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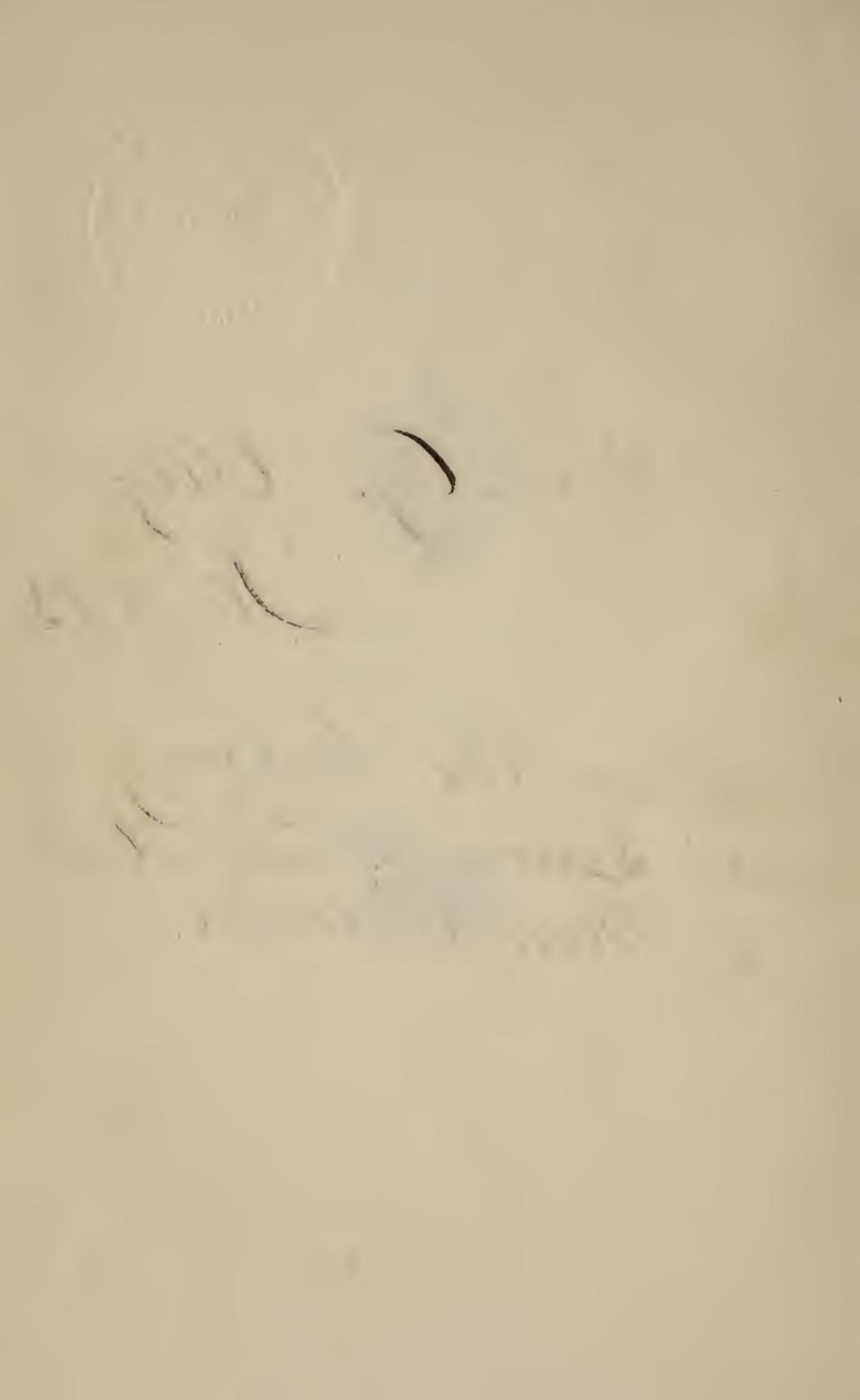
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THE MAGAZINE
OF
HORTICULTURE,
BOTANY,

AND ALL USEFUL DISCOVERIES AND IMPROVEMENTS IN
RURAL AFFAIRS.

“Je voudrais échauffer tout l'univers de mon got pour les jardins. Il me semble qu'il est impossible qu'un méchant puisse l'avoir. Il n'est point de vertus que je ne suppose à celui que aime à parler et à faire des jardins. Pères de famille, inspirez la jardinomanie à vos enfans.”—*Prince De Ligne*.

VOL. VIII.
1842.

EDITED BY C. M. HOVEY.

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PREFACE.

THE Eighth Volume of the Magazine is now completed, and a reference to the table of contents will show its value, as compared with previous years.

The increased attention which is now being given to the cultivation of choice fruits, has induced us to devote a larger part of our articles to this subject; and among the many valuable papers of the year, we only need name those of our late friend and correspondent, Mr. Manning, of the Pomological Garden, Salem. His descriptions of new pears, and his notice of forty-four kinds of cherries which he fruited and proved in 1842, will be read with delight by every cultivator. To an obituary notice of Mr. Manning, which will appear in the next volume, we refer the reader for a list of the several communications which he has contributed to our pages—containing all he has written of any value, since the publication of his *Book of Fruits*.

It will be unnecessary to give any analysis of the several papers in the Eighth Volume; but we cannot omit to name the notice of Mr. Rivers's pamphlet on Root Pruning, at page 210, or the several papers upon the habits, diæcious character, and cultivation of the strawberry. That the communications on this subject have been exceedingly valuable, we believe all will admit; and although the question in regard to the sexual character of many sorts may not be satisfactory to all, yet we doubt not the facts which have been elicited will lead to the production of more prolific crops of the larger varieties. Among our floricultural articles, the communication by Mr. Saul, upon the autumn treatment of green-house plants, will be found highly interesting. Prof. Russell's paper on that beautiful tribe, the *Oxalis*, in which the several species are correctly ascertained, their synonyms detected, and their cultivation noticed, is valuable to the lover of pretty green-house plants.

We enter upon the new volume with renewed zeal. We invite our friends to assist and sustain us; and it will be our object and aim to embody in the pages of the Magazine, every thing useful to the American horticulturist.

C. M. H.

Boston, Dec. 1, 1842.

CONTENTS.

ORIGINAL COMMUNICATIONS.

GENERAL SUBJECT.

A Retrospective View of the Progress of Horticulture in the United States, during the year 1841. By the Editor	1
Notes made during a Visit to New York, Philadelphia, Baltimore, and Washington, and intermediate places, from August 8th to the 23d, 1841. By the Editor	41, 81, 121
An Account of the Lowell Cemetery, its Situation, Historical Associations, and particular description. By W.	47
On the Study of Natural History; being extracts from an Address delivered before the members of the Harvard Natural History Society, at Cambridge. By J. L. Russell, A. M., Prof. of Botany, &c. to the Massachusetts Horticultural Society	241
Some Account of the <i>Magnolia macrophylla</i> , its discovery in a new locality, together with a notice of the Nursery of N. W. Hatch, Vicksburg, Miss. By Alexander Gordon	332
On a Method of destroying the Canker worm grub. By John Porter, Esq., Newburyport, Mass.	361
New localities of the <i>Magnolia macrophylla</i> , with the dimensions of a large tree of the <i>M. grandiflora</i> ; and a notice of a newly discovered species of <i>Sarracenia</i> . By A. Gordon	401

LANDSCAPE GARDENING.

Notes on Belts of Trees in Ornamental Plantations. By A. J. Downing, Botanic Garden and Nurseries, Newburgh, N. Y.	220
--	-----

HORTICULTURE.

On the Cultivation of the <i>Sycios edulis</i> as a culinary fruit. By J. D. Legare, Esq., Editor of the Southern Agriculturist	51
On the cultivation and management of forced Cucumbers in Hot-beds. By J. W. Russell, Worcester, Mass.	53
Pomological Notices; or Notices respecting new and superior varieties of Fruits, worthy of general cultivation. By the Editor	161, 249
Notices of thirty-nine varieties of new Pears, which ripened their fruit in the Pomological Garden, during the year 1841. By R. Manning, Esq., Pomological Garden, Salem, Mass.	56
Notice of forty-four varieties of Cherries, fruited at the Pomological Garden, Salem, Mass., in the season of 1842. By R. Manning, Esq.	281

Desultory Remarks upon variations in Fruits. By R. Manning, Esq., Pomological Garden, Salem	86
Description of a new variety of Plum, called the Columbia; with some Remarks on the culture of the Plum, the destruction of the Curculio, &c. By A. J. Downing, Botanic Garden and Nurseries, Newburgh, N. Y.	90
On the Cultivation of Salsify, (<i>Tragopogon porifolius</i> .) By the Editor	129
On the comparative merits of the Isabella and Catawba grapes; with a Notice of a new native variety, called the Ohio grape, and Observations on the cultivation of Grapes from seed. By N. Longworth, Esq., Cincinnati, Ohio	167
Some Notice of the Poire d'Angora, (Angora pear,) with a translation of a letter written by M. Leon le Clerc to the President of the Academy of Sciences, respecting its origin, &c. By J. W. Knevels, Esq., Fishkill, N. Y.	169
On the cultivation of the Grape vine in Graperies; being a Diary of the progress of the vines, from the first application of heat to the maturity of the fruit. By O. Johnson, Esq., Lynn, Mass.	201
On Root pruning of Pear trees; to which is added a short treatise on the subject, read before the London Horticultural Society, April 7, 1840. By T. Rivers, Jr., of the Sawbridge-worth Nurseries, near London	210
A new disease of the Plum. By Dr T. W. Harris, author of the Entomological Report of the State	247
Observations on different varieties of Strawberries, and the means of producing good crops of fruit. By N. Longworth, Esq., Cincinnati, Ohio	257
Some Account of a new variety of the <i>Malus microcarpa</i> ; translated from the Bulletin of the Societe d'Horticulture de Rouen, for 1841. By the Editor	266
Some Remarks on the growth of the Strawberry, with reference to the diæcious character of the large varieties. By J. C. G.	288
The Canker Worm; its habits, and Remarks on the best means of preventing its ravages. By J. C. G.	321
Remarks on the cultivation of the Currant. By the Editor	324
Some account of the origin, cultivation and fruit of the Ohio Ever-bearing Raspberry. By A. H. Ernst, Nurseryman, Cincinnati, Ohio	362
On the cultivation of the Raspberry. By the Editor	364
Notice of a large Pear tree in Indiana. By the Rev. H. W. Beecher, Indianapolis, Indiana	403

- Additional Remarks on the fertile and sterile character of several varieties of Strawberries; with a notice of a new native species of the Strawberry, from the Prairies of Iowa. By N. Longworth, Esq., Cincinnati, Ohio . 404
- Remarks on the Sterility of several kinds of Strawberries; and a Query respecting the best method of Insuring the fertility of old plantations. By D. W. Coit, Esq., Norwich, Con. 406

FLORICULTURE.

- On the cultivation and treatment of *Antholyza æthiópica*; with some Remarks upon the growth of Cape bulbs, belonging to the natural order *Iridacææ*. By A. Saul, foreman in the Botanic Garden and Nurseries of A. J. Downing & Co., Newburgh, N. Y. 94
- Attempt to ascertain more correctly the species of *Oxalis* cultivated in our green-houses; with Observations on other species of a more hardy character. By John Lewis Russell, Prof. of Botany and Vegetable Physiology to the Massachusetts Horticultural Society, &c. 130
- Some Notice of a new variety of the Michigan Rose, (*Rosa rubifolia*) By an Amateur 134
- Remarks on the method of raising seedling Camellias, as practised in Washington, D. C. By Dr. J. S. Gunnell 171
- On forcing the Chinese Chrysanthemum, so as to produce flowers in May. By J. B. Garber, Columbia, Pa. 172
- Description of three new seedling Camellias, raised in Georgetown, D. C. By Robert Dick 223
- On the cultivation of *Lachenalias*. By the Editor 290
- On the cultivation of the *Amaryllis Beladonna*. By the Editor 410
- Observations on the Autumn treatment of Green-house plants. By A. Saul, foreman in the Botanic Garden and Nurseries of A. J. Downing & Co., Newburgh, N. Y. 411
- Floricultural and Botanical Notices of New Plants, figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens, and additional information upon plants already in cultivation 12. 64. 96. 135. 173. 224. 291. 333

REVIEWS.

- The Theory of Horticulture; or an Attempt to explain the principal operations of Gardening, upon Physiological principles. By John Lindley, Ph. D., F. R. S., &c. &c. First American edition, with Notes, &c. By A. J. Downing and A. Gray 18
- The Farmer's Companion; or Essays on the principles and practice of American husbandry; with the Address prepared to be delivered before the Agricultural and Horticultural Societies of New Haven, Conn.; and an Appendix, containing tables and other matter useful to the farmer. By the late Hon. Jesse Buel, Conductor of the Cultivator. Third edition, revised and enlarged. To which is prefixed a Eulogy on the life and character of Judge Buel, by Amos Dean, Esq. 32
- Organic Chemistry, in its application to Agriculture and Physiology. By Justus Liebig, M. D., F. R. S., &c. &c., Prof. of Chemistry in the University of Geissen. Edited from the manuscript of the author, by Lyon Playfair, M. D. Second American edition, with an Introduction, Notes, and Appendix, by John W. Webster, M. D., Prof. of Chemistry in Harvard University 33
- The Orchardist's Companion; a Quarterly Journal, devoted to the history, character, properties, modes of cultivation, and all other matters appertaining to the Fruits of the United States, embellished with richly colored designs of the natural size, painted from the actual fruits when in their finest condition, and represented appended to a portion of the branch, with leaves and other characteristics as seen when on the tree; also the flowers, cut fruits, and stones. A. Hoffy, Editor and Proprietor 144
- Fourth Report of the Agriculture of Massachusetts; Counties of Franklin and Middlesex. By Henry Colman, Commissioner of the Agricultural Survey of the State 146
- A Muck Manual for Farmers. By Samuel L. Dana 182
- Boston Journal of Natural History; containing papers and communications read before the Boston Society of Natural History, and published by their direction 185
- Chemistry in its application to Agriculture and Physiology. By Justus Liebig, M. D., Ph. D., F. R. S., M. R. I. A., Prof. of Chemistry in the University of Geissen, &c. &c. Edited from the manuscript of the author by Lyon Playfair with very numerous additions, and a new chapter on soils. Third American, from the second English edition; with Notes and an Appendix, by John W. Webster, M. D., Erving Prof. of Chemistry in Harvard University 319
- Address delivered at Washington, Mis., before the Agricultural, Horticultur-

ral and Botanical Society of Jefferson College. By B. L. C. Wailes, President of the Society, on the 29th of April, 1842 369
Cottage Residences; or a series of Designs for Rural Cottages, and Cottage Villas, and their gardens and grounds; adapted to North America. By A. J.

Downing, author of a treatise on Landscape Gardening. Illustrated by numerous engravings 414
An Address delivered before the Massachusetts Hortical. Society, at their Fourteenth Anniversary, Sept. 16th, 1842. By J. E. Teschemacher, Corresponding Secretary of the Society 418

MISCELLANEOUS INTELLIGENCE.

GENERAL NOTICES.—On the management of Bulbs, after being long out of ground, 187; On the growth of Succulent Plants, 188; Cultivation of *Salvia fulgens*, 229; Cultivation of Rhubarb, 229; On the cultivation of Asparagus in Spain, 229; New method of supporting Annuals, 231; Cultivation of the English and Spanish Irises, 231; Flower beds or Lawns, 232; To stop the bleeding of Vines, 232; Pruning Black Currants, 262; *Hemerocallis carulea*, 262; To kill Moss on Gravel Walks, 263; Taking up Hyacinth Bulbs, 263; Pruning Forest trees, 263; Treatment of some kinds of Dahlias, 263; Cultivation of *Salvia patens*, 263; Characteristics of new Dahlias, 264; Bone Dust for Manure, 265; Nitrate of Soda, 265; Cultivating Chinese Roses, 266; Vanilla, 266; New Ribes, 266; Bokhara Clover, 266; A hardy sort of Rice, 266; Nitrate of Soda on Evergreens, 267; *Cyripedium insigne*, 267; Guano Manure and Potatoes, 267; Stopping Vines, 269; Preserving Flowers fresh for a long period, 302; Cultivation of choice kinds of Petunias, 302; Gas Tar for Gravel Walks, 302; New Method of growing Asparagus at Nice, 303.

FOREIGN NOTICES.

England.—American Grapes, 34; Pruning Fruit trees, 35; Cultivation of Satvias, 35; Cinerarias, 35; Destroying the Gooseberry Caterpillar, 35; Cultivation of the Camellia, 103; New Dahlias, 105; Exhibition of the London Horticultural Society for May, 1842, 303; Great crop of Grapes, 310; Exhibition of the London Horticultural Society for June, 1842, 338; English Dahlia Exhibitions for 1842, 441;
France.—Cultivation of Roses, 269.
Austria.—Description of the Garden and Collection of Plants of Baron Ven Hugel, near Weimar, 189.

DOMESTIC NOTICES.

Premium of the Massachusetts Agricultural Society for the best Apple Orchard in the Commonwealth, 36; Ripe Tomatoes, 37; *Prunus virginiana* as a stock for the Plum, 37; *Chorozema varium*, 37; Specimens of Pears, 73; Discussion upon the growth of Fruit trees, 74; Horticulture in Philadelphia, 152; The Angora Pear, 152; Specimen Pears, 152; Horticulture in Kentucky, 152; Pennsylvania Horticultural Society, 194; The Cinnamon Rose for a stock for budding, 195; Horticulture in western New York, 195; Botanical In-

telligence, 195; Pennsylvania Horticultural Society, 233; Mr. Perry's collection of Plants for sale, 233; New Work on Cottage Residences, 233; Cattle Show and Fair of the New York Agricultural Society, 270; New Seedling Strawberry, 270; Live plants, seeds, bulbs, &c., from the Exploring Expedition, 271; Hoveys' Seedling Strawberry, 271; Horticultural Exhibition in Hartford, Ct. 272; Fourteenth Annual Exhibition of the Massachusetts Hort. Soc. 311; Mr. Walker's Carnation Show, 311; Fine Seedling Pinks in Washington, 311; *Cereus Napoleonis*, 312; Sun Dials for Garden Ornaments, 312; Fourteenth Exhibition of the Pennsylvania Horticultural Society, 349; Horticultural Exhibition of the Burlington Lyceum, 349; Lard Oil, 350; Nursery of T. Allen, Winchester, Va., 350; Bloodgood Nursery of Messrs. Wilcomb & King, Flushing, L. I., 350; Horticulture in Virginia, 350; Cultivation of the Grape Vine in Vineries without heat, 350; Large Currants, 351; Ross's Phenix Strawberry, 351; Mr. Nuttall the Botanist, 352; Mediterranean Wheat, 352; The Rev. H. Colman, 352; Notes on the Climate of Ohio, and the state of Gardening in Cincinnati, 425; The Century Plant or American Aloe, 427; Crop of Grapes in Ohio, 427; Agricultural and Horticultural Exhibition in Kings County, N. Y., 427; The Ohio Grape, 428; Gardening in Indiana, 428; *Iridæ*—*Gladiolus natalensis*, 428; Fair of the American Institute, 428.

Pennsylvania Horticultural Society.—Monthly Meeting, 110; Rules for awarding Premiums for new plants, seeds, &c. 197; Monthly Meeting for Exhibition, 272.

Massachusetts Horticultural Society.—Report of the Flower Committee offering premiums for 1842, 75; Appropriation for premiums, 75; Report of the Committees on flowers, fruits and vegetables, awarding premiums for 1841, 112, 113, 115; Report of the Fruit and Vegetable Committee offering premiums for 1842, 116, 117; Exhibitions, 157; Exhibitions and Premiums for Tulips awarded, 235; Exhibitions and Premiums for Pronies and Roses awarded, 274; Exhibitions and Premiums for Carnations awarded, 313, 316; Committee of Arrangements for Annual Exhibition, 315; Exhibitions, 353; Annual Exhibition and Festival of the Society, 371; Grand Dahlia Show, 395; Exhibition and Subscription Dahlia Show, 433, 434; Officers of the Society for 1843, 434.

Exhibitions of Horticultural Societies.—Essex County Natural History Soc'y, 416; Middlesex County Horticultural Society, 457; Worcester County Horticultural Society, 453; Horticultural Exhibition of the New York State Agricultural Society, 465; Fifteenth Annual Fair of the American Institute—Horticultural Exhibition, 468.

Retrospective Criticism.—The Linnaean Botanic Garden and Nurseries, Flushing, L. I., 109; The Linnaean Botanic Garden and Nurseries, 153; The wrong Name, 154; Clairmont Nursery near Baltimore, 155; Hybridizing Camellias with the pollen of different varieties, 156; The Glout Morceau Pear, 156; Linnaean Botanic Garden and Nursery, Flushing, L. I., 196; *Camellia* var. *Covingtonii*, 196; *Camellia* var. *Hempsteadii* and *Landréthii*, 196; The Garden and Grounds of the President's house, 196; Pennsylvania Horticultural Society, 234; Fisher Professor-

ship of Natural History in Harvard University, 234; Glout Morceau Pear, 235; Glout Morceau Pear, 312; *Tuckermánia californica*, 353; Producing good crops of Strawberries, without regard to male and female blossoms, 353; Glout Morceau Pear, 429.

Panvil Hall Market.—January, 38; February, 78; March, 118; April, 158; May, 198; June, 237; July, 278; August, 318; September, 358; October, 398; November, 438; December, 471.

Horticultural Memoranda.—January, 39; February, 79; March, 119; April, 159; May, 199; June, 239; July, 280; August, 319; September, 359; October, 399; November, 440; December, 472.

Obituary Notices.—William Prince, 238; M. A. P. De Candolle, 239; Alymer Bourke Lambert, 239; Archibald Menzies, 239; David Don, 239; Robert Manning, 439.

LIST OF PLANTS IN VOL. VIII., P. 473.

LIST OF ENGRAVINGS.

FLOWERS.		FRUIT.	
Male Strawberry blossom, <i>fig.</i> 8 . . .	258	PEARS.	
Female Strawberry blossom, <i>fig.</i> 9 . . .	258	Queen of the Low Countries pear, <i>fig.</i> 1 . . .	59
DIAGRAMS.		Dumortier pear, <i>fig.</i> 2 <i>a</i> . . .	61
Plan showing the error in the common mode of planting belts of trees, <i>fig.</i> 6 . . .	221	Passans du Portugal pear, <i>fig.</i> 2 <i>b</i> . . .	61
Plan showing the picturesque mode of planting belts of trees, <i>fig.</i> 7 . . .	222	Belle of Flanders pear, <i>fig.</i> 3 . . .	62
		Muscadine pear, <i>fig.</i> 4 . . .	63
		PLUMS.	
		Columbia plum, <i>fig.</i> 5 . . .	91

LIST OF CONTRIBUTORS.

A Fruit Grover	156. 312	Holmes, E.	155
An Amateur	37	Ives, J. M.	73
An Amateur	134	J. C. G.	288. 321
An Amateur, Philadelphia	137. 152. 156. 181. 195. 196. 228. 233. 334	Johnson, O.	201
An Old Member	224	Knevels, J. W.	169
Allen, T.	350. 353	Legare, J. D.	51
Beecher, Rev. H. W.	403. 428	Longworth, N.	168. 257. 404. 427. 428
Buist, R.	271	Manning, R.	56. 86. 152. 281
Callan, J. F.	196	M. T.	39. 79. 119. 159. 199. 238. 279.
Coit, D. W.	406		319. 359. 399. 439
Dick, R.	223. 227	Philo Vitis	351
Downing, A. J.	90. 120	Porter, John	361
E. D. II.	152	Prince, Alfred	110
Editor	1. 13. 35. 37. 41. 57. 66. 74. 81. 90. 97. 120. 129. 137. 161. 175. 195. 212. 228. 233. 235. 249. 262. 270. 271. 285. 290. 292. 294. 311. 324. 334. 350. 351. 364. 409. 410. 427. 429. 430. 439. 445	Prince, W. R.	110
Elliott, C. W.	427	Russell, Prof. John Lewis	130. 241
Ernst, A. H.	362	Russell, J. W.	53
Garber, J. B.	173	Saul, A.	94. 411
Gordon, Alexander	332. 401	Sinclair, R.	156
Gunnell, J. S.	171. 175. 196	S. W. T.	195
Hancock, T.	350	Thorburn, George C.	37
Harris, Dr. T. W.	247	Tucker, L.	271
		W.	47
		W.	457
		Walker, Samuel	235. 430
		Watson, G.	353
		Winter, Gabriel	154. 196
		**	32

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THE MAGAZINE
OF
HORTICULTURE.

JANUARY, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *A Retrospective View of the Progress of Horticulture in the United States, during the year 1841.* By the
EDITOR.

THE taste for horticulture continues to increase throughout the country with much rapidity, and new gardens, villa residences, and commercial establishments for the sale of nursery productions, are every where increasing. From the great extent of territory over which the gardening operations of this country are spread, the rapidity with which improvement has taken place cannot be so easily perceived: if they were all reduced to an extent of surface within the compass of that of England, what is accomplished every year would astonish the most accurate observer. But scattered over twenty-six States, and comprising an area of two millions of square miles, it is scarcely possible to form an accurate opinion of the advancement of horticulture in this country.

After the detailed notices which have appeared in our last volume, upon the gardens and state of gardening in New York and Philadelphia, and with the continuation of the same article, which will appear in the succeeding numbers of the Magazine, giving the results of our tour in Baltimore and Washington, there will be less for us to say at this time, without in some degree repeating what we have already advanced. We shall therefore, as briefly as possible, note down the more important improvements which have marked the progress of horticulture for 1841, referring, as occasion may require, to the various articles and papers which have appeared in the past volume.

The season of 1841 was somewhat similar to that of the preceding one. The summer was unusually dry, and the autumn exceedingly wet. January, February, and March were months of average temperature with seasons in general. April opened mild and pleasant, and an early spring was anticipated; but the latter part of the month was cool and cloudy, with dull weather and continued rains. In May, unremitted showers fell until about the 18th or 20th of the month: a sudden change then took place; the sun shone with great brilliancy from a clear and unclouded sky; the earth put on its livery of green, and vegetation advanced with great rapidity. In the short space of five days, the trees, which had previously scarcely swelled their buds, now put forth their blossoms in abundance, promising a rich harvest. Planting, which had been delayed from the latter part of April, from the redundancy of wet, was soon completed, though many crops were too late to do well. Up to the middle of June, warm showers fell, which encouraged vegetation; but dry weather set in about the 25th, and during July and August, rain did not fall sufficient to wet the surface of the soil. Crops suffered exceedingly; in many places they were totally dried up: fruits suffered, particularly strawberries, of which more than half of the crop was cut off. In September a few refreshing rains fell, which revived the suffering vegetation. October was mild and pleasant, without any frost until the middle of the month. November continued mild for the season, with several heavy rains at the close of the month.

The fruit crop, in some parts of the country, was good; in others, a complete failure. The peaches, in New Jersey, were entirely cut off: in New England, they were never so abundant. In the western part of New York, fruit of all sorts was a scanty product. Pears and plums, in the vicinity of Boston, were more plentiful than in ordinary seasons. The rains of September destroyed a great portion of the plum crop, by the cracking of the fruit just as it was attaining perfection.

LANDSCAPE GARDENING.

It is with a great degree of pleasure that we are enabled to announce that more attention has been directed to this important branch of gardening than heretofore. In our article de-

scribing Mr. Downing's residence,* we have already alluded to this, and stated what, in our opinion, was the cause of the increased interest which was apparent in the vicinity of our large cities. This taste is but the commencement of a better state of things, which, by the aid of Mr. Downing's volume upon the subject, we hope will be more speedily brought about. We have already commended this work to our readers. Until its appearance, we were not aware that so many places of interest to the landscape gardener were to be found in the country. But from Mr. Downing's excellent descriptions of Blythewood, Hyde Park, and other residences on the Hudson river, we have among us examples of parks and pleasure grounds, which, if not equalling in their high keeping and details, English residences of the same extent, may be studied by every planter of ornamental grounds with great instruction.

No. 1, of our series of illustrations of the principles of landscape gardening, intended with a view to aid in laying out, planting, and ornamenting grounds, has already appeared. It will be followed by others, of greater and less extent of surface, and will include residences varying in size from a quarter of an acre to a hundred acres. We have now in view the plans of two or three fine places, which will appear in the course of the volume.

ARBOREICULTURE.

Nothing can appear more strange to a lover of ornamental trees and shrubs, particularly to those who are acquainted with a great portion of our native species, than to see with

* We regret that in the haste of writing out our account of Mr. Downing's grounds, (Vol. VII., p. 401,) part of which was from memory, that some errors occurred, which should be corrected. They are as follows:—

On p. 407, two lines from the top, when speaking of the ample dimensions of the hall, we stated "ten by twelve feet," which should read "sixteen by twenty feet." The library, instead of occupying the same space as the hall, is "eighteen by twenty feet." Our readers will see the injustice we did to Mr. Downing's taste, in making the rooms so small. P. 408, four lines from the bottom, "*P. Groëniï*" should read "*P. picta*," and "*P. intermèdia*" should read "*P. Groëniï*." Since our visit to Mr. Downing's place, a handsome Gothic entrance gate has been erected, in the place of the Grecian one which we noticed.—*Ed.*

what a sparing hand such kinds are introduced into the gardens, and around the dwellings of country residences. In most instances, all the shade trees and ornamental shrubs are confined to eight or ten kinds, and whether the grounds are the extent of an acre, or of twenty, the same sorts are repeated, until they become, from their great number, neither objects of interest or beauty, otherwise than as affording dense masses of shade and shelter.

How different would be the impression made upon the spectator, were such trees and shrubs selected for the size, color, richness, or singularity of their foliage,—the brilliancy of their fruit, or their botanical character. In the place of a few firs and pines and common shrubs, why should we not see the graceful drooping of the Norway spruce; the glossy leaves of the magnolias; the tulip tree, for its noble flowers; the purple beech, for its dark foliage, contrasting with the lighter hues of other vegetation; the *Ulmus alata*, for its singular shoots; the weeping ash, weeping cherry, and weeping laburnum; the *Salisbùria adiantifolia*; and among smaller shrubs, the Cornelian cherry, with its scarlet fruit; the hawthorns, with their crimson or golden haws; the deep green of the rhododendrons and laurel, (*Kálmia latifolia*?) But we need not multiply the list here, as our only object was to bring to the minds of our readers the great number of hardy trees and shrubs which are suitable for planting out, to give variety and increased interest to villa residences. We shall endeavor to bring this subject frequently before our readers, in order to have them become familiarized with the kinds of trees adapted for ornamental purposes in our climate.

HORTICULTURE.

The cultivation of new and choice varieties of fruits is attracting the earnest attention of cultivators: in no department of horticulture has there been so perceptible an improvement as in the growth, and the introduction, either from abroad, or by native seedlings, of new fruits. The old varieties, many of which were never remarkable for any peculiar qualities, are removed to give place for those kinds which produce good crops of excellent quality. The introduction of the new Flemish pears, generally greatly superior to the best of the older kinds, has created a demand which nursery-

men have not been fully able to supply. Our correspondent, Mr. Manning, of Salem, has been indefatigable in his exertions to procure every new fruit from abroad, and he has, the past year, fruited several new sorts, scions of which were received directly from Dr. Van Mons. At the annual exhibition of the Massachusetts Horticultural Society, in September last, he exhibited upwards of one hundred and twenty-five varieties of pears. Mr. Kenrick, whose article upon some of the gardens and nurseries around London, appeared in the past volume, (p. 231,) brought out with him, on his return, a few new kinds of fruits. He also received a package of scions of new sorts from M. de Wael, of Antwerp, consisting of the best of that amateur's very extensive collection of fruit trees. The former are described, and the names of the latter are enumerated, in Mr. Kenrick's new edition of the *American Orchardist*. Under the head of our Pomological Notices, we shall mention all the new fruits which have been recently introduced.

Mr. Manning's article in the last volume, (p. 41,) describing one hundred and six varieties of apples which he has proved, is one of the most interesting papers to the pomologist. To establish a correct nomenclature appears to be the whole effort of Mr. Manning: he has spared no pains to collect from all sources, and test the correctness of each. We have the promise of one or two articles from him, which we hope to offer in an early number of the Magazine. To cultivators of peach orchards, the article by Mr. Hancock, (Vol. VII., p. 90,) is recommended, as giving information upon this subject; and, in connection, Mr. Sinclair's article upon the disease called the *yellows*, which is so fatal to the peach in the southern and middle States. Dr. Hildreth's article is perhaps as valuable a practical communication as the volume contains. Mr. Russell's article, together with our own, on planting fruit trees, will afford some useful information on this subject, too often considered sufficiently understood, by many cultivators.

The science of vegetable culture has received important additions in the works of Dr. Lindley and Dr. Liebig, the latter of which was fully reviewed in our last volume, (p. 344,) and an extended notice of the former appears in the present number. Other contributions to this subject will be found in the articles on the growth of plants in charcoal, (Vol.

VII., p. 249,) and the notice of Mr. Rivers's system of pruning the roots of trees. The latter subject is now attracting much notice in England, and we shall give an abstract, as early as possible, of the different opinions advanced in relation to it, in various communications in the *Gardener's Chronicle*.

The Massachusetts Horticultural Society, encouraged by the success which attended the offer of the liberal premium for the destruction of the rose-slug, voted a similar award to the individual who should discover an effectual method of preventing the curculio from injuring the plum and other fruits. The Committee on Fruit, to whom the subject was referred, have already received one communication, which was read before the Society, but which has not been published. As the season approaches, we trust individuals interested in the cultivation of the plum, to which fruit the curculio seems more particularly to wage eternal war, will try experiments for the destruction of this most injurious insect. The canker worm grub is now most easily, speedily, and economically prevented from ascending trees, by a mixture of India rubber, oil, and tar, a composition which retains its stickiness for a long time; and also by India rubber alone, as recommended by a correspondent, in our last volume, (p. 17.) The *patent* lead troughs are expensive, and of very little use.

Of the new fruits introduced the past year, which deserve more particular notice, we may mention the Victoria, the Cannon Hall Muscat, and the West's St. Peters grapes, if the latter is, in reality, different from the old St. Peters: an account of these varieties, by a correspondent, has already been given in our last volume, (p. 423.) Plants of the Swainstone Seedling strawberry were introduced by Mr. Kenrick, but with what success we have not been informed. A reference to our report of the Massachusetts Horticultural Society's last annual exhibition will show the great number of fruits which have been exhibited the past season, and among those shown by Mr. Manning, the names of several new varieties. In the report of the Pennsylvania Horticultural Society, (Vol. VII., p. 468,) some new American grapes are noticed. The new banana, (*Musa Cavendishii*), has been introduced, and we saw plants of it in several collections in New York and Philadelphia, last autumn, but it has not yet, we believe, fruited. Its compact growth, the small space it occupies in the

hot-house, the ease with which it is cultivated, and the richness of its fruit, have rendered it a most valuable plant in England.

In the early part of the season, some mention was made of the receipt of the seeds of a new tomato, found by the botanists attached to the United States' Exploring Expedition, but we have not yet heard of its having ripened any of its fruit: we saw plants of it in August, in Philadelphia and Baltimore. For notices of new or recently introduced vegetables the reader is referred to our articles in the past volume, (pp. 92 and 134.)

FLORICULTURE.

No one feature in the progress of floriculture is more apparent than that of the increase of seedling productions. The new varieties of the camellia, verbena, azalea, roses, and cacti, are evidences of the zeal and skill of our amateur and practical gardeners, in attempting the growth of new plants by means of the process of hybridization. It is but a short period since these experiments were tried, except by a few individuals: it is now no uncommon thing to find amateur collections stocked with seedling plants of all kinds: the result must be, in the course of a few years, a race of new and beautiful plants, equalling, if not surpassing, the varieties which are introduced from abroad.

From time to time, under our Floricultural Notices, we have mentioned many new seedling plants. Among the camellias, we may note here *C. var. Wilderi*, *Binneyi*, and *Hempsteadii*, as superior flowers, and fully equal to any of the varieties which have ever been raised in England. The number of seedling verbenas has been greatly increased, and many improved and beautiful varieties have been obtained. The brilliant tribe of azaleas has received some fine additions in several seedlings raised in Philadelphia, and described in our last volume, (p. 223.) And, lastly, the rose and the cactus have had some superior additions by seedlings, which have been produced in Baltimore, particulars of which will be found when our notes appear on the gardens of that city.

Some of the more recent and important additions to our gardens, are the seedling chrysanthemums which have been raised in England by Messrs. Chandler and others: this neglected flower, from the perfect character of the new varieties,

is now again likely to take its proper rank. The new sorts flower abundantly and early, and are very perfect in their form. The pelargonium has also received additions of many of the choicest English varieties. The pansy is yet grown only to a limited degree, but it merits a fair share of the florist's attention. Many new roses have been received, and our collections now contain fine selections of kinds.

Among the more rare things, we may notice *Lilium lancifolium* album, as having flowered and been exhibited before the Massachusetts Horticultural Society: it is a most splendid variety. *Lisianthus Russellianus*, a plant which has made considerable noise in England, we saw in many collections in New York and Philadelphia, and plants of it were exhibited at the annual exhibition of the Massachusetts Horticultural Society; it is a very showy plant. Among the new annuals, the new orange flowered thunbergia, (*T. alata* var. *aurantiaca*,) has flowered freely all summer, in the collection of Messrs. Hovey & Co. The collection of cacti, in the possession of J. B. Smith, of Philadelphia, is one of the richest in the country, and contains many singular, grotesque, and curious forms, peculiar to this extensive tribe. Several new azaleas, camellias, and other plants, have been imported since last year, and notices of them will be found under our Floricultural Notices in the last volume.

Among the articles in the past volume, more particularly interesting to cultivators of flowers, we may mention the article on the propagation of plants, by cuttings in charcoal; this subject has been considerably agitated in Germany, and several articles have been translated and published in the *Gardener's Magazine*; but we believe we have condensed the substance of it in our article. We would advise some experiments by the process which has been detailed, in connection with those of the ordinary modes, in order that the true value of the system may be fully tested. Not less interesting is the review of Liebig's *Chemistry*. An excellent article upon the growth of camellias, (p. 214,) in the parlor, has been contributed by Dr. Gunnell, which is deserving an attentive perusal by all who wish to cultivate this beautiful plant in such a situation. If a proper selection of fine flowering varieties is made, and the directions contained in the article followed, success must be the result. An extract from the *Gardener's Chronicle*, (p. 302,) giving the mode of growing

the pelargonium, as practised by Mr. Cattleigh, one of the most successful cultivators in London, is invaluable to all who wish to procure superior specimens of this popular and showy flower. The two reports which we have given of the exhibition of the London Horticultural Society, are sufficiently interesting to deserve the attention of all possessors of plants. Amateur cultivators should not rest satisfied with their labors, until they can attain the same degree of excellence in the growth of these plants. We believe all will agree with us, that the great aim of a gardener should be, to grow his plants to the highest degree of perfection; and that a common plant, covered with blooms and rich foliage, possesses greater attractions, than a stunted, ugly shaped, and meagre flowering variety, merely because it has the merit of a new name. Grafting the *Cacti* is very extensively practised in Baltimore, but as we shall refer to the subject when we give the details of our visit to that city, we omit it at this time.

COMMERCIAL GARDENS.

It is gratifying to observe a better demand for plants and shrubs, than has been the case in former years. The demand for fruit trees, in particular, has been greater than the supply, and the stock, in many instances, has been reduced below what are considered good saleable trees. This has occurred with pears and apples, of which there are few nurseries, possessing a supply of the newer and better sorts, that are able to furnish good sized trees. The constant and certain demand, creates such a continued drain upon the young stock, that it has not time to acquire a good size. This demand for trees, has caused the establishment of some new nurseries in various parts of the country.

In the vicinity of Boston, Messrs. Hovey & Co. have increased their facilities for supplying all the productions of the garden. They have become the proprietors of a fine spot of ground, containing upwards of thirty acres, only two and a half miles from the city, which they intend to devote to the purposes of a nursery, flower garden, &c. They have erected a large and splendid conservatory, eighty-four feet long by twenty-two feet wide, which will be finished early the approaching spring; it is a span-roofed house, and will be complete in every part. We shall give some engravings of it in an early number of

the Magazine, as the drawings are already made; we shall then notice it at some length. Mr. McCullough has rebuilt the range of houses which were destroyed by fire last year. Messrs. Kenrick's and Winship's nurseries are well stocked with a fine collection of fruit trees, ornamental trees, shrubs, &c. Mr. Kenrick is now absent in England, and will probably send home fruit trees in addition to his own stock. In Salem, our correspondent, Mr. Manning, has been extending his nursery, and is now able to supply a greater number of trees than heretofore.

Some changes have taken place in the old establishment of Messrs. Prince, of Flushing, N. Y. Mr. G. R. Garretson has become the proprietor of the grounds heretofore known as the Linnæan Botanic Garden. A new establishment, under the management of Parsons & Co., located at Flushing, has also issued a very good catalogue of trees and shrubs. Messrs. Wilkom & King, of the same place, are very extensive nurserymen. Of the establishment of Messrs. Downing & Co., at Newburgh, it is unnecessary for us to remark here, as we have already given a detailed account of the grounds, the collection of fruit trees and shrubs, &c., (Vol. VII., pp. 372 and 401.) Mr. Thorburn has rebuilt and enlarged his greenhouses since their destruction by fire last winter, and has now a very large collection of plants. Other commercial gardens in New York we have noticed at length in the last volume.

Some account of the state of gardening in New Jersey has been given in our last volume by a correspondent, and several fine gardens in Princeton particularly described. Our correspondent, Mr. Hancock, of Burlington, has made many improvements, which we have already noticed.

It is in Philadelphia that there seems to be the most active spirit prevailing among commercial gardeners. The Pennsylvania Horticultural Society is accomplishing much, by its semi-monthly and annual exhibitions, and the energetic manner in which it is conducted. The nurserymen continue to enlarge their establishments, and increase their stock of plants, for which they find a ready sale. We have already noticed the improvements which have taken place the past year.

In Baltimore, there is more attention being given to the cultivation of choice fruits than heretofore, and the collections of several amateurs comprise many of the newest sorts. There does not appear to be any nurserymen here who have taken

pains to introduce the better kinds of fruit, except Mr. Sinclair, of the Clairmont Nursery, and his whole collection of fruit, though very good, only numbers about 300 sorts. The establishments of the Messrs. Feasts have been considerably enlarged since 1839, and contain good collections of plants.

Our visit to Washington the past summer enabled us to gather some information of the state of gardening in the District. Our notes on the various places we visited will appear as soon as we can find room. The most extensive establishments appear to be those of Messrs. Buist, Douglas, and Pierce. The former, in the central part of the city, we found stocked with a choice assortment of roses, camellias, geraniums, &c. Mr. Douglas's, a mile or so out of town, and Mr. Pierce's, still further, we found in good condition. Mr. Pierce's grounds are more occupied with fruit and forest trees than with green-house plants.

In Cincinnati, a new nursery is about to be established by Mr. C. W. Elliott. There are now several well conducted places, containing good assortments of trees, among which we may notice that of Mr. Ernst, who made a visit to the east the past fall, and purchased a fine stock of trees from the nurseries around Boston.

GARDEN LITERATURE.

The past year has been productive of several new editions of American works, and reprints of foreign publications on subjects connected with gardening. The only new work of importance has been the *Treatise on Landscape Gardening*, by Mr. Downing. Dr. Lindley's *Theory of Horticulture*, with notes by Messrs. Gray and Downing, reviewed in the present number, is a work which should be in the hands of every thinking gardener: a simple glance at the review will show how valuable it must be to every cultivator. Liebig's *Organic Chemistry*, with notes by Dr. Webster, already passed to a second edition, is another foreign work of great utility. It completely sets aside the commonly received notions of the action of manures. But without believing all that the learned author has advanced, it is nevertheless a valuable work, abounding in new ideas upon the operation of manures, the properties of soils, &c. A new and revised edition of the *American Orchardist* has appeared, containing many ad-

ditions and alterations, by matter collected by the author while in Europe. Upon botany, another part of that complete and excellent work, the *Flora of North America*, has appeared the past year: the *Herbaceous Plants of Massachusetts*, and another part of the *Boston Journal of Natural History*, containing several botanical papers. In connexion with agriculture, we have had several agricultural *Addresses*; *Bee-breeding in the West*; and the *Western Farmer and Gardener's Almanac for 1842*. The *Fourth Report of the Agriculture of Massachusetts* was issued from the press just as we were bringing this article to a close. It is one of the most interesting which has been published, and concludes the labors of the Commissioner. It is to the agricultural journals that the farming community now look for information: these are increasing in all parts of the country, and are an evidence of the interest which is felt in this great branch of national industry and wealth.

ART. II. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Floricultural and Botanical Intelligence.—In our article on the gardens in New York, Philadelphia, &c., in our last volume, and which will be continued in our next number, we have named a great portion of the new plants which have been

introduced by the enterprising nurserymen of those places: it will therefore be unnecessary for us to enumerate them here. A reference to our notices of the establishments of Messrs. Buist, Ritchie & Dick, Mackenzie, and others, in Philadelphia, and the Messrs. Feasts, Baltimore, (some account of which will appear in our February number,) will show to what extent these have been added to our collections. In the vicinity of Boston several new geraniums, camellias, carnations, roses, and other plants, have been imported, descriptive notices of which will appear under this head, as they come into bloom.

Caméllia japonica var. *Binneyii*.—We understand that the stock of this fine seedling variety, raised by Mr. J. B. Smith, of Philadelphia, has been purchased by Mr. Boll, nurseryman, New York, together with many seedling plants of Mr. Smith's, which have not bloomed. When we were in Philadelphia, in August last, we called upon Mr. Smith, and passed an hour in looking through his fine collection of cacti and camellias, (our notes on which were written out for publication a month since, and have been waiting an opportunity for insertion,) and he then informed us he was desirous of selling out his whole stock of plants. Mr. Smith has been a most successful grower of seedlings.

Iconography of the genus Camellia.—Since our last notice of this work forty additional numbers have been published, making, in all, forty-eight. In these, ninety-six camellias are figured, being only a fourth part of the number of varieties, (or reputed ones,) in the collection of the Abbé Berlèse. In one of the latter numbers is a figure of the celebrated Victoria camellia, much spoken of for its great beauty, and sold at the high price of one hundred francs per plant. The drawing represents a well formed, very double, and regular flower, of a deep red color, with a broad stripe of white through the centre of every petal. It promises to be a valuable variety. We shall refer to this work again, and describe some of the varieties that are figured, that are but little known in our collections.—*Ed.*

Onogràcææ.

ÆNOTHERA

fructicosa var. *indica* *Lindl.* Indian Ænothéra. A hardy perennial; growing about eighteen inches high; with yellow flowers; appearing from June to August. Increased by seeds and division of the roots. *Bot. Mag.*, 1841, t. 2.

A variety, the seeds of which were received from India, among a collection of other seeds. It is a perennial, with

dwarf stems, rather dull hairy leaves, and very handsome bright yellow flowers, which approach very near to our native *Æ. fructicòsa*; but is, however, distinct. "Its leaves are less shining; the corymbs of the flowers are never elevated above the leaves, on a long stalk; and the herbage forms a compact little bush, about a foot and a half high." This character appears to have been acquired by long cultivation in India.

The plants are hardy, and grow and flower freely in any good garden soil, and are easily increased by the division of the roots. (*Bot. Reg.*, Feb.)

Rosàcæ.

SPIRÆA

Kamtschatica var. *himalénsis* Lindl. Himalayan Meadow-sweet. A hardy perennial; growing three feet high; with white flowers; appearing in June and July; a native of the Himalayan Mountains; increased by division of the roots. Introduced in 1838. *Bot. Reg.*, 1841, t. 4.

"Apparently identical with a Kamtschatica species, from which it scarcely seems to differ, except in having the leaves white with down underneath: a circumstance of no consequence, because *S. ulmària* itself varies with leaves downy and smooth underneath." Very similar to the common meadow-sweet of our gardens, *S. ulmària*, growing freely in any good soil, and flowering best when planted in rather a damp situation. (*Bot. Reg.*, Jan.)

Crassulàcæ.

ECHEVERIA

virida Lindl. Lurid echeveria. A hardy green-house perennial; growing one foot high; with scarlet flowers; appearing in spring; increased by leaves; grown in leaf mould and brick rubbish. *Bot. Reg.*, 1841, t. 1.

"Similar to *E. secúnda*, being, like that species, stemless, with the leaves collected into a circular patch, in the manner of a house leek." The flowers are a richer scarlet. It requires the same treatment as the mesembryanthemums, and, like them, should be kept in small pots, well drained, and placed in a mixture of leaf mould and brick rubbish, with the surface of the pot covered with silver sand. It should not be placed in a wet situation during summer. (*Bot. Reg.*, Jan.)

Goodeniàcæ.

EUTHALES *R. Brown.* (From *well*, and *to flower*, in allusion to its gay and numerous flowers.)

macrophylla Lindl. Broad leaved Euthales. A green-house perennial; growing three to four feet high; with yellow flowers; appearing all summer; a native of New Holland; increased by cuttings. *Bot. Reg.*, 1841, t. 3.

"A green-house plant of the easiest culture," producing a succession of gay yellow blossoms throughout the summer

and autumn months. The flowers are about the size of a coreopsis; the stem strong, erect, and branched, with broad deep green foliage. It must be a valuable plant for turning out into the border during summer, where its golden blossoms, produced so freely, would make a brilliant appearance. Grows freely in any rich soil, and is increased readily from cuttings. (*Bot. Reg.*, Jan.)

Asteràcæ.

BRACHYCOME *Cass.* (From *short* and *hair*, in allusion to the shortness of the pappus.)
iberidifolia Benth. Large swan daisy. An annual plant; growing one foot high; with pale and dark violet flowers; appearing all summer. *Bot. Reg.*, 1841, t. 9.

Another of the elegant annuals of late introduction. The genus *Brachycome*, Dr. Lindley remarks, consists mostly of "little mean looking flowers, altogether unsuited to gardens;" but that which is now figured "is evidently one of the handsomest hardy annuals in cultivation. Its large violet colored flowers, varying in the depth of color, according to their age, the youngest palest, have no rival among annuals of the same dwarf habit, and it is not too much to say the large swan daisy deserves to be placed in the same class as *Nemóphila insignis*." It is, in reality, a beautiful plant.

It flowers freely in the open border, but is impatient of wet: at the latter end of the season it may, however, be lifted, and transferred to the green-house, where it will go on blooming beautifully. The plants vary as much in the color of their flowers as the *Phlóx Drummondii*, and, like that lovely annual, they must be in every good garden. (*Bot. Reg.*, Feb.)

Convolvulàcæ.

IPOMÆA

ficifolia Lindl. Fig-leaved Ipomæa. A hot-house climber; growing ten feet high; with purple flowers; appearing all summer; increased by cuttings. *Bot. Reg.*, 1841, t. 13.

A most free blooming plant, which produced, when only twelve months old, nearly five hundred rich purple flowers, upon a cylindrical wire trellis, two feet high. Its disposition to blossom to this unusual degree more particularly recommends it to the gardener's attention: the foliage is also correspondingly small. The plant is slightly shrubby, and has a tuberous root.

It also succeeds well in the summer, against a south wall, and "thrives under the commonest cultivation." On this account it will be a fine ornament for trellises or arbors. It is a native of Buenos Ayres. (*Bot. Reg.*, March.)

Solanaceæ.

SOLANUM

macranthèrum Soland. Large *anthered* bitter-sweet. A green-house plant; growing about four feet high; with purple flowers; appearing all summer; a native of Mexico; increased by cuttings. *Bot. Reg.*, 1841, t. 7.

“A fine half shrubby green-house plant, with large clusters of deep purple flowers, whose centre is occupied by a knot of large bright yellow anthers. It is nearly allied to the *bitter-sweet* of the hedgerows, but its flowers are very much larger and handsomer.” The plate represents a very showy plant, with the flowers in a terminal paniced raceme, the deep yellow of the anthers contrasting finely with the rich purple of the petals. It must prove a desirable acquisition to the green-house. (*Bot. Reg.*, Feb.)

Pedaliaceæ.

MARTYNIA

fràgrans Lindl. Fragrant Martynia. A half hardy annual; growing three feet high; with rich purplish crimson flowers; appearing all summer; a native of Mexico; increased by seeds. *Bot. Reg.*, 1841, t. 6.

“A half hardy annual, of great beauty and delicious fragrance.” The plant grows about three feet high, with large cordate dentate leaves, and long petioles. The flowers are as large as the common martynia, of a very rich crimson purple, and appear in racemes of four to six blooms each. It may be classed with the balsams, being equally showy and brilliant.

The specimen from which the drawing was taken was grown in a pot, and produced a spike of flowers when a foot high: “two lateral branches were then produced, and these also bloomed from the extremity, sending forth lateral opposite branches. In this way the plant continued to grow, and in a pot of light rich earth attained the height of three feet, and about the same extent in diameter.” In our climate, we presume that if the seeds were sown in April, in a hot-bed, and plants put out into the border in June, they would flower as freely as the balsam. (*Bot. Reg.*, Jan.)

Boraginææ.

CYNOGLOSSUM

glochidiatum Benth. Burry hound’s tongue. A hardy biennial; growing a foot high; with blue flowers; appearing in July; a native of India. *Bot. Reg.*, t. 15.

Only pretty when its flowers are placed in water, or a bouquet, where its dull green coarse herbage “may not offend the eye.” It is in most respects similar to the European forget-me-not, forming a straggling plant, throwing up short branched stems “whose bright and joyous looking flowers are exceedingly gay.” The seeds should be sown in May, in a

good soil and rather dry situation, when the plants will flower freely, from July until winter. (*Bot. Reg.*, March.)

Labiatae.

SALVIA

regla Benth. The regla sage. A green-house plant; growing four feet high; with scarlet flowers; appearing from May to July; a native of Mexico; increased by cuttings. Introduced in 1839. *Bot. Reg.*, 1841, t. 14.

A fine addition to the now quite numerous family of salvias. It is but a few years since the *spléndens* was the only kind known in our collections; they now number eight or ten species. The present subject is a very ornamental plant, attaining the height of from four to five feet, with half shrubby erect stems, and rather small, roundish, obtuse, crenate leaves. The flowers appear in terminal clusters of three to five, and are of a brilliant scarlet. The only specimens that have flowered were grown in the green-house of the Horticultural Society, where the plants bloomed freely, but not in so good perfection as they will when the management of the plants is understood. It will probably require similar treatment to the *S. spléndens*, *fúlgens*, &c., and, like them, is a most desirable plant. (*Bot. Reg.*, March.)

Amaryllidææ.

ISMENE

viréscens Lindl. Stalk flowered Ismene. A green-house bulb; growing a foot high; with white flowers; appearing from June to August; increased by offsets; grown in loam, peat, and sand. *Bot. Reg.*, 1841, t. 12.

A beautiful species of the ismene, which, though less brilliant than the *I. Amáncaes*, is nevertheless a desirable plant. The stem is a foot or more in length, and the flowers greenish white, with an agreeable lemon-like fragrance. It should be treated like the other species, that is, absolute rest in winter, then planted either in pots or in the open border in April or May, in a very light sandy soil, where it will flower freely. Take up the bulbs in August, and keep them dry and cool till spring. Increased by offsets. (*Bot. Reg.*, Feb.)

SPREKELIA

gláuca Lindl. Glaucois jacobæan lily. A green-house bulb; growing a foot high; with pale crimson flowers; appearing in June; a native of Mexico; increased by offsets. Introduced in 1839. *Bot. Reg.*, 1841, t. 16.

Similar to the old jacobæan lily, but differs in having "smaller and rather paler flowers, and a very glaucous foliage." It was found in Mexico, by M. Hartwig, and first flowered in the garden of the London Horticultural Society in 1840. It requires the same treatment as the *Amaryllis formosíssima*, now called by Mr. Herbert, *Sprekèlia*. (*Bot. Reg.*, March.)

REVIEWS.

ART. I. *The Theory of Horticulture, or an attempt to explain the principal operations of Gardening, upon Physiological principles.* By JOHN LINDLEY, Ph. D., F. R. S., &c. &c. First American Edition, with Notes, &c., by A. J. Downing and A. Gray. New York and Boston, 1841. pp. 346.

The author of this ingenious and interesting work, has succeeded in bringing into useful application, those facts and phenomena connected with vegetable physiology, on which the science of horticulture mainly depends. To enable the gardener to operate in a clear and lucid manner,—no longer to be obliged to grope in the dark, and to institute reiterated experiments, on the hope only of success;—the simpler laws of organized matter in plants are here exposed. We say the science of horticulture—for since the philosophical operations of Knight and such men, the mere mechanical details of raising fruits and vegetables, have given place to actual scientific and elegant experiment, in which a comparatively certain result could be anticipated. Our author has, however, judiciously avoided entering too much into the niceties of such scientific data; satisfied with such general principles as every one could readily understand.

To render this work welcome to the American reader, Messrs. Gray and Downing have given us an edition, to which are appended such notes and illustrations as were deemed necessary to make the text appropriate to our own vegetation. The former of these gentlemen is the able coadjutor with Professor Torrey, in the *Flora of North America*; and with the latter, through his communications on various subjects in this Magazine, its readers are acquainted. The work is divided into two books: the first of these treating “of the principal circumstances connected with vegetable life, which illustrate the operations of gardening.” The following is the definition of a plant:—

A plant is a living body composed of an irritable, elastic, hygro-metrical matter, called tissue. It is fixed to the earth by roots, and it elevates into the air a stem bearing leaves, flowers, and fruit. It has no power of motion except when it is acted upon by wind or

other external forces; it is therefore peculiarly susceptible of injury or benefit from the accidental circumstances that may surround it; and, having no free agency, it is above all other created beings suited to acknowledge the power of man.

The vital actions of plants have so little resemblance to those of animals, that we are unable to appreciate their nature, in even the smallest degree, by a reference to our own sensations, or to any knowledge we may possess of animal functions. Nor, when we have thoroughly studied the phenomena of vegetation, are we able to discover any analogies, except of a general and theoretical nature, between the animal and vegetable kingdoms. It is therefore necessary that plants should be studied by themselves, as an abstract branch of investigation, without attempting to reason as to their habits from what we know of other organic beings; and consequently we are not, in this part of Natural History, to acknowledge any theory which is not founded upon direct experiment, and proved by the most satisfactory course of inquiry.

Then succeed several chapters treating of Germination, Growth by the Root, Growth by the Stem, Action of the Leaves, Action of the Flowers, Maturation of the Fruit, &c. After perusing these and admiring the economy of their physiology, we begin to imbibe a more respectful consideration for each living vegetable structure; and to trace in the meanest floret or the most homely fruit, something deeper and more mysterious than hitherto met our eye. We feel greatly indebted to such minds as those of Lindley, and De Candolle, and Richard, for such revelations of so much beauty and exquisite perfection. The mazes of nature into which they introduce us, and through which they lead us by actual experiment, are perceptible equally in the most insignificant as in the most gigantic; and we cherish a love for such pursuits, which prove that "the primrose on the river's brim" is veritably something more—much more than a yellow primrose: yea, even the ingenious workmanship of a Divine hand!

Thus, too, the pursuit of any branch of the natural sciences begets a spirit of fascinating interest, which grows on us insensibly more and more. This we see in the zeal and ardor of those distinguished men whose whole lives have been spent in the investigations of organized matter. The rapid strides, which these studies have effected in modern times, have caused such investigations to be turned to a good account. No longer is the inquiry instituted, "of what good are these?" but to the comfort and luxury of society, to those substantial and tangible results, which address the wants of the body as well as of the mind, all such pursuits are tending. Vegetable

physiology, for instance, which gives you to understand how the seed germinates, the root receives nutriment, or the fruit matures, now teaches how to raise good celery for the table, mammoth squashes for the kitchen, and melting peaches for the dessert. Sir Andrew Knight had at his command the energies of nature in raising the pine-apple, that king of fruits, whose head bears a leafy *crown*; and from gray peas and similar of inferior quality, his cross impregnation brought him results as favorable as curious. The whole baneful hosts of mildew were vanquished before his persevering hand; and many a sad obstacle in the way of the mere mechanical horticulturist, fled at his approach. When M. Turpin discovered in the folds of his herbarium, the leaf of an ornithogalum studded with minute bulbs, he did not hesitate in his search, until he established the beautiful fact that these embryo buds are existant in myriads in the tissue of every plant: and thereby explained in a philosophical manner what the cultivators of bulbous roots knew before, but *knew ignorantly*; when they, by injuring the main bulb by incision, could cause the requisite increase, for the benefit of their stock of plants. Mankind after all are in the mass strictly utilitarian, let sages prate as they may of the divine nature of humanity: and those books and pursuits will be the most readily read and followed, which teach them the comforts of the social condition.

We cannot in passing, omit to mention, with gratification, the good common sense displayed in some of the notes on the text of the work. Theories are very well, and *supposed facts* plausible, until met by others of a more stubborn nature. One can reason himself into the truth of any proposition, until a startling instance to the contrary stands in his way. Let the reader compare these two passages:—

But although, under ordinary circumstances, the sap of Exogens rises through the alburnum and descends through the liber, yet the simplicity of structure in plants is such, that, together with the permeability of their tissue, it enables them, in cases of emergency, to alter their functions, and to propel their fluids by lateral instead of longitudinal communications. The trunk of a tree has been sawed through beyond the pith in four opposite directions; namely, from north to south, from west to east, from south to north, and from east to west, at intervals of a foot, so as completely to cut off all longitudinal communication between the upper and lower parts of the stem, as effectually as if those two parts had been dissevered; and yet the propulsion of the sap from the roots into the head of the tree went on as before: which could only have been effected by a lateral

transmission of this fluid, through or between the sides of the woody tissue. So when "ringing" is practised, and the alburnum is partially destroyed, the ascending fluid diverges into the stratum of wood beneath the annulation; and, when it has passed by, it again returns into its accustomed channels; at the same time, it is probable, although not proved, that some portion of the descending sap forces its way laterally below the wound, out of the bark into the alburnum, using the latter as a means of communicating with the bark below the ring.

Some curious experiments upon this subject were contrived by Mr. N. Niven, (*Gardener's Magazine*, vol. xiv.) In one case, he divested the stem of a tree of a deep ring of bark, and of the first twelve layers of wood below it; nevertheless the tree continued to live and be healthy. From the exposed surface of the wood no sap made its appearance, except from a cut which had been inadvertently made with the saw on one side, to the depth of, perhaps, five or six layers of wood beyond the twelve actually removed. From that cut a flow of sap took place, and continued to run during the whole of the season in which the operation was performed. In this case, the sap must have ascended exclusively by the alburnum.*

We would invite attention to the wonderful economy of leaves, and the beautiful deduction relative to the probable habits, as applicable to the culture of plants.

A leaf has moreover a skin, or epidermis, drawn all over it. This epidermis is often separable, and is composed of an infinite number of minute cavities, originally filled with fluid, but eventually dry and filled with air. In plants growing naturally in damp or shady places it is very thin; in others, inhabiting hot, dry, exposed situations, it is very hard and thick; and its texture varies between the two extremes, according to the nature of the species. The epidermis is pierced by numerous invisible pores, called stomates, through which the plant breathes and perspires. Such stomates are generally largest and most abundant in plants which inhabit damp and shady places, and which are able to procure at all times an abundance of liquid food; they are fewest and least active under the opposite conditions. It will be obvious, that, in both these cases, the structure of a leaf is adapted to the peculiar circumstances under which the plant to which it belongs naturally grows. Now, as this structure is capable of being ascertained by actual inspection with a microscope, it

* This is a possible case; but the American, familiar with the practice of *girdling trees*, (which is nothing more than ringing with the hatchet,) so common in the new settlements, well knows that it destroys vitality as certainly as cutting down the tree at once.—During the deep snows of winter, in the northern States, young apple-orchards are often destroyed by field mice, which girdle the trees near the ground, and they perish in the course of the ensuing season. The trees may however be preserved, by taking a suitable circle or section of bark, in the spring, from the limb of another apple tree, and adapting it carefully to the wounded bark, the edges of which are to be pared to an even line, and the whole bound up and covered with grafting clay. It is not absolutely necessary that the bark introduced should encompass the whole trunk; as the union by a single portion will preserve the life of the tree, and the remainder of the wound will gradually become covered with new bark.

follows, as a necessary consequence, that the natural habits of an unknown plant may be judged of with considerable certainty by a microscopical examination of the structure of its epidermis. The rule will evidently be, that plants with a thick epidermis, and only a few small stomates, will be the inhabitants of situations where the air is dry and the supply of liquid food extremely small; while those with a thin epidermis, and a great number of large stomates, will belong to a climate damp and humid; and intermediate degrees of structure will indicate intermediate degrees of atmospherical and terrestrial conditions. It is, however, to be observed, that the relative size of stomates is often a more important mark in investigations of this nature than their number; those organs being in many plants extremely numerous, but small and apparently capable of action in a very limited degree; while in others, where they are much less numerous, they are large and obviously very active organs. Thus the number of stomates in a square inch of the epidermis of *Crinum amabile* is estimated at 40,000, and in that of *Mesembryanthemum* at 70,000, and of an *Aloe* at 45,000; the first inhabiting the damp ditches of India, the last two natives of the dry rocks of the Cape of Good Hope: but the stomates of *Crinum amabile* are among the largest that are known, and those of *Mesembryanthemum* and *Aloe* are among the smallest; so that the 70,000 of the former are not equal to 10,000 of the *Crinum*. Again, the *Yucca aloifolia* has four times as many stomates as a species of *Cotyledon* in my collection, but those of the latter are about the one seven hundred and fiftieth of an inch in their longer diameter, large and active, while the stomates of the *Yucca* are not more than one two thousand and five hundredth of an inch long in the aperture, and comparatively inert. The *Yucca*, therefore, with its numerous stomates, has weaker powers of perspiration and respiration than the *Cotyledon*.

There are some of a sickly sensibility, who are perpetually ringing changes on the gloomy realities of life, and endeavoring to find in the economy of nature, some seeming proof or illustration. Autumn in its varied dyes, the changing, drooping leaf, returning to the bosom of the earth to moulder and decay, are brought into their aid by way of poetic effect. With such ideas we confess we have no sympathy. What beauty ever invests this earth—what curious, wondrous transformation! The dry leaf “eddying in the blast,” has consummated its work. 'T is no longer an organ of an organized fabric endued with vital energy, but 't is still a beauteous thing. Obedient to the fiat of nature, it will again enter into new combination and renewed beauty.

In the course of time, a leaf becomes incapable of performing its functions; its passages are choked up by the deposit of sedimentary matter; there is no longer a free communication between its parenchyma and that of the rind, or between its veins and the wood and liber. It changes color, ceases to decompose carbonic acid, absorbs

oxygen instead, gets into a morbid condition, and dies: it is then thrown off. This phenomenon, which we call the *fall of the leaf*, is going on the whole year round, except mid-winter, in some plant or other. Those which lose the whole of their leaves at the approach of winter, and are called deciduous, begin, in fact, to cast their leaves within a few weeks after the commencement of their vernal growth; but the mass of their foliage is not rejected till late in the season. Those, on the other hand, which are named evergreens, part with their leaves much more slowly; retain them in health at the time when the leaves of other plants are perishing; and do not cast them till a new spring has commenced, when other trees are leafing, or even later. In the latter class, the functions of the leaves are going on during all the winter, although languidly; they are constantly attracting sap from the earth through the spongelets, and are, therefore, in a state of slow but continual winter growth. It usually happens that the perspiratory organs of these plants are less active than in deciduous species.

In general, a leaf is an organ of digestion and respiration, and nothing more: some leaves have, however, the power of forming leaf-buds, if placed in or upon earth, under suitable circumstances. The *Bryophyllum calycinum* forms buds at the indentations of its margin; *Malaxis paludosa* throws off young buds from its margin; *Tellima grandiflora* occasionally buds at the margins of its leaves: the same thing happens to many ferns; and several other cases are known.

The florist and pomologist observe many singular transmutations in double flowers, and in monstrous fruits, which are thus explained:—

Notwithstanding the difference in form and office of the parts of a flower, they have evidently a strong tendency, in cultivated plants, to change into or assume the appearance of each other. In the Poppy, the Garden Aneimone, and many others, the stamens change into petals; in the Anemone, the *Ranunculus*, &c., the pistil changes into petals; in the Primrose, Cowslip, &c., the calyx changes into petals; in the Houseleek, the stamens become pistils; and so on. Hence the origin of double flowers. In a double Barbadoes Lily, described by me in the *Transactions of the Horticultural Society*, in which the parts were very much confused, the young seeds were borne by the edges of the stamen-like petals.

In their ordinary state the parts of a flower are extremely unlike leaves, and each has its allotted office, which is not the office of a leaf; they are also incapable of forming leaf-buds in their axils. But, although such is the case, there is found a strong and general tendency on the parts of both the floral envelopes and sexes to change to leaves, like the leaves of the stem. In the white clover (*Trifolium repens*), all the parts often become leaves; in the *Fraxinella*, this has also been remarked; so has it in the *Nasturtium*, in *Sieversia montana*, and many other instances. A partial alteration into leaves is of very frequent occurrence in the parts of a flower. In the Rose, the sepals and pistil are frequently changed into leaves; in the Double Cherry, the pistil is almost always to be found in the

form of a leaf; and books on structural botany abound in the records of similar cases. It sometimes happens that buds are not only formed, but developed, at the axils of the parts of a flower, as in a *Celastrus scandens* observed by Kunth. In the Pear, it is not uncommon to find two or three small pears growing out of an older one, each of which pears may be traced to the axil of some one of the parts of the flower; and rose-buds are frequently seen growing out of Roses. A very striking and uncommon case of this sort was observed by the late Mr. Knight in the Potato, whose flowers produced young potatoes in the axils of the sepals and petals. Occasionally, the centre of a flower lengthens and bears its parts upon its sides, as in the Pear and Apple, whose fruit is often found in the state of a short branch. Still more rarely a flower lengthens, and produces from the axils of its parts other flowers arranged over its sides, as in the Double Pine-apple of the Indian Archipelago.

The following very striking illustrations of these facts have, among many others, occurred in the present season (1839.) A branch of a Pear, exhibited a flower deformed, but still sufficiently recognisable, and another completely changed into a branch; the calyx assuming the appearance of leaves or leafy scales, the petals also partially transformed into leaves, while the whole apparatus of stamens and pistils is converted into an ordinary branch. *Potentilla nepalensis* sometimes changes its flowers into branches; all the sepals, petals, and stamens are converted into leaves, but the pistils are little changed; the sepals, petals, and stamens are but little altered, but the receptacle of the fruit is lengthening into a branch, and is covered by the carpels partly converted into leaves, and some of them near the apex producing flowers from their axils; finally, the whole of the floral apparatus is changed into a rosette of leaves.

It therefore appears, that although the parts of a flower are different both in appearance and office from leaves, yet that they do all assume, under particular circumstances, the same appearance and office. Hence it is inferred that they are really nothing more than leaves in a modified state; and, consequently, that a flower is a very short branch, and a flower-bud analogous in many respects to a leaf-bud. A leaf-bud is a collection of leaf-scales of the same or similar form, arranged round a central very short branch, having a growing point. A flower-bud is a collection of leaf-scales of different forms, arranged round a central very short branch, not having a growing point under ordinary circumstances. In this latter respect it resembles those buds of the Larch which form leaves in starry clusters, without extending into a branch. Many points in horticulture could not be explained until the existence of this analogy was made out.*

* This doctrine has been taught at different times, by different independent observers. Among other persons, I find that Mr. Knight had come to the same conclusion, at a time when the views of Wolffius and Goethe were quite unknown in England. He says:—"The buds of fruit trees which produce blossoms, and those which afford leaves only, in the spring, do not at all differ from each other, in their first stage of organization, as buds. Each contain the rudiment of leaves only, which are subsequently transformed into the component parts of the blossom, and in some species of the fruit also. I have repeatedly ascertained that a blossom of a Pear or Apple

Some marvellous accounts of the temperature of the earth, and its influence on the growth of plants suited to such a condition, are given in the chapter on Temperature. These explain a well known fact in the successful cultivation of what are technically known to florists as Cape bulbs. To flower these in vigor and splendor, an alternate condition of humidity and of aridity is essential. We, not long since, saw some roots of *Gladìoli*, and bulbs of *Amaryllis*, *Hæmânthus*, &c., which pushed strong foliage after a long voyage from Cape Town, and a subsequent depreciation of soil and water, surviving more than a year without any chance to vegetate. The natural alternations of moisture and dryness in such regions, require, in plants indigenous, peculiarly formed functions: and every gardener soon becomes aware of this fact in the culture of species of many such plants. Some of these floral splendors are however very difficult to be produced, notwithstanding all the art of the patient florist; though doubtless they are annually destined to waste their beauty and magnificence on their native deserts. An *antholyza* in our green-houses, (we believe *Antholyza æthiópica*?) we never saw in bloom; and after long unsuccessful culture it is usually rejected as worthless. An extraordinary high temperature might perhaps effect this desired result; and this, artificially applied to other difficult bloomers, might reward all effort. Series of experiments, such as are suggested by such observations as follow, might be advantageous in promoting the end of floricultural labors.

There appears to be no series of direct observations upon the superficial temperature of the earth, at the different periods of vegetation, in other countries; but some statements are to be found, here and there, concerning the temperature occasionally observed, from which it is to be inferred, that the earth is heated, at least for short periods of time, very much above the atmosphere; and it is probable that this excessive elevation of temperature is necessary to the healthy condition of many plants. From some interesting observa-

tree contains parts which previously existed as the rudiments of five leaves, the points of which subsequently form the five segments of the calyx; and I have often succeeded in obtaining every gradation of monstrosity of form, from five congregated leaves, (that is, five leaves united circularly upon an imperfect fruit-stalk) to the perfect blossom of the Pear tree. The calyx of the Rose, in some varieties, presents nearly the perfect leaves of the plant, and the large and long leaves of the Medlar appear to account for the length of the segments, in the empalement of its blossom. The calyx of the blossom of the Plum and Peach tree is formed precisely as in the preceding cases, except that the leaves which are transmuted into the calyx separate at the base of the fruit, and become deciduous, instead of passing through and remaining a component part of it." (*Transactions of the Horticultural Society*, vol. ii. p. 364. May 6, 1817.)

tions communicated to me by Sir John Herschel, it appears that the temperature of the earth, at the Cape of Good Hope, is often excessive. On the 5th of December, 1837, between one and two o'clock in the day, he observed the heat, under the soil of his bulb garden, to be 159° ; at 3, P. M. it was 150° , and even in shaded places 119° : the temperature of the air in the shade, in the same garden, at the same period, was 98° and 92° . At 5, P. M. the soil of the garden, having been long shaded, was found to have, at 4 inches in depth, a temperature of 102° . "On the 3d of December, a thermometer buried one quarter of an inch deep, in contact with a seedling fir of the year's planting, quite healthy, and having its seed-leaves, marked as follows:—at 11h. 25m. A. M. $148^{\circ}2'$, at 0h. 48m. P. M. $149^{\circ}5'$, at 1h. 34m. P. M., $149^{\circ}8'$, at 1h. 54m. P. M. $150^{\circ}8'$, and at 2h. 46m. P. M. 148° ." Sir John Herschel observes that such observations "go to show that at the Cape of Good Hope, in the hot months, the roots of bulbous and other plants which do not seek their nourishment very deep, must frequently, and, indeed, habitually, attain temperatures which we can only imitate in our hot-houses by actually suspending over the soil plates of red-hot iron. For it must be remarked, that heating the ground *from below* would not distribute the temperature in the same way."

Book II. treats "of the Physiological principles upon which the operations of Horticulture essentially depend;" and commences with these remarks:—

Every operation in horticulture depends for success upon a correct appreciation of the nature of the vital actions described in the last book; for although there have been many good gardeners entirely unacquainted with the science of vegetable physiology, and although many points of practice have been arrived at altogether accidentally, yet it must be obvious that the power of regulating and modifying knowledge so obtained cannot possibly be possessed, unless the external influences by which plants are affected are clearly understood. Indeed, the enormous difference that exists between the skill of the present race of gardeners and their predecessors can only be ascribed to the general diffusion, that has taken place, of an acquaintance with some of the simpler facts in vegetable physiology.

In attempting to apply the explanations of science to the routine of horticultural practice, it appears desirable, in order to avoid frequent repetition, that all the subordinate details of the art should be omitted, and that those general operations should alone be adverted to, which, under many different modifications, and in various forms, constitute the foundation of every gardener's education.

Canker and infertility of many of our finest fruits, have been subjects of earnest inquiry and research. Various theories have been advanced, and as many partial experiments, but all with hitherto uniform success; the success of failure. The past summer, of unusual drought, gave us, however, the most remarkable crop of the delicious St. Michael pears, that we

have seen for many previous years. This fact completely overthrew the last favorite theory of the cause of blighted fruits; viz. that the trees lacked moisture, and that frequent waterings, or keeping the ground wet about the roots, would be attended with favorable results. Another theory maintained that the present race of St. Michael trees in this vicinity, were from deteriorated scions of deteriorated trees, and that by procuring those from trees yet healthy, the fruit would regain its reputation. So far as our own observations extended, the crop of St. Michael pears of this year, set at defiance both of these theories. 'Tis well, however, to suggest and to adopt, hoping for some future important end. Professor Lindley, in his chapter on bottom heat, offers some suggestions.

It may hence be considered an axiom in horticulture, that *all plants* require the soil, as well as the atmosphere, in which they grow, to correspond in temperature with that of the countries of which they are natives. It has also been already shown, that the mean temperature of the soil should be a degree or two above that of the atmosphere (119.)

This explains why it is that hardy trees, over whose roots earth has been heaped or paving laid, are found to suffer so much, or even to die; in such cases, the earth in which the roots are growing is constantly much colder than the atmosphere, instead of warmer. We have here, also, the cause of the common circumstance of vines that are forced early not setting their fruit well, when their roots are in the external border and unprotected by artificial means; and to the same cause is often to be ascribed the shrivelling of grapes, which, as we all know, most commonly happens to vines whose roots are in a cold and unsunned border.

Mr. Reid of Balcarras has, indeed, shown that one of the causes of canker and immature fruit even in orchards is the coldness of the soil. He found that, in a cankered orchard, the roots of the trees had entered the earth to the depth of three feet; and he also ascertained that, during the summer months, the average heat of the soil, at six inches below the surface, was 61°; at nine inches, 57°; at 18 inches, 50°; and at three feet, 44°. He took measures to confine the roots to the soil near the surface, and the consequence was, the disappearance of canker, and ripening of the fruit. (*Memoirs of Caledonian Hort. Soc.* vi. part 2; and *Gardener's Magazine*, vii. 55.)

We indeed remember seeing a year since, some dwarf trees of the St. Michael, full of fair and large fruit, transplanted a few months before; perchance the partial injury done to the roots, and the fact that they were near to the surface of the soil, were promotive of the crop.

In forcing the grape and other fruits, and in the process of

raising young plants; in prevention of the growth of those minute fungi, which cause entire crops to *damp off*; Chapter III. may be perused with advantage. The succeeding chapter on Ventilation sets the subject in a just light, and is, while opposite to the older methods, perfectly in accordance with the facts of modern science. Cooling down a green-house by "giving air" from the top glasses, and rather creating a current of wind through the house, always seemed to us rather a harsh way of managing plants, especially in mid-winter. The difference, however, between the natural solar heat of our skies and those of England, should be taken into consideration. Yet even then, in very many cases, we opine that partial shading to modify the sun's rays, would be more conducive than raw, cold air. Ventilation is sometimes very essential to remove those impurities arising from the use of sulphur and other substances. To those who have suffered from an improper use of sulphur for instance, it may be interesting to learn, that according to Drs. Turner and Christison, one ten thousandth of sulphurous acid gas, would destroy leaves in forty-eight hours, and that similar effects were obtained from hydro-chloric or muriatic acid gas, chlorine, ammonia, and other agents, the presence of which could not be ascertained by the smell. From these, it may be gathered, that the management of the forcing-house and conservatory should be conducted on careful data: and in no branch with more scrupulous attention, than in a proper ventilation. So far as the natural atmosphere is concerned, plants will survive and grow and thrive, in a perfectly confined area, as the beautiful experiments of Mr. Ward, with his glazed, tight cases have shown. This plan has even been carried to a great extent in the formation of hot-houses, for the especial growth of tropical plants.

Chapter V., on seed saving, offers some remarkable facts. To the success of the following, we can testify in our own late experiments, having at this moment, several thrifty seedlings of the same species of plant, from seeds submitted to the process of boiling for five, and even *for ten minutes*.

Flax seed will grow after a similar process; while the scalding of ipomæa seed is recommended as promotive of speedy vegetation. Among seeds of plants sent from China, and most probably submitted to a *baking process*, or to some such as generally destroy the germ, occasional instances of

growth will occur. According to *Annales des Sciences*, wheat, barley, kidney beans, and flax, retained their vitality for a quarter of an hour in vapor at $143^{\circ} 6'$, and in dry air at 167° they sustained no injury.

On saving seed for transmission to foreign countries, we are told in Chapter VII.,

Upon the whole, the only mode which is calculated to meet all the circumstances to which seeds are exposed during a voyage is to dry them as thoroughly as possible, enclose them in coarse paper, and to pack the papers themselves very loosely in coarse canvass bags, not enclosed in boxes, but freely exposed to the air; and to insure their transmission in some dry well ventilated place. Thus, if the seeds are originally dried incompletely, they will become further dried on their passage; if the seed paper is damp, as it almost always is, the moisture will fly off through the sides of the bags, and will not stagnate around the seeds. It is true that, under such circumstances, the seeds will be exposed to the fluctuations of temperature, and to the influence of the atmosphere; but neither the one nor the other of these is likely to be productive of injury to the germinating principle. The excellence of this method I can attest from my own observation. Large quantities of seeds have been annually transmitted from India for many years, doubtless gathered with care, it is to be presumed prepared with every attention to the preservation of the vital principle, and certainly packed with all those precautions which have been erroneously supposed to be advantageous; the hopelessness of raising plants from such seeds has at length become so apparent, that many persons have altogether abandoned the attempt, and will not take the trouble to sow them when they arrive. But the seeds sent from India by Dr. Falconer, packed in the manner last described, exposed to all the accidents which those first mentioned can have encountered, have germinated so well, that we can scarcely say that the failure has been greater than if they had been collected in the south of Europe.

I have no doubt that the general badness of the seeds from Brazil, from the Indian Archipelago, and from other intertropical countries, is almost always to be ascribed to the seeds having been originally insufficiently dried, and then enclosed in tightly packed boxes, whence the superfluous moisture had no means of escape.

Theory of suckers in Chapter XI.

Suckers are branches naturally thrown up by a plant from its base, when the onward current of growth of the stem is stopped. Every stem, even the oldest, must have been once covered with leaves; each leaf had a bud in its axil; but, of those buds, few are developed as branches, and the remainder remain latent or perish. When the onward growth of a plant is arrested, the sap is driven to find new outlets, and then latent buds are very likely to be developed; in fact, when the whole plant is young, they must necessarily shoot forth under fitting circumstances; the well known effect of cutting down a tree is an exemplification of this. Such branches, if they proceed

from under ground, frequently form roots at their base, when they are employed as a means of propagation; and, in the case of the Pine-apple, they are made use of for the same purpose, although they do not emit roots till they are separated from the parent. Gardeners usually satisfy themselves with taking from their Pine-apple plants such suckers as are produced in consequence of the stoppage of onward growth by the formation of the fruit: but these are few in number, and not at all what the plant is capable of yielding. Instead of throwing away the "stump" of the Pine-apple, it should be placed in a damp pit, and exposed to a bottom heat of 90° or thereabouts, when every one of the latent eyes will spring forth, and a crop of young plants be the result. Mr. Alexander Forsyth, a very sensible writer upon these subjects, pointed this out some years since in the *Gardener's Magazine* (xii. 594;) and there can be no doubt that his observations upon the folly of throwing away stumps are perfectly correct both in theory and practice.

The practice of scarring the centre of bulbs, the heads of Echinocacti and such plants, and the crown of the stem of species like *Littæa geminiflora*, in all which cases suckers are the result, is explicable upon the foregoing principles.

Chapter XII. Grafting, its plans, improvements, and errors relative thereto. Twenty-six pages detail the theory and practice of pruning and training. Among the remarks of potting, in Chapter XV., we find the following curious facts:—

If woody plants are allowed to remain growing in the same pot for many years, as is sometimes the case, one or two things must happen: either the roots, matted into a hard ball, become so tortuous and hard as to be unfit for the free passage of sap through them, or they acquire a spiral direction. In either case, if such plants are turned out of their pots in a conservatory, or in the open ground, with a view to their future growth in a state of liberty, new roots will be made with difficulty, and it will be a long time before the effects of growth in free soil will be apparent. Where the spiral or corkscrew direction has been once taken by the roots, they are very apt to retain it during the remainder of their lives; and if, when they have become large trees, they are exposed to a gale of wind, they readily blow out of the ground, as was continually happening with the *Pinaster* some years ago, when the nurserymen kept that kind of *Fir* for sale in pots. In all such cases as these, the roots should be carefully disentangled and straightened at the time when transplantation takes place.

The "preservation of races by seed," and "the improvement of races," are desirable topics for discussion with the amateur florist, and general cultivator. By these gradations and interchange, what superb results have accrued! The dahlia and pæony, the rose and anemone, the camellia, and a host of smaller beauties beside, all attest to the importance of correct principles in their production and successful treat-

ment. Concerning these interesting subjects, much may be gathered in Chapters XVII. and XVIII.

Every propitious experiment or result in horticulture, has been based on certain natural phenomena, peculiar to whatever plant they are made in reference to. The forcing of the grape at unusual seasons, though the result of experiment, yet is founded on the great law of rest, and a season for receiving a new supply of excitability. Patience and perseverance might bring about similar results in many of our finest flowers. Undue excitability at one time must be balanced by an undue season of rest at another. Our long, cold winters, seem to us to be the cause of our primal sterility; whereas they are only the accompaniments. The vivid and gorgeous flora of the tropics is only periodical, and after a few weeks of verdure and splendor, the season of rest is a season of sterile aridity.

At the Cape of Good Hope there are districts in which the period of wet is long and very severe; and many of the favorite flowers of our gardens are produced by those districts. The Karroos are plains of great extent, destitute of running water, with a soil of clay and sand, colored like yellow ochre by the presence of iron, and lying on the solid rock. During the dry season the rays of the sun reduce the soil nearly to the hardness of brick: Fig Marigolds, *Stapeliæ*, and other fleshy plants, alone remain green; nevertheless, the bulbs and tribes of Iridaceous and other plants are able to survive beneath the sun-scorched crust, which appears indeed to be necessary to their nature. But in the wet season these bulbs are gradually reached by the rain; they swell beneath the earth; and at last develop themselves so simultaneously that the arid plains become at once the seat of a charming verdure. Presently afterwards, myriads of the gay flowers of the Iridacæ and Mesembryanthemums display their brilliant colors; but in a few weeks the verdure fades, the flowers disappear, hard dry stalks alone remain; the hot sun of August, when in those latitudes the days begin to lengthen, completes the destruction of the few stragglers that are left, the Karroo again sinks into aridity and desolation, and the desert reappears. What succulents survive are covered with a grey crust, and derive their nourishment only from the air. In other parts of the Cape of Good Hope the mean range of the thermometer in winter is 48° to 93° , with cold rain, while that of the summer is from 55° to 96° , with dry days and damp nights.

The concluding Chapter treats of "soil and manure," in a brief and succinct manner. Of these indeed little can be said without tedious detail, after the foregoing principles and application to horticultural science. The importance of attending to the difference of soils in which species of the same ge-

nus naturally grow, is alluded to. Of this we notice that *Rhododéndron hirsútum* grows on calcareous soil, while *Rhododéndron ferrugíneum* grows exclusively on granite. Want of attention to these facts and similar, have been the principal causes of so many failures, both in extended and narrower plans of cultivation; for as in manures, so in soils, the plant must be adapted to the application, or it is labor lost.

In conclusion, we recommend the work to every one who would wish to see horticulture raised to a higher rank than a mere delving and laborious occupation, and would understand on what wondrous laws the ingenuity of man has hitherto been employed, in the culture of the subjects of the vegetable kingdom. To the amateur in his confined area of a city garden, and with his choice parlor plants, and to the young gardener, entrusted with the care of the green-house and conservatory, this simple and elegant work will be found of signal advantage. ***

ART. II. *The Farmer's Companion; or Essays on the principles and practice of American husbandry; with the Address proposed to be delivered before the Agricultural and Horticultural Societies of New Haven County, Conn.; and an Appendix, containing tables and other matter useful to the farmer.* By the late HON. JESSE BUEL, Conductor of the *Cultivator*. Third edition, revised and enlarged. To which is prefixed a Eulogy on the life and character of Judge Buel, by Amos Dean, Esq. 1 vol. 12mo. Boston, 1842.

It is just two years since we reviewed at some length the *first* edition of this excellent work. No praise that we can again bestow upon it would weigh more with the public, than the fact that it has passed to the *third* edition in the short period of two years. To this edition is prefixed a eulogy upon the life and character of Judge Buel, a merited tribute to the virtues and talent of the lamented author. A full glossary of agricultural terms, and a copious index, are also added, rendering the volume more interesting, from the facility of turning to any subject at once. The volume should be in the hands of every good farmer.

ART. III. *Organic Chemistry, in its application to Agriculture and Physiology.* By JUSTUS LIEBIG, M. D., F. R. S., &c., &c., Prof. of Chemistry in the University of Geissen. Edited from the manuscript of the author, by Lyon Playfair, M. D. Second American edition, with an Introduction, Notes, and Appendix, by John W. Webster, M. D., Prof. of Chemistry in Harvard University. 1 vol. 12mo. pp. 424. Cambridge, 1841.

It is but a short period since we reviewed this work at length, (Vol. VII., p. 344.) The rapid sale of the volume has exhausted the first edition, and we have now before us the second. The volume has been wholly revised, and the original order of the work substituted, as in the London edition. This is a decided improvement, and will make the second edition more acceptable than the first.

The editor also states "that a valuable addition has been made to the present edition, in the extracts from the lectures delivered after the appearance of Liebig's work, by Prof. Daubeny, at Oxford, on agriculture and rural economy. The greater part of the third lecture is given in the appendix, and this will be found of much value to the practical agriculturist, being a summary of the practical application of the principles developed and described in the body of this work."

"It has been gratifying to the editor to learn from the gentleman under whose supervision this work first appeared in England, that its publication, and the manner in which it has been edited in this country, have met with his entire approbation. To Dr. Playfair, the editor is also indebted for some valuable suggestions, which have been followed in preparing the second edition, and for which he would express his thanks." The present edition contains thirty pages of additional matter.

It is unnecessary for us to again commend a book so manifestly useful to every cultivator. It is gratifying to learn that the first edition was so eagerly read by practical men. The work was evidently intended for men of science; but the practical application of its principles has been productive of the best results.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Foreign Notices.*

ENGLAND.

American grapes.—In the *Gardener's Chronicle* for November last, a communication appears from Mr. Paxton, gardener to the Duke of Devonshire, at Chatsworth, in which he states that he received by the royal mail steamer *Caledonia*, which sailed from Boston October 2d, a basket of grapes from Col. T. H. Perkins, of Brookline. It will be recollected that the *Caledonia*, owing to some damage sustained by running on to the rocks near Halifax, put back to that port, and did not sail till the 7th, and arrived at Liverpool on the 19th. Mr. Paxton states that "the grapes were sent without any packing, save a layer of cotton wadding beneath them, upon which they were loosely laid. Notwithstanding this, the rough voyage by sea, and the land carriage in this country, they arrived at Chatsworth in such a state as to enable us to test their qualities against the same kinds grown here: the latter proved very much superior to the American fruit in flavor, but the bunches and berries were equal in size to any hot-house grapes we have seen this season. The kinds were Muscat of Alexandria, Syrian, St. Peters, Nice and Grizzly, black and white Frontignac. The Syrian, Muscat, and Frontignacs, were little injured, considering the journey; but the latter kinds possessed none of the aroma for which they are prized in this country—the white Frontignac tasting like the Sweetwater."

Mr. Cowan, late gardener to Col. Perkins, informed us the day the *Caledonia* sailed, that he had forwarded a basket of grapes from the vineries under his charge, to the care of Mr. Paxton, from whom Mr. Perkins received many attentions when he visited Chatsworth last spring; and he remarked to us that he was fearful they would not arrive in such a condition as to fairly test their qualities, even were the voyage as favorable as usual. Unfortunately, the steamer was delayed at Halifax, and did not arrive at Liverpool until the 19th, making the voyage seventeen days from Boston. It would not be expected that grapes packed up in an open basket, and exposed to the influence of the sea atmosphere for that long period, would retain their fine flavor, particularly such as the Muscats, whose rich aroma constitutes their great excellence. If all these circumstances had been taken into consideration, we do not think Mr. Paxton would have compared them with the fresh grapes, cut immediately from his vines, without making due allowance for the long time the former had been cut, and the exposure they had suffered. Mr. Cowan's grapes might not have been as high flavored as usual, but we are certain that under our hot sun and dry atmosphere, the Muscats can be made to attain to a greater degree of perfection than in the climate of Britain. We hope, another season, that Col. Perkins or Mr. Cushing will send another basket of grapes, selecting such as they know to be excellent, in order that Mr. Paxton may see that we can cultivate

the grape to a high degree of perfection. We are sure Mr. Haggerston would not be afraid to put his grapes in comparison with any of those grown at Chatsworth, or elsewhere in England, making proper allowance for a voyage of fourteen days.

The steam-ships afford ready means of communication with England, and we trust that exchanges in fruits may hereafter be made, which will be of benefit to cultivators in both countries. We are not sure but that some kinds of pears and apples could be sent from Boston to London with as much safety as from some of the inland towns from whence productions are sent to the exhibitions of the London Horticultural Society, over a rough road of two hundred miles.—*Ed.*

Pruning fruit trees.—At the meeting of the London Horticultural Society, November 2d, a paper was read on a peculiar system of pruning fruit trees, by Mr. Crace. The object in view was, to make old branches, which have become barren, re-produce bloom buds. Having well drained his garden, which was originally a brick-field, he put light rich soil to the depth of two feet on it, and on this he planted his trees, keeping them steady by pegging down the large roots. To check luxuriant growth, he annually prunes the roots, cutting them each time an inch longer than before. In June, the young shoots are nipped off to about six inches, which occasions the development of the dormant buds on the old wood, and causes the bloom buds round the shoulder to produce their foliage, thus bringing to maturity numberless eyes before dormant. When the fruit is ripe, the autumn pruning is commenced, by cutting off the shoots to within an inch of the shoulder, excepting the tops, which are left uncut till winter. Mr. Crace has been very successful in the cultivation of various fruits, particularly pears.—*Ed.*

Cultivation of salvias.—A correspondent of the *Gardener's Chronicle* states, that he has perfect success in growing his salvias in the following manner:—At the end of May he procures cuttings of *Salvia splendens*, *sùlgens*, *coccinea*, &c.; he strikes them in a small frame, and then transplants them into a bed on the west border, which he had previously trenched, strongly manured and limed: the salvias grew with the greatest rapidity, and in a short time beat, in strength and general vigor, the parent plants: the whole of these varieties flowered freely the past summer, and in September had attained the height of three feet.—*Gard. Chron.*

Cinerarias.—This pretty tribe of plants is attracting much attention just now in England. Great quantities of seedling varieties are annually raised, which are great improvements upon the old species. We hope some of the new kinds will find their way into the collections of our nurserymen, and from thence into the hands of amateur gardeners: they would contribute greatly to the ornament of the green-house in February and March.—*Ed.*

Destroying the Gooseberry caterpillar.—We see it stated in a London paper, that the powder of white hellebore is effectual in destroying this insect. The insects are on the under side of the leaf; and one man holds up the branches, while another dusts the powder on them from below: if perfectly dry, it spreads in a cloud of dust, and misses none if well directed; and none it touches will live, if the hellebore be *fresh* and good. (*Mark Lane Express.*)

ART. II. *Domestic Notices.*

Premium of the Massachusetts Agricultural Society, for the best apple orchard in the Commonwealth.—The Committee of the Massachusetts Agricultural Society, have awarded their premium of fifty dollars for the best orchard, to Capt. George Randall, of New Bedford. With the letter of application or offer for the premium, Capt. Randall submitted to the Committee some account of his method of planting, and the future management of the trees: these remarks were subsequently enlarged, at the request of the Committee.

From Capt. Randall's communication, we learn that he has been very successful in the application of whale oil soap as a wash for his trees, preventing thus far the borer from attacking them. Mr. Randall, if we recollect aright, was the gentleman who first suggested to Mr. Haggerston the value of whale oil soap, as an antidote to noxious insects. It was during a visit which Mr. Haggerston made to Mr. Randall, in the spring of 1841, to look at some fine stock in his possession, that he suggested to him a trial of the soap on his trees, as recommended in the letter we have alluded to; and it was in consequence of this, that it occurred to Mr. Haggerston that it might answer the purpose of destroying the *rose slug*. How well it has answered this object, every one can affirm, who has tried the most valuable discovery of Mr. Haggerston. Its use appears to be no less important in the destruction of other insects injurious to trees and plants.

Capt. Randall's orchard was planted out in the spring of 1837, and comprises about three and a half acres; the soil good, but rather light. Every year since, the ground has been planted to roots, such as potatoes, ruta бага, mangel wurtzel, &c. The manures used have been common stable compost, loam, swamp mud, peat ashes, plaster, and a small quantity of saltpetre. The first pruning was made on the first of May last, at which time every tree had the earth removed from its base, to examine for borers, and not *one* was found, or any indication of one.

The whole number of trees planted was two hundred and twelve; the distance apart twenty-five feet. In four years from the nursery, they had acquired, several of them, near the roots, about thirteen inches in circumference.

Capt. Randall's mode of planting was so thorough, and completed in so workmanlike a manner, that we recommend it to others. It was as follows:—The mutilated roots of each tree are carefully cut off smooth, even the small fibrous ones, and engraving salve put over large cuts. The roots are immersed in water for above one half hour before planting, thereby inducing the mould or loam to become attached to them; the hole to be dug sufficiently large, so that every root may extend without bending or being cramped. He puts nothing around the roots but surface earth, and that carefully worked in by hand, each root and fibre thus laying horizontally and naturally. No manure is made use of in setting, but a bushel or so

of fine stable manure was put around each tree the November following, and repeated for two years. Capt. Randall prefers spring to fall planting.

The manner in which Capt. Randall uses the whale oil soap, and which we consider the most important part of his communication, is as follows:—eight to ten pounds of whale oil soap are put into a common pail, to which a sufficient quantity of warm water is added, so that when well mixed together, the whole is about the consistence of good thick paint. With this pail of soap, thinned in this manner, the man having a small tin pail, or bag, or pocket, filled with fine sand, tied round his waist, with a coarse crash cloth, and a paint brush, is ready for operations. He first wets his cloth with soap, then scatters on some dry sand, and gives the trunk and branches a good rubbing; after which, with a hand brush, he puts on a coat of the soap, prepared as above, equal to a thick coat of paint. The time selected for the operation is just at the termination of a storm of rain, when the moss, or any roughness on the bark, will yield more readily to rubbing.

From the remarks of the Committee, and the size which they state the trees have acquired in four years, we should think Capt. Randall has been highly successful in the management of his orchard, and is worthily entitled to the Society's premium. We particularly invite the attention of cultivators to the above method of applying the whale oil soap, not only to the apple, but to all kinds of fruit trees.—*Ed.*

Ripe Tomatoes.—At the residence of Mr. Cushing, Belmont Place, Watertown, there is a small pit, filled with tomatoes, the vines of which are trained upon a trellis near the glass, and now produce their fruit in abundance. Nearly half a bushel was gathered at one picking, a few weeks since.—*Ed.*

Prunus virginiana as a stock for the Plum.—A year ago, you mentioned, (Vol. VII., p. 33,) that Mr. Floy, of New York, made use of the *Prunus virginiana*, or wild cherry, as a stock for the plum. Have you heard any thing farther in regard to the success of the experiment?—*Yours, An Amateur, Dec. 1841.*

[Two months ago, while on a visit to the nursery of Messrs. S. & G. Hyde, in Newton, Mr. Hyde showed us some plum trees grafted upon the common cherry, or mazard, stock, two years since. The scions were inserted about three feet from the ground, and they had now attained such a size as to form a good head. How well the trees will bear, how long they will continue in a thriving state, and how far the stock will answer any useful purpose, we are unable to say. We requested Mr. Hyde to note the progress of his trees, and inform us of the result. When we receive any further information upon the subject, we shall lay the same before our readers.—*Ed.*]

Chorózema varium.—I have a plant of *Chorózema varium*, which I turned out last spring in the pit in one of my houses, which has taken to the fine prepared New Holland soil, and is now an immense bush: it will be splendid in January. I have also two superb *Acácia pubés* cens turned out.—*Yours, G. C. Thorburn, New York, Dec. 1841.*

vailing. Potatoes have been quite heavy, but a slight movement has just taken place, not, however, sufficient to cause any alteration in our present rates; Eastports are not so good as usual, but Nova Scotias are rather better. Sweet potatoes are yet quite abundant for the late season. Of onions, the stock has been somewhat reduced, and prices have advanced slightly. Beets and carrots are plentiful and good. A few roots of salsify have been brought in; this vegetable, though superior to the parsnip, is but very slightly known; were its excellent qualities duly appreciated, we are confident it would find a ready and constant sale, and be as eagerly sought after as the tomato was, after its good qualities became well known. Horseradish plentiful and good. The stock of cabbages is reduced very low, probably lower than for several seasons; the cause of the scanty crop we mentioned in our last report; some large lots of drumhead have been wanted, and it was found difficult to fill the orders. Cauliflowers and brocolis are very well supplied. Lettuce improves as the season advances. Spinach is now brought in of very good quality. Celery continues abundant and good. Squashes are very scarce; autumnal marrows command the high price of six cents per pound; a few West Indies have arrived, the first for the season; they are much superior to those of last year. Parsley is plentiful and of handsome growth.

Fruit.—We have very little alteration to note in the fruit market. Apples remain about the same, the stock good, and in better keeping order than last year. The best selected Baldwins command a slight advance on our prices. A few Danvers winter sweets have been brought in the past week. Pears are yet supplied, of several good varieties; the St. Michael Archangels being the principal stock. Cranberries remain the same. Grapes are plentiful, sweet, and good. The purple sort is about gone. Pine-apples are scarce. Quinces are all gone. Oranges are plentiful and at moderate prices. Walnuts and chestnuts are without alteration, and the stock good for the season.—*M. T., Boston, Dec. 28th, 1841.*

HORTICULTURAL MEMORANDA

FOR JANUARY.

FRUIT DEPARTMENT.

Grape vines, in the green-house, will require but little care this month. After the pruning is over, which should be by the first of the month or soon after, the shoots may be tied loosely up to the trellis. Perhaps a washing of whale oil soap, diluted with water, would be beneficial, and destroy the eggs of many insects which may have been laid upon the branches or around the eyes. They will need no further attention till they begin to grow.

Peach trees, in pots, may now be brought into the green-house, and placed in an airy situation. They will begin to swell their buds the latter part of the month, and if properly managed afterwards, will ripen their fruit in the latter part of May or early in June.

FLOWER DEPARTMENT.

Camellias will continue to require attention now: let them be well supplied with water, and occasionally syringe over the foliage, selecting a mild and fair day for the operation. Attend to the impregnation of the flowers, if seeds are wanted, and do not allow any of the fallen petals to lie upon the stages, but let them be swept up every day. If it is wished to grow plants from cuttings, now is the time to put them in.

Geraniums should be carefully watered; such as are too vigorous should be watered sparingly, in order that they may not run up too tall and weak; nip off the tops of those which have a tendency to do so.

Roses will now be showing their buds if the plants have been properly managed: water freely as they come into bloom.

Ericas of many sorts will now be flowering: keep the surface of the soil free from moss, and water carefully, neither giving too much or too little: they should not be deluged at one period, and then allowed to become dry: but they should receive a small quantity of water every day, unless in dull wet weather. Cuttings succeed well if put in now.

Chinese primroses will be flowering freely, and if in small pots should be shifted: water liberally.

Calceolarias must receive attention: water very sparingly, and if the plants need it, repot into the next size.

Azaleas will commence growing the latter part of the month: as soon as this is perceived, water liberally and syringe over the foliage.

Tree pæonies may be brought into the house now for a succession of flowers.

Verbenas will commence growing soon: such as need it should be repotted; and if the plants are straggling, they should be pruned into good shape.

Lechenaultias will now be in full flower: give moderate supplies of water, and place in an airy situation near the glass.

Oxalises of many sorts will now begin to flower: give water often as they continue to open their blooms.

Sparaxis, ixias, &c. will need more liberal supplies of water as they advance towards a flowering state.

Hyacinths planted in November, and placed in frames or in the cellar, may now be brought into the green-house or parlor to bloom.

Cactuses will now be ripening their shoots and forming their flower buds: water sparingly, and keep them in a cool situation near the glass.

Dahlia roots will require looking after: see that they are not decaying and in bad order: such as have the appearance of rotting may be potted, placed in a warm situation, and started into growth.

Pansy seeds may now be planted in boxes, and placed in the green-house, where they will come forward and be ready for transplanting into the open ground in April.

THE MAGAZINE
OF
HORTICULTURE.

FEBRUARY, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *Notes made during a visit to New York, Philadelphia, Baltimore, and Washington, and intermediate places, from August 8th to the 23d, 1841.* By the EDITOR.

(Continued from Vol. VII., p. 413.)

Garden of Mr. J. B. Smith.—Among the many amateur cultivators of plants with whom we have had the pleasure of an acquaintance, Mr. Smith excels them all in his zeal and ardor in the propagation and growth of fine specimens. To get up a collection of plants, with him appears to be but the work of a season. It is now only six or seven years since he disposed of his whole collection of plants. In the course of three years, he had accumulated another large lot, which he then offered at public auction, as he intended making a visit to Europe. But during only the short space of three years, he has accumulated another very large quantity of fine plants, nearly all of his own growth, either by propagation or by seeds. Mr. Smith is a great lover of plants; and though he would rather keep his collection within limited bounds, the pleasure he derives from their cultivation will not allow him to remain idle, and his leisure time is devoted to the multiplication of every thing which he possesses, and in this he has been one of the most successful cultivators.

The lovers of that splendid tribe of plants, the camellia, are indebted to Mr. Smith for some of its finest ornaments; his *philadelphica*, *amabile*, *E'stheri*, *Vauxii*, and particularly his *Binneyi*, will long commemorate his labors in improving the beauty and variety of this truly superb family. Mr. Smith has now [or had, at the time these notes were made,]

upwards of six hundred seedlings, from one to six feet high, none of which have yet flowered. We never saw healthier or stronger seedling plants, and from the great success which he has had in raising seedlings, there must be many valuable sorts among those which are yet to bloom. Of the character of *Bínneyi* sufficient has already been said (Vol. VII., p. 258,) to render any remarks here unnecessary. Mr. Smith has raised hybrids between *C. japónica* var. and *C. maliflora* Lindl. (*Sasánqua* L.) The plants have very dark and small foliage. In speaking of the growth of seedlings, and the kinds best adapted for that purpose, Mr. Smith stated that he had used the old waratah in almost every instance; and that all his fine varieties, including *Bínneyi*, were raised from it. He adopts the practice which we have before recommended, and which was tried by Mr. Knight, of fertilizing with the pollen of two or more kinds mixed together; and it is generally his practice to take the pollen from eight or ten fine sorts, and mix it thoroughly together with a camel's hair pencil, and then apply it to the stigmas of the seedling plants. This doctrine has been denounced by Dr. Lindley, in his *Theory of Horticulture*, but whether founded in truth or not, the results of Mr. Smith's practice are before us, and certainly speak strongly in its favor.

Mr. Smith has several strong plants of *C.* var. *Bínneyi*, nearly all of which are budded finely, and will bloom well the coming season: he has had several very favorable offers for the whole stock of it; and as he does not wish to be at the trouble of propagating young plants, and at the same time is desirous that amateurs may possess it, we presume he will soon dispose of it to some of the enterprising nurserymen in the city. Each of his other seedlings afford rich flowers.

But the plants which Mr. Smith feels most attached to are the *Cácti*, of which he has undoubtedly the most rare and unique collection in the country. Until we saw them, we had no conception of the great interest which attaches to a choice collection of this singular and splendid family. Among the number, he possessed many new echinocactuses, beautiful from their form, and the disposition of their spines; several of the *Céreus sénilis*, or Old man's cactus, and a great number of seedlings. Mr. Smith's acquaintance in the West Indies and South America has enabled him to procure a great portion of the fine species which abound in those places.

The practice adopted for growing the cacti by Mr. Smith is simple and most successful. The plants are plunged out in tan or coal ashes, in frames, exposed to the full sun, and are only protected from long and heavy rains, when a few boards or sashes are laid over the frames. Grown in this manner, the plants have a strong and healthy appearance, with ruddy looking stems and leaves, flowering abundantly every spring. The plants require very little care when managed in this manner, as the dews are sufficiently heavy to supply them with so much moisture as to require water only once or twice a week. The soil Mr. Smith uses is sandy loam, mixed with about one third its quantity of animal charcoal or the refuse of the sugar refineries: this mixture must lie some few months, until it is well incorporated, before it should be used. Mr. Smith will retain all his *Cacti*, should he find any one who wishes to purchase the remainder of his collection of plants.

Mr. Sherwood's Nursery and Flower Garden, near Laurel Hill Cemetery, has been much improved since we visited it, in the spring of 1837. At that time, there was only one range of glass, which had just been erected, the grounds having been only enclosed and occupied the previous season. At our present visit, we found two other additional structures erected for the growth of plants, and a very handsome cottage, occupied by Mr. Sherwood. In 1837, nothing had been planted in the open ground, but we now found it well filled with a collection of plants.

Mr. Sherwood possesses some fine specimens of plants: among others, we noticed a large *Bonapártea júncea*; *Doryánthes excélsa*, which had the appearance of flowering the present season; a double white camellia, the largest we have ever seen; it is planted out in the ground, in the centre of a span-roofed green-house, and nearly reaches the glass, its branches spreading thirty feet in circumference. Mr. Sherwood's name is familiar to all lovers of the camellia, from his having originated one of the most beautiful varieties which exists in our collections. It is an elegant rose colored flower, occasionally marked with white, perfect in its shape, with a fine rose petal, large broad, glossy foliage, and excellent habit. Mr. Sherwood has some three or four hundred seedlings yet to bloom, but we think he must have remarkable success, if he raises one which will surpass that to which he has given his name. Mr. Sherwood's collection of camellias is very good: we noticed,

among other varieties, *Juliàna*, *elàta*, *Donckelaèri*, *tricolor*, *cœlestina*, *ochroleuca*, *delicatissima*, *Millèri*, *King*, *nobilissima*, *Palmer's Perfection*, &c., &c.

In the open garden, we noticed a small bed of the beautiful *Euphòrbia Jacquinæflòra*, scarcely yet known in many collections, but a brilliant plant, in winter, in the hot-house; the green-house is not warm enough to flower it. Not only at Mr. Sherwood's, but at other places, we noticed it turned out of the pots into the ground, where it does much better than when its roots are confined: the plants grow more compact and bushy, the foliage strong and vigorous, and if taken up carefully and potted in September, they produce an abundance of its wreaths of scarlet blossoms from January to April. Mr. Sherwood's collection of tender roses is very large, and comprises many of the leading new sorts: his collection of green-house plants we found also very good, but a correspondent, in our last volume, (p. 127,) has given so extended an account of them, that it is unnecessary for us to extend our remarks at this time.

Flower Establishment of Peter Mackenzie, Spruce Street.—

Our last notice of Mr. Mackenzie's garden appeared in the fall of 1839, (Vol. V., p. 369,) but a correspondent has furnished us with some further account of it, in our last volume, (p. 125.) Mr. Mackenzie is a most excellent cultivator of plants, and has stored his establishment with a choice and well grown assortment.

The most important acquisitions which have been made since our last visit, are the new azaleas which have been produced from seed by Mr. Mackenzie, and the finest of which have been described in our last volume, (p. 223;) some of them are very fine, particularly *A. var. Còpeii*. We noticed a fine stock of young plants coming on, of the several varieties, and Mr. Mackenzie will soon be able to supply plants of all the kinds he has raised. Many new camellias have been added, and we found a fine and thrifty stock of young plants. The collection of roses is large, and includes all the good sorts: owing to the hot and dry season, we found but a limited number of kinds in bloom. We noticed a number of plants in the open ground, of that fine variety of the Bengal, *Agrippina*, which were blooming abundantly; and a few of the same sorts we have already noticed at other places, were expanding an occasional flower.

The practice which we alluded to, in our last remarks upon this place, of planting many kinds of green-house plants out in the open ground in summer, is adopted to a great extent by most of the Philadelphia cultivators of plants, and with good success: at Mr. Buist's, Mr. Sherwood's, and at this establishment, we found numerous plants grown in this manner; and we must again recommend it to the notice of amateurs and cultivators in the vicinity of Boston.

The camellias are here kept in the houses the year round: this is probably owing to the limited space which the nurserymen possess, who are located within the limits of the city. To place these plants in the open air, surrounded as they would be by brick walls or ranges of glass, which throw a reflected heat upon the plants, they would suffer much more than they do when standing in the house—the sashes, coated over with a thin wash of lime or whiting, to prevent the rays of the sun from injuring the foliage, and the house well ventilated at all times. When a good situation can be selected, against a north wall or building of some kind, or even in the shade of trees, though not *directly* under them, we would advise the plants to be removed from the green-house; but if otherwise, to let them remain, only taking the precaution to wash over the inside of the sashes with lime or whiting and water. Mr. Mackenzie's establishment is kept in the neatest order throughout, as every nursery establishment should be, and the whole reflects much credit upon his industry and skill.

The Nursery and Flower Garden of H. A. Dreer, at the Woodlands.—The Woodlands is well known to those conversant with the early history of gardening in this country, as having formerly been the residence of the late Mr. Hamilton: it is situated on the opposite side of the Schuylkill, about three miles from the city. In the early part of the present century, it was noted for its fine collection of trees and plants, probably equal, or superior, to any other in the country: the first camellias which were imported into America, were, we believe, received at this establishment. The botanist Pursh had charge of this place in 1802, into whose hands it was relinquished by Mr. John Lyon, a botanist whose researches had contributed considerably to enrich the flora of America. For many years, however, the grounds have been in a neglected and deserted state, and little now remains, except its fine plantations of forest trees, to designate the spot where the la-

bors of Pursh and others, aided by the wealth and taste of Mr. Hamilton, contributed so much to the advancement of botany and gardening in this country.

We passed into the grounds through the old gate, with its lodges now in a ruined state, and winding up a new avenue, lately cut, to facilitate the drawing out of the timber where it had been hewn down, we arrived in front of the old mansion. Standing upon what was formerly a noble lawn, but now overrun with weeds, our thoughts were carried back to the period, when, under the care of the skilful gardener, it might have vied, both in keeping and picturesque beauty, with the princely demesne of the English nobleman. The gently undulating surface of the grounds, the fine groups of trees, the broad glades of green turf, all contributing to render the place one of the finest residences the fancy could picture up. We could only hope that the ruthless hand of the woodman, in the mania for modern improvement, might spare the noble giants of the forest which rear their heads in majestic grandeur and stillness over a spot rendered so beautiful by the labors of man.

The garden is situated to the west of the entrance front of the house, and occupies a valley of about five or six acres in extent. From the gardener's lodge, it is entered by descending a flight of several steps in the rear of the old green-house, now in so dilapidated a state that little idea can be formed of its original appearance: the back wall is built of stone, and is carried up so as to secure a number of rooms for the gardener over the furnaces and potting rooms. One range of it is a conservatory in the old style, with a blank roof, and the gardener's lodge at one end; the wing forms the green-house. In front of the conservatory, we saw the old sun-dial, cut in freestone, a remnant of the flower garden which formerly occupied that spot.

But leaving the associations which are connected with its former condition, we turn to its present occupancy. Mr. Dreer has converted the old flower garden into a dahlia ground, and we found the best collection here in bloom that we observed in the city. [Mr. Dreer obtained the first prize of the Pennsylvania Horticultural Society for the best blooms at their last annual exhibition, Vol. VII., p. 469.] In the green-house, we found a good collection of cacti, and back of the conservatory, a large number of green-house

plants. In the garden, in different places, we observed a great quantity of many sorts of green-house plants turned out into the open ground, which were growing vigorously. Fine collections of annuals were planted for their seed, and we noticed some of the most brilliant colors of the *Phlós Drummondii* we have ever seen. Looking into the frames, Mr. Dreer showed us some moss roses, grown from cuttings by his gardener, which had made good shoots. The cuttings are put in when the shoots begin to acquire a ligneous or woody character, and exposed to a slight heat, they root very well. Grafting camellias is performed at all seasons of the year, when the sap of the stock is in motion. Propagation of various other plants was going on.

The place is rather too large to be kept in good order, but considering the state in which Mr. Dreer found it two years ago, when he leased the premises, he is deserving of credit for what he has accomplished.

(*To be continued.*)

ART. II. *An account of the Lowell Cemetery, its Situation, Historical Associations, and particular description.* By W.

To satisfy the natural desires of the community, this cemetery was projected and established by several public spirited and liberal individuals: the object is a general cemetery for the city of Lowell and its vicinity.

The site has been consecrated to its future purposes with solemn and appropriate services, and it will be faithfully preserved as a place of burial, without desecration or a change of purpose. In giving a description of this cemetery, it will be the writer's purpose to enter into such detail as he trusts will contain matter of interest, both for the general reader and for those who have friends interred in cemeteries.

The Lowell Cemetery contains an area of about forty-four acres of land, retired, and pleasantly situated on the southern slope of "Fort Hill," and at the distance of about three quarters of a mile from the city, and a mile and a half from the City Hall. The surface of the ground is beautifully di-

versified with hill and valley. The high grounds command an extensive view of a portion of the city, the country, and the Concord River, which forms its western boundary, and is seen to a distance slowly winding its course along the surface of ground, diversified with a variety and beauty of scenery seldom to be met with.

With such variety of surface, this ground possesses a high degree of adaptation as a place of sepulture; and ornamented both by nature and art, this cemetery must have attractions for the most unobserving and the least reflecting. There are many historical associations connected with this spot, and its former, but now long deceased, occupants. About the year 1652, it was the chief settlement of that once powerful but peaceful tribe, the Pawtuckets, who, for the facility of hunting, and that they might not be drawn into the quarrels which disturbed other tribes, obtained a grant to occupy this spot, and pass their time in sunshine and peace. They trusted not, however, to the bounds and spotted trees of the white man, but chose a more lasting line of demarcation; they dug a trench, which crosses the site now appropriated for the cemetery, traces of which are plainly seen to this day, and is known as "Passaconaway's Ditch." The chief sagamore of the tribe had his residence, and built a fort, on the summit of the hill: hence the name of "Fort Hill." Just before the death of the old chief, he embraced Christianity, and said, "heretofore, I have been unwilling to leave my old canoe, but now I embark in a new one, and do engage to pray to God." There are also to be seen mounds or tumuli, much resembling that ancient style of sepulture, in shape and form. The aborigenes of this spot dwelt in the darkness of cold mythology, like many tribes of the east, and are said to have held a superstition, that if one of them died in a strange land, and be there buried, his body will grope its way through the bowels of the earth, until it arrives within its own hunting ground. This tribe has long gone to their fathers, and their places yielded to the dead, and the spots where once blazed the red man's fire, and beneath the old oaks where once curled the smoke of the wigwam, may now be seen the humble turf-clad mounds, beneath which are sleeping the beloved remains of a wife, a husband, or a friend, whose virtues are fondly remembered by that constant visitor to the grave, whose pleasing duty it is to bedeck it with the first flowers of spring and the last of autumn.

Here, too, may be seen wild and thick masses of trees and shrubs, unpruned by the too formal knife of the gardener, where, in uninterrupted solitude, bereaved relatives may calmly enjoy their soothing visit to "the house appointed for all the living," and there cherish all those interesting associations which ever cast a cheerful light over the darkness of the grave.

The site of the Lowell Cemetery is eminently picturesque and beautiful. The northern and southern boundaries embrace a range of high grounds, covered for the most part with a young and verdant growth of trees: these high grounds gradually and abruptly slope towards the centre or valley, through which runs a brook, supplying several large ponds for the season, also sufficient for supplying a fountain of about one hundred feet head. The southern range of high grounds is covered with a verdant growth of trees, and is highly ornamented with that most characteristic and appropriate of all sepulchral ornaments—well grown and stately oaks, intermixed with the funereal and feathered boughs of the dark hemlock; while the slopes are only partially clothed with trees, and the contrast between the deep dusky green of the hemlock and the soft bright tint of the grass in the open spaces between them, produces an effect almost magical, and which strikes one as being more the result of art than nature. The northern range is admired for its more elevated position, and is favorable for tombs or vaults. The soil, for the most part, is of a hard and gravelly nature. Leaving the high grounds on the north, and descending to the lower parts, the gravel disappears, and a moist yellow clay, mixed with black earth, extends to a great depth, and is productive for a rapid growth of shrubs.

The professional work of surveying and laying out this cemetery was commenced during the fall of 1840—that of making the avenues and paths, early in the spring of 1841, since which, a corps of laborers have been engaged in making the roads and paths, and clearing off the grounds. Of the architectural department there is much to admire. One of the avenues, called "Washington Avenue," embraces a circuit round the ground, and the whole extent of drive is a mile and a half.

Directly opposite the gateway, and winding along the side of a natural ridge, leading to the chapel, is "Fenelon Avenue." From the chapel, the avenues diverge, one extending along the central parts, and intersects with others at right

angles: these avenues, for the most part, are bordered by fine forest trees, of a variety of kinds and sizes. In laying out the avenues and paths, particular regard was had to the greatest possible extent of available footage, and ready access by them to any part of the ground. The direction of many of the most important paths was dictated in a great degree by the existing ornamental timber; and some reference was necessarily had to the course required for draining. In laying out these grounds, the skill of the designer has been displayed, in combining somewhat the "ancient or geometric style" with the natural or irregular. In some parts, the regular forms and right lines are well adapted to the location of the ground, while in others, the varied and gradually curving forms give an air of grandeur and boldness, and in combining these with the natural scenery, cannot fail to call forth, in the minds of visitors, impressions of love and veneration.

The plan of the gateway is designed upon the ancient Egyptian style of architecture, consisting of an elevation similar on both sides, which serve as gate piers, to which are hung gates folding in the centre. Each pier rests upon a base of about five feet square, surmounted with a plain massive capital; the height of the elevation, from the ground to the apex of the wreathed head of the capitals, is twenty feet: upon the interior face of these piers, and next the gate, are pilasters supporting the Egyptian arch, which is twelve feet wide.

The chapel is to be built of sober but correct style of Gothic architecture, and will be embosomed amongst a deep mass of pines and stately trees, and the whole will form a picture of nature and art combined, not easily to be surpassed.

The grounds are now open to visitors, and all are earnestly advised, who have not already done so, to pay an early visit to this beautiful cemetery.

In concluding this detailed account, the writer will not omit to state, that the whole of the architectural arrangements, including the ground plan, the disposition of the grounds, the gateway, and chapel, have been effected under the professional management of George P. Worcester, Esq., civil engineer.

Lowell, Dec., 1841.

ART. III. *On the cultivation of the Lycios edulis, as a culinary fruit.* By J. D. LEGARE, Esq., Editor of the Southern Agriculturist.

IN an early number of the Magazine of Horticulture, for the present year, you mention that Mr. R. Buist had exhibited to the Horticultural Society of Philadelphia several fruit of the *Lycios edulis*, which he had received from South America, and you express a hope that they would be cultivated, and the results made known to you. I believe the fruit referred to by you were some I sent Mr. Buist last fall, and which were erroneously reported to have come from South America, in the stead of South Carolina. Soon after I saw your notice, it was my intention to have written to you, and given some account of this fruit (or vegetable) which has been cultivated in this city for many years, but I mislaid the number, (which I have never been able to find since,) and various calls on my time prevented me, until it was so late that I determined to defer it until I could send you some of the fruit, which I did by the ship Leland, consigning them to the care of a friend, and hope by this time that you have received them.

The *Lycios edulis* has been cultivated in Charleston, for at least thirty years, and how much longer I am unable to say, for when brought to this city I have never been able to learn. It is a perennial vine, which with us grows most vigorously, covering with its large palmated leaves, large arbors, and producing large numbers of fruit late in the season. Although it has been so long among us, and grows so luxuriantly, and bears so well, yet it is *comparatively* unknown, even in this city, and scarcely at all out of it. I can scarcely account for this, unless it be that it requires so large an arbor for it to run on, for the fruit is excellent, either as a vegetable, preserve or pickle. The two I sent you will give you an idea of their shape, but not of their size, as they were small and shrivelled. They resemble a pear very much in shape, and are usually from four to six inches in length; from the butt end of which, as it matures, proceeds a bean, which divides, adhering only at the extremity; from this bean, and at the point of adhesion, proceeds a shoot, (sometimes two,) which, in the process of time, becomes a vine. The whole fruit is planted, when in this state,

but as this cannot safely be done before all danger of frosts be past, it is usual to keep them in some cool place until the proper period for planting arrives, which with us is usually in March. Very frequently, however, owing to their being placed in rooms too warm, or the season being very mild, these shoots grow to great length, and I have seen instances when they exhausted the fruit, which became shrivelled, and perished. This is, however, prevented by keeping them in as cool a room as possible, merely excluding the frost.

When the season for planting arrives, a hole is made, and some well rotted manure being placed therein, the fruit is placed entire, about three inches deep, merely leaving a small portion of the vine out. During the first part of the season the growth will be slow, but as the weather becomes warmer, this becomes more rapid, and a beautiful and luxuriant vine is produced, which will cover a very large arbor or trellis, producing a dense shade. It does not, however, produce any fruit, nor even a blossom, until the approach of cool weather. In October, with us, the vines are covered with fruit, and continue to bear until destroyed by frost. Twelve dozen and upwards have been gathered from a single plant.

I have already mentioned that it is perennial, and all that is necessary in this climate, to preserve it, is to cover the roots with manure. Treated in this way, I had one which grew in the garden eight years, and was lost by the carelessness of the old gardener. This, however, is considered of but little consequence here, as they produce an abundance of fruit the first year of their growth. The fruit is mostly used as a vegetable, and plain boiled, and eaten with butter, salt, and pepper; it resembles the summer squash both in appearance and flavor so nearly as readily to be mistaken for that vegetable. It may also be cooked in any of the modes in which the purple egg plant is. The fruit is also used as a pickle, and highly esteemed. Made into a preserve, it is said to closely resemble the citron; I have never seen it in this state. The fruit, as I have already intimated, keeps well and long; and if picked whilst young, packed in sand, and placed in a cool place, they may be used as a vegetable the whole winter. We have had them on our table, without any of these precautions being taken, several times a week, until late in December.

I have thus given you all the information which will prove interesting to you, relative to this fruit; but should there be

any thing farther, which you may wish information on, I will with pleasure communicate it, if in my power.

I remain, yours, respectfully, JOHN D. LEGARE.

Charleston, S. C., Dec. 30, 1841.

We are indebted to our cotemporary for his kindness in forwarding us some of the fruit above named; and also for the excellent communication describing its mode of cultivation. We shall plant the fruit, and at a future time make known the results of its growth in our climate.—*Ed.*

ART. IV. *On the Cultivation and Management of forced Cucumbers in Hot-beds.* By J. W. RUSSELL, Worcester, Mass.

WHEN early cucumbers are wanted, the first necessary step to take is, to procure a sufficient quantity of horse dung, with a good portion of the strawy litter mixed with it. This ought to be well prepared, before making up the bed, in the following manner:—

Having obtained fresh dung from the stable, at least *one month* before it is intended to make up the bed for the fruiting plants, it should be laid into a round heap, on a high and dry place, and watered if the dung is dry, and turned over three or four times, being mindful to shake the whole well to pieces with a fork at the different times of turning it over. The outside of the heap should be placed in the middle, and the middle at the outside at each time of turning it, in order that the whole may be well mixed and fermented together. If any of the manure appears dry, it should be made wet by the application of water; in fact, the two extremes must be guarded against, that is, it should not be *too wet* or *too dry*. The dung having been prepared as thus proposed, it will, at the end of a month's time, be in a proper state for making the bed: every gardener knows that what is here recommended is of the utmost importance in order to be successful in forcing the cucumber.

Before making the bed, collect brush-wood, or old stumps of trees, &c., to form a drainage at the bottom, one foot high; if this be not done, water from heavy rains would chill the bed, by flooding the ground all around it. After the bed has been made four or five weeks, the manure will become dry from the heat evaporating, and will therefore require water in large quantities to be poured into holes that have been perforated in various parts of the bed, for that purpose: the drainage will allow the superabundance of water to pass off freely, and no unwholesome steam will arise to injure the plants. If the bed is made in the month of March, it should be built at least three feet high, spreading the dung evenly, and gently beating it down with a fork: by the middle of May, the bed will not be more than eighteen inches high, therefore it will be immediately perceived that three feet of manure, in the first start, will not be too much.

Having formed the bed or beds, put on the frames and lights, and shut up close till the heat rises; then give air night and day, sufficient only to allow the steam to pass off, and once or twice a week fork the surface over about six inches deep, to sweeten it, and in this operation, if any of the manure appears dry, water it. The rank steam having passed away, and the bed being quite sweet, it will be ready for the earth in which the plants are to be grown; this should be composed of a good friable loam, with about one third of well rotted manure thoroughly mixed with it, adding a portion of coarse sand, if the mould be deficient of it; then place about one bushel of this compost on the bed, under the centre of each light. The next day, the plants may be put out, placing two in each hill, and about six inches from the glass. When the roots make their appearance all round the hill, which they will do in about a week, or less time perhaps, cover them over about one inch with the same kind of soil as that in which the plants are growing, and continue to do so every few days for three or four weeks. By following this method the plants will grow rapidly; but if the whole bed is earthed over a few days after the plants have been put out, they will not flourish or grow so vigorously in three weeks as they would in one week with the treatment I have proposed; the great quantity of soil will chill the bed, and prevent the heat from rising freely. Be sure to keep in the frames watering-pots, filled with soft water, for the purpose of watering the plants, as cold water from

a pump or draw-well would chill the soil, and materially retard the growth of the plants.

If the practice of growing the plants in the hill and adding the soil every two or three days, as just recommended, (which will be found to be decidedly the best plan,) is carefully followed, it will be about three weeks before the frame is wholly earthed over with the compost; in a short time there will be an abundance of cucumbers, and the vines will continue all through the summer to bear plenty of fruit, if attention is given to pruning and thinning them out occasionally, and supplying the roots with a bountiful quantity of water.

A small one-light frame is the most suitable for raising the plants in, as it saves both time and trouble. The bed ought to be made as recommended for the fruiting plants; the seed to be sown in No. 1 pots, only two in each pot. When the plants make their appearance, give air every day, if it be only by propping up the sash half an inch; if the weather is cold and windy, place a bass mat over the part where the air is admitted, in order that the young plants may not be chilled by the cold wind.

By sowing the seed as here advised, the plants can be repotted two or three times, and receive no check in their growth. When the plants have made their second leaf, which will be large and rough, they must be stopped, by taking off the centre or leader with the finger and thumb; this will be the means of making them throw out their side shoots, which will be strong and vigorous. The same plan of stopping the shoots is to be practised in the fruiting beds occasionally. Remember always to stop the shoots one or two joints *above* the *fruit*, and cut out some of the vines, especially such as are found to produce nothing but male flowers. Attention must also be given to the impregnation of the flowers in the early months, before the plants are fully exposed to the air, or the bees or the wind can perform the same operation for the gardener. This is particularly necessary, or the fruit will not swell freely, or attain a good size.

I would add, that the long prickly cucumber is the most desirable sort for forcing, and also for bearing throughout the season.

J. W. RUSSELL.

Worcester, Mass., Jan. 1842.

ART. V. *Pomological Notices; or Notices respecting new and superior varieties of Fruits, worthy of general cultivation.* Notices of thirty-nine varieties of new pears, which ripened their fruit in the Pomological Garden during the year 1841. By R. MANNING, Esq., Pomological Garden, Salem, Mass.

As we have already intimated, we now have the pleasure of laying before our readers the results of Mr. Manning's labors in the cultivation of new pears the past year. He has sent us the descriptions of thirty-nine kinds, thirty of which have not fruited in any other collection in America. Many of the varieties have been exhibited the past summer and autumn at the Massachusetts Horticultural Society's room, but several of them are only known to Mr. Manning himself, none having been exhibited. The varieties have been gathered from various sources, both at home and abroad; a larger part, however, were received from that great pomologist, Dr. Van Mons, of Belgium, with whom Mr. Manning has long corresponded, and from whom he has received all the most noted seedlings of his own production. The scions of a great number of kinds were received some years since, and soon after they were sent to Mr. Manning, the larger part of the valuable collection of Dr. Van Mons was destroyed, owing to the necessity of the removal of the trees, at a season of the year when their death was inevitable. In consequence of this, many of the following sorts do not exist, only in the Pomological Garden at Salem. The scions were sent out under the same numbers and marks of the original trees from which they were cut; and as the varieties came into bearing, Mr. Manning was desirous that they should be named. From Mr. Manning's prefatory remarks, it will be seen that Dr. Van Mons has, with the most commendable liberality, given him liberty to add such names as he pleased.

It will be perceived that we have given engravings of a few of the varieties; and we only regret that we are not enabled to add more. It is our intention hereafter, to give outline engravings of all the new and more remarkable varieties which we may notice in our pomological reports. By the kindness of Mr. Manning, we were supplied with specimen fruits of those varieties we have figured, together with many of the older sorts,

and having taken drawings of these, intended at the time for our private use, it occurred to us that to represent them here would add much to the value of Mr. Manning's descriptions. The coming season, we shall endeavor to procure drawings of all those which we do not now possess, and at another opportunity to present them in our pages.

In conclusion, we have only to regret that Mr. Manning's health is such as to prevent his being able to communicate through our pages so often as he is desirous to do, or we could wish. We anxiously hope that his health may improve, that our readers and the public generally may obtain the results of his long and careful experience in the cultivation of the most esteemed varieties of fruits.—*Ed.*

Sir:—I send you the following descriptions of thirty-nine sorts of pears which ripened during the last summer at the Pomological Garden: a part of them are from the unnamed sorts sent by Dr. Van Mons; the names I have chosen myself, having recently received a letter from him, authorising me to do so. The descriptions were written at the time of tasting the fruit, and are what they appeared to my judgment at the time.—*R. M., Pomological Garden, Salem, January, 1842.*

1. *Beurré Haggerston* (No. 8, of Van Mons.)—Medium size, oblong, obtuse at stem, which is one inch long; color yellow; flesh juicy, sharp, agreeable and very abundant. Ripe August 28th.

2. *Sullivan* (No. 889 of Van Mons.)—Medium size; skin yellow, stem long and stout, turbinated, some specimens oblong; flesh rich, juicy, and sweet. Ripe Sept. 28th.

3. *Elizabeth* (No. 158, Van Mons.)—Medium size, round; flesh coarse, white and very sweet; skin red, spotted with yellow. Ripe Aug. 29th.

4. *Limon* (Van Mons.)—Large, oblong, obtuse at the stem, which is long, large, and obliquely inserted; skin whitish yellow, and faint red on the exposed side; flesh white, high flavored, and juicy. Ripe Aug. 29th.

5. *Amanda's Double* (Van Mons.)—Medium size, pyriform, stem short, fleshy at its junction with the fruit; skin yellow, bright red; flesh coarse-grained, sweet, tender and excellent. Ripe Sept. 14th.

6. *Pailleau* (Van Mons.)—Large, oblong, stem one inch long, and very stout, obliquely inserted, and very fleshy at its junction with the fruit; skin greenish yellow, rough, with brown and green dots and patches of russet; flesh very rich, juicy, sweet, and excellent. Ripe Sept. 10th.

7. *St. Andre*.—Large, nearly round; skin light yellow, spotted with red; stem one inch long; eye small; flesh melting and fine. Ripe Sept. 17th. The grafts of this pear were received from Messrs. Baumann of Bolwiller, France.

8. *Van Assene* (Van Mons.)—Large, roundish, stem one inch long, eye deeply sunk; skin dull yellow, covered with dark spots; flesh white, very tender, fine and melting. Ripe Sept. 17th.

9. *Rousselette de Meester* (Van Mons.)—Large, broad at the crown, tapering suddenly at the stem, which is one inch long, placed on a diagonal point; skin greenish yellow, and dull red, with spots and blotches on the sunny side; flesh juicy, sugary, and very fine. Ripe Oct. 10th.

10. *No. 1054* (Van Mons.)—Large, yellow, sweet and good. Ripe Sept. 28th.

11. *Colmar Epine* (Van Mons.)—Large, roundish, oblong, tapering gradually to an obtuse point at the stem, which is one inch long; color greenish yellow; flesh sweet, white, very melting, juicy, high flavored, and good. Ripe Sept. 29th.

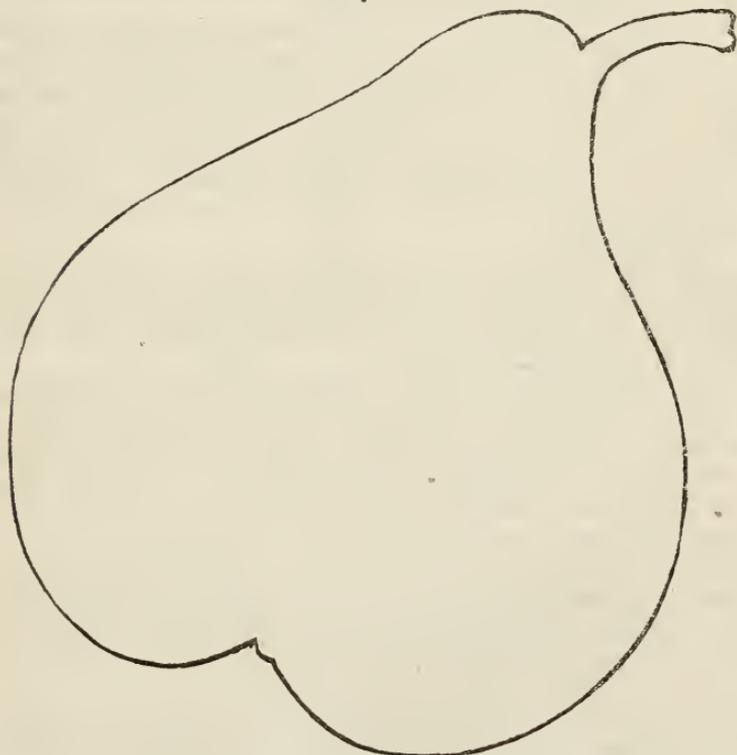
12. *Jalousie de Fontenay de Vendee* (from Vilmorin, Paris.)—Medium size, oblong, obtuse at the stem, which is one inch long; skin yellow, russett mixed with green; flesh juicy, sweet and excellent. This pear resembles the *Jalousie* of *Duhamel*, in the color of the skin, but is of smaller size and much superior. Ripe Oct. 2d.

13. *Clara* (Van Mons.)—Medium size, long, tapering from the middle, both to the eye and stem, which is long and stout; skin light green, mixed with a few russet spots and patches; flesh white, juicy and good, but has rather too much acidity. Ripe Oct. 3d.

14. *Capucin* (from Van Mons.)—Large, swelling out in the middle, and diminishing at both ends, obtuse at the stem, which is one inch long; eye small, deeply sunk, around it are some ridges or swellings; skin yellow, with red cheek, spotted with dark points; flesh rich, juicy, and excellent. Ripe Oct. 4th.

15. *Queen of the Low Countries* (from Van Mons.)—Of the very largest size, oblong, round, and large at the blossom end, decreasing suddenly to an obtuse or sharp point at the stem, which is an inch and a quarter long; color fine dark red and on the shaded side dull yellow and green with russet spots, especially round the eye, which is deeply sunk, extremely small and naked; flesh white, juicy, very melting and excellent. Ripe Oct. 4th. Van Mons describes this pear as follows, “very large, very beautiful and good, and without any question, the most perfect of pears.” [Fig. 1, is an engraving of this pear. Owing to a mistake of the engraver, the stem is too short by one quarter of an inch.—*Ed.*]

1



Queen of the Low Countries Pear.

16. *Great Citron Pear of Bohemia* (from Baumann of Bolwiller.)—Large, oblong, yellow, spotted and tinged with red on the side of the sun; stem one inch long; flesh sugary, juicy and very fine. Ripe Sept. 30th.

17. *Croft Castle*.—Size small, skin yellow, with russet spots; flesh extremely high flavored and good. Ripe in November. The scions were given me by the late Mr. Lowell.

18. *Dundas* (Van Mons.)—Medium size, obovate, yellow and brilliant red, surface uneven, spotted with dark points; stem one inch long; eye very deep in a wide cavity; flesh sweet between breaking and melting, good, very handsome. Ripe Oct. 10th.

19. *Doyenne Boussouek* (from Vilmorin.)—Obovate, medium size, russet, sweet, good. Ripe Oct. 20th.

20. *Beurré Neill* (from Van Mons.)—Very large, oblong, obtuse at the stem, greenish yellow, and light red; flesh melting and excellent. Ripe Oct. 20th.

21. *Beurré Preble*.—Large, oblong or turbinated; stem one inch long and very stout; skin greenish yellow, mottled with russet and green spots; flesh melting, high flavored and fine. Ripe Nov. 2d. This pear was raised from seed by Elijah Cooke of Raymond, Maine, from whom I received the grafts. I have given it the above name in memory of Commodore Edward Preble, of the United States Navy, a native of Maine.

22. *Enfant Prodige* (Van Mons.)—Medium size, shaped like the St. Michaels, dull yellowish green skin with dark spots and blotches; stem one inch long; flesh rich, juicy, high flavored. Ripe Nov. 3d.

23. *Incomparable* (from Vilmorin, Paris.)—Small size, turbinated, dull yellow skin; stem one inch long; seeds large and black; flesh musky, sweet and excellent. Ripe Nov. 4th.

24. *Lewis of Bologna* (from Van Mons.)—Medium size; skin light yellow; form obovate, stem one and a half inches long; flesh sweet, melting and good. Ripe Nov. 5th.

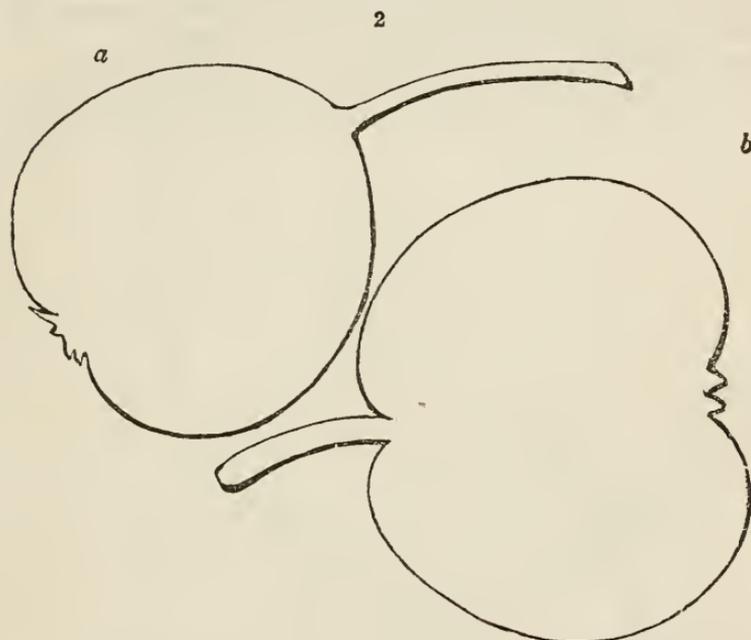
25. *Commodore* (Van Mons. No. 1218.)—Medium size, round and full at the crown, tapering to an obtuse point at the stem, which is long and large; skin yellow with patches of russet and red; flesh rich, sweet and excellent. Ripe Nov. 30th.

26. *Clinton* (Van Mons. No. 1238.)—Large size, shaped like the Bezi Montigny; light yellow skin; flesh soft, buttery and good, but not high flavored. Ripe Nov. 13th.

27. *Michaux* (from Messrs. Baumann of Bolwiller.)—Medium size; skin yellow, with a slight tinge of red; stem long; flesh high flavored and good. Ripe in September.

28. *Comte de Lamy*.—Medium size, obovate; skin pale yellow, with red cheek; flesh rich, juicy and excellent. Ripe in October. The scions of this very fine pear were received from the London Horticultural Society.

29. *Dumortier* (Van Mons.)—Small, obovate; stem long; skin dull yellow, with dark red spots, and blotches of russet; flesh fine, juicy, sweet and excellent. Ripe Oct. 7th. [Our fig. 2 a, represents the fruit.—*Ed.*]



Dumortier Pear.

Passans du Portugal Pear.

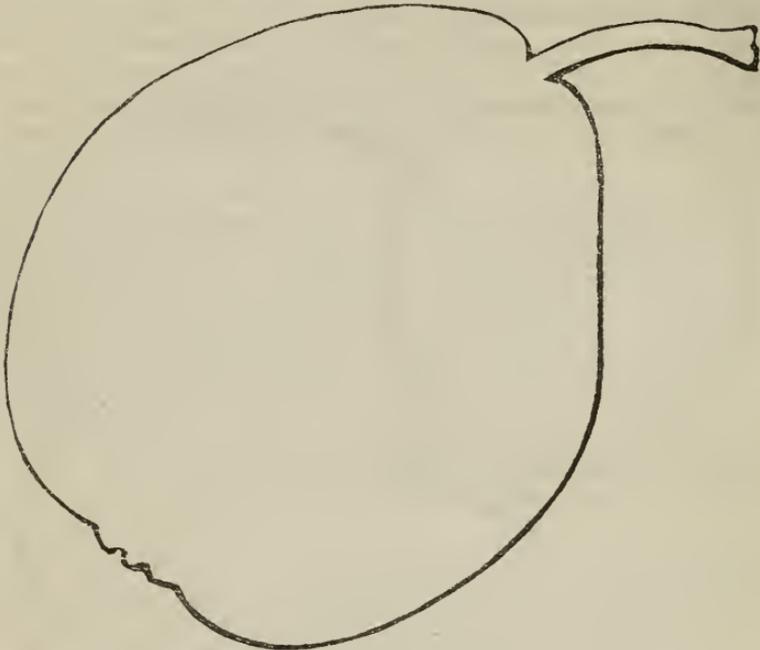
30. *Stevens's Genesee*.—In size, form and color it resembles the *St. Michaels*; it ripens in October, and is a fine fruit. It is a native variety from western New York.

31. *Passans du Portugal*.—The size is small; in shape, it closely resembles the *summer rose*; skin whitish yellow, sometimes with a faint tinge of red. Although not very high flavored, it is tender, juicy and very delicate; a great and early bearer, ripening in August. [This pear is our fig. 2 b.]

32. *Belle of Flanders*.—The size is large, obovate; skin greenish yellow, mixed with red and russet; flesh buttery,

juicy and high flavored. Ripe in September. The scions were received from the London Horticultural Society; it is a good bearer, and one of the best of pears. [Our fig. 3 represents this excellent fruit.—*Ed.*]

3



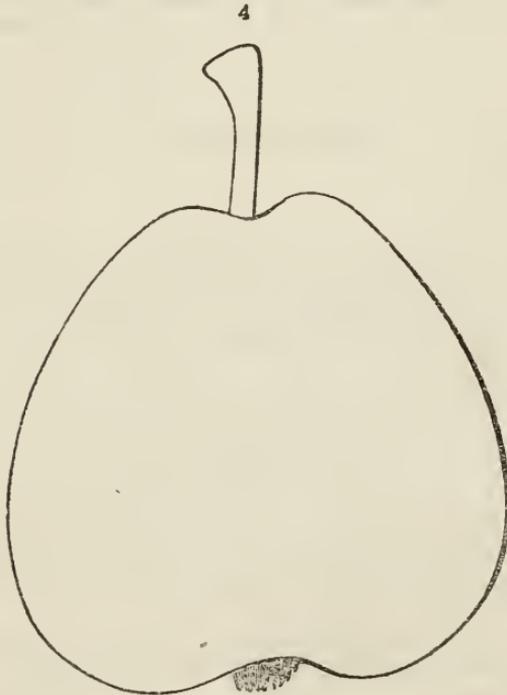
Belle of Flanders Pear.

33. *Mc Laughlin*.—A seedling from Scarborough, Maine, of large size; skin rough, greenish yellow; form oblong; flesh juicy and good. Ripe in January. This cannot be the fruit of the same name, sent some years since to Boston by General Wingate of Maine; it was of the size and color of the Bartlett, and was tasted by the Committee of the Massachusetts Horticultural Society in Mr. Cook's office in September, when it was over ripe.

34. *Muscat Robert*.—The size is small; skin a clear light yellow; flesh good, with a peculiar flavor; a great bearer. Ripe in July. This is one of the old French pears, but lit-

tle known here. I think as it ripens early, it deserves more attention than it has received.

35. *Muscadine*.—In size, shape and color, it resembles the Dearborns' seedling; it is a first rate pear, ripening in September. This variety originated in the vicinity of Newburgh, N. Y., and was introduced to notice by Messrs. Downing, of that place, from whom I received scions. [In our first volume, p. 364, will be found a communication from our correspondents Messrs. Downing, describing this pear, together with an engraving of the fruit taken from a specimen sent to us by those gentlemen. As many of our present readers may not possess our earlier volumes we repeat the engraving here. *Ed.*]



The Muscadine Pear.

36. *Hampden's Bergamot*.—The size is large; skin green. The fruit was injured by being blown from the tree before ripe. I received the scions from the London Horticultural

Society; it has the reputation in England of being a first rate fruit. Ripe in September.

37. *Super-fondante*.—Of medium size, form obovate; skin yellow, with a few red dots; flesh juicy, rich and excellent. Ripe in October. The specimen tree, I received from Messrs. Baumann.

38. *Thompson's*.—Medium size, form rather oblong; skin yellow with a few russet specks and blotches; an excellent high flavored pear, ripe in October and November. The scions were sent me from the garden of the London Horticultural Society.

39. *Beurré Kenrick* (Van Mons, No. 1599.)—Medium size, flat at the blossom end, tapering to the stalk; color greenish yellow with indistinct russet spots; stem one inch long; flesh good, juicy, sweet and buttery. Ripe in September.

ART. VI. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Botanical and Floricultural Intelligence. Botanical Excursion to the Mountains of North Carolina.—The last number of Silliman's *Journal* contains a long and interesting article by Dr. Gray, giving an account of an excursion to the

mountains of North Carolina during the last summer, made by himself and his friends Messrs. John Carey and James Constable. The article is in the form of a letter, addressed to Sir W. J. Hooker, whose labors in the investigation of North American plants have been of signal service to the science of botany.

From this paper it appears that the younger Bartram (William) was the first botanist who visited the southern portion of the Alleghany Mountains. This was in 1773—76, when, after travelling in Florida and the lower part of Georgia, he made a transient visit to the Cherokee country. His well known and very interesting volume of travels contains numerous observations upon the botany of these regions, with occasional popular descriptions, and, in a few cases, Latin characters of some remarkable plants.

The next botanist was André Michaux, who, at an early period, and amid difficulties and great privations, explored our country from Hudson's Bay to Florida, and westward to the Mississippi, more extensively than any subsequent botanist. Some few of his plants have not yet been re-discovered, and a considerable number remain among the rarest and least known species in the United States. Dr. Gray having had the opportunity of consulting the original journals of Michaux, presented by his son to the American Philosophical Society, gives an account of his peregrinations, particularly in the mountain regions of North Carolina. From his journal, it appears he left France in the L'Orient, in September of 1785, and arrived in New York in November. He immediately established two nurseries or gardens, one in New Jersey, and the other about ten miles from Charleston, S. C. These were intended to receive living plants as he discovered them, from whence they were to be sent to France. In the garden at the latter place, he introduced the *Mimosa Julibrissin* (*Acacia Julibrissin*, Willd.) from Europe, and it was probably from this stock that the tree has become extensively disseminated in the southern States, and is beginning to be naturalized in many places.

From 1787 to 1796, Michaux made repeated journeys to the mountain regions of Carolina; he descended the Ohio to Louisville, Ky., with the view of visiting the western States; he explored East Florida; travelled as far north as Hudson's Bay, and devoted part of a season to an examination of that

region; botanized in Mississippi, Tennessee, Kentucky, Ohio, Illinois, Virginia, New York, and Pennsylvania. In August, 1796, he embarked for Amsterdam, in the ship *Ophir*: this vessel was wrecked on the coast of Holland, in October, and part of his collection lost. In December, he arrived at Paris, with what he had saved. Michaux labored with untiring zeal, and his researches were attended with great success.

Subsequently, Frazer, Michaux the younger, author of the *Sylvia Americana*, Pursh, Kin, a German nurseryman and collector, Nuttall, Dr. MacBride, Rafanisque, Mr. S. B. Buckley, and Rev. M. A. Curtis have explored the regions visited by Dr. Gray and his companions.

We have not room to follow Dr. Gray in his excursion: he set out from New York on the 22d of June, and did not return till near the end of July, the intermediate period having been devoted to herborizations among the mountains. For an account of the botanical information which Dr. Gray and his companions gathered together, we must refer the reader to the article itself, which occupies forty-nine pages. (*Silliman's Journal*, No. 85, 1842.)

Undescribed Plants of Central Ohio.—In the same number of the *Journal* above quoted from, we find a notice of three new plants from Central Ohio, described by Mr. S. Sullivant. They are as follows:—

Arabis patens—inhabiting the Sciota River, near Columbus, Ohio. *Fedia umbilicata*—around Columbus; and *Eleocharis compressa*—on the Darby plains, fifteen miles from Columbus.

Two plants which Nuttall discovered in his travels to the Arkansas, and supposed to be nearly or altogether confined to that region, Mr. Sullivant states are also natives of Central Ohio; one is the showy *Erysimum arkansanum* Nutt., the other, the *Eulophus americanus* Nutt. Dr. Short has also detected them in Kentucky.—*Id.*

Seedling Chrysanthemums.—The Pennsylvania Horticultural Society, at its meeting of the 16th of November, awarded its premium for the best American seedling chrysanthemum to R. Kilvington. The committee who awarded the premium remark, that the prize seedling is decidedly the finest variety ever presented to the Society, “of a beautiful ranunculus form, and shaded pink color:” another very good seedling was shown by Mr. Kilvington, of a bright orange color.

Mr. Kilvington also gained the prize for the first and second best twelve varieties. Fine seedlings were also exhibited by R. Buist, Peter Roubé, and other contributors. We are highly gratified to learn that our Philadelphia friends are improving this beautiful and most desirable flower.—*Ed.*

Thymelæceæ.

PIMELEA

spectabilis Lindl. Showy Pimelea. A green-house shrub; growing two feet high; with rose-colored flowers; appearing in spring; a native of Swan River; increased by cuttings and seeds. *Bot. Reg.*, 1841, t. 33.

“One of the best Swan River shrubs yet introduced.” Similar, in many respects, to *P. hispida*, but is much handsomer, with the heads of flowers twice as large. Its habit is different from the other species, and it is readily known when out of flower, by the “smooth, rather glaucous leaves, so arranged as to form four rows along the stem.” The heads of flowers are so large as to induce the slender branches to bend beneath their weight. The bracts which support the flowers assume a reddish tint. Among other good qualities which it possesses, is that of living a long time when cut and placed in water; on this account it will be very useful for bouquets.

It is easily propagated, either by cuttings or seeds. The soil best suited to them is a mixture of loam, peat, leaf mould, and sand. Planted out in the border of a conservatory, the plants form splendid objects. (*Bot. Reg.*, June.)

Leguminosæ.

BROWNÆA (so named by Jacquin, in honor of Dr. Patrick Browne, the author of a Natural History of Jamaica.)

grandiceps De Cand. Large headed Brownæa. A stove shrub; growing ten feet high; with red flowers; appearing in March; a native of Caraccas; increased by seeds; grown in a rich soil. *Bot. Reg.*, 1841, t. 30.

A most magnificent stove plant, attaining the height of eight or ten feet, which flowered in the collection of Richard Harrison, Esq., of Liverpool. The blossoms are produced on a short spike, tier above tier, until the whole are expanded, when the mass becomes “a globe of living and glowing crimson.” Every evening, the leaves rise up and expose the blossoms to the dew, so that each morning they were uncovered; but as day advanced, the leaves gradually drooped, and bent over the flowers, to guard them from the rays of the sun.

This noble tree requires the heat of a damp stove. When its seeds are good, they are easily raised in light soil, in a good hot-bed. A free rich soil suits the plant; but they can

only be grown to perfection in a large house, where, if planted out in the border, or placed in a large tub, it forms a really magnificent object. (*Bot. Reg.*, June.)

Balsaminàcæ.

IMPATIENS

rosea Lindl. Small pink Balsam. A half hardy annual; growing two feet high; with pale rosy flowers; appearing all summer; a native of India; increased by seeds. *Bot. Reg.*, 1841, t. 27.

Another of the new East India balsams, attaining the height of two to three feet, with leaves six or eight inches long, linear lanceolate, tapering to the base, and bordered with fine saw-teeth. The flowers appear in axillary clusters, all along the stem and branches. The stalks (petioles) are blood red, and about as long as those of the leaves. The sepals are deep rose color, and the petals much larger and paler than the sepals, and of the two lobes of which they consist, the smaller are rounded and erect, while the larger are half oblong, and hang down like a double lip in front of the flower. The pods are oblong and covered with white wool. Received from the directors of the East India Company, and flowered in the garden of the London Horticultural Society. Managed precisely like the common balsam. (*Bot. Reg.*, May.)

cândida Lindl. White Balsam. An annual; growing six feet high; with white flowers; appearing all summer; a native of East India; increased by seeds. *Bot. Reg.*, 1841, t. 20.

“A stately annual, with brittle succulent stems,” growing six feet high, bright green, obtusely quadrangular, and branched to the very ground. The leaves are narrow, lanceolate, tapered to the point, arranged in whorls of three, and edged with fine crimson teeth. The flowers are large, showy, white, a little speckled with crimson, and appear in loose terminal umbels of from five to twelve each.

A most superb species, forming a fine object for the flower border. In England, it is a tender annual, only attaining perfection in the green-house: with us, it would grow and flower as abundantly in the open border as the common balsam. It needs a rich moist soil and an open situation. The seeds were received by the Horticultural Society from the directors of the East India Company. (*Bot. Reg.*, April.)

Plumbaginiàcæ.

ARMERIA *Endlich.*

fasciculata De Cand. Fascicled Thrift. A frame perennial; growing three feet high; with pink flowers; appearing in August; a native of Corsica; increased by division of the root. *Bot. Reg.*, 1841, t. 21.

A fine species, forming “a pretty bush, looking like a young pine tree,” producing its heads of pink flowers in the month

of August. A shrubby species of thrift, Dr. Lindley remarks, at first sight appears an anomaly, but if we examine the common species, we shall find it equally shrubby with the one now mentioned, only the branches are so very short as not to be discernible.

The plant thrives well in a light soil in the open air in summer; but in winter requires the protection of the frame or green-house. Its heads of pink flowers, intermixed with its tiny slender foliage, and the bushy habit of the plants, render it a species well worth introduction. (*Bot. Reg.*, April.)

Asteràcæ.

TRIPTILION (from *three*, and *a feather*, in allusion to the feathery pappus.)
spinosum De Cand. Spiny Triptilion. A frame perennial, growing two feet high; with blue flowers; appearing in July; a native of Chili, increased by seed and division of the roots. *Bot. Reg.*, 1841, t. 22.

A most beautiful plant, growing two feet high, with an herbaceous stem, delicate pinnate foliage, and elegant deep azure flowers produced in large corymbs. This species has long been known to botanists conversant with the Chilian flora, and repeated attempts have been made to introduce it, but in vain, until seeds came into the hands of Mr. Frost, gardener to the Countess of Grenville, at Dropmore, who succeeded in flowering it. Only two plants were raised from seed, as it seeds sparingly. The root is fleshy, somewhat like that of a dahlia in miniature. The radical leaves spring up in autumn, as soon as the flower stems are cut off; but as they grow in summer they will have died off. The plant has increased in size every year, but Mr. Frost has been too choice of it to make an attempt to divide the root. The plants have been kept in the green-house, but he thinks a cold pit will suit it best. Sandy loam and rotten leaves are used as a compost for the plants, which, after wintering in small pots, are shifted into larger ones, as circumstances require. (*Bot. Reg.*, April.)

Cinchonàcæ.

POSOQUERIA Endlich. (*Aymara posoquera* is the native name, among the Caribs, of the original species.)

versicolor Lindl. Changeable Posoquery. A stove shrub; growing two feet high; with changeable pink and red flowers; appearing in August; a native of Cuba; introduced in 1840; increased by cuttings; grown in loam, leaf mould, peat, and sand. *Bot. Reg.*, 1841, t. 26.

A handsome stove shrub, "with long, pendulous, fragrant flowers, changing from white to crimson through pink." The leaves are ovate lanceolate, and the flowers are produced at the ends of the branches, in clusters of four or five each, the

corollas very long, tuberous, and gracefully recurving from the calyx; their different hues forming a really pretty object. For stove collections it is a fine addition. Easily grown from cuttings in sand in a good heat. (*Bot. Reg.*, May.)

Polemoniàcææ.

COBÆA Cavan. (in compliment to a Spanish Jesuit, named Cobo.)
stipularis Benth. Changeable Cobæa. An herbaceous climbing plant; growing ten feet high; with greenish yellow flowers; appearing in August; a native of Mexico; increased by seeds and cuttings. *Bot. Reg.*, 1841, t. 25.

The common cobæa of our gardens (*C. scândens*.) is a good representative of the present subject, except in the color of the flower: in the former it is a fine purple, in the latter it is of a greenish yellow. Its habits are the same: that is, it may be treated as an annual by planting early in March, and turning out into the border, where it will flower freely in August and September: or it may be sown later, kept in a frame or green-house, and planted out the following year. By the latter mode it produces a much greater quantity of flowers. This species flourishes well in a conservatory, as it does not prefer too much light. Found by M. Hartwig, in Mexico, and first flowered in the garden of the London Horticultural Society, from seeds received from him. (*Bot. Reg.*, May.)

Acanthàcææ.

STROBILANTHES (from *pine cone*, and *a flower*, in allusion to the appearance of the inflorescence of some species before the blossoms expand.)
scâbra Nees. Rough leaved Conehead. A stove plant; growing two feet high; with yellow flowers; appearing in August; a native of India; increased by cuttings; grown in loam and peat. *Bot. Reg.*, 1841, t. 32.]

A very pretty stove plant, in habit somewhat like a justitia. It is half shrubby, with dark green foliage, and terminal clusters of gay yellow blossoms. The plant is covered over with short stiff hairs, which form little points upon the leaves and stems. The plants thrive if managed like the justitia; that is, to keep them in rather small pots during summer, in a cool situation, and bringing them into the stove in autumn, when the change of temperature will speedily bring them into bloom. Any free soil will suit it. (*Bot. Reg.*, June.)

Bignoniàcææ.

COLEA (after Gen. Sir G. Lowry Cole, Governor of Mauritius.)
floribunda Bajer. The yellow Rei-rei. A stove plant; growing eight feet high; with yellow flowers; appearing in August; a native of Madagascar; increased by cuttings; *Bot. Reg.*, 1841, t. 19.

“A stove plant, with a stately aspect, and singular habit in consequence of the stem, which is seven or eight feet high, being perfectly simple, covered with noble pinnated leaves at

the upper end only." The flowers are produced in a large panicle, and are of a "bright yellow ochre color, with a pale border." It flowered in the collection of the Duke of Northumberland, in August, 1840. (*Bot. Reg.*, April.)

Cyrtandæcæ.

ÆSCHYNANTHUS (from *to blush*, and a *flower*.)
maculatus Lindl. Spotted Blush-wort. A hot-house plant; growing a foot high; with orange colored flowers; appearing in summer (?); a native of India; increased by cuttings. *Bot. Reg.*, 1841, t. 28.

A fine plant; a native of India, where the species of this beautiful genus, in the hot damp sands, and upon rocks and trees, are found clinging to such surfaces, and maintain themselves by aerial roots, like those of ivy. The present subject has an erect stem, with opposite lanceolate leaves, and terminal umbels of bright orange and crimson flowers. It requires a strong heat and damp atmosphere, and thrives best fastened to a stick placed in a pot, and the space filled up with light leaf mould and peat. (*Bot. Reg.*, May.)

Garden Memoranda.—It is our intention, in the course of a few weeks, to resume our notes on gardens and nurseries, as full as in our earlier volumes. For the purpose of gathering together interesting matter for this purpose, we visited a few places the past month. But after preparing to write out our remarks, we found that want of room would compel us to put off their appearance till another month: having, however, a spare page, we embrace the opportunity to note down a few plants which flowered the past month, and others which will flower during February, in the vicinity of Boston.

A hasty visit to Mr. Wilder's green-house revealed to us some pretty camellias, of new introduction. The loss of a portion of Mr. Wilder's plants by fire, last season, is probably fresh in the minds of our readers. The collection was indeed much reduced by that unfortunate circumstance, and many choice and rare plants were entirely lost. The most remarkable instance of preservation was that of his new seedling camellia, of which we gave some account last season, (*Vol. VII.*, p. 25.) A *single* bud was all that was saved; this was a graft only inserted a few weeks previous to the fire: it had but a *single* leaf, and so near was the escape, that a part of that leaf was destroyed by the heat of the fire. The plant is now a foot high, and we are glad that Mr. Wilder was so fortunate as to preserve it. Making allowance for the damage

done to nearly all the plants, which rendered it necessary to head down some of the large camellias to within a foot of the roots, they look generally in very good condition.

Among the few camellias which were uninjured, were some seedlings, which are now showing very promising buds; some of the plants were from excellent impregnations, and good varieties may be expected. Only a small portion of the camellias we found in bloom: among the new ones were *Claritas*, a semi-double white, with a few stamens intermixed; pretty only for a large collection. A delicate variety, with blush colored petals, faintly streaked with rose, called *ranunculiflora striata*, promises to be worthy of cultivation. *Donckelaëri*, with several of its singularly blotched, splashed, or marbled flowers, perhaps coming under the denomination of all three of these terms, was very showy, and may be considered a great acquisition; it is an abundant and free bloomer. *Triphosa*, not much unlike the old *Wellbankiana*, is a white variety of considerable beauty. *Sherwoodii* was opening, but the plant did not appear in good condition; it is a splendid variety. *Elegans*, *eximia*, *punctata*, and several others, were displaying fine flowers. Among the kinds which show promising buds, that will open soon, we name *C. var. Grunellii*, *Gardenæflora*, *cœlestina*, *spectabilis maculata*, *Henri Favre*, *delicatissima*, *picturata*, &c.

Mr. Wilder has lately made some addition to his collection of new roses, geraniums, &c.: he has also procured from Germany ten or fifteen new kinds of tree pæonies, all the plants of which looked well, and several of them were showing good flower buds: if they are as good as they have been represented, they will be a great acquisition. A new white azalea, with the habit of *A. phœnicea*, was just coming into bloom. Many other plants we should have been glad to have noted down, but our time did not permit us to do so.

In the collection of Messrs. Hovey & Co., *Camellia var. Donckelaëri*, *imbriata*, *elata*, *Sherwoodii*, *triumphans*, *florida*, *Fløyi*, *althææflora*, *élegans*, *Gilesii*, *speciosa*, and numerous other kinds, will be in flower. Among the azaleas will be *A. indica variegata*, *lateritia*, *speciosa*, *speciosissima*, *Danielsiana*, *phœnicea*, &c. Some fine heaths will also be in bloom in the course of a month. *Lechenaültia formosa* has been flowering finely all winter. Some fine new roses have been added to the collection, several of which are coming into bloom.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Domestic Notices.*

Specimen of Pears, &c.—Dear Sir: Accompanying this, you will receive a box containing a few specimens of pears: those marked No. 1, are the Josephine, not yet in eating, a good bearer upon the quince; No. 2, Lewis, a good bearer upon a standard; No. 3, now in eating and fine, a great bearer upon the quince, Bergamotte Sylvanche of Coxe; No. 4, Beurré Capiaumont, the last specimen I have raised, also upon the quince, now in eating; No. 5, a specimen from a tree which Mr. Shaw, of New York, sold at Cunningham's, two years since, for the Columbian Virgoulouse; if it is not the Columbian Virgoulouse, it is certainly a first rate fruit; I fear the specimen is rather past its prime; No. 6, Bergamotte du Pasque, a good bearer, not in eating; No. 7, Monsieur le Curé, or Burgomestre of Boston, nearly in eating; No. 8, Duchesse d'Angouleme; these were taken from a tree engrafted upon a quince, seven feet high, which set upwards of one hundred specimens and matured seventy; those now sent were the average size. The best flavored pears I have fruited this season (the Seckel excepted,) were the Belle Lucrative as fall fruit, and Dearborn's Seedling as summer fruit. I also enclose you a sheet of outline drawing of two or three varieties which have generally such strong characters as to form, and yet have been sometimes mistaken one for the other; I mean particularly the Roi de Wurtemberg, Beurré Capiaumont, and Beurré Bosc. Would not outlines of fruits be as useful in your Magazine as colored? Loudon's *Magazine* has no others; and do you not think that of the two circumstances, color, or shape, the latter could be more generally depended upon? There are, I know, exceptions, for the Michaux, and a fruit I received from Mr. Prince for the black-seeded beurré, the former resembles, both in form and color, the Belle Lucrative, and the latter the Urbaniste, and we must know the distinction by leaf, manner of growth, and quality; still, my opinion is, that more pears can be identified *from form, than from color.*

A curious effect was produced upon some Bartlett pears, which I took from the tree when they were three quarters grown, by placing them in a tight drawer covered with cotton batting: they became, as they ripened, of a beautiful red upon one side, while those that remained upon the trees until they commenced changing color, were all yellow. I think the Bartlett, taking every circumstance, (its prolificativeness, quality, &c.,) as one of the best if not *the most* desirable variety for New England culture.

I have taken off outlines of fruit from the specimens grown with me, and have forwarded you a copy of the Buffum, &c. I think Loudon has an article in one of his works, upon the advantages, &c. of mere outlines.—*John M. Ives, Salem, Nov. 10, 1841.*

[With the above communication from our correspondent, we received the several varieties of pears, for which he will receive our

thanks. The Beurré Capiaumont was past its eating state: No. 5, which was received as the Columbian Virgoulouse, is undoubtedly the Blecker's Meadow: the Duchess d'Angouleme, though very fair, were not so high flavored as usual, probably owing to the great crop which the tree produced.

We agree with our correspondent, in regard to his remarks upon outline figures of fruit, as compared with colored engravings. The past fall, we have taken drawings of about fifty kinds, and another year intend to complete our labor by procuring an outline of every good pear in cultivation. Mr. Manning has thus far furnished us with many fine specimens, and has promised to send, another season, such varieties as we may wish for our purpose. The drawings sent with the above, we have not room for this month, but shall endeavor to give them a place in a future number.—*Ed.*]

Discussion upon the Growth of Fruit Trees.—The subject for discussion at the Fourth Agricultural Meeting at the State House, was upon fruit trees. Mr. Buckminster opened the discussion, and gave his experience upon the subject. He stated, that it was an erroneous idea that the next generation alone can eat the fruit we plant: that if trees are properly managed, there is no need of waiting long for the fruit. He alluded to the common practice of planting too deep, and to the bad effects of laying an orchard down to grass soon after the trees were set out. He thinks the trees need hoeing as much as corn. His views on planting are correct: he says that trees should never be set out the last end of March and first of April; the soil is not mellow at that season, and it is better to take them up, lay them in by the roots, (or heels, as termed by nursery-men,) and plant out later, when the earth becomes mellow and warm. In summer, he covers the roots with litter, but in winter removes it, as it would harbor mice. The white pine Mr. Buckminster has planted as late as the middle of June, with success.—*Ed.*

ART. II. *Massachusetts Horticultural Society.*

Saturday, Nov. 27, 1841.—An adjourned meeting from October 30th—the President in the chair.

Hon. Daniel Webster was admitted an honorary member of the Society.

[In our report of the meeting of the 30th, we omitted to state that John Tyler, President of the United States, and Hon. H. L. Ellsworth, of Washington, D. C., were admitted honorary members.]

Adjourned five weeks, to Jan. 1, 1842.

January 1, 1842.—An adjourned meeting—the President in the chair.

The Finance Committee were charged with an examination of the books of the Treasurer, and to report at the next meeting.

A letter was read from Edward Pitkin, East Hartford, Conn., on the subject of the destruction of the curculio, and referred to the Fruit Committee.

Adjourned two weeks, to January 15th.

Jan. 15th.—An adjourned meeting—the President in the chair.

Mr. Vose, from the Finance Committee, reported, that they had examined the Treasurer's books, and found them correct; and that the sum received by the Society from Mount Auburn, for 1841, amounted to \$1436.65: the report was accepted.

Letters were read from President Tyler, Hon. D. Webster, and Hon. Mr. Ellsworth, acknowledging the honor conferred on them by the Society.

The Committee for the publication of the Proceedings of the Society, were directed to make them complete from the time of the last report.

George Walsh, of Charlestown, and James Wentworth, of Boston, were admitted subscription members.

Adjourned one week, to January 22d.

Jan. 22d.—The President took the chair, and stated the business before the meeting.

Some amendments were made to the bye-laws, in regard to the admission of honorary and corresponding members.

It was then voted, that the sum of three hundred and sixty dollars be appropriated for premiums for 1842; to be distributed among the several committees as follows:—one hundred and fifty dollars to the Committee on Flowers—one hundred and fifty dollars to the Committee on Fruits—and sixty dollars to the Committee on Vegetables. The several committees were requested to make up their schedules of premiums for the present year as soon as possible.

Adjourned one week, to January 29th.

Exhibited.—Vegetables: From W. C. Mann, fine specimens of Giant celery, some of the heads very large, and well blanched.

Jan. 29th.—An adjourned meeting—the President in the chair.

The Executive Committee laid upon the table the following report of the Flower Committee, offering premiums for 1842:—

REPORT OF THE COMMITTEE ON FLOWERS.

TULIPS.—For the best display of fine blooms, a premium of	\$5 00
For the second best display of fine blooms, a premium of	3 00
GERANIUMS.—For the best twelve plants in bloom; variety of the kinds, and shape and vigor of the plants to be considered, a premium of	5 00
For the second best twelve plants in bloom, with the same considerations, a premium of	3 00
PEONIES.—For the best display of flowers, a premium of	5 00
For the second best display of flowers, a premium of	3 00
PANSIES.—For the best display of fine varieties, a premium of	3 00
For the best six varieties, a premium of	2 00
For the best seedling flower, a premium of	2 00
ROSES.—In classes:—	

Class 1. Hardy kinds.

For the best fifty dissimilar blooms, a premium of	10 00
For the second best fifty dissimilar blooms, a premium of	8 00
For the third best fifty dissimilar blooms, a premium of	5 00

Class II. <i>Bourbon, China, Tea, and Noisette Roses.</i>	
For the best display of flowers, a premium of . . .	\$5 00
For the second best display of flowers, a premium of . . .	3 00
PINKS.—For the best display of flowers, a premium of . . .	5 00
For the best six varieties, a premium of . . .	3 00
For the best seedling, a premium of . . .	2 00
CARNATIONS.—For the best display of flowers, a premium of . . .	5 00
For the second best display of flowers, a premium of . . .	3 00
For the best seedling, a premium of . . .	2 00
BALSAMS.—For the best display of flowers, a premium of . . .	3 00
For the second best display, a premium of . . .	2 00
GERMAN ASTERS.—For the best display of flowers, a premium of . . .	3 00
For the second best display of flowers, a premium of . . .	2 00
DAHLIAS—In the following divisions and classes:—	

DIVISION A.

Open to all cultivators.

PREMIER PRIZE.—For the best twelve dissimilar blooms, a premium of . . .	18 00
SPECIMEN BLOOM.—For the best bloom, a premium of . . .	7 00
For the second best bloom, a premium of . . .	4 00

DIVISION B.

Open to all cultivators of more than two hundred plants.

Class I.—For the best twenty-four dissimilar blooms, a premium of . . .	12 00
For the second best twenty-four dissimilar blooms, a premium of . . .	7 00
Class II.—For the best twelve dissimilar blooms, a premium of . . .	10 00
For the second best twelve dissimilar blooms, a premium of . . .	5 00
Class III.—For the best six dissimilar blooms, a premium of . . .	8 00
For the second best six dissimilar blooms, a premium of . . .	4 00

DIVISION C.

Open to all cultivators of less than two hundred plants.

Class I.—For the best twenty-four dissimilar blooms, a premium of . . .	12 00
For the second best twenty-four dissimilar blooms, a premium of . . .	7 00
Class II.—For the best twelve dissimilar blooms, a premium of . . .	10 00
For the second best twelve dissimilar blooms, a premium of . . .	5 00
Class III.—For the best six dissimilar blooms, a premium of . . .	8 00
For the second best six dissimilar blooms, a premium of . . .	4 00

The amount voted by the Society, for the present year, was one hundred and fifty dollars; to this has been added sixty-four dollars,

being the amount set aside for the award of dahlias for 1841, as stated in the report of the Committee awarding premiums for that year. The sum of sixty-four dollars has been wholly added to the premiums offered for dahlias, in accordance with the wishes of the cultivators of that flower who were the competitors for the premiums for 1841, and who relinquished their claims to the prizes awarded, on this condition.

The Committee believe that the arrangement which has been made in regard to the dahlias, will meet the views of every cultivator of flowers. It is well known that the Society's autumnal shows would be meagre, and quite unattractive to what they are at present, were it not for the exhibition of the dahlia: there is no individual flower which contributes so much to the beauty and splendor of the room; appreciated alike by all, its brilliant colors and perfect form command the admiration of those who would scarce bestow a glance upon some more humble, but equally as deserving a flower.

With these remarks, the Committee submit their report to the Executive Committee.—*C. M. Hovey, Chairman, Jan. 1842.*

The following rules and regulations will be observed in regard to the dahlia show:—

1. All growers who intend to exhibit, shall signify their intention to the Chairman of the Committee on Flowers, and in which class or classes, at least one week before the day set for the exhibition.

2. Any persons may enter for the prizes of any of the classes, in either of the divisions to which they are eligible, but they cannot take more than one prize in division B. or C.

3. Each competitor will be required to declare that every flower exhibited by him is of his own growth, or has been grown under his care.

4. The judges for awarding the prizes in division B., shall be selected from such cultivators or connoisseurs as are not competitors in that division; and the same rule shall be observed in selecting judges for division C.

5. The judges shall be appointed by a majority of the exhibitors, whose decision shall be final, and to be chosen at the Society's room, on the first Saturday in September, at twelve o'clock, noon. Notice of this meeting to be given by the Chairman of the Flower Committee to such persons as have signified their intentions of competing for the premiums.

6. Each competitor shall give to the Chairman of the Flower Committee a list of the names of the flowers he exhibits, sealed up, and signed with his name.

7. The blooms shall be shown in bottles provided by the Society, without foliage or any other embellishment.

8. No seedling, not sold out, will be allowed to be placed in either of the divisions or classes, except the seedling class; nor must any stand contain two blooms of the same variety.

9. The judges shall sign their award with a declaration upon their honor, that, to the best of their knowledge, they have decided upon the respective merits of the flowers exhibited.

ART. III. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>		From	To	<i>Squashes and Pumpkins.</i>		From	To
		\$ cts.	\$ cts.			\$ cts.	\$ cts.
Potatoes:				Canada Crockneck, per lb...	4	5	
Chenangoes,	} per barrel..	1 25	1 37½	Autumnal Marrow, per pound	5	6	
	} per bushel..	50	60	Winter Crock-neck, per lb...	3	4	
Eastports,	} per barrel...	2 00	2 25	West Indias, per pound,...	3	4	
	} per bushel...	1 00	—	Pumpkins, each,	12½	20	
Common,	} per barrel...	1 25	—				
	} per bushel...	50	55				
Sweet potatoes, per bushel,		1 25	1 50				
Turnips, per bushel:							
Common,.....		37½	50				
Ruta Baga,.....		37½	50				
Onions:				<i>Fruits.</i>			
Red, per bunch,....		3½	4	Apples, dessert:			
White, per bunch,....		3½	4	Baldwins, per barrel,....	3 00	3 50	
White, per bushel,....		1 25	1 50	Russets, per barrel,....	2 50	3 00	
Yellow, per bushel,...		75	1 00	Greenings, per barrel,...	2 50	3 00	
Beets, per bushel,		75	—	Blue pears, per barrel,	2 50	3 00	
Carrots, per bushel.....		62½	—	New York pippins, per bbl.	3 00	3 50	
Parsnips, per bushel.....		75	—	Common, per barrel,....	2 00	2 50	
Salsify, per dozen roots,...		25	—	Pippins, per bushel,....	1 00	1 25	
Shallots, per pound,		20	—	Nonsuch, per bushel,....	2 00	—	
Horseradish, per pound....		10	12½	Sweet, per bushel,....	1 25	1 50	
				Lady apples, per half peck,	25	—	
<i>Cabbages, Salads, &c.</i>				Dried apples, per pound,...	4	5	
Cabbages, per doz:				Pears, per dozen:			
Savoy,.....		75	1 00	Passe Colmar,.....	—	—	
Drumhead,.....		75	1 00	St. Germain,.....	50	75	
Red Dutch,.....		75	1 00	Chaumontel,.....	25	50	
Brocoli, each,.....		12½	25	St. Michael Archangel...	—	—	
Cauliflowers, each,.....		12½	25	Common,.....	—	—	
Lettuce, per head,.....		8	12½	Baking, per bushel,....	2 00	2 50	
Spinach, per peck,.....		37½	—	Cranberries, per bushel,...	1 75	2 00	
Dandelions, per half peck,..		37½	—	Grapes per pound:			
Celery, per root:				Malaga, (white).....	17	20	
Giant,.....		10	12½	Malaga, (purple).....	25	—	
Common,.....		6	8	Pine-apples, each,.....	25	50	
Cucumbers, (pickled) pr gal.		25	—	Quinces, per bushel,....	—	—	
Peppers, (pickled) per gallon		37½	—	Lemons, per dozen,....	20	25	
				Oranges, per doz:			
<i>Pot and Sweet Herbs.</i>				Havana.....	37½	50	
Parsley, per half peck,....		37½	—	Sicily.....	20	25	
Sage, per pound,.....		17	20	Walnuts, per bushel,....	1 25	1 50	
Marjorum, per bunch,....		6	12½	Chestnuts, per bushel,....	2 00	—	
Savory, per bunch,.....		6	12½	Butternuts, per bushel,....	1 00	—	
Spearmint, per bunch,....		3	—	Almonds, per pound,....	14	15	
				Castana, per pound,....	—	—	
				Cocoa nuts,.....	3	4	

REMARKS.—January has been one of the most open months for the season, that has been experienced for many years: there is at present scarcely any frost in the ground. No snow has fallen during the month, neither have there been any storms of rain: the sun has shone from a clear and almost unclouded sky during a larger part of the month: such mild weather has been highly favorable to the growth of forced vegetables, and has forwarded the spring work considerably.

Vegetables.—Potatoes are still dull and heavy, and the market over supplied: Sweet potatoes are less abundant than at the period of our last report, and not now in so good order. Turnips are a shade higher. Onions are scarcer; good whites are nearly all gone, and the stock of yellow is much reduced. Salsify is supplied in small quantities, the demand being quite limited. No radishes have yet been brought in, but will probably come to hand between this and our next report. Cabbages are quite scarce, the stock has not been so low at this season for three or four years; there are but few good Drumheads and Savoys to be had; red Dutch are also very scarce. Brocolis and cauliflowers are nearly gone. Lettuce now comes to hand of fine size and excellent quality, the late mild weather having been extremely favorable. Spinach is abundant. Dandelions in January! this is certainly exceedingly early for this vegetable; but there has been a good supply for some days, and the quality as good and handsome as could be desired. Celery is abundant and good. Squashes are a shade higher: a few small lots of Crooknecks are occasionally brought in; no West Indias have arrived the present month, and the stock is now tolerably well reduced.

Fruit.—Apples are higher: several shipments have been made to the south, which has taken off the surplus stock: sweet apples are scarce, and few of good quality to be obtained. Pears are about gone; only one or two good eating kinds are now to be had: the stock of baking has been reduced, and prices have advanced slightly. Cranberries are higher, and in better demand: as other fruits become scarce, it affects the price of this. Grapes are abundant and cheap. Oranges and lemons plentiful. A few pine-apples have been received. Walnuts are plenty, and sales very dull. Chestnuts are not much called for, and are nearly out of season.—*M. T., Boston, Jan. 28, 1842.*

HORTICULTURAL MEMORANDA

FOR FEBRUARY.

FRUIT DEPARTMENT.

Grape vines will now, in some green-houses, where a rather high temperature is kept up, begin to swell their buds, and by the 1st of March will have broken into their first leaf. Such as have commenced to grow in this way, should have the shoots tied up to the trellis carefully. Keep the temperature of the house as regular as possible, and in fine weather give an abundance of air.

Peach trees in pots, brought into the house last month, will begin to open their flower buds soon. Keep the house at as even a temperature as possible, till after the fruit has set.

Strawberries may be brought into the hot-house, or placed in a hot-bed, for fruiting. Be careful to supply an abundance of water, and give large quantities of air.

FLOWER DEPARTMENT.

Camellias will now be in full bloom; supply them well with water. As soon as the flowers begin to fall, if all the buds have opened, commence repotting, shaking off the old soil if the plants are not in a healthy condition. After this operation is finished, prune off the straggling shoots, and give the plants a syringing twice a week. Seeds will now begin to come up, and the young plants must be watered carefully. Inarching may be performed this month.

Roses, which have been managed properly, will now begin to flower: supply them freely with water.

Azaleas will begin to bloom this month, and will need good quantities of water. Young plants may be repotted now, if they require it.

Geraniums will need attention now. Repot such as need it; syringe the plants occasionally over the foliage, and water more freely at the roots.

Orange trees may be grafted now, and if the plants require it, repotted.

Ericas may be propagated now: by some, it is considered the most favorable season. Keep the plants duly watered, and syringe frequently over the foliage. Seeds may be sown now.

Oxalis Bowiei, now done flowering, will need less supplies of water.

Cactuses should now be watered more freely, as they begin to show their flower buds.

Dahlia roots may be potted now for producing plants for early flowering. As soon as the eyes begin to swell, divide the roots, putting one tuber with a good shoot in each pot.

Calceolarias should be carefully attended to. Give water carefully, and repot as soon as the plants need it.

Verbenas which have been wintered in small pots should now be shifted into good soil, and placed in a warm situation near the glass.

Ten Week Stock seed may now be planted for early blooming in the open garden.

Annuals of many sorts, wanted to bloom early, may be now planted in pots in the green-house or hot-bed; such as *Phlox Drummondii*, *Bartonia aurea*, *Eutoca viscida*, coxcombs, China asters, balsams, &c.

Plants in frames should be uncovered and aired occasionally, when the weather is fine.

Cuttings of many kinds of green-house plants may now be put in, particularly such as *salvias*, *heliotropes*, &c., for turning out into the open border in summer.

Trevirana coccinea. The roots or corms of this pretty plant should now be separated and potted.

THE MAGAZINE
OF
HORTICULTURE.

MARCH, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *Notes made during a visit to New York, Philadelphia, Baltimore, and Washington, and intermediate places, from August 8th to the 23d, 1841.* By the EDITOR.

(Continued from p. 47.)

Baltimore, August 16th.—In the autumn of 1839 we visited Baltimore, and made some memoranda of our tour at that time, (Vol. V., p. 370.) Since then, the taste for horticultural improvement does not seem to have made a very rapid advancement. The Maryland Horticultural Society, which at one time was in a flourishing condition, and exerted considerable influence by its annual exhibitions, reports of which we have given in our pages, appears to have been on the decline, and the last two years, no exhibitions, we believe, have taken place. The interest in the society appears to have wholly subsided, for we could not learn from any of our friends, that any thing had been done to keep it together, for some time. This is much to be regretted: for a city, ranking, as regards its population, only the third in the country, and next to Philadelphia, should possess sufficient taste to keep alive so useful and excellent an institution.

Baltimore possesses many very excellent gardens, though far less numerous in proportion to its inhabitants, than other cities: there are some fine collections of plants, and many seedling roses and camellias have been raised by some of the nurserymen and florists, sufficient indeed, in their extent and merit, to render the exhibition of a society beautiful and interesting. We can only account for the apathy of feeling

which exists, to a want of cooperation among the amateurs and practical men. Without this, nothing can be accomplished successfully; and with it, a society could be continued in a flourishing condition. We hope that an attempt will be made to resuscitate the old society, and place it in a condition which will enable it to create a new interest in horticultural pursuits.

Residence of Dr. T. Edmonson, Jr.—This delightfully situated place we gave some account of at the time above alluded to, (Vol. V., p. 373.) Since then, however, many improvements have been made, and others are still progressing. The pleasure ground is being extended, by the removal of the boundary fence, and the clearing up of a piece of woodland, by which several acres are now brought into it: when completed, it will form one of the finest residences in the country.

When we were here, in 1839, the flower garden had just been laid out: we now found it in fine condition, saving the uncommonly dry weather which had been experienced. The borders were planted with sanguinea and other roses, the former of which made a brilliant display with their deep crimson flowers. This old variety is well adapted for turning out into the border, growing and flowering freely all the summer and autumn. Dr. Edmonson possesses some fine seedling phloxes, but the drought had destroyed the flowers. *Magnolia grandiflora* var. *exoniensis* stands the winter here without any protection; the specimen is very splendid, upwards of fifteen feet high, and clothed with foliage from the base to the top.

Dr. Edmonson possesses many large stove and green-house plants, which are placed out on the lawn and in the walks of the flower garden during summer. Among them are large specimens of *Erythrina poiánthes* and *Crista gállii*, *Eriobótrya japónica*, *Jambòsa vulgàris*, &c. We noticed some plants of *Erythrina* which were raised from seed of *E. Crista gállii* impregnated with *Poiánthes*: the plants showed flower buds, and, from the appearance of these and the leaves, some new varieties will be produced. The large orange and lemon trees were in fine condition, as were also the camellias and other plants.

From the garden, we passed into the hot-house, where we witnessed many curious experiments made in grafting the *Các-*

ti. Dr. Edmonson's place is under the charge of Mr. Feast, Jr., a young man of much taste and considerable practical knowledge, united with a great love for plants. We here saw grafting in all its varieties; *Echinocactus Eyrîssi* grafted upon the ends of the pendulous stems of *Cereus flagelliformis*! having a singular appearance. *Cereus triangularis* and several of the *Opuntias* are used for stocks; and, in some instances, several kinds are grafted on one plant. All the weaker growing sorts are cultivated altogether by grafting, and they bloom more abundantly, and with finer flowers. *Cereus serpentinus*, upwards of ten feet high, was full of buds. A novel experiment had been tried in grafting the wax plant, (*Hoya carnosa*,) upon the *Stapelia*, and the scions had commenced growing; how it will continue to flourish remains to be seen.

On the lawn in front of the house, Dr. Edmonson showed us a *Maclura*, different from the *M. aurantiaca*, and probably a variety of that species. It forms quite a small shrub, or tree, with the dense glossy foliage of the former, but smaller, and the habit of the plant rather dwarf. From its slower growth, and less robust habit, we think it would be more likely to stand the climate in the latitude of Boston, than the *M. aurantiaca*: it has never flowered or fruited.

Nursery of Mr. Samuel Feast.—Since the autumn of 1839, Mr. Feast has made many additions to his extensive collection; he has also enriched it with many excellent seedlings of the *Camellia*, *rose*, *azalea*, *Cacti*, &c.

Mr. Feast erected one or two new houses the past season; one in particular for the growth of *cacti*, of which he possesses a large and extensive variety, many of which are seedlings. These we found in very fine condition: a larger part of the species and varieties are grafted upon the *Opuntia braziliensis* and *vulgaris*, *Cereus triangularis*, &c., and in this manner they form large and thrifty plants: growing them upon their own roots seems to have been mostly given up. In our former notice of this establishment, (Vol. V., p. 371,) we alluded to Mr. Feast's practice of grafting seedling *cacti* when only a few weeks old, upon the *Cereus triangularis*. Since then, we have tried the experiment ourselves, and with good success. *Echinocactus Eyrîssi*, grafted on a tall stem of the *Cereus triangularis*, is a very beautiful object, when in bloom.

In no department of plants has Mr. Feast given more attention than to the cultivation and production of roses from

seed. He has raised many hybrids between the Michigan rose and the Herbemot's musk cluster and others, which are remarkably strong growers and free bloomers, producing immense clusters of blossoms. A great many of the new French tea and China roses have also been added to the collection, now comprising many fine kinds. The seedling azaleas comprise some very interesting new varieties. The last season, Mr. Feast has raised a great many plants from South American seeds, among which we noticed the *Araucaria excelsa*, and *imbricatà*; we also saw some young seedlings of a *Poinsétia*, raised from *Poinsétia pulcherrima* and *Euphòrbia spléndens*. A great many seedling pæonies have also been raised the last year, and, among the number, Mr. Feast anticipates some new kinds.

Some experiments upon the growth of plants in charcoal have been made here. Mr. Feast had quite a collection of *Orchidææ*, and as they had not thriven any too well, it occurred to him that he might make use of the charcoal with good effect. The whole of the plants were consequently repotted in a mixture of peat and charcoal: this was done in June or July, and when we saw them in August, many of the plants were throwing out new roots with much vigor. The charcoal seems to act as a conductor and retainer of heat, and, by keeping the soil light and open, facilitates the rooting of the plants. Mr. Feast has also tried charcoal in rooting plants from cuttings, and has succeeded in growing in this way Herbemot's musk cluster rose, which he has been unable to multiply by cuttings, in the ordinary way. *Combrètum purpùreum*, a plant not easily increased, was speedily rooted in charcoal. We would recommend further experiments to be made, as we are convinced the system is attended with excellent results.

In the open garden, we noticed the Rose acacia (*Robinia viscòsa*,) grafted as a standard, eight feet high, and forming a fine object when in bloom. The only objection to this mode of cultivating the acacia is its liability, from the brittle character of its stems, to be destroyed by the wind: if, however, the plants are placed in a situation not exposed to high winds, there would not be much danger. The common locust is a good stock, and those who have an abundance of them we would advise to try the experiment. *Magnòlia conspícua*, a large plant of which we saw here in 1839, about ten feet

high, was killed down to the ground by the severe winter of 1839 and 1840, after having stood out for a number of years. There is a *Magnolia glauca* here, thirty feet high: it is about forty years old, and produces an abundance of its flowers every spring.

In connection with this nursery, Mr. Feast has erected a building in the city for the sale of seeds and plants, to which he has a fine green-house, about thirty feet long, attached, in the rear. This is supplied with fresh plants from the nursery as fast as they are needed, to supply the place of those which have been sold.

The Flower Garden of Mr. John Feast, in West Lexington Street, has undergone many alterations and improvements. Nearly an acre of ground has been added, and two or three new houses erected, one of which is entirely for the growth of roses.

Mr. Feast has been successful in raising some fine verbenas, he showed us his beds of seedlings, and we noticed several of quite a distinct color and habit from any we are acquainted with: when he names them, we shall endeavor to give some description of the sorts.

We here saw a new flowering bean, which was raised from seeds received from the United States' Exploring Expedition. It is a fine acquisition; the leaves have a dark purplish hue, and the flowers are produced in spikes, eight or ten inches long, and of a rich purple tint, exceedingly showy. The habit of the plant is not coarse, being more of the character of the Hyacinth bean than the common scarlet runner. *Sálvia pátens* was displaying its azure flowers. Mr. Feast possesses many seedling roses, a great part of which were only seedlings of the present year. The *Microphylla* rose stands out here during the winter, and flowers abundantly all summer. *Basélla tuberòsa* has also stood out here, planted against the end of the green-house.

The propagation of several sorts of green-house plants is carried on extensively in the open air during summer. The Chinese azaleas are propagated in this manner, by laying down the small summer shoots in July. *Magnolia fuscàta*, a fragrant species, and much prized in Baltimore as a parlor plant, is grown in the same manner: we have cultivated this plant for several years, and have always admired the pine-apple-like odor of its blossoms, one of which will perfume a room for

two or three days: it will rank with the daphne as an odoriferous plant. Mr. Feast's camellias, and other green-house plants, were arranged together in fine order, and appeared in a healthy and vigorous condition.

There are several amateur collections in Baltimore, which it was our intention to visit, but our time would not allow us to do so. The gardens of W. Wilson, Esq., Messrs. Kurtz, Waters, Smith, &c., contain many fine plants. A friend of ours, passing through Baltimore, has sent us the following account of what he saw during his stay in the city, which we append here.

Mr. Holliday's Establishment, on the Huxton Road, near Baltimore, will be, in the opinion of our correspondent, one of the finest nursery and flower establishments in the city. Mr. Holliday has put up two of the finest houses in the neighborhood; one of them is one hundred and twenty feet in length, and finished in the best manner.

Mr. Waters, in Saratoga street, has a fine private collection of plants. His green-house is thirty feet in length, and twenty wide, and is mostly filled with camellias, of which he possesses a fine collection of upwards of sixty distinct kinds, and many seedlings. Our correspondent observed a fine plant of *Brunsvigia Josephinæ*, showing a cluster of its splendid flowers. The Mango tree was ripening its fruit here. The plants were in the best condition, and showed that Mr. Waters is a careful and skilful cultivator.

(*To be continued.*)

ATR. II. *Desultory Remarks upon variations in Fruits.*
By R. MANNING, Esq., Pomological Garden, Salem.

I HAVE, for several years past, observed changes in the size, color, and quality, of some of the new pears, which are so remarkable that I think them worth describing.

In 1838, a tree of the *Beurré Duval* (London Horticultural Society's *Catalogue*, No. 101,) was loaded with fine large fruit, of a bright yellow color, with red cheek: we anticipated

that they would prove, as described by European authors, very superior; but when they ripened, in November, the disappointment was extreme, to find them tasteless, in fact, worthless.

The next year, the same tree produced a few pears, not more than half as large as those of the preceding year, of a dull yellow color mixed with russet; they kept later, and were found, on being cut, very delicious. The tree produces a few pears every year, and of the same fine quality as those just described.

In the season of 1840, the Hericart pear tree (Van Mons) produced fruit for the first time; the size was medium, form obovate, color a yellow russet, the flesh melting and high flavored. The last season, the same tree produced a more abundant crop, the fruit was of larger size, more oblong, color dull greenish yellow, but the pears were so tasteless as to be immediately rejected as worthless.

In 1839—40, the Calabash pear tree (London Horticultural Society's *Catalogue*, No. 166) produced some fine fruit; the shape was oblong, with unequal ridges running the length of the fruit; the color was bright russet; flesh between breaking and melting, and very good. The last season, the same tree produced a greater quantity of fruit, of a larger size, of a bright yellow color, even in its outline, that is, without projecting ridges, and the flesh very insipid.

In some years, the Beurré Diel produces fruit of a yellow color, and on the same tree a few pears of a rough russet. Those pears having the russet skin are always higher flavored than the smooth, fair, yellow fruit.

In fact, when a pear tree has a disposition sometimes to produce fruit of a russet color, I have found, when the russet predominates, that the pears are more delicious. In writing the above, I merely state matters of fact; I never indulge in theories. That accurate observer, Mr. Haggerston, on my mentioning the subject to him last summer, observed that he had noticed the same variations in the fruits growing under his cultivation.

The Julienne pear, which in most years is a very fine fruit, has sometimes produced a crop of large sized and tasteless pears.

The Wurtemberg, Passe Colmar, and Surpasse Virgoulouse, usually produce abundant crops, but many of them will

be small, of a pale yellow color, and tasteless; at the same time the large fruit with a bright color, and especially the Wurtemberg, with a high colored red cheek, will prove very superior fruit: this has given those varieties a bad name with some persons. I should recommend the thinning out of all the small pears, when about half grown. Dr. Van Mons observes, "never thin the fruit; the large and the small are equally delicious." I cannot, after many years' observation, agree to this, but believe that by a judicious thinning out at the proper season, we should lose but little in bulk, and be abundantly rewarded in the size, beauty, and high flavor of the remaining.

Mr. Coxe, in describing the Holland green pear, says that it was "imported from Holland by the late William Clifton, of Philadelphia;" but although eagerly sought for among the immense importations of pear trees from Europe, no such pear has been found, and, in fact, it is not described by any European author.

I remember, some years since, that Gen. Forman, of Pennsylvania, sent a basket of pears to the Massachusetts Horticultural Society's exhibition; they were called the Bagpipe pear, and were said to be a native fruit, and the particular locality was named. The Committee immediately recognized these pears as the same as those described by Mr. Coxe as the Holland green, and, depending entirely upon his authority, they rejected the idea that they were a native fruit, and made the report accordingly; but after revolving the subject in my own mind for several years, I think I am justified in coming to the conclusion that Mr. Coxe was wrong, and that the person who exhibited the fruit was correct, and that it was a fruit of native origin. Perhaps some of your correspondents in Pennsylvania can give us sufficient light upon the whole subject.

In connection with the above, I will only observe, that Mr. Coxe was the first American writer on fruits; and that although his book is generally correct, yet, not being able to reconcile all his statements in my own mind, I took the opportunity, some years since, when on a visit to New Jersey, to inquire of one of his friends if he ever heard Mr. Coxe make any remarks on his work; his reply was as I had anticipated, that Mr. Coxe stated to him that errors had inadvertently crept into his book, which it was his desire and intention to correct in a second edition.

Doubts will often arise respecting fruits, whether of native or foreign origin; how easy to remove these by wounding the roots, and causing them to produce suckers. I have followed this course for some years, and have now a good collection of native plums on their own roots. Mr. Prince says that he has raised Prince's St. Germain and Prince's Virgoulouse pears, the Imperial Gage, the red, the white and the yellow Gage plums, from seed. I think that he is correct; but, as I have heard doubts expressed by some persons, how soon could he make "assurance doubly sure," by exhibiting fruits raised from suckers from the original trees.

In the *Orchardist's Companion*, published in Philadelphia, there is a figure and description of the "Keser or Miser," plum. As soon as I received the work, I took measures to obtain from a first rate source in New Jersey, a specimen tree of this plum: I am sorry to differ from the editor of a work which promises to be so useful, but if this specimen tree is correct, I have no hesitation in saying that this is the Cherry plum or Mirobalan of Coxe and the European authors, and that the synonymes quoted from the London Horticultural Society's *Catalogue* and the French writers, are erroneous.

In the same work, the editor has quoted the description of the Surpasse Virgoulouse, under the impression that it may be the same as the St. Michael pear; but it is an error; the two fruits are entirely distinct. All I know of the origin of the Surpasse Virgoulouse is, that I received the specimen tree from the late Mr. Parmentier; that I have not found it described in any European work, nor under any name in my own collection of more than eight hundred sorts. I have come to the conclusion that it was either raised from seed by Mr. Parmentier, or that it is one of the new Flemish pears, the name of which was lost, and the present one adopted by Mr. Parmentier. Respecting the quality of this fruit, I will only observe, that I sent it, among a great many other varieties of pears, to a gentleman in Maryland, and he informs me that he thinks it the finest pear he ever tasted.

In a review of Hugel's *Travels in Cashmere*, in the *Foreign Quarterly Review* for October, 1841, I find the following extract from that work:—"The most magnificent fruit is perhaps a white mulberry, found also in Northern Hindostan; it is from three to four inches in length, and of the thickness of the little finger; the flavor is delicious." How desirable

an object to introduce this fruit and acclimate it in England, where they pay such magnificent prices for whatever is rare and valuable. If money were an object with the person introducing it, he would no doubt be richly remunerated.

R. M.

Pomological Garden, Salem, Jan. 26, 1842.

It is unnecessary for us to make any comments upon the value of the above remarks. Mr. Manning's discerning and attentive mind has detected errors where few other cultivators would have found them out. The desire to store his mind with practical, rather than theoretical, knowledge, has led him to note the variations and changes which take place in all fruits which have come under his eye. These variations, it is well known, have given rise to the innumerable synonymes which abound in our catalogues of fruit. Every individual who wishes to make himself familiar with fruits should be a careful observer; for it is only by great experience that we can become familiar with the changes which, from the effects of soil and climate, take place in vegetation.

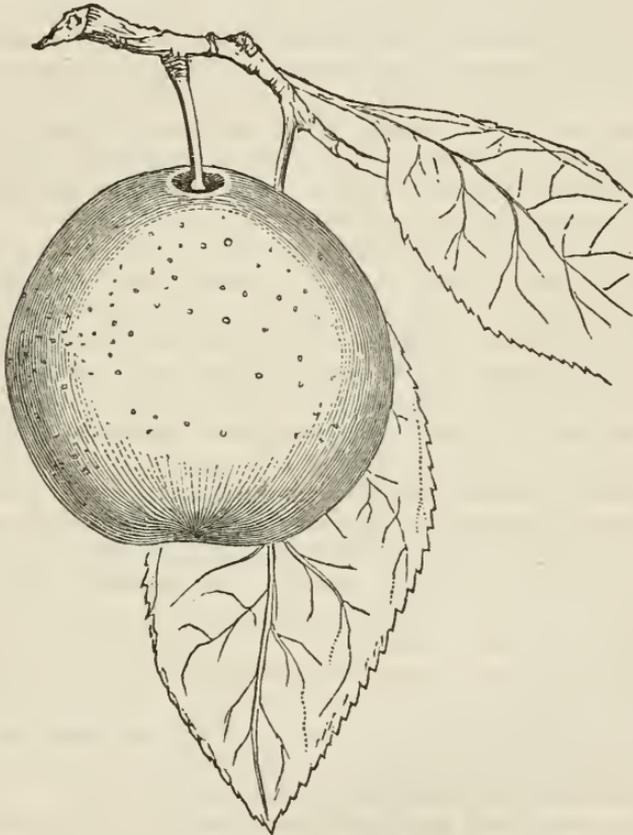
In the *Gardener's Chronicle* of last year, several communications appeared from Mr. Rivers, Jr., and other celebrated cultivators in England, upon the variations which have been observed in pears in that climate; and the remarks of the several writers will undoubtedly lead to valuable results, in regard to a judicious and proper selection of kinds for peculiar soils, exposures and situations.—*Ed.*

ART. III. *Description of a new variety of Plum, called the Columbia; with some Remarks on the culture of the Plum, the destruction of the Curculio, &c.* By A. J. DOWNING, Botanic Garden and Nurseries, Newburgh, N. Y.

ABOUT two years since, our attention was called to a new variety of plum, of superior quality, which originated in the city of Hudson, in this State. The original tree, which is

now of large size, is standing in the garden of Mr. Lawrence, in that city, and was raised, as Mr. Lawrence assured us, from a seed of the green Gage planted by him. Although the Columbia plum is quite a celebrated variety in the neighborhood where the original tree grows, it is, as yet, scarcely at all known to cultivators or nurserymen; and we are now endeavoring to propagate it largely, for the first time, in this

5



The Columbia Plum.

establishment. The tree is a most abundant bearer, and the fruit, when fully ripe, is of a beautiful color and delicious flavor. The drawing from which the annexed engraving (*fig. 5,*) was made, was taken from a specimen of ordinary size,

gathered from the original tree, and the following characteristics of the variety were noted at the same time.

FORM almost globular; diameter of the fruit nearly two inches. **STEM** about an inch long, rather slender, inserted in a slight cavity; suture scarcely visible, on one side of which the fruit is rather larger than on the other. **COLOR** brownish purple, or dark brown covered with purple bloom, dotted with numerous golden specks. **FLESH** adheres slightly to the stone, which is small and considerably compressed. **SKIN** thin; juice abundant, rich, and sugary; young shoots and leaves slightly downy; the leaves not glossy on the upper surface.

Some other fine varieties of plums have originated in the neighborhood of Hudson, and Mr. Lawrence has raised another excellent sort, of the color of the Imperial gage, which we may hereafter figure and describe.

The soil of Hudson and the vicinity is a stiff heavy loam, in many places running into clay, which produces large and abundant crops of plums. Indeed, on the North River, all our most productive orchards of this fruit are upon heavy clay soil. The plum orchard of Mr. Denniston, of Albany, one of the largest in this country, is planted in a retentive clayey soil, and the trees bend under the heavy weight of their purple and golden fruit; when in other orchards, planted on light sandy soils, scarcely a fruit reaches maturity. We have therefore frequently recommended, with excellent success, the application of clayey loam as a manure for this tree on light sandy soils. It increases the retentiveness of the soil, and the roots are furnished with a more abundant supply of moisture and nutritive matter.

The *curculio* is one of the greatest enemies of the plum; indeed, in many sections of the country, the whole crop is frequently swept off by its attacks. When its habits are well known, however, a little care will enable us to rid our gardens of this insect, so destructive to stone fruit.

The *curculio* is a winged insect, which emerges from the ground about the time when the trees are in blossom, and punctures the fruit almost as soon as it is formed, depositing its eggs in the tender skin of the swollen germ. When the fruit has reached one third of its size, if we observe it closely, we shall discover the scar of this puncture made by the insect, in the shape of a semi-circle or small crescent, about

a tenth of an inch in breadth. The egg has now taken the larva form, and the latter is working its way gradually to the stone or kernel of the fruit; as soon as it reaches this point, the fruit falls from the tree, and the worm now leaves it in a few days, and finds its way into the loose soil beneath the tree. Here it remains until the ensuing season, when it emerges in a winged form, and having deposited its egg to provide for the perpetuity of its species, perishes.

As it is found that the curculio, though a winged insect, is not a very migratory one, the means taken to destroy it in one garden are not without efficacy, though the neighboring orchards may not receive the same care. As the fruit, when it falls from the tree, contains the larva, it is evident that if we destroy it before the insect has time to find its way into the soil, we shall destroy, with it, the curculio. In small gardens, it is sufficient to gather all the fallen fruit every morning, during the period of its fall from the tree, and throw it in the hog-pens, when the whole will be speedily consumed. In larger orchards, where it is practicable, the hogs may (the trees being protected,) be turned in for the short time in the season while the fruit is dropping, and they will most effectually destroy the whole race of insects of the current season. Indeed, in large plum orchards, this practice is found a very effectual remedy for the attacks of the curculio.

In small gardens that have come under our notice, formerly much troubled with the attacks of this insect, where the practice of gathering the fruit and destroying it daily for a short period, has been pursued, the insect has failed to make its appearance after a couple of years, and the trees have borne abundant crops of fine fruit. In addition to this, we would recommend the application of clay about the roots of plum trees, in very light sandy soil.

It is sometimes the case that the plum will be many years in coming into bearing, where the richness of the soil induces too great a luxuriance of growth. When this is the case, the ground should be partially removed from the roots, which should be pruned or reduced in number one fifth or one fourth, and the soil replaced. This should be done in the autumn, and will rarely fail in bringing about a profusion of blossom buds and a good crop of fruit.

A. J. D.

Newburgh, N. Y., Feb. 1842.

ART. IV. *On the cultivation and treatment of Antholyza æthiópica; with some remarks upon the growth of Cape Bulbs, belonging to the natural order Iridæcæ.* By A. SAUL, foreman in the Botanic Garden and Nurseries of A. J. Downing & Co., Newburgh, N. Y.

SIR:—On looking over your review of the American edition of Lindley's *Theory of Horticulture*, (page 25 of the January number,) in the chapter on Temperature, in referring to its influence on the successful growth of what are technically called Cape bulbs, among which you class *Gladiolus*, *Amaryllis*, *Hæmánthus*, &c., to flower which in vigor &c. an alternate condition of humidity and aridity is essential, you seem to arrive at the conclusion that *Antholyza* (*æthiópica*, you believe,) which is in your collection of green-house plants, and which you have never seen bloom, and consequently rejected as worthless, might be made to bloom by the application of an extraordinary high temperature to its culture.

As *Antholyza æthiópica* is an old acquaintance of mine, and as I have never seen, or *found*, any difficulty in blooming it, treated precisely the same as *Ixia*, *Babiána*, and that class of Cape bulbs, which is directly opposite to the above suggestions, if you consider the following remarks worthy of notice, they are at your service.

Among some other bulbs which the Messrs. Downing had from the green-houses of J. W. Knevels, Esq., some two or three years ago, were some of *Antholyza æthiópica* in pots. In the month of September of that year, I shook them out of their pots, &c., when they had apparently stood several years, (consequently never flowered,) and I repotted them in some fresh compost, of equal proportions of peat and loam, with an eighth of white sand, (more or less peat and sand, in proportion to the texture of the loam;) they were then placed in a cold frame, with other things of their class, with the lights off day and night at first, and as they begin to grow, and the nights get colder, shut up at night, and always, from a superabundance of wet, watered only as they require it. In this situation they are kept as late in the fall as possible, protected at night by mats from frosts, &c., until the season begins to have a wintry aspect, when they are removed into a cool part of the green-house, where they can have plenty of

light and air. In this way we have had, in the month of March, for the last two years, *Antholyza æthiópica* flower very freely. Although not the most splendid genus of the *Iridææ*, it is really very curious and handsome: we have also had several species of *ixias*, *Sparáxis*, *Gladíolus*, *Watsònia*, &c., bloom splendidly, treated in the above manner. When done flowering, and as soon as the grass or leaves begin to decay, they are placed on shelves, or any other convenient place, to be kept in their arid state until September, when they should again be annually potted.

Treated in the above manner, I have never known any of the genus of the *Iridææ*, called Cape bulbs, to fail blooming, and I believe the *Iridææ* include all which are technically called Cape bulbs. Those of the *Amaryllidææ*, natives of the Cape of Good Hope, which comprise but a small portion of that natural order of plants, also require green-house temperature, though somewhat higher than the *Iridææ*, whilst the great majority of the *Amaryllidææ* are natives of the tropical parts of South America, East and West Indies, and other tropical climates, and hybrids from those, and consequently require a high humid temperature during their growing season, from 60° to 80°, or even higher, while 45° to 55°, or 60° at the highest, (Fahrenheit,) is sufficient for the *Iridææ*.

In concluding this communication, I do not wish to be understood as claiming any originality in my system of treatment, being nothing more or less than I have seen practised very successfully, for many years, in the cultivation of Cape bulbs, and consequently well known to most practical and all scientific gardeners. But being anxious my old acquaintance, *Antholyza æthiópica*, should not be rejected as worthless, and fearful lest some inexperienced amateur, who may perchance get a few Cape bulbs, may be induced to experimentalize on high temperature, &c., in their treatment, I was induced to forward for your consideration the above remarks.

A. SAUL.

Botanic Garden and Nurseries, }
Newburgh, N. Y., Feb. 7, 1842. }

The review of Dr. Lindley's *Theory of Horticulture*, attributed to us by Mr. Saul, was from a friend and correspondent, whose information upon horticultural subjects is extensive and general, though perhaps not so practical as that of

the author of the above article. We do not possess *Antholyza æthiópica* in our collection now, though we bloomed it finely for two or three years in succession, some time ago: not thinking it so beautiful as many of the smaller *Iridæcæ*, we gave up its cultivation. At that time, however, we wrote a long article on the treatment of several genera of the order *Iridæcæ*, which were then in our collection, and most of which we have now, in which we detailed our mode of growing this very species of *Antholyza*, (Vol. III., p. 367;) to which article Mr. Saul can refer for our mode of practice, which was equally as successful as his own.

We are pleased, nevertheless, to insert the above remarks, coming, as they do, from one who is well acquainted with the growth of Cape bulbs; a tribe of plants too little known, and too little appreciated by amateur cultivators. Our hope is, that Mr. Saul's article may be the means of bringing the subject up afresh in the minds of our readers, that they may be induced to add some of the many beautiful objects which compose the *Iridæcæ* to their collections. Those who wish to make a good selection, are again referred to our articles, (Vol. II., p. 498, and Vol. III., p. 365,) where many of the best are described, and their cultivation given at length.
Ed.

ART. V. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Botanical and Floricultural Intelligence.—*Torreya taxifolia*.—In the fall of 1840, our correspondents, Messrs. A. J. Downing & Co. sent Mr. Loudon, the conductor of the *Gardener's Magazine*, a specimen of this new evergreen tree, discovered in Florida, to which Dr. Arnott, in compliment to Dr. Torrey, has given the name of *Torreya*. Mr. Loudon, on the arrival of the plant, placed it in the hands of Mr. Masters, of the Canterbury Nursery, for propagation, but owing to some damage sustained by the tree in packing, it did not survive. Mr. Masters had, however, taken the precaution to graft some other trees with it, and to take off cuttings, in order to insure its safety. The grafts did not succeed, but the cuttings are now growing slowly, and in time will make good trees. It will be a valuable acquisition to the arboretum of Britain, where it will undoubtedly be hardy.

Paulownia imperialis Sieb.—This is the name of a splendid new tree, which has been lately introduced to France, and still later to England. It belongs to the natural order Scrophulariæ, and is nearly allied to the *Catalpa*, resembling it so much in its wood &c., that the latter has been selling for the same tree. Whether it will prove hardy in England, remains to be seen. In the Jardin des Plants, at Paris, it has stood unprotected; but from the vigorous shoots which it makes, (twelve to fourteen feet long in a season,) it is feared that it will not prove hardy. In this respect, however, it is like the *Ailantus* and the *Catalpa*, each of which make vigorous shoots, and each of which are hardy, even in the latitude of Boston, except in very unfavorable situations.

The *Paulownia* is described as a "magnificent tree," having leaves from two to three feet in diameter, deeply serrated, and slightly ciliated. When growing in a favorable situation, it makes shoots twelve to fourteen feet long during the growing season; but when the plants become older, the growth is less and the leaves smaller. A plant set out in the Jardin des Plants, stood the cold winter of 1838—39 without any covering, and it is now twenty feet high, with leaves two feet in diameter. It is easily propagated by cuttings of the roots, which make fine plants in one year, six feet high; and we trust it will be speedily introduced into our gardens, that its hardiness may be tested in our climate.

Lythraceæ.

HEIMIA De Cand.

salicifolia var. *grandiflora* Lindl. Large flowered Heimia. A green-house plant; growing three feet high; with yellow flowers; appearing in June. A native of Buenos Ayres. Increased by cuttings. Introduced in 1839. Bot. Reg., 1841, t. 60.

Heimia salicifolia is an old plant, introduced from the Berlin Botanic Garden long ago. The present subject is a variety of it, or at least Dr. Lindley so thinks, in the absence of sufficient materials for comparison. The plant grows from two to three feet high, with short linear lanceolate foliage, and large deep yellow flowers, somewhat resembling a *Lythrum*: the branches have a graceful drooping habit, and are loaded with flowers almost up to their summit. The plant should be grown in the green-house, in the "society of camellias, azaleas, and hardy kinds of New Holland plants." It first flowered in June last, in the collection at Sion House. (*Bot. Reg.*, Nov.)

Leguminosæ.

CLIANTHUS

carneus Lindl. Flesh colored Glory Pea. A green-house twining plant; growing eight or ten feet high; with flesh-colored flowers; appearing from April to July. A native of Norfolk Island. Increased by cuttings. Bot. Reg., 1841, t. 51.
Syn. *Streblorhiza speciosa* Endlich.

The introduction of *Clianthus puniceus* to our gardens is fresh in the memory of every cultivator: notwithstanding its great beauty, very few persons have ever seen a plant in bloom, and, at the present time, we doubt whether many specimens are to be found in cultivation. The present subject is very similar to the *C. puniceus*, except in the color of the flowers, which is of a pale pink or flesh color; and though of course less brilliant than the former, quite pretty from their delicate tint. It has good evergreen leaves, and is well adapted for a cold conservatory, where it would prove an excellent plant for training over a trellis. Its cultivation is simple, only requiring a rather rich strong soil, and plenty of room to grow, and it will then flower freely: its roots do not like confinement in a pot, and, in consequence, it is not suited for growing in that manner. It strikes freely from cuttings. (*Bot. Reg.*, Sept.)

BOSSIÆA

disticha Lindl. Double roaced Bossiæa. A green-house shrub; growing two feet high; with yellow flowers; appearing in March; a native of Swan River; increased by cuttings. Bot. Reg., 1841, t. 55.

A pretty little shrub, of an erect habit, but weak and slender branches, covered with ovate obtuse leaves in a two-

ranked manner. The flowers are rather large for the size of the plant, of a bright yellow, "with a darker spot at the base, of the same color, and bordered first with crimson and then with dusky red," which renders it a showy object. It is a pretty companion to the chorozemas and eutaxias, and like them requires the temperature of a common green-house, and to be potted in a light soil composed of heath mould and sandy loam. It is increased freely by seeds or cuttings. (*Bot. Reg.*, Oct.)

MIRBELIA

speciosa Lindl. Showy Mirbelia. A green-house shrub; growing eighteen inches high; with purplish violet flowers; appearing in March and April; a native of New Holland; increased by cuttings. *Bot. Reg.*, 1841, t. 58.

"A handsome shrub," forming a twiggy bush, with interrupted racemes of bright but purplish violet flowers, with a yellow spot in the centre of the vexillum. The stem is pubescent; the leaves scattered, ternate, and verticillate. The flowers appear in axillary clusters of three or more, and are very showy. The plants grow freely, delighting in a light sandy soil, which is rather poor and well drained: for if the soil is too wet or retentive, they are likely to die suddenly. In summer, it should be placed in a cold frame or pit, when the lights can be removed entirely in dull weather, and at night, but kept on during boisterous and wet weather. Dr. Lindley truly remarks, that "it is a mistake to suppose that green-house plants should be placed out of doors, and subjected to all the vicissitudes of the weather during summer. As regards delicate sorts, like the present, the sudden changes which they are subjected to, when placed out of doors, are very destructive to them." He further remarks, that "more injury is done by too much fire heat and too little water to such plants during winter, than by all other causes together, frost excepted." (*Bot. Reg.*, Oct.)

Rutàcæ.

BORONIA

tryphilla var. *latifolia*. The three leaved Boronia. A green-house shrub; growing two feet high, with red flowers; appearing in spring; a native of New Holland; increased by cuttings; grown in light sandy soil. *Bot. Reg.*, 1841, t. 47.
Syn. *Boronia ledifolia*. *Part. Mag. Bot.* 1841. t. 123.

All the boronias are pretty objects, but the present may be regarded "as one of the best, partly on account of its good foliage, but more because of the deep rich ruby red of its numerous starry flowers." The plant has an erect habit, with ternate leaves, and axillary flowers in pairs, forming ra-

comes of much beauty. The plants are grown similar to the diosma, erica, and such plants, requiring a rather light sandy soil, the pots to be well drained, and the soil never allowed to get dry. Indeed, the same treatment as recommended under the head of *Mirbèlia* above, will suit this plant. Increased freely from cuttings. (*Bot. Reg.*, Oct.)

DIPILOLÆNA (from *double* and *cloak*, in allusion to the two coverings to the flowers.)

R. Brown.

Dampieri Des. Dampier's double Cap. A green-house shrub; growing two feet high; with greenish flowers; appearing in spring; a native of Swan River. *Bot. Reg.*, 1841, t. 64.

“A botanical curiosity,” possessing little or no beauty as a flowering plant, but extremely interesting. It is botanically allied to *Corræa* and *Borònia*, without any external resemblance to those plants; and it has the arrangement of parts found in composite genera, without any sort of affinity to them: finally, it is an “apelatous genus among polypetalous ones.” The plant forms a bushy shrub, with obovate oblong leaves, and flowers in dense heads, composed of a great number of long stamens, which project to some distance. It cannot be considered as an acquisition, only to the botanical world. (*Bot. Reg.*, Nov.)

Crassulacæ.

ÆONIUM *Webb*

cruciatum *Webb* Bleeding Stone-wort. A green-house plant; growing two feet high; with yellow flowers; appearing in May. a native of the Canary Isles; increased by cuttings. *Bot. Reg.*, 1841, t. 61.

The old genera of *Sempervivum* and *Sedum* have been remodeled by Mr. Webb, in his work describing the plants of the Canaries. *Æonium* is one of them, to which has been assigned the old *Sempervivum arboreum*, and about twelve other species. The plant now mentioned is a pretty species, with an erect branched stem, small leaves, and paniced clusters of yellow flowers. It requires the same treatment as the mesembryanthemums and similar plants, that is, light sandy soil, well drained, a dry situation in summer, and a cool situation in winter. (*Bot. Reg.*, Nov.)

Plumbaginacæ.

STATICE

monopétala L. Monopetalous Sea Lavender. A green-house shrub; growing two feet high; with red flowers; appearing from July to September; a native of the south of Europe; increased by cuttings. *Bot. Reg.*, 1841, t. 54.

Many of the statices are pretty plants, well deserving cultivation, though they are rarely seen in collections. *S. arborea*, lately introduced, is said to be a splendid plant. The

present subject forms a pretty shrub, with a whitish fructicose stem, linear spatulate leaves, and spokes of handsome red flowers. It may be kept in a green-house or a frame in winter, and in summer placed in the open air, where it freely displays its flowers from July to September. Grows in any rather rich light soil, and easily increased from cuttings. (*Bot. Reg.*, Oct.)

Apocynææ.

TABERNÆMONTANA

dichõtoma *Rorb.* The Forked Tabernæmontana. A stove shrub; growing six to ten feet high; with white flowers; appearing in spring; a native of Ceylon; increased by cuttings. *Bot. Reg.*, 1841, t. 53.

“A most fragrant and beautiful stove plant,” with peculiarly dark and glossy foliage. The flowers are larger than the common species of our collections, and appear in clusters of six or eight each. It is fully described by Roxburgh, in his *Flora Indica*, and was introduced to the collection at Sion House, where it first flowered in England. Its cultivation is simple. Cuttings root in sand under a bell glass in bottom heat, and if the young plants are potted into a mixture of loam, turfy peat, and leaf mould, they will grow vigorously, requiring, however, the tops of the shoots to be nipped off, to make them grow bushy. (*Bot. Reg.*, Oct.)

Convolvulææ.

PHARBITIS

Learii *Paxl.* Mr. Lear's Gaybine. A green-house twiner; growing twenty feet high; with rich purple flowers; appearing all summer; a native of Buenos Ayres; increased by cuttings. *Bot. Reg.*, 1841, t. 56.

Of the many species of convolvulaceous plants which have been added to British collections within a few years, and of which *Ipomæa Horsfälliæ*, and *rùbro cærùlea*, are among the most conspicuous, few can claim a greater share of attention than the charming species now noticed. It thrives well, either in a pot, or planted out in the ground; in the former case trained to a trellis, and in the latter, led over the rafters of the green-house, where it displays its cymes of large purple flowers in the greatest profusion, thousands being expanded at once. It forms tuberous roots, which should be kept rather dry in winter, when it is not growing. When it begins to grow, the vines should be thinned and cut back, and if insects are upon them they should be cleaned off; it will then grow rapidly and flower abundantly all the season. Increased easily by cuttings, and grows luxuriantly in any good soil. (*Bot. Reg.*, Oct.)

Gesneriàcæ.

GESNERA

discolor Lindl. Varnished Gesnera. A stove plant; growing two feet high; with scarlet flowers; appearing in May and June; a native of Brazil; increased by cuttings. Bot. Reg., 1841, t. 63.

A "handsome species," throwing up a stem terminated with a large paniced cyme of shining scarlet flowers, each flower cylindrical, and nearly two inches long. It requires to be managed similar to the other species, to be kept warm and dry in winter, and when it begins to grow to repot it and give it plenty of water. A light loamy soil, with a mixture of peat, leaf mould, and a little well rotted dung, will suit it. Cuttings root readily. (*Bot. Reg.*, Nov.)

Cyrtandàcæ.

ÆSCHYNA'NTHUS

grandiflorus Spreng. Large flowered Blushwort. A stove plant; growing a foot high; with scarlet flowers; appearing in spring; a native of India; increased by cuttings. Bot. Reg., 1841, t. 49.

"One of the handsomest stove plants." It throws up a single stem, with opposite lanceolate leaves, and terminated with an umbel of the most brilliant scarlet flowers. It is easily managed in a damp stove. A cutting may be tied to a log of wood, and it will immediately put forth its ivy-like roots, and in a short time convert itself into a "pendulous bush, every branch of which is terminated by a cluster of deep scarlet flowers." It should be kept dry and warm when out of flower, but when it begins to grow, it luxuriates in a damp hot atmosphere. (*Bot. Reg.*, Sept.)

Amaryllidàcæ.

PLA'CEA

ornata Miers Gay flowered Placea. A green-house bulb; growing a foot high; with pink flowers; appearing in (?); a native of Chili. Bot. Reg., 1841, t. 50.

A "very elegant plant" not yet introduced from Chili. Mr. Miers, whose travels in that country have been published, discovered it on the Andes, where he found it growing to the height of nine inches, producing a head of four to seven flowers, snow white externally, and striped with brilliant vermillion lines on the inside; the filaments are pale crimson. Mr. Miers secured bulbs, but they were unfortunately lost, with a greater part of his rich collection, by shipwreck. It is a fine plant, and it is to be hoped that it will be soon added to British collections. (*Bot. Reg.*, Sept.)

Amaryllis formosissima may now be potted for early flowering in pots.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Foreign Notices.*

ENGLAND.

Cultivation of the Camellia.—“The West London Gardeners’ Association for mutual instruction, holds monthly meetings for the purpose of presenting papers upon the cultivation of various plants, and for discussing and interchanging opinions upon their respective merits. Some of the papers read, we have already presented to our readers, and we doubt not they have been read with much instruction. At a late meeting, one of the members read a paper on the culture of the camellia, and as we consider the remarks of the writer, together with the discussion which it elicited, a good exposition of the management of this fine plant, we are induced to copy it entire.

The camellia will grow and bloom under very ordinary treatment, when placed in the green-house; but it is not often that the plants are seen in that vigorous and healthy condition which gives to this tribe a great part of its claim to our attention. Its large, broad, deep green, shining foliage, is one of its chief attractions, and renders it at all times, and all seasons, ornamental: and when, from ill treatment, the plants lose their leaves in part, or they become diseased, and from thence the foliage assumes a sickly hue, though they may still open a few weakly half formed blossoms, they lose their principal beauty. It is only when seen in full vigor, throwing out their splendid blooms, embosomed and almost reflected in the polished surface of its noble leaves, that the camellia commands and enchains our admiration, as one of the most splendid acquisitions to our gardens.

The author of the paper was Mr. Shearer, a practical gardener.

“He began by observing that camellias, like heaths and geraniums, require a separate house to give them that attention and treatment which are proper for each genus. The splendid and beautiful colors in the flowers of the camellia form a fine contrast with the glossy green foliage which is so conspicuous at that early season of the year when they are most easily produced. His practice, when done flowering, was to raise the temperature of the house to 50° or 53°, in which heat they are more certain to mature the wood and to set the buds. Water should then be given liberally to the root, and syringings every morning and evening. Bunting to be used to shade them, from May until September, during sunshine. If any were observed to grow too much to wood, by discontinuing the watering it would give a gentle check, which would materially assist to set the buds. He would recommend inarching as the most certain and expeditious way of propagating camellias; tongue-grafting he also practised, covering the part with moss, which he found preferable to clay; then putting them under hand-glasses, giving but little air until they were united. The compost to be light and rich; two parts turfy loam, one part leaf mould, and one part sandy peat, with a little decomposed cow-dung; when desirable to grow them large, to be pot-

ted as soon as done flowering. If low shrubby plants are preferred, he would pot them in the autumn, giving a top-dressing with rich loam and cow-dung. A good drainage for the camellia is indispensable, that no stagnant water may sour the soil. When required to flower them early, plants with the most prominent buds should be selected; the temperature to commence at 50°, rising gradually to 60° as the buds expand. He would select the double striped variegata, Colvillii, pæoniaflora, Chandlèrii, and corállina as the best for forcing. He attributed the falling off of the buds to the want of water, and recommended gardeners to allow no more than one or two buds to remain on each branch, as he was confident that the practice would insure a more certain supply, and very much increase the size of the flowers.

“Mr. W. Keane returned thanks to Mr. Shearer for bringing forward, on such a short notice, his excellent paper on the culture of the camellia. It was a subject in which he felt particularly interested, as at Castle Martyr, the seat of the Earl of Shannon, where he lived, the camellia was the topic of conversation with all persons who visited the place. There were fourteen large specimens planted out in the open air about sixteen years ago, and they were all, in 1834, when he last saw them, from twelve to thirteen feet high. The largest, a double white, was thirteen and a half feet high, and twenty-two feet in circumference, and every season feathered with flowers from the bottom to the top. They were planted out in three quarters peat, and one quarter good rich loam, three feet deep, with drainage of old bricks, lime rubbish, and rough gravel at the top. They were planted beside a wall with an east aspect; if the winter was severe, a few poles were placed in front, and mats were stretched from the poles to the wall, which was always found sufficient to protect them from the inclemency of the weather. They generally flowered beautifully in April and May. The system of propagation he recommended was, to take the cuttings in July, or any other time when the wood was perfectly ripe, and insert about ten or twelve in a large 60-sized pot, well drained and filled with sandy peat and loam, but very little loam to be used, as the tender roots are found to grow better in sandy peat; when struck, to be potted singly into 60-sized pots, the cuttings to be any of the common sorts, which serve as good stocks for the better kinds to be grafted upon them. To be grafted without tongueing, as the tongue is apt to decay; then tied with bast-matting; clay never to be applied over them, as the admission of light and air is found to be beneficial for the union of the scion and the stock. To be kept in a pit heated by dung to about 55° or 60°. In March to be planted out in sandy peat upon shelves within two or three feet of the glass, where they would grow rapidly until taken up, if required, for forcing the following season; potting to be performed when they were done flowering.

“Mr. Caie was certain that, by proper management, camellias can be flowered, by exciting or retarding the growth of the plant, to mature the wood and flowering buds, at any season of the year. He considered spring the best time for shifting them; all decayed roots to be cut away, and if the plants are in a sickly state, then placed in heat from sixty to seventy degrees, where they are to remain until

they have produced roots; the soil light sandy loam, with good drainage, an abundance of water may be given with advantage, but it was a great disadvantage to keep them at a great distance from the glass, where they will not mature their buds. When the roots of camellias were coiled, he found it beneficial to tie hay-bands around the stems to retain the moisture, by which they were much invigorated.

“Mr. Fish saw camellias flower pretty well fifteen and sixteen feet from the glass, but about three or four feet from the glass he observed them to flower better and more abundantly. He would recommend crown glass to be used for camellia houses, as defects in the glass are likely to concentrate the rays of the sun on the leaves of the plants, and to give the blotched appearance often to be observed on them; he has kept up a succession of flowering plants for seven months in the year. The temperature, when flowering, to be 60° in the day, 50° to 55° at night; the soil one quarter leaf mould, one quarter sand, one quarter peat, and one quarter loam. He considered good strong adhesive loam would be the best for growing large plants, but would not answer so well for flowering them. He agreed with Mr. Shearer, in the advantage of disbudding to produce large flowers; and also that water, by deficient drainage, stagnates and sours in the soil, which is the principal cause of buds falling off. He did not think the camellia a plant of easy culture, as it requires a great deal of attention to produce good forced flowers. He disrooted camellias which were in a bad state, then plunged them in dung heat, with the temperature at 50°, increasing as vegetation proceeded, allowing it to range as high as 80°, with sunshine.

“Mr. Caie objected to bottom heat, as being injurious by exciting too much the plant that had been disrooted.

“Mr. Massey agreed with Mr. Caie in the disadvantage of bottom heat. He saw fine camellias at Enfield kept in tubs, and put out in the summer in a shady place. He thinks too much water to be the cause of the buds falling off.

“Mr. Caie believed that plants, at a great distance from the glass, were easily affected by too much moisture, as the air of the house would contain two parts hydrogen and one part oxygen. The open air is composed of twenty parts oxygen and eighty nitrogen, consequently there can be no carbon fixed in the plant.

“Mr. T. Keane saw camellia and orange trees much injured by water, which were recovered by withholding it. He also considered that too much water was the cause of the buds falling off.

“Mr. O’Loughlin admitted that camellias may be kept flowering nearly the whole year in large collections. He was opposed to close cutting and to bottom heat. The soil he would recommend to be three quarters peat and one quarter sand. To be potted when done flowering; the temperature to be kept between 45° and 50° at night, at 75° or 80° in the day, to be removed to a shady situation in the autumn, which is of advantage to mature the wood. He saw orange trees grown well in 60° bottom heat, and then gradually inured to the temperature of the orange house.

“Mr. Fish agreed with Mr. O’Loughlin in the advantage of bottom heat for orange trees. He cut out the decayed roots, headed the branches at the same time, and plunged them in bottom heat, where

they grew luxuriantly. From the similarity of the two genera, he considered it was confirmatory of the benefit of bottom heat for the camellias.

“Mr. O’Loughlin approved of removing some of the buds, if too close or too numerous on the plant. He considered cuttings from the single red to be the best for stocks. He did not believe that tonguing was injurious to grafts, and recommended that the pots should be well drained with brick rubbish at the bottom, with rough peat over that to the depth of five or six inches, as the health of the plant mainly depended upon good drainage. He saw, in Dorsetshire, fine camellias eight to nine feet high, planted out in the open air, protected by a few thatched hurdles: they were not injured by the severe frost of 1837–38.

“Mr. W. Keane believed that sudden changes of temperature were the causes of buds falling off; the heat he considers best to flower them is 60° by day and 50° at night. When done flowering, the heat to be raised to 80° by day, and from 65° to 70° at night, to grow them well. When the flower buds are set, the temperature to be gradually decreased, until placed out of doors in June, in some shady situation; if wanted to flower early in the autumn or winter, they should be set growing early in the spring. He was opposed to the system of marching with bottles of water in which to insert the end of the scion, as it requires too much nicety for general practice.

“Mr. Gilfoyle agreed with Mr. Fish in the advantage of bottom heat for the orange trees, but did not think there was such an analogy between them and camellias, as to warrant a gardener to adopt the same practice for both. He believed that the camellia, by the nature of the plant, could transpire from the leaves but very little water, while, on the contrary, the foliage and wood of the orange were naturally more permeable, and could receive a greater quantity of water at the roots without fear of cankering them, or of souring the soil.

“Mr. Caie observed that the constitution of the plants should be closely studied, to direct us in removing the buds and in the application of water, which may be freely given to healthy plants in the flowering season. In his opinion, the success of grafting does not depend upon the clay, bottle, or any other practice, but is mainly to be attributed to the beneficial influence of a close atmosphere.

“Mr. T. Keane was sure that the idea of Mr. Fish was borne out by the fact, that the rays of the sun were concentrated on the drops of water which remained on the plants, by which the blotched appearance was given to the leaves; he approved of keeping them near the glass, and of shading them on hot, sunny days.

“Mr. Shearer agreed with Mr. Caie, that camellias could be grown nearly all the year round, and also in the advantage of keeping them near the glass, to receive the benefit of light and air.”—(*Gard. Mag.*)

New Dahlias.—In our last volume, (VII., p. 441,) we gave a long and particular account of the principal dahlia exhibitions which took place in England last season, naming the flowers which gained the first or premier prize at all the celebrated shows which took place. We also, so far as we had time, gave a list of such as appeared to have been the most successful of the old or newer kinds.

We remarked then, that the labor of looking through fifty or a hundred columns of fine print, to note down the number of premiums which many of the flowers gained, so as to arrive at a more satisfactory result in regard to the real merits of the kinds, was a laborious task, and one which we had not the time to bestow upon: but as we have found an article in the *Gardener's Gazette*, which is the result of a careful inspection of all the reports by the writer, who has been induced to perform such a task, we avail ourselves of his labor, in presenting an abstract of the same, for the benefit of our readers, and in particular, for the gratification of cultivators of the dahlia.

The list is long—too long to copy entire: the writer says that he has “expunged from the statement all old varieties that have been shown but once or twice, retaining only the new sorts that appear in that unenviable position, in order that their worthlessness may be more clearly seen, than by their mere omission.” We shall, however, omit many of those new ones which gained only one, two, or three prizes, and name only such as were very successful, as we presume admirers of the dahlia do not wish to grow a variety that will afford but one prize flower in a season.

As the colors of the kinds are given with the name, we have retained the same, abridging them as follows:—*ro.* rose; *y.* yellow; *cr.* crimson; *p.* purple; *sc.* scarlet; *wh.* white; *br.* bronze; *sal.* salmon.

Argo, Widnall's, <i>y.</i>	56	Lewisham Rival, <i>wh.</i>	34
Andrew Hofer, <i>dark cr.</i>	44	Maria, Wheeler, <i>ro.</i>	52
Admirable, Sparry's, <i>ro.</i>	29	Maid of Bath, Davis, <i>wh. & p.</i>	57
Amato, Dandy's, <i>p. cr.</i>	24	Marquis of Lothian, <i>cr.</i>	47
Beauty of the Plain, Sparry's, <i>wh. & p.</i>	99	Metella, Bigbee, <i>p.</i>	40
Bloomsbury, Pamplin's, <i>buff</i>	46	Mary, Dodd, <i>wh. & pink</i>	31
Bishop of Winchester, Jackson's, <i>cr. p.</i>	40	Miss Johnston, <i>shaded ro.</i>	27
Bloomsbury, Lee, <i>sc.</i>	44	Nicholas Nickleby, <i>sal. & pink</i>	49
Burnham Hero, Church, <i>cr.</i>	23	Optime, Thurtell, <i>p.</i>	23
Conservative, Low, <i>light p.</i>	65	Pickwick, Cormack, <i>p.</i>	92
Climax, Jeffries, <i>p.</i>	35	Phenomenon, Whale, <i>wh. & pink</i>	76
Constancy, Keynes, <i>p.</i>	16	President of the West, Whale, <i>cr.</i>	67
Duchess of Richmond, Fowler, <i>br.</i>	69	Penelope, Hedley, <i>wh. & p.</i>	12
Eclipse, Widnall, <i>sc.</i>	29	Queen, Widnall, <i>pale lilac</i>	14
Egyptian King, Wilmer, <i>br.</i>	23	Rouge et Noir, Ansell, <i>dark</i>	37
Exquisite, Holmes, <i>wh. & p.</i>	22	Rienzi, Widnall, <i>dark shaded</i>	26
Eclipse, Cattleigh, <i>rosy sc.</i>	12	Royal Standard, Whale, <i>cr.</i>	24
Eva, Foster, <i>blush</i>	12	Rosa, Brees, <i>ro.</i>	18
Fanny Keynes, Keynes, <i>rosy p.</i>	30	Rival Sussex, Stamford, <i>dark</i>	18
Francis, Jones, <i>wh. & pink</i>	29	Regina, Gregory, <i>red</i>	14
Grace Darling, Dodds, <i>sal. ro.</i>	78	Springfield Rival, <i>cr.</i>	61
Hope, Neville, <i>ro.</i>	57	Suffolk Hero, Girling, <i>maroon</i>	42
Haidee, Wildman, <i>wh. & pink</i>	15	Scarlet Defiance, Cozzins	23
Highgate Rival, <i>cr.</i>	17	Springfield Purple, Gaines	18
Le Grand Baudine, <i>br. p.</i>	61	Tournament, Cattleigh, <i>red</i>	17
Lady Middleton, Jeffries, <i>lilac</i>	37	Upway Rival, Harris, <i>ro. p.</i>	32
		Yellow Defiance, Cox	61

The writer then proceeds to make the following recapitulation:—

“It will be seen by this table, that Sparry’s Beauty of the Plain has been the most successful dahlia of the season, having been shown in winning stands as follows:—

Beauty of the Plain	99 times	Conservative, Low’s	65 times
Pickwick, Cormack’s	92 “	Le Grand Baudine	61 “
Grace Darling, Dodd’s	78 “	Springfield Rival	61 “
Phenomenon, Whale’s	76 “	Yellow Defiance	61 “
Duchess of Richmond,		Hope, Neville’s	57 “
Fowler’s	69 “	Argo, Widnall’s	56 “
President of the West	67 “	Maria, Wheeler’s	52 “

So that *practically* speaking, the above have been, this season, the best twelve dahlias grown. The next twelve will be

Maid of Bath, Davis’s	51 times	Andrew Hofer, Union	44 times
Nicholas Nickleby, Cor-		Suffolk Hero, Girling’s	42 “
mack’s	49 “	Bishop of Winchester	40 “
Marquis of Lothian,		Metella, Bigbee’s	40 “
Goodall’s	47 “	Rouge et Noir, Ansell’s	37 “
Bloomsbury, Pamplin’s	46 “	Lady Middleton, Jeffries’	37 “
Bloomsbury, Lee’s	44 “	Clinax, Jeffries’	35 “

The most successful new dahlia has been Davis’s Maid of Bath, which has been shown in winning stands as follows:—

Maid of Bath	51 times	Tournament, Cattleugh’s	17 times
Fanny Keynes, Keyne’s	30 “	Highgate Rival, Stein’s	17 “
Eclipse, Widnall’s	29 “	Constancy, Keyne’s	16 “
Admirable, Sparry’s	29 “	Haidee, Wildman’s	15 “
Burnham Hero, Church’s	28 “	Queen, Widnall’s	14 “
Scarlet Defiance	28 “	Bridesmaid, Brown’s	13 “

“The most fortunate raisers of dahlias, therefore, taking the aggregate number of prizes obtained by their flowers in the above thirty-six, will be, 1st, Mr. Whale; 2d, Mr. Cormack; 3d, Mr. Sparry; 4th, Mr. Low; 5th, Mr. Widnall; 6th, Mr. Dodd;—the first four having two flowers each, Mr. Widnall three, and Mr. Dodd one.

“Those who wish to form or arrange their collections, with the view to the possession of *constant* flowers, have a very good *practical guide* before them; the above having proved themselves, if not the best in every respect, at least the most available for showing.

“Some will no doubt another year decline, and their places be supplied with the new sorts, many of which have not been so generally grown, nor, of course, exhibited in so great a number of stands. This was the case last year with Le Grand Baudine. Another consideration is, that the season that just past, having been unfavorable for hard eyed flowers. Glory of Plymouth may be mentioned as an example, having been shown, perhaps, oftener during the present year than ever since it was raised: and the cause that has operated in favor of the harder flowers has notoriously tended to make the soft ones thinner than usual, and to show the eye more than might otherwise have been the case. Some discretion may therefore be fairly exercised in this respect when the other properties have been

desirable, but we should not generally recommend it, as it has been clearly proved that, however attractive the style or other beauties, unless the *centre* be really good, a flower is good for nothing on the day of show; and it is this property alone that has caused many of those we have enumerated to stand so high on the list. Beauty of the Plain has a small and not sufficiently round or cupped petal; Pickwick has a small and pointed petal; Duchess of Richmond is long and quilled: the petal of Hope is flat, and any thing but good; and Maid of Bath has little to recommend but its *constancy* and delicacy of color, the petal being large, flat and loose."

Our readers have thus the opinion of the writer in regard to new dahlia: how well it accords with their own views, we leave them to decide. There are very few *really* good dahlia, notwithstanding the immense number of seedlings which have been raised; for there are so many properties required to make up a perfect flower, that it is almost impossible to find them combined in any one variety.

It must not be understood that in separating the above kinds from all the varieties cultivated, that they are alone recommended for *general* growth: in many gardens the object is rather a *profuse show of flowers*, even if of a secondary character, than a spare bloom here and there, having merely the requisites of a *show bloom*. The latter will do for the dahlia amateur; while the former must be recommended to the possessors of gardens, who wish their borders to be radiant with the autumnal glories of this splendid flower.

For the benefit of our friends who are cultivators of the dahlia for exhibition, the above article has been principally quoted; and we trust that they will find in it, taken in connection with our notices of the exhibitions previously alluded to, all the information which is needed to guide them in the selection of suitable kinds for planting out the coming season.—*Ed.*

ART. II. Retrospective Criticism.

Errata.—In our last number, in the communication of Mr. Legare, *Lycios edulis*, which occurs two or three times, should be *Sicyos edulis*. The error was overlooked until too late for correction.

The Linnæan Botanic Garden and Nurseries, Flushing, L. I.—We notice, by the remarks in the January number of your Magazine, page 10, that you have been misled, as some others were, by the deceptive catalogue issued by a Mr. Garretson, who pretends therein to be the "*Agent*" for this establishment, and successor of ourselves in the Linnæan Botanic Garden and Nurseries, (he says "*Nursery*" by way of quibble, instead of nurseries.)

If you will refer to the New York newspapers of October and November last, you will there find inserted, during six weeks, our exposition of this base attempt "to filch our name by a fraud upon

our rights, and imposition on the public." Mr. Garretson is not the "proprietor" of one inch of any grounds that ever were connected with this establishment, but a brother-in-law of William Prince, Sen. now holds the plot, through which streets have been cut, and from which all the fruit trees were removed years ago; and it is on the ground that these lots were formerly occupied by William Prince, that the pretence to the title, and the pretended agency, is based. The law, however, will soon set this matter at rest.—
Yours, respectfully, William Prince and Alfred S. Prince.

N. B. We send you a copy of the advertisement, for insertion. [This will be found on our cover.—*Ed.*]

[We deem it no more than justice to Messrs. Prince to insert this notice, in correction of any error which we may have committed in relation to their establishment. We supposed from Mr. Garretson's circular, that he had become proprietor of the old Linnæan Botanic Garden and Nurseries; and we made a similar remark in our Retrospective View of Horticulture for 1841. We have no interest with either party, and our only object was to state things as we presumed them to exist. The note above, from Messrs. Prince, explains the matter.—*Ed.*]

ART. III. *Pennsylvania Horticultural Society.*

The stated meeting of the Society was held at its hall, on Tuesday, January 18th, 1842—the President in the chair.

The display of flowers consisted of two collections of fine plants in bloom, in one of which, not offered in competition, were some fine specimens of camellias, a good seedling of a rosy pink color, a profusely flowering specimen of *Chorózema cordatum*, several azaleas, and *Euphórbia Jacquinæflóra*. In the other were some fine plants, among which was an orchideous specimen, *Læ'lia anceps Barkeriàna*, with several scapes of beautiful flowers. There was shown a beautiful basket bouquet, containing many choice camellia flowers, roses, &c., and also rare for the season, several bunches of asparagus and rhubarb.

The premiums were awarded to competitors as follows:—

For the most interesting collection of plants in pots, to William Chalmers, gardener to Mrs. Stott.

For the best bouquet, to John Sherwood.

And a special premium of two dollars to Robert Kilvington, for fine asparagus and rhubarb.

Standing committees for the year were appointed at this meeting: Mr. R. Buist was chosen chairman of the Committee to superintend exhibitions.

The following resolutions were submitted to the meeting by Horace Binney, Esq., and unanimously adopted:—

Resolved, That a committee of five members be now appointed, and annually appointed hereafter in the month of January, to be called the Committee on New Plants, Flowers, Fruits, and Vegetables, whose duty it shall be to examine all new plants, flowers, fruits, and vegetables, exhibited at the stated meetings of this Society, or at their exhibitions, and at the same meeting or at the next monthly meeting of the Society to report the botanical name and description, and the appearance and merit of the respective specimens exhibited. And annually, at the stated meeting in December, the said Committee shall report to the Society the premium awarded by them under the premium list for the specimens so exhibited, and the name of the person to whom the same is awarded.

Resolved, That all such reports shall from time to time be published among the transactions of the Society.

Resolved, That said Committee be instructed to report such rules as they may deem necessary to declare the limits within which a plant, flower, fruit, or vegetable shall be deemed new, within the preceding resolutions.

By appointment, *ad interim*, of the President, the said Committee consists of the following named gentlemen:—

Committee on New Plants, &c.—Horace Binney, John B. Smith, Thomas Landreth, Thomas P. James, Dr. Gavin Watson.

Mr. Binney then proposed the following as a substitute for the last premium offered on the schedule of premiums for 1842, which was unanimously adopted:—

For the introduction and exhibition before the Society of new and valuable plants, flowers, fruits, and vegetables during the year 1842, a premium or premiums not exceeding in the aggregate the sum of one hundred dollars, at the discretion of a standing Committee appointed for that purpose.

A further amendment as follows:—

Any person to whom a premium has been or may hereafter be awarded to the amount of two dollars and upwards, shall be entitled, at his option, to receive in lieu thereof an honorary certificate of merit from the society. (*Society's Report.*)

[The total of the Society's schedule of premiums for 1842 is upwards of six hundred dollars. We are glad to see this society set so commendable an example of liberality, and it should be followed by every horticultural society in the country which wishes to continue in a state of prosperity and be instrumental in disseminating a taste for gardening pursuits. If the Massachusetts Horticultural Society were to extend their premiums in the same manner, we are certain it would produce the most satisfactory results.

Were the schedule not so long as to occupy four or five pages, we should be pleased to give it entire. The highest premium offered is twenty dollars, for the most appropriate design of cut flowers; others are, ten dollars for the twelve best ever-blooming roses in pots; ten dollars for the best fifty varieties of dahlias; ten dollars for the best ten camellias, &c.; and one hundred dollars appropriated as premiums for new and valuable plants exhibited during the year 1842. *Ed.*]

ART. IV. *Massachusetts Horticultural Society.*

Saturday, Jan. 29th.—There being no particular business at this meeting, it was adjourned one week to February 5th.

Exhibited.—Fruits: From R. Manning, McLaughlin and Sieulle pears; Reinette Cœur du Pigeon, Pennock's red Winter, Aunt Hannah, and yellow Bellflower apples, the two latter in excellent eating; the Aunt Hannah is supposed to be an American fruit, and is well worthy of cultivation.

February 5th.—An adjourned meeting—the President in the chair. At this meeting, the Executive Committee presented the reports of the several committees awarding premiums for 1841, and offering premiums for 1842. They are as follows:—

REPORT OF THE COMMITTEE ON FLOWERS,
AWARDING PREMIUMS FOR 1841.

The Committee, having duly attended to their duty of making an award of premiums for 1841, report as follows:—

PEONIES.—For the best display of flowers, a premium to		
W. E. Carter of		\$5 00
For the second best display of flowers, a premium to		
W. Kenrick of		3 00
ROSES.—For the best fifty blooms, a premium to John A.		
Kenrick of		8 00
For the second best fifty blooms, a premium to Messrs.		
Winships of		5 00
For the third best fifty blooms, a premium to S. R.		
Johnson, of		3 00
For the best display of Chinese and other tender roses,		
a premium to S. R. Johnson of		5 00
PINKS.—For the best display of pinks, a premium to W.		
Meller of		5 00
For the best seedling, a premium to S. Walker of		3 00
For the best six blooms, a premium to S. Walker of		3 00
CARNATIONS.—For the best display of flowers, a premium		
to J. Hovey of		5 00
For the best six blooms, a premium to S. Walker of		3 00
BALSAMS.—For the best display during the season, a pre-		
mium to S. R. Johnson of		5 00
GERMAN ASTERS.—For the best display of flowers, a pre-		
mium to Hovey & Co. of		5 00
PERENNIAL PLANTS.—For the best display during the sea-		
son, a premium to Messrs. Winships of		3 00

GRATUITIES.

To Mr. J. Cadness, of the Public Garden, for a fine speci-		
men of <i>Lisianthus Russellianus</i>		3 00
To Joseph Breck & Co., for fine specimens of seedling		
pinks, picotees, &c.		3 00
To S. Walker, for a fine display of twelve blooms of the		
tulip		3 00
To Hovey & Co., for fine specimens of seedling pansies		3 00

To W. Meller, for a display of fine geraniums . . .	3 00
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	\$74 00
Amount in the hands of the Treasurer, for dahlias	64 00
	<hr/>
	\$138 00

The Committee have not, it will be perceived, made any award of premiums for dahlias, in their report. The dahlia exhibition took place so late in the season, that it was impossible to show them in the perfection which they ordinarily attain. Just before the day arrived, a severe storm of wind and rain almost entirely destroyed the plants. But as the exhibition day had been set, the dahlia growers exhibited their blooms agreeably to the rules of the Society; judges were appointed, and the awards were duly made. The exhibitors held a meeting, and by their unanimous consent, the whole amount awarded was allowed to remain in the hands of the Treasurer of the Society, to be added to the premiums of the year 1842: Should this not meet the hearty concurrence of the Executive Committee, the several exhibitors will call for the premiums awarded them by the judges on the day of the exhibition.

The Committee would take this occasion, were it not for extending their report to too great length, to make mention of many plants and flowers exhibited by various individuals, for which premiums were not specified. They would not, however, omit to take honorable notice of the fine collections of *roses* and *dahlias* exhibited by the President of the Society, which contributed much to the beauty of the several exhibitions at which they were shown; nor of the contributions of native plants by B. E. Cotting, which have been objects of considerable interest.

The Committee trust that the Society will bestow an increased amount for premiums the present year; and they look forward to a series of more splendid exhibitions than have ever yet been made at the Society's room. Respectfully submitted.—*C. M. Hovey, Chairman.*

REPORT OF THE COMMITTEE ON FRUITS,

AWARDING PREMIUMS FOR 1841.

The Committee on Fruits award the following premiums for 1841:

APPLES.—For the best summer apples, to Cheever Newhall, of Dorchester . . .		\$5 00
For the best fall apples, to Benjamin V. French, of Braintree . . .		5 00
For the best winter, to Lemuel P. Grosvenor, from his orchard in Pomfret, Ct.		5 00
PEARS.—For the best summer pears, to Robert Manning, Salem		5 00
For the best fall pears, to Elijah Vose, Dorchester		5 00
For the best winter pears, to Marshall P. Wilder, Dorchester		5 00
CHERRIES.—For the best cherries, to George Walsh, Charlestown		5 00
For the next best, to John A. Kenrick, Newton		4 00

PEACHES.—For the best peaches, open culture, to J. L. L. F. Warren, Brighton	\$5 00
For the next best, open culture, to John Hill, West Cambridge	4 00
For the best, grown under glass, to J. F. Allen, Salem	5 00
PLUMS.—For the best plums, to Samuel Pond, Cambridgeport	5 00
For the next best, to William Thomas, of Boston, (seedling)	4 00
APRICOTS.—For the best apricots, to Marshall P. Wilder, Dorchester	5 00
NECTARINES.—For the best nectarines, to David Haggerston, Watertown	5 00
GOOSEBERRIES.—For the best gooseberries, to John Hovey, Roxbury	5 00
STRAWBERRIES.—For the best strawberries, to Messrs. Hovey & Co., Boston	5 00
For the next best, to J. L. L. F. Warren, Brighton	4 00
CURRENTS.—For the best currants, to A. D. Williams, Roxbury	3 00
MELONS.—For the best water-melons, to J. L. L. F. Warren, Brighton	3 00
For the best musk-melon, to J. Lovett, Beverly	3 00
RASPBERRIES.—For the best raspberries, to Messrs. Hovey & Co., Boston	5 00
GRAPES.—For the best foreign grapes, grown under glass, to David Haggerston, Watertown	10 00
For the best foreign, open culture, to S. R. Johnson, Charlestown	5 00
For the best native, open culture, to J. L. L. F. Warren, Brighton	5 00

Gratuities awarded are as follows:—

To George Lee, of West Cambridge, for a fine specimen of peaches, grown in pots	\$3 00
To Otis Johnson, of Lynn, for a fine specimen of grapes, grown under glass	3 00
To J. Lovett, 2d, of Beverly, for a fine exhibition of pears	3 00
To Alexander McLennan, of Newton, for a fine display of foreign grapes	3 00
To S. Sweetser, for his exhibition of large Martin rareripe peaches	3 00
To George Brown, of Beverly, for a choice exhibition of pears	3 00
To George Walsh, of Charlestown, for large handsome peaches	3 00
To S. Phipps, of Dorchester, for extraordinary large Bartlett pears	3 00
To Mr. Ferguson, of New Bedford, for choice native grapes	3 00
To Samuel Pond, of Cambridge Port, for his exhibition of Cushing pears	3 00

\$150 00

Making, in all, one hundred and fifty dollars, being the whole amount offered for premiums for 1841. The Committee were of opinion that the Wells Premium should be continued for another year, as no applicant was deemed entitled to it, agreeable to the conditions of the notice given June 19, 1841.—*Benjamin V. French, Chairman.*

REPORT OF THE COMMITTEE ON VEGETABLES,
AWARDING PREMIUMS FOR 1841.

The Committee on Vegetables, having attended to the duty of awarding premiums for the year 1841, report as follows:—

ASPARAGUS.—For the best asparagus, a premium to Samuel Walker of	\$5 00
BEANS.—For the best Lima beans, a premium to E. Vose of	3 00
CELERY.—For the best celery, a premium to S. C. Mann of	4 00
CUCUMBERS.—For the best early cucumbers, a premium to Hovey & Co. of	5 00
RHUBARB.—For the best rhubarb, a premium to Samuel Walker of	5 00
SQUASHES.—For the best squashes, a premium to A. D. Williams of	3 00
BRUSSELS SPROUTS.—For the best Brussels sprouts, a premium to John Prince of	3 00
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	\$28 00

For a number of articles on which premiums were offered, there were no competitors, and the Committee would respectfully recommend the following gratuities for several fine specimens of vegetables, which were not included in the list of premiums offered by the Society, but for which the Committee are of opinion that the exhibitors deserve something more than a notice in the Society's weekly reports:—

To the President of the Society, M. P. Wilder, for very large white carrots	\$3 00
To Josiah Lovett, 2d, for very fine specimens of beets and carrots	3 00
To Alexander McLennan, for an extra large squash, weighing about one hundred pounds	3 00
To Francis R. Bigelow, for several new varieties of the tomato	3 00
To J. L. L. F. Warren, for fine large asparagus	2 00
To John Hovey, for extra large tomatoes	2 00
To Marshall Tidd, for very early and fine shelled beans	2 00
To William McIntosh, for a bushel of very large and handsome Chenango potatoes, exhibited at the annual exhibition	2 00
To Otis Johnson, for a great variety of fine vegetables, exhibited at the annual exhibition	2 00
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	\$22 00

Respectfully submitted.—*Samuel Pond, Chairman.*

REPORT OF THE FRUIT COMMITTEE,
OFFERING PREMIUMS FOR 1842.

The Committee on Fruits recommend the following premiums to be awarded for the ensuing year:—

APPLES.—For the best summer apples, to be exhibited previous to the 1st of September	\$5 00
For the best fall apples, to be exhibited previous to the 1st of December	5 00
For the best winter apples, to be exhibited after the 1st of December	5 00
PEARS.—For the best summer pears, to be exhibited previous to September 1st	5 00
For the best fall pears, to be exhibited previous to December 1st	5 00
For the best winter pears, to be exhibited after Dec. 1	5 00
CHERRIES.—For the best specimen of cherries	4 00
For the next best specimen of cherries	2 00
PEACHES.—For the best exhibition of peaches	5 00
For the next best exhibition of peaches	3 00
For the best peaches grown under glass	5 00
For the next best peaches grown under glass	3 00
GRAPES.—For the best foreign grapes grown under glass, exhibited before July 1	5 00
For the next best foreign grapes grown under glass, exhibited before July 1	3 00
For the best grapes grown under glass, and exhibited after July 1	5 00
For the best foreign grapes, open culture	5 00
For the best native grapes, open culture	3 00
APRICOTS.—For the best specimen of apricots	5 00
For the next best apricots	3 00
NECTARINES.—For the best specimen of nectarines	3 00
QUINCES.—For the best specimen of quinces	2 00
PLUMS.—For the best specimen of plums	5 00
For the next best specimen of plums	3 00
GOOSEBERRIES.—For the best exhibition of gooseberries	3 00
STRAWBERRIES.—For the best exhibition of strawberries	5 00
For the next best exhibition of strawberries	3 00
CURRENTS.—For the best specimen of currants	3 00
For the next best specimen of currants	2 00
RASPBERRIES.—For the best specimen of raspberries	4 00
For the next best specimen of raspberries	2 00
MULBERRIES.—For the best exhibition of mulberries	3 00
MELONS.—For the best exhibition of water-melons	3 00
For the best exhibition of green-fleshed melons	3 00

\$125 00

To be awarded in gratuities 25 00

\$150 00

WELLS PREMIUM.

The Committee also offer the Wells Premium for apples, the produce of seedling trees, which have been brought into notice since 1829:—

- For the best summer apples, not less than one dozen, a premium of \$25 00
- For the best fall or autumn apples, a premium of 25 00
- For the best winter apples, a premium of 25 00

Premiums to be awarded to members of the Society only; and where the claims are not of sufficient merit, no premium will be awarded. This will be strictly adhered to, particularly in regard to the Wells Premium, where no premium will be awarded, but in full evidence of its superiority.—*Benjamin V. French, Chairman.*

REPORT OF THE VEGETABLE COMMITTEE,
OFFERING PREMIUMS FOR 1842.

The Committee on Vegetables recommend the following premiums to be offered the ensuing year:—

ASPARAGUS.—For the earliest and largest four bunches	\$3 00
RHUBARB.—For the largest and best twelve stalks, previous to the first Saturday in July	3 00
PEAS.—For the earliest and best peck in June	4 00
LETTUCE.—For the finest six heads, of open culture, previous to the first Saturday in July	2 00
POTATOES.—For the best peck previous to the first Saturday in August	3 00
CUCUMBERS.—For the best pair grown under glass, previous to the first Saturday in June	4 00
For the best and earliest of open culture	2 00
BEANS.—For the earliest large Lima, two quarts	3 00
For the earliest dwarf, two quarts	2 00
CAULIFLOWERS.—For the best and largest four heads	3 00
BROCOLI.—For the best and largest four heads	3 00
CELERY.—For the largest and best twelve roots	3 00
EGG PLANTS.—For the finest six	3 00
TOMATOES.—For the best, not less than one dozen	2 00
SQUASHES.—For the best display of the largest number of varieties at the annual exhibition	5 00
For the best display of various vegetables at the annual exhibition, not including squashes	5 00
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	\$50 00
For gratuities	10 00
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	\$60 00

Samuel Pond, Chairman.

Adjourned two weeks, to February 19th.
February 19th.—Owing to the inclemency of the weather, the meeting was adjourned two weeks, to March 5th.

ART. V. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>		From	To	<i>Squashes and Pumpkins.</i>		From	To
		¢	cts.	¢	cts.	¢	cts.
Potatoes:							
Chenangoes,	} per barrel, . . .	1 25	1 37½	Canada Crookneck, per lb. . .	5	6	
	} per bushel, . . .	50	60	Autumnal Marrow, per pound	6	—	
Eastports,	} per barrel, . . .	2 00	2 25	Winter Crookneck, per lb. . .	4	6	
	} per bushel, . . .	1 00	—	West Indias, per pound, . . .	3	—	
Common,	} per barrel, . . .	1 25	—	Pumpkins, each,	12½	20	
	} per bushel, . . .	50	55				
Sweet potatoes, per bushel,		1 25	1 50				
Turnips, per bushel:							
Common,		37½	50				
Ruta Baga,		37½	50				
Onions:				<i>Fruits.</i>			
Red, per bunch,		4	5	Apples, dessert:			
White, per bunch,		4	5	Paldwins, per barrel,	3 50	4 00	
White, per bushel,	1 25	1 50		Russets, per barrel,	2 75	3 00	
Yellow, per bushel,	75	1 00		Greenings, per barrel,	2 50	3 00	
Beets, per bushel,	75	—		Blue pears, per barrel,	2 50	3 00	
Carrots, per bushel,	62½	—		New York pippins, per bbl.	3 00	3 50	
Parsnips, per bushel,	75	—		Common, per barrel,	2 00	2 50	
Salsify, per dozen roots,	25	—		Pippins, per bushel,	1 00	1 25	
Radishes, per bunch,	12½	—		Nonsuch, per bushel,	2 00	—	
Shallots, per pound,	20	—		Sweet, per bushel,	1 25	1 50	
Horseradish, per pound,	10	12½		Lady apples, per half peck,	25	—	
				Dried apples, per pound,	4	5	
<i>Cabbages, Salads, &c.</i>				Pears, per dozen:			
Cabbages, per doz:				Burgomestre,	25	37½	
Savoy,	75	1 00		St. Germain,	50	75	
Drumhead,	75	1 00		Chaumontel,	25	50	
Red Dutch,	75	1 00		St. Michael Archangel	—	—	
Brocoli, each,	12½	25		Baking, per bushel,	2 00	2 50	
Cauliflowers, each,	12½	25		Cranberries, per bushel,	2 00	2 50	
Lettuce, per head,	8	12½		Grapes per pound:			
Spinach, per peck,	25	37½		Malaga, (white)	20	25	
Dandelions, per half peck,	37½	—		Malaga, (purple)	25	—	
Celery, per root:				Pine-apples, each,	25	50	
Giant,	10	12½		Quinces, per bushel,	—	—	
Common,	6	8		Lemons, per dozen,	17	20	
Cucumbers, (pickled) pr gal.	25	—		Shaddocks, each,	12½	—	
				Oranges, per doz:			
<i>Pot and Sweet Herbs.</i>				Havana,	37½	50	
Parsley, per half peck,	37½	—		Sicily,	20	25	
Sage, per pound,	17	20		Walnuts, per bushel,	1 25	1 50	
Marjorum, per bunch,	6	12½		Chestnuts, per bushel,	2 00	—	
Savory, per bunch,	6	12½		Butternuts, per bushel,	1 00	—	
Spearmint, per bunch,	3	—		Almonds, per pound,	14	15	
				Castana, per pound,	—	—	
				Cocoa nuts,	3	4	

REMARKS.—The weather, thus far in February, has continued remarkably mild, with only one great depression of the thermometer, and that only for one night. Two severe storms of rain have been experienced, which, however, were followed by fine sunny weather, more like March than February. It is a singular fact, that in Boston the thermometer has not fallen below zero since February, 1840.

Owing to the mild season, forcing has been much favored, and we consequently have to note a better quality of such vegetables as are brought forward at this early season.

Vegetables.—Potatoes remain nearly the same: Chenangoes are rather brisker, and good ones command fully our highest rates: East-ports are duller, and Nova Scotias are less in demand: the latter do not keep so well as other sorts: sweet potatoes are yet quite plentiful for the season. Turnips remain about the same. Onions are growing scarcer; and we quote a little higher: good white by the bushel are nearly gone. Beets are well supplied. Carrots and parsnips are abundant. The first radishes of the year came to hand last week: though yet small, they are of good quality and appearance. Horseradish is abundant and good. Cabbages are reduced to a small stock, and drumheads now command increased prices. Brocoli and cauliflowers are supplied in small quantities. Spinach is plentiful, cheap and good: the season has been fine for this vegetable. Dandelions have been brought forward in fair quantities. Lettuce continues to increase in quality, and the market is well supplied. Celery is good, and tolerably abundant. The stock of squashes is now reduced quite low, and only a few good ones remain: West Indias have been received in small lots.

Fruit.—With the exception of Baldwins, apples remain about the same, with the additional quality of having been well picked: good Baldwins now command four dollars; russets are a little quicker, but without material variations. There are very few sweet apples remaining in the market. Some few Nonsuches have been received, but the variety is not much cultivated. Dried apples are abundant. Pears are nearly gone: a few Burgomasters, or Monsieur Le Cures, are now to be had, but it is a rather inferior fruit. Good baking are to be had at our quotations. Cranberries have improved considerably, and the stock is now working off at our increased rates. Grapes are less abundant than at the time of our last report, though there is a good supply by late arrivals. A few pine-apples have been received, sufficient just to keep the market supplied. Lemons and oranges are very cheap and abundant: late arrivals from the Mediterranean have overstocked the market. Walnuts and chestnuts remain without much demand or variation.—*M. T., Boston, Feb. 1842.*

HORTICULTURAL MEMORANDA

FOR MARCH.

FRUIT DEPARTMENT.

Grape vines will now begin to swell their buds and push their shoots; where considerable heat has been kept up, they will already have burst into leaf: care should be taken that the shoots are tied

firmly up to the trellis: keep up an even temperature if cold nights occur, by increasing the fires: it is injurious to the crop to suffer the vines to be retarded in their growth at this season. Give air, and syringe occasionally, as the weather will admit.

Peach trees in pots, if brought into the house, as directed last month, will now be in bloom; leave off syringing until the fruit is set, when it may be resorted to again freely.

Grape vines in the open air may be pruned this month, if omitted in the fall.

Scions of fruit trees may now be cut for grafting in April or May: place them in a cellar or cool place, with the lower ends in a box or pot of earth.

Root grafting trees may now be performed as recommended in our Vol. VI. p. 249.

FLOWER DEPARTMENT.

Camellias will be finishing their bloom, and will begin to grow: such as need it should be repotted as described in our last. Inarch young plants, if it is desirable to increase any of the kinds in a collection.

Roses will now be blooming: give good supplies of water, and syringe the foliage every other day.

Azaleas will now begin to bloom, and should receive an increased supply of water.

Ericas may now be propagated with good success: young plants potted off in the fall may now be shifted.

Dahlias will now need more attention: if early blooming plants are wanted, now is the proper time to pot the roots.

Verbenas should be shifted now into larger pots, and the branches tied to neatly made trellises.

Cactuses may be potted this month, and grafting may also be performed.

Annual seeds may now be sown of such kinds as were recommended last month.

Sparaxis, ixias, and similar bulbs, now coming into bloom, should be watered freely.

Geraniums will require attention: keep them clear of the green fly; and such as need it should be shifted into larger sized pots.

Tulips, hyacinths, &c., in beds in the open ground, will begin to show their shoots above the soil the latter part of the month: if the weather is mild, the beds should be then uncovered.

Pansies raised in boxes last month should now be potted off ten or twelve in a box, and placed in frames till the weather is sufficiently mild to plant out in the open air.

Erythrina crista galli.—Plants of this fine flower may be brought from the cellar to the green-house, to forward their growth.

Salvia splendens, fulgens, &c., may now be propagated by cuttings, for the purpose of planting in the borders in summer.

Plants in frames should receive attention: give an abundance of air in all mild weather.

Calceolarias should now be attended to; shift such as have already filled the pots with their roots.

THE MAGAZINE
OF
HORTICULTURE.

APRIL, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *Notes made during a visit to New York, Philadelphia, Baltimore, and Washington, and intermediate places, from August 8th to the 23d, 1841.* By the Editor.

(Concluded from p. 86.)

Washington, D. C., Aug. 20, 1841.—When we contemplated a visit to Washington, we were in hopes that we should have the opportunity to do so at our leisure; but it is almost unnecessary to say that we had very little spare time, owing to our delay in the cities of Baltimore and Philadelphia. By confining our attention mostly to the amateur and commercial gardens of the city, we found time to note down all that appeared interesting and new. We also took a hurried walk through the grounds of the Capitol, and the garden attached to the President's house, with a view to notice their arrangements.

The Columbia Horticultural Society has been established several years, and has held some few annual exhibitions, accounts of which have appeared in our pages. But for the last year or two, the interest in the Society appears to have decreased, and we believe no annual exhibition was held for the autumn of 1841. It would be a source of regret to see this society, which has been instrumental in spreading a taste for gardening pursuits, fall into a declining state, which would prevent its further usefulness. We trust the amateur and practical cultivators in and around the city will use their exertions to sustain and preserve it. There certainly has been a constantly increasing taste for plants since it was first organized, and now that a sufficient number of beautiful objects are in the hands of

the members, to render its shows at all times interesting, renewed exertions should be made to keep it in a prosperous condition.

Garden of Dr. J. S. Gunnell.—Our first visit in the city was to the garden of our correspondent, Dr. Gunnell, whose communication upon the growth of the camellia in rooms, appeared in our last volume, (p. 214.) It is situated nearly opposite the President's house, and occupies about half an acre of ground. There is a small green-house, about twenty-five feet long, lately erected, and intended principally for camellias and roses. [Since our visit, Dr. Gunnell has erected a new green-house, twenty-seven feet long by sixteen wide, which he also intends for camellias and roses.]

Until within two or three years, Dr. Gunnell cultivated his camellias in the parlor, or rather in the room attached to his office, in the same manner as described by him in the article alluded to; it was there that he bloomed nearly all the good kinds in cultivation, and not only flowered them, but succeeded in procuring seeds from some of the sorts, from which he raised the seedlings which have been described in our previous volumes, (V., p. 210, and VI., p. 337,) one or two of which are said to be extremely beautiful, and well worthy a place in any collection. This shows conclusively, that the camellia *can* be grown in the parlor, with proper attention and care, and nearly as well, too, as when placed in the green-house. We think Dr. Gunnell told us that he had never found any difficulty in blooming any of the kinds in his collection, though some would open more freely than others, and were better adapted to such a situation. We saw the benches or stands, upon which the plants were placed, as described in Dr. Gunnell's communication, and should consider them admirably adapted to the purpose; by their use, the plants can be syringed freely, and the danger of the water running upon the floor or carpet is perfectly obviated. A level stand, also, to our eye, is neater than the steps or stages so generally in use as parlor stands for plants. So successful was Dr. Gunnell in the management of the plants in his room, that he would not have erected a green-house, but for the great increase of his plants, which, by means of seed, and the constant addition of new sorts by introduction from abroad, enlarged his collection so as to render it necessary to remove them from the limited space of a portion of one or two rooms.

The camellias we noticed were in excellent health. The new varieties of merit which have been raised by Dr. Gunnell, are Old Virginia, Covingtonii, Mrs. Madison, Judge Washington, Gen. Nelson, George Mason, Peter Francisco, and Mrs. Gunnell, the latter a fine white one, lately bloomed for the first time. We noticed a number of seedling plants, which have not yet flowered. In noting down some observations, Dr. Gunnell stated that he had always found that those seedlings which have white or light colored flowers, as white striped and blush, invariably have a purely green foliage and stem when the new growth commences, though when it begins to acquire a woody character, it changes its color; while those, with pink, rose, or darker colored flowers, have leaves and stems with a reddish tinge. During many years of close observation, he has never known an instance of variation from this principle. By thus watching the young wood, such as will have blush or white flowers are easily detected in the earliest stages of their growth.

Inarching camellias is performed at all times from February to September. The first branches are taken off in February; when the new shoots begin to harden, they are again inarched off in June; and when in turn the new shoots of these acquire a woody habit, they undergo another operation in August. If the stocks are young and thrifty, the union takes place in six weeks, and they may be cut off. Those who prefer to inarch in the place of grafting, will find this a sure way of increasing any new or desirable kinds. In the green-house, we here saw young plants of *Euphórbia Jacquinæflóra*, which had been propagated by inarching off the branches in June.

Dr. Gunnell cultivates quite a large collection of roses, and among the number, six or eight seedling varieties, raised by an amateur in Washington. One called Suter's pink Noisette, which we saw in bloom, is a fine addition to this class of ever-blooming varieties. Among the foreign roses, Stephens's new China is an exceedingly fine one, with large, purplish-pink, globular, flowers. Several of the fine varieties which we have noticed at other places, were also in flower. Many of the plants turned out into beds in the open garden, presented a fine display of flowers.

Nursery and Flower Garden of Mr. Buist.—This is situated but a short distance from the Pennsylvania Avenue, at the corner of Twelfth Street and New York Avenue, near

the new Patent Office, and contains about an acre and a half of ground. On it is a green-house, forty feet long; a camellia-house facing the north, forty feet; a hot-house, forty feet; and a geranium-house, about forty feet, the whole being a connected range. In addition to this, there is a rose-house, lately erected, about forty feet long. The whole we found well filled, for the season of the year, with a choice collection of healthy and well grown plants. The camellias were in excellent health; they are kept in the house the year round.

When Mr. Buist first leased a piece of ground in Washington, it only contained a few thousand feet; but he has gradually extended his business and enlarged his premises, and at the present time his whole grounds are completely-stocked with an excellent collection of plants. In the open garden, the most attractive objects were the roses, of which Mr. Buist cultivates a choice assortment, including many of the newest kinds. We here saw some remarkably large specimens of microphylla, Noisette, and other roses, which are generally considered very tender in the latitude of Boston, growing to the height of five or six feet, and flowering in great profusion, particularly the microphylla. With a little protection, the latter, as well as some of the teas and noisettes, stands the winter at Washington without injury, flowering abundantly from June to November. Mr. Buist showed us some seedling erythrinæ, which, though only six months from the seed, were pushing flower buds: it may almost be treated as a tender annual, sowing the seeds in a hot-bed in March, and transplanting to the open ground in June, where the plants will flower in August.

What pleased us here as much as any single object, were the pyramids of cypress vine. We never saw this exquisite annual growing, where we were so much struck with its beauty. The plants were sown in a circle about three feet in diameter; in the centre of the circle, a large tall stake was placed, twelve feet or more high; at the root of each plant was placed a forked peg, made of stout twigs of trees; to each of these a strong piece of twine was attached, which was carried to the top of the stake, and there made fast to the edge of a smaller circle, about six inches in diameter. The vines had reached the top of the stake, wreathing its branches from one string to another, and forming a complete pyramid of its delicate foliage, interlaced with its brilliant crimson

starry blossoms. Every one who possesses a garden may have it in equal perfection, by sowing the seeds in April, in a hot-bed, or May in the open garden, and transplanting into circles, when it is desirable to form a pyramid, as here described. *Thunbérghia alàta*, a. *álba*, and a. *aurantiaca*, may also be treated in the same manner, though not with equal effect; the foliage of the latter in no way comparing with the cypress vine: but then the mixture of large buff, deep orange, and pure white flowers, would form a galaxy of beauty which would be admired by all lovers of flowers.

Mr. Buist gave us a list of many of his new roses; but as they are the same as we have already noticed as in the collections of the Philadelphia florists, we shall not repeat them. He grows his best kinds in beds in the open garden, where they make stronger plants, produce larger and handsomer flowers, and, what is also of considerable consequence, require very little care in summer, the trouble of continual waterings being nearly done away with. In the winter season, Mr. Buist flowers a large number of plants; the gaieties of the winter season in Washington, when Congress is assembled, create a demand for bouquets, and roses are one of the principal flowers wanted on such occasions.

Mr. Buist is an enterprising man, and being in constant correspondence with his brother in Philadelphia, is enabled to add all the new and rare plants to his collection at an early day. Neatness is preserved in all parts of the garden, and we were well pleased with all the arrangements.

The Flower Garden of Mr. J. Douglas, Jr., near Pennsylvania Avenue, a short distance from the new Treasury building, contains about an acre of ground, upon which is erected a fine green-house, nearly a hundred feet long. In connection with this place, Mr. Douglas also occupies several acres about a mile out of the city, where a larger part of his plants are cultivated, and from whence the green-house, attached to the city garden, is stocked with a fine collection, which is replenished as it becomes reduced from extensive sales.

In the garden out of the city, are several houses devoted to the cultivation of plants; one for roses, one for camellias, and one for geraniums and miscellaneous plants. Mr. Douglas possesses a fine collection of roses, being mostly selections from the nurserymen of New York and Philadelphia,

which places he visits every year or two, for the purpose of procuring all kinds of plants that are new and fine. The camellias were in excellent health, and embraced all the best varieties; among the number we saw some large and fine specimens of the double white.

In the vegetable garden, we noticed a method of cultivating celery, quite different from the usual plan of growing in single trenches. The system is, to prepare a bed about four feet wide, and of any length the ground will admit. In this bed the plants are set out, in rows about six inches apart, and six inches from plant to plant. This takes place the latter part of July or first of August. As soon as the plants get well rooted and begin to grow, the operation of blanching commences, and the earth is filled in between the plants every fortnight, until they complete their growth. The object of this mode is principally to counteract the effects of dryness. When the earth is thrown up in single ridges, evaporation, under a hot sun, takes place much more rapidly than if there was a large body of earth, as in beds four feet wide. The consequence is, that the plants have a constant supply of moisture, and as ridges are formed between the beds, where the earth is thrown out, in all heavy rains the plants receive all the benefit of the rain; while, by the method of growing the plants in single rows, all the water is carried away from them into the hollows which are formed, as soon as the plants are earthed up above the surface of the soil. The celery in the Washington market has the reputation of being of excellent quality. Mr. Douglas had several large beds planted out for this purpose.

In addition to the stock of plants, Mr. Douglas has a seed store attached to his city garden, and supplies all the finest vegetable and flower seeds to be procured.

Nursery of Mr. Joshua Pierce.—About four miles from the city, we found the nursery of Mr. Pierce, situated upon one of the most beautiful spots around the city, approached only at the nearest point, from a road which skirts the border of a forest, occasionally running through a dense growth of maples, chestnuts, &c. The nursery and farming grounds cover upwards of a hundred acres, which is an elevated piece of ground, sloping on all sides to the valley which intervenes between that and the surrounding land. The nursery is a detached portion on the south and west sides, the green-house,

pits, &c. facing the south. Mr. Pierce's attention has been given more to the cultivation of fruit and shade trees than to green-house plants, although he has now a very good collection of the latter, including many fine camellias and a good variety of roses. We unfortunately did not find Mr. Pierce at home, but from the intimate acquaintance of Dr. Gunnell, who kindly accompanied us, we had the opportunity of fully inspecting Mr. Pierce's grounds.

In connection with Mr. J. F. Callan, Mr. Pierce has lately erected a small green-house in the garden attached to Mr. Callan's store, in F Street, where they propose to sell plants and bouquets, and will keep a fine collection always fresh from Mr. Pierce's premises. Many purchasers who would be deterred by the distance from visiting Mr. Pierce's grounds, will be thus enabled to secure plants of his cultivation ready at hand.

In regard to cultivation, we saw no improvements worthy of note. The green-houses, generally, are more badly constructed than at the north, and, with few exceptions, less attention is paid to the neatness and appearance of the in-door arrangements.

The Grounds of the Capitol, which we should judge contain about twenty acres, are situated upon an eminence which commands a fine view of the surrounding country, and are laid out with broad avenues of various widths, which intersect one another, and lead to the steps of the Capitol. The main entrance to the west front is from Pennsylvania Avenue, where the grounds form a semi-circle, of which the avenue is the centre; a very broad walk leads from them, up the ascending surface, to the main steps, which descend from a broad semi-circular terrace: two other entrances to this part of the grounds are placed at the angles or sides of this semi-circle, which also, by a straight walk, lead up to the broad terrace. From this lower terrace, a long flight of steps leads to the upper one, upon which the building of the Capitol is placed: on the turf between the walks, are oval and circular beds, planted with shrubs and roses, and filled with dahlias and other annual flowers.

The grounds on the other side, or east front, form nearly a square, laid out with two avenues through the centre, and a broad walk running round the whole, with a belt of trees, which forms the boundary line. On each side of the centre

avenues rows of trees are planted, and upon the grass lawns which intervene between the centre and outer walks, are two large circles of dug ground, planted with shrubs, dahlias, and other flowers.

The carriage entrances are on either side of the Capitol, and are separated from the grounds on the north front by an iron paling, which runs direct from one entrance to the other. The Capitol itself forms the line of separation on the other, with the exception of a short distance of low palisading on each side, which runs along the edge of the terrace.

The grounds are kept in very neat order by Mr. Murphy, the principal gardener, and, for the amount of labor employed, reflected much credit upon his industry. The walks were clean and well rolled, and the dug circles were filled with earth and planted with a variety of showy summer flowers. We will not stop here to say how far this mixture of forest trees and exotic plants is in accordance with our taste for so extensive a spot of ground, and attached to such a building as the Capitol, as we should extend our remarks too far; our object is only to give our readers some idea of the state of gardening, without the intention of fully discussing particular errors or faults in laying out grounds.

The Garden and Grounds of the President's House have been a subject of so much discussion the past year or two, that it might be expected we should give some account of a place upon which such *extravagant* sums are said to have been expended. We fear, however, that any person of any pretensions to taste, would be sadly puzzled to find in what manner any large amount of money could have been expended. The garden consists of nothing but a plain piece of ground, formerly quite level, but now made uneven and unmeaning by three artificial mounds. A walk environs the whole, and other walks cross the grounds at two or three points; a hasty glance did not impress upon our memory every particular in relation to them. Very few trees or shrubs have been planted, and, with the exception of a border about ten feet against the wall which shuts out the offices of the house, there are but few flowers upon the grounds. The mounds which we have referred to have been thrown up, and thus remain, without any plantations of shrubs or trees to give a character to the garden, or hide the nakedness of these elevations, seeming more like heaps of earth accidentally placed there, and grown over

with turf, rather than the natural undulations of the surface. We can conceive of no worse taste than the execution of the work as it now is: the object of these mounds seems to have been to hide one part of the garden from another; but this could have been done much better by a picturesque or gardenesque plantation of trees, without a resort to the artificial means which have been used. We trust, for the credit of a national taste, that some alterations may be made, when there shall be means at command to do it, and that the grounds may be re-arranged, and laid out in a style corresponding to the architecture of the building and the character of the place.

Having delayed our tour longer than we had expected, duty to our readers compelled us to hasten our return, and passing through the same route which we came, we reached Boston on the 23d of the month, gratified with our visit, and our note-book stored with memoranda, which we trust have furnished not only interesting information upon the state of gardening, but many useful practical hints to the cultivator of plants.

ART. II. *On the cultivation of Salsify, (Tragopogon porifolius.)* By the EDITOR.

ONE of the most delicious vegetables, of late introduction, is the Salsify, or vegetable oyster. Though more or less known for several years, yet, to the mass of the community, it is quite a new vegetable. It is rarely found in our market, and is scarcely seen beyond the precincts of the kitchen gardens of gentlemen in the vicinity of our large cities, who look upon it as one of the most valuable vegetables they cultivate, supplying the place, as one of its names indicates, of the oyster, and in perfection from December till June. A brief notice of it in our pages will, we hope, draw more attention to it, and induce many to plant; and it is rather with this view that we allude to it, for its cultivation is exceedingly simple, requiring no more care than the parsnip.

The seeds should be sown in April, in rows about ten inches apart, in good light rich soil, dug very deep, so that the roots may penetrate the earth and meet with no obstruction to make them crooked. Thin out the plants to the distance of four or six inches; give due attention during the season, and keep the beds clean by occasional hoeings between the rows and by hand weeding, and the plants will make a good growth.

In October, or early in November, the roots should be taken up and housed in the cellar, precisely in the same manner as the parsnip, and may be used from time to time as needed. We have left them out all winter, as they are as hardy as the parsnip; and where there is a plentiful stock, one or two rows might remain until March or April, when the roots should be dug.

There are various methods of cooking the roots, but one of the most simple is to boil them, then mash and form them into cakes, and fry them in batter. Served in this way, they resemble a real "native" oyster, challenging even the palate of a *grand gourmand* to detect the substitute, and are an excellent accompaniment to many dishes, particularly in the country, where oysters are a rare article at all times.

An ounce or two of seed will plant a bed suitable for the wants of a small family.

ART. III. *Attempt to ascertain more correctly the species of Oxalis cultivated in our green-houses; with Observations on other species of a more hardy character.* By JOHN LEWIS RUSSELL, Professor of Botany and Vegetable Physiology to the Massachusetts Horticultural Society, &c. &c.

ALTHOUGH much has been said heretofore, and many contributions have been made to the pages of this Magazine, of value to the amateur and florist, on the subjects of this present memoir, yet a desire to add to the interest manifestly shown towards the culture of these little floral gems, has induced me to contribute the results of my inquiries towards a more pre-

cise knowledge. Aware that errors existed in their nomenclature, arising from a too prevalent habit among gardeners to attach to a species of whose name they are ignorant, some name of their own, or one which *sounds* like the correct, I was induced to look into the matter, and endeavor to ascertain those species which have fallen under my observation.

To facilitate the study of plants, the species of which are numerous, it is usual to divide them into sections, by a sort of natural arrangement, embracing individuals most nearly related to each other. I follow, in this paper, the arrangement of De Candolle, in the first volume of his *Prodromus Syst. Nat. Regni Vegetabilis*, p. 690.

§ 2. CORNICULATÆ.

Peduncles one, two, or many flowered; stems leafy, leaves trifoliolate, leaflets sessile.

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|---------------------------------|---|
| 1. <i>Oxalis stricta</i> L. | } Native in fields and by roadsides; considered as weeds, and of little beauty; flowers yellow: |
| 2. <i>Oxalis corniculata</i> L. | |

§ 3. SESSILIFOLIÆ.

Peduncles axillary, one-flowered; stems elongated, leafy; leaves trifoliolate, sessile.

3. *Oxalis rubella* Jacquin. A beautiful species, and common in our green-houses; of a lax habit, with weak long stems, pubescent, and branching frequently, bearing linear-wedge-shaped leaves, sessile, pale green, ciliate; the flowers appearing shortly after it begins to grow; peduncles quite long, each bearing a single rosy blossom, yellowish at base; a small bracte just below the calyx, liable however to some variation as to its relative distance from the calyx, owing probably to the mode of growth, by which the entire peduncle is elongated. Figured in Curtis's *Botanical Magazine*, 1031, as *Oxalis hirta* Jacquin, in which also is a remark that *O. hirta*, *rubella*, and a third species, are nearly allied. I have received it from a friend as identical with *O. hirta*, as sent from some collection in England, with that name. I am confident, however, that this is a mistake, and suspect that a species sometimes called *O. pentaphylla*, (vide this Magazine, Vol. II., p. 442,) is the genuine *O. hirta*. Indeed, from De Candolle's description, there can scarcely be any doubt of this; "floreo lilacini flavo tubo brevi." The genuine *O. pentaphylla* belongs to the section of *glandular-leaved*, while *O. rubella* and the supposed *pentaphylla* do not.

§ 5. CAPRINÆ.

Stemless; peduncles one, two, or many flowered; leaflets three, or many, stalked.

4. *Oxalis Bôwiei* Aiton., Loudon's *Hort. Britt.*, 11928. A superb species, and of easy culture, if particular care is taken to cultivate large bulbs. For excellent remarks, see pp. 295, &c. of Vol. IV., by the editor.

5. *Oxalis cœrnua* De Cand. The well known, delicately yellow-flowered species, sometimes incorrectly called *caprina*. A double or monstrous multiplex-corolled variety of this, is met with in collections, an object of curiosity rather than of beauty.

6. *Oxalis tetraphylla* Cavanilles. Leaves four, (rarely three,) obcordate, smooth; scape umbelliferous, with several flowers of a purple color. A pretty species for out-door cultivation in summer: the bulbs to be taken up at the approach of frost, and kept dry in winter. Native of Mexico. For treatment in pots, see Vol. I., p. 334 of this Magazine.

7. *Oxalis violæcea* L., Bigelow's *Plants of Boston*, &c. A little native species of delightful habits and easy culture in some rich shady situation in the garden; flowering in May and June.

8. *Oxalis Déppeii*. An abundant blooming species, with dull red flowers on long peduncles; and better adapted for the border than for pots. The only notice I have observed of it, is an incidental one in Vol. II., p. 141, of this Magazine. Country unknown.

9. *Oxalis latifolia* Kunth. Stemless; leaflets three, broad, deltoid, emarginate, bilobed; scape several-flowered, sepals obtuse, marked with a reddish glandular spot on the tips; flowers violet-colored, small. Rather pretty for out-door culture. Increases rapidly. Received in soil with plants from Cuba, by J. W. Boot, and kindly presented to me.

§ 8. ACETOSELLE.

Stemless; leaves trifoliolate, petioled; scapes one-flowered.

10. *Oxalis variabilis* var. b. *rùbra* Jacquin. This seems to be the correct name for what is usually known in green-houses, and offered for sale in seed-stores of florists, for *O. rosacæa* or *ròsea*. The veritable *O. rosacæa* belongs to an entirely different group, and has the habits of *O. rubélla*; while the true *O. ròsea* belongs to the section *Corniculatæ*, and is related to species still more distinct.

11. *Oxalis variabilis* var. c. *grandiflora* Jacquin. Similar to variety 6. Flowers large, pure white, pale yellow at base. Not common in collections, but more delicately beautiful than the last, and an excellent accompaniment to it. Received, about four years ago, from the gardens at St. Helena, and cultivated by the amateur florists in Salem.

12. *Oxalis variabilis* var. d. *Simsii* De Cand. Another variety (similar to the last,) with large white flowers. Seen in the collection of J. W. Boot, in the winter of 1840.

13. *Oxalis acetosella americana* De Cand. An elegant native species, exceedingly abundant in deep woods of New Hampshire, Maine, &c., and easily cultivated. Seen on Kearsarge Mountain, July 5th, 1840, covering the ground with profusion of flowers.

§ 9. ADENOPHYLLÆ.

Stems leafy; leaves petioled; three to five leaved linear, underneath at top bearing glands.

14. *Oxalis versicolor* L. Common in collections, and minutely beautiful, being one of the smallest species cultivated; of easy culture in the parlor or green-house, and for sale at the seed-stores.

§ 10. PALMATIFOLIÆ.

Stemless; leaves petioled, palmate, or peltate, three to five leaved; scapes one-flowered.

15. *Oxalis flabellifolia* Jacquin. Leaves singularly plicate fan-shaped before expanding; flowers yellow. A shy flowerer, and therefore in not much repute; but if kept quite dry after being potted, and before the appearance of the leaves, the flowers may be readily obtained.

DOUBTFUL SPECIES.

16. *Oxalis mauritiàna* (*Mauritius's oxalis*,) Prince's *Catalogue* of green-house plants. Leaflets in threes, obcordate, ciliate; scape rising above the leaves; flowers on large peduncles, pale lilac. A species of some beauty, and becoming naturalized in warm sheltered situations of our city gardens.

REMARKS.—*Oxalis mauritiàna* (?), *tetraphylla*, *latifolia*, and *Déppeii*, might be advantageously planted as a low border for small beds, affording a constant bloom for several months; or interspersed with *O. Bôwiei*, would look well in large patches, after the style of planting verbenas. The latter species flowers very well in the open ground towards the end of

summer; the smaller bulbs doing better by this treatment than by potting; giving an opportunity to the florist to use his entire stock of bulbs, and in selecting the stronger for the culture of the succeeding winter.

J. L. R.

Feb. 17, 1842.

ART. IV. *Some notice of a new variety of the Michigan Rose, (Rosa rubifolia.)* By AN AMATEUR.

THREE years ago, I received from Mr. Samuel Feast, of Baltimore, a small lot of roses. One of them was a seedling of our superb native, *Rosa rubifolia*, (the Detroit or Michigan rose.) The terms in which Mr. Feast mentioned it, were not such as to excite very high expectations; being, however, a variety of a species that I greatly admired, it was planted in a good situation, and its period of flowering looked forward to with some anxiety.

The first year it did nothing—gave no indications of excellence. But by the second spring, it had become well established, and then it fully vindicated its parentage—it indeed proved to be a variety of surpassing beauty.

It is distinguished, like its parent, for luxuriance of growth, and, like it, produces its flowers in large clusters. The flower is very double, and of an exquisite form, being perfectly symmetrical and deeply cupped, with petals of a camellia-like appearance. Its color is a fine pink, with slight variations of brilliancy in the flowers of the same cluster; and it possesses the property most unusual in a rose, of retaining its beauty unaffected by our scorching suns, for several days.

I have bloomed some of the best varieties of the Ayrshire, and several other fine running roses; but though they are very beautiful, this seedling is superior to any of them. Mr. Feast calls it the Beauty of the Prairies.

I have recently learned that Mr. Feast has been so fortunate as to raise four other beautiful varieties of the same species, the names and characters being as follows:—

Baltimore Belle, with blush centre, flowering in large clusters.

Perpetual Michigan; pink, changing to purple; cupped, and very double; flowering from three to four times a year.

Superba; white, with pink centre.

Pallida; white.

Mr. Feast recommends the above very highly.

Some years ago, I had the two original species, *R. rubifolia* and *R. sempervirens* var. *capreolata* (Ayrshire,) growing side by side, and was strongly impressed with the relative inferiority of the latter. I then looked forward to the time when the former should be the parent of more superb varieties of climbing roses than any that had ever yet gladdened the eyes of the amateur; but little did I imagine that my anticipations were so soon to be realized.

AN AMATEUR.

ART. V. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Botanical and Floricultural Intelligence. *New species of Rafflèsia.*—Mr. Teschemacher, in an article in the last number of the *Boston Journal of Natural History*, (Vol. IV., Part I.,) describes a new species of the *Rafflèsia*, which he proposes to call *R. manilana*. The specimens are preserved in spirit, and were received last spring from Manilla. They

were gathered in Basei, a district of the province of Leiti, on the same spot visited by Mr. Cumming for the purpose of finding this plant, during his late excursion to the Philippine Islands. The results of his tour are not yet known; and in the mean time, Mr Teschemacher proposes to call it *R. manilana*. The following is the description:—

Rafflesia manilana *Tesch.* Bud before expansion two and a half inches in diameter, arising from a cup three fourths of an inch high, formed by the thickened bark of the root of the *cissus*; the bractæ originating from the inner side of the upper edge of the cup; no appearance of reticulation under the base; disk of column convex, processes on surface eleven, one of which is in the centre, the rest arranged around it, their summits entire and hispid; lower part of the tube of perianth studded with thick glandular hairs; anthers ten, with cells and pores as in other species; no maniliform cord at base of column; sporiferous cavities not apparent; flowers examined probably male; interior of perianth covered with various forward tubercles.

A drawing of this species, copied from the specimen received, is added to the above description. It represents a section of this singular flower, as dissected by Mr. Teschemacher. The largest bud measured two and a half inches in diameter, and arises from a cup three fourths of an inch in depth. Its smaller size alone is sufficient to distinguish it from *R. Arnóldii*, which is said to have buds one foot in diameter. The genus now comprises four species, *R. Arnóldii*, *R. Pátma*, *R. Horsfiéldii*, and *R. manilana*.

Caméllia var. *Hempsteàdii*.—We lately noticed this fine variety, (Vol. VII., p. 259.) Since then, we have had the pleasure of seeing a flower which was cut from the original plant. The flower is of great beauty, and will rank among the best which have been raised. It is fully equal in its form to *Lándrethi*, (which we consider superior, as a model flower, to the double white,) but of larger size, less compact and stiff, and with a bolder petal. The centre is well crowned, and in this respect it rather excels *Lándrethi*. The color very nearly resembles *myrtifolia*, being of a clear deep rose: it comes near to *C. var. Wilderi*, both in form and color. Messrs. Ritchie & Dick, the growers of this fine seedling, have not yet offered it for sale, but will probably do so another season, when those who are desirous of possessing a collection of the very best caméllias, must include this among the number.—*Ed.*

New seedling Camellias, Azaleas, &c.—Our correspondent in Philadelphia writes us as follows, in regard to the new plants and novelties of the season:—

With regard to new plants and varieties of the season, I may mention a few that were exhibited at a late meeting of the Pennsylvania Horticultural Society. One of the finest objects was a seedling camellia, (*C. var. Chalmèrii*,) by Peter Rabbe, a neat and perfect one of the kind; it has a great deal of the character of *C. var. Fòrdii*, but much superior, lighter in color, with large shining foliage, the veins very prominent, almost to reticulation; quite distinct from any other, and forms a beautiful, bushy, and showy plant, and will be numbered as one of the best. Mr. Buist exhibited a tolerably good rose-colored seedling camellia, with a few ragged petals in the centre; he also had some seedling azaleas, and a fine seedling cineraria, I think the very best of the kind. Ritchie & Dick, I understand, have another exceedingly fine camellia this season; I have not seen it, but report speaks highly favorable of its character. Mr. McKenzie's seedling azaleas, numbering upwards of a hundred kinds, are splendid, of all colors, large in flower, and fine habits. I believe they are a cross between the *Rhododéndon* and *Azàlea*; a few of these are superior, in my opinion, to any of the varieties, except variegata, and will be an acquisition to any collection.—*An Amateur.*

New Tree Pæonies.—In our notes, a short time since, upon Mr. Wilder's plants, we stated that he had recently received ten or fifteen new tree pæonies from Germany; since then, some of them have flowered, and promise to be fine additions to this splendid family of plants. One called *rùbra plèna*, was quite superior to the old *Bánkxiæ*, being fuller in the centre of the flower, and the color deeper and richer. More of them will bloom the present month.—*Ed.*

Capparidæcæ.

CLEOME

lutea Hooker. Golden Cleome. A hardy annual; growing four feet high; with yellow flowers; appearing all summer; a native of Fort Vancouver. Bot. Reg., 1841, t. 67.
Syn. *Cleome aurea.* Torrey and Gray's *Flora.*

“A rather pretty annual” introduced from the North West Coast. It grows three or four feet high, with glabrous three to five parted leaves, and the stems terminated with large clusters of golden yellow flowers. The plants grow freely in any good strong soil, and a dry situation.

In Torrey and Gray's *Flora*, *Cleòme aúrea* is considered different from *C. lùtea*, because it is larger in all its parts, and the stamens are equal, instead of being four long and two short, with long narrow anthers. From an examination of authentic specimens, Dr. Lindley has deemed it necessary to unite the two supposed species, *C. lùtea* and *C. aúrea*. (*Bot. Reg.*, Dec.)

Onogràcœæ.

FUCHSIA

ràdicans Miers Rooting Fuchsia. A green-house shrub; growing twenty feet high; with crimson flowers; appearing in summer; a native of Brazil; grown in light rich soil; increased by cuttings. *Bot. Reg.* 1841, t. 66.

Of this new and very fine species of the fuchsia, the following account is given by Mr. Miers, who introduced it from Brazil:—

“I was greatly struck with this beautiful species, when I first met with it in the Organ Mountains, in 1829, clinging, in long festoons, from a very tall tree, and exhibiting abundance of its brilliant flowers. It was also collected by Mr. Gardner, when he first botanized in the same range; and, on my last visit to those mountains, I planted a cutting, which I succeeded in bringing home, and which, although nearly four years old, has only now shown its first blossom. The main stem has attained a length of eighteen feet, and it has many accessory branches of nearly equal length. From its handsome flowers and trailing habit, this species is likely to become a favorite ornament in green-houses, where it will flourish well; for though its native place is just within the tropics, it grows at an elevation of three thousand feet, where it experiences, during the nights of the Brazilian winter, in those regions, a temperature frequently as low as 35° to 40°.”

The old stems throw out peculiar stoloniform roots, (from whence its name,) at each axil, and occasionally also in the internodes, bursting through the bark. In this respect, Mr. Miers thinks it approaches the *F. affinis* of *St. Hiliare*. The drawing represents a branch, with elliptical acuminate leaves, and axillary flowers two inches in length, the petals deep purple, and the calyx of a rich scarlet. It produces an ovate berry, of a deep reddish purple.

This species is a free grower, and requires the same treatment as the other fuchsias. From its pendant trailing habit, it may be planted in the border of the conservatory, and trained to a pillar or trellis, where it would look well if it

flowers freely. Its habit would indicate a less abundant and early bloom than many of the other kinds, but young plants have already flowered in Birmingham. It strikes freely from cuttings. (*Bot. Reg.*, Dec.)

cordifolia *Benth.* Heart-leaved Fuchsia. A green-house plant; growing three to five feet high; with green and crimson flowers; appearing in spring; a native of Guatemala; increased by cuttings, and grown in leaf mould and loam. *Bot. Reg.*, 1841, t. 70.

The family of fuchsias has become exceedingly numerous, from the introduction of many new species, and the production of numerous new seedlings by the English florists. But notwithstanding the brilliancy of many of them, they are yet to be eclipsed by new additions from abroad. "If," says Dr. Lindley, "the woods of Mexico and Chili, now almost exhausted, have yielded us the species *thymifolia*, *microphylla*, *cylindrica*, *Lycioides*, *fulgens*, *macrostemma*, *gracilis*, and all their train of beautiful hybrids, we have still the rich store-house of the Cordilleras of Peru to investigate, from which *F. corymbiflora* only, of itself a treasure, has yet appeared." M. Hartweg, the Horticultural Society's collector, is now on his route from the Cinchona forests of Guayaquil to the untrodden mountains of Popayan, and will probably detect some new and fine species.

The *F. cordifolia* has a glabrous stem, with opposite, cordate, acuminate leaves; the flowers are tubular and pubescent, about two inches long, of a fine scarlet, the segments terminated with green, thus forming a striking contrast. The foliage is large, and "handsomer than the generality of its race." M. Hartweg found it on a volcano, ten thousand feet above the level of the sea. It will be an excellent species from which to raise hybrids, by crossing it with the *globosa* and others. Increased by cuttings, and requires the same treatment as others of the genus. (*Bot. Reg.*, Dec.)

Campanulacæ.

GLOSSOCOMIA (from a *money bag*, because of the resemblance of the flower to it.)
D. Don.

ovata *Benth.* Ovate Pouch-bell. A hardy perennial; growing a foot and a half high; with white and pink flowers; appearing in July; a native of the north of India; increased by seeds. *Bot. Reg.*, 1842, t. 3.

Syn. *Wahlenbergia Roylei* Alph. D. C.

A pretty perennial plant, growing eighteen inches high, with erect stems, and small, cordate, ovate, pubescent leaves; each shoot terminated by a single white bell-shaped flower, the inner part of the corolla veined and streaked with bright pink. The plant is of simple cultivation, requiring only a common

garden soil, and good situation, where it flowers freely in July. It is increased by seeds. (*Bot. Reg.*, Jan.)

Goodeniæ.

LESCHENAU'LTIA

biloba Lindl. Large blue Leschenaultia. A green-house plant; growing a foot high; with blue flowers; appearing all the spring; a native of Swan River; increased by cuttings; grown in peat, loam, and sand. *Bot. Reg.*, 1842, t. 2.
Syn. *Leschenaultia grandiflora* De Cand.

The great beauty of the old *Leschenaultia formosa* of our gardens, is acknowledged by all who have ever seen it: its delicate heath-like foliage, its small stature, and the profusion of its orange scarlet flowers, displayed nearly the whole year through, has rendered it a universal favorite in all choice collections. When it was announced that a species with similar habits, and with fine blue flowers, had been discovered, great interest was excited among cultivators to introduce it to British collections, for it could not fail to be as generally cultivated and admired as the *formosa*: in due time plants were procured, and they bloomed for the first time in the fall of 1840, in the collection of Messrs. Veitch & Sons, of Exeter, who obtained the large silver medal of the London Horticultural Society for the specimen exhibited. Its reputation has not been exaggerated, for few plants can "be more lovely than its deep azure flowers, on so delicate and heath-like a foliage." To describe it is only to imagine the orange scarlet flowers of the *L. formosa* to be changed into deep blue, and the *L. biloba* is before us. Dr. Lindley states that there are other species of *Leschenaultia* in Swan River, not yet introduced, "one, too, with blue flowers," called the *L. grandiflora*, which appears, from the dried specimens, to be loaded with "blossoms of a much larger size than this."

This species is as easily treated as the *formosa*, requiring the same soil, and the same situation in the green-house. Cuttings root freely in spring and summer, under a bell-glass, in a little heat. When growing, care should be taken to nip off the tops of the branches, to make the plants form compact bushes. (*Bot. Reg.*, Jan.)

Primulæ.

LYSIMACHIA.

Lobelioides Wallich Lobelia-like Loose-strife. A hardy perennial; growing one to two feet high; with white flowers; appearing from July to October; a native of India; increased by seed and division of the roots; grown in common garden soil. *Bot. Reg.*, 1842, t. 6.

A rather pretty plant, with opposite ovate leaves, and short petioles; the stem terminated by a raceme of small, white,

campanulate flowers, which, though "simple and unattractive, are very sweet scented." It is well adapted for rock-work, and light dry soils. This species was first observed by Dr. Wallich, in Nepal, in 1821, but was only recently introduced by the directors of the East India Company. (*Bot. Reg.*, Jan.)

Gesneriææ.

ACHIMENES P. Browne. (Derivation unknown.)

rosea Lindl. The rose-colored Achimenes. A green-house plant; growing a foot high; with rose-colored flowers; appearing in summer; a native of Guatemala; increased by the roots; grown in light rich soil. *Bot. Reg.*, 1841, t. 65.

The beautiful *Trevirana coccinea* is familiar to all lovers of fine plants: it was originally called *Achimenes*, a name given to the genus by Dr. Patrick Brown; afterwards L' Heritier called it *Cyrilla*, and for a long time it was known as such in British collections: but as the *Cyrilla* of Linnæus was a different plant, the name was cancelled, and Willdenow gave it the name of *Trevirana*. De Candolle, however, in his *Prodromus*, has retained the name of *Achimenes*, and as that work is universally employed by botanists, the old name must be retained, and it will be henceforth known as the *Achimenes coccinea*.

The present species is one of the "most charming plants in our gardens." It has the habit and general appearance of *A. coccinea*, blooming fully as abundantly, but the flowers are of a rich rosy hue in the place of scarlet: it is also as easy to manage. The little buds, or roots, should be potted in March or April, in light rich soil, and placed in a gentle heat; later, they may be shifted, and placed in the green-house, when the plants will bloom abundantly all summer. M. Hartweg found it in Guatemala, and it flowered for the first time in the Horticultural Society's Garden, the last summer. (*Bot. Reg.*, Dec.)

Achimenes longiflora, from the same country, has also flowered in the Horticultural Society's Garden, and is said to be more striking than the *A. rosea*: it will probably be described in a future number of the *Botanical Register*.

NIPHEA (from *snow*, in allusion to its spotless flowers.)

oblonga Lindl. Oblong Snow-wort. A hot-house plant; growing a foot or more high; with white flowers; appearing in the autumn; a native of Guatemala; increased by scaly buds or roots; grown in light rich soil. *Bot. Reg.*, 1842, t. 5.

A very pretty plant, somewhat resembling the gesnerias, though quite distinct, in its botanical character, from any of

the genera of this order. It has large, oblong, rugose, cordate leaves, deeply serrated; with a stem terminated by a cluster of its snow-white flowers. In its habits it resembles the *Achimenes rosea*. It flowers in autumn and winter, after which the stems die off, and the plant remains dormant until spring, during which period it should be kept dry. In April, the scaly buds at the base of the old stem, should be removed and potted, placing them in a little heat, and allowing them a free supply of water. In August, the plants will begin to bloom. M. Hartweg found it in Guatemala. (*Bot. Reg.*, Jan.)

Garden Memoranda.—As the season is now approaching when the operations in the open garden will commence, it may be well to give a few hints in relation to the selection of flower seeds suitable for small and choice amateur collections. From the multiplicity of annuals, it is almost impossible for one, not fully acquainted with all the prominent kinds, to secure a selection of the very best. There are some four or five hundred kinds, which are all desirable where there is a plenty of room devoted to flowers; but in more limited flower gardens, such as we generally find attached to our suburban residences, only a small number can be planted, and among them it is generally desirable to include all the new and rare sorts.

Among the older sorts, the double German asters, double balsams, rocket larkspurs, ten week stocks, *Crysæis crœcea*, *Convólulus minor*, coreopsises of various sorts, *Clárkia élegans*, *Madària élegans*, *Málope grandiflora*, crimson nasturtium, petunias, schizanthuses, sweet peas, *Hibíscus africànus*, sweet scabious, sweet sultans, and many others, some account of which we have before given, with a description of them, their height, color of the flowers, &c., (*Vol. VI.*, p. 175,) should always find a place.

The more choice new annuals are the following:—

**Phlòx Drummondii*, producing bluish, rosy, crimson, dark crimson, and rich purple blossoms, which appear all summer: **Clintònia pulchélla*, with elegant blue and white flowers, and dwarf and delicate habit: *Nolàna atriplicifolia*, with large blue and white flowers and trailing habit, very beautiful: *Erysimum Peroffskyànum*, with spikes of bright orange flowers, very showy, and highly striking from their contrast with other

colors: *Bartonia aurea*, with large golden yellow flowers, and very ornamental: *Leptosiphon densiflorus* and *androsæceus*, both elegant, with purple and white flowers: *Nemophila atomaria*, with white flowers spotted with black, and *N. insignis*, with large bright blue flowers, the latter very superb: **Eutoca viscida*, with sparkling blue flowers: **Lotus jacobæus*, with almost black flowers, and delicate foliage: *Lupinus mutabilis*, with changeable blue and white flowers: **Didiscus cæruleus*, with umbels of light blue flowers, very beautiful: *Limnithes Douglâssii*, with yellow flowers: *Enothëra Drummondii*, with large yellow flowers: **Rodânthe Manglèsii*, with lovely rosy flowers in clusters: *Sphænogyne speciosa*, with bright buff flowers, with a black mark in the centre: *Lupinus nanus*, with bright blue flowers all summer: *Papaver amænum*, with red and white flowers; *Cacalia coccinea, aurea*, new, with orange flowers; *Calandrinia discolor*, with purple flowers; *Centaurea pulchra*, with purple flowers; *Málva zebrina*, with striped flowers, very fine; *Oxyûra chrysanthemoides*, with pretty yellow flowers; **Impatiens tricôrnis*, with yellow flowers, and **granduligera*, with purple flowers; *Brachycôme iberidifolia*, with flowers varying from pale to dark violet; *Gilia tricolor*, very showy from its abundant display of purple and white flowers; *Godétia rubicunda*, with large pink blossoms all summer; **Thunbérkia alata alba*, and *aurantiaca*, the former with white and the latter with orange flowers, both superb climbers; *Helénium Douglâssii*, with handsome yellow flowers; *Godétia concinna*, with pale rosy blossoms; *Eûtoca Wrangeliàna*, with elegant violet flowers; **Anagállis Philipsii*, with brilliant azure flowers; *Collinsia heterophylla*, with spikes of beautiful white and red flowers.

All those marked thus, * may be sown in pots, early this month, and placed in a green-house, hot-bed, or frame, where they will soon make their appearance, and may be transplanted into the border in May. The others may be sown in the open ground about the middle of May, making the soil light and fine, and guarding the seeds against drought and heavy rains. If it is desirable to have them earlier, they may be sown in pots, in the same manner as recommended above, and transplanted in May to the open air; selecting places in the flower border where the plants will not be overrun with others of too vigorous growth. Water after transplanting, if the weather is dry.—*Ed.*

REVIEWS.

ART. I. *The Orchardist's Companion; a Quarterly Journal, devoted to the history, character, properties, modes of cultivation, and all other matters appertaining to the Fruits of the United States, embellished with richly colored designs of the natural size, painted from the actual fruits when in their finest condition, and represented appended to a portion of the branch, with leaves and other characteristics as seen when on the tree; also the flowers, cut fruits, and stones.* A. HOFFY, Editor and Proprietor. In quarterly numbers, quarto size, twelve plates each. Nos. 1, 2, and 3, for April, July, and October, 1841. Philadelphia: 1841.

THOUGH our notice of this new work comes rather late, we trust it will not be the less acceptable to those who will feel interested in its publication. The character of the work is so fully expressed in the title, that it is scarcely necessary for us to repeat it again; but that the editor may speak for himself in regard to the plan of the journal, we quote the following from the prefatory remarks:—

“Each number will be found to contain a *portion of two volumes*, consequently *two title-pages* are inserted in this our first number. *The first title-page, marked Vol. I.*, is intended to precede and embody the preliminaries, together with the letter-press matter, treating of the practical operations in the cultivation of fruit trees, &c.; and finally to constitute the *first volume* of this work.

“*The second title-page, marked Vol. II.*, is intended to be placed in advance of the *plates*, and their *descriptive pages*, and in due time to constitute the *second volume* of this work.

“Each portion may be readily separated, and without confusion, from the other, by unstitching the numbers, and placed appropriately and distinctly together, under the specific title-pages, when about to be formed and bound into volumes.

“Therefore, by this contradistinction, the first volume will comprehend practical matter alone, so that in the event of any of our subscribers wishing to refer simply to the operative portion of this work, they may not be interrupted by the intermixture of plates.

“On the other hand, it may oftentimes be expedient for our subscribers to have recourse only to the exemplifications or illustrations of our fruits, which, through this arrangement, they will be able to effect more readily; and in cases where it becomes a matter of business between vender and buyer of fruit trees, expedition is frequently an object of consideration, which this plan will again facilitate.

“The plates exhibiting the fruits are left unnumbered, so as to admit hereafter of being filled up in regular succession, when they will have become sufficiently numerous to be classed and placed in rotation under the specific headings. An alphabetical and explical index will accompany the last number of each volume.”

The publication of a work of this description is much wanted, and if properly conducted must become a desideratum to every cultivator of fruit. It is intended to supply the same place in the pomology of this country, which the *Pomological Magazine* of Lindley did to the English cultivators of fruits. So far, the plates have been very well drawn and richly colored, and, with the improvements which will undoubtedly be made as the work progresses, we may look for illustrations of our fruits which will be recognizable by any common observer. The work commences under the most favorable auspices. Thirty-six fruits have already been figured in the three numbers which have been issued, comprising the following kinds:—

Pears.

Williams's Bon Chrétien
 Seckel
 Yellow Butter, (St. Michael)
 Brown Beurré
 Napoleon
 Washington
 Julienne.

Peaches.

Large Rareripe
 Rodman's red Cling
 Red Cheek Melacaton
 White Rareripe
 Heath
 Early York
 Orange Cling
 Pine-apple Cling.

Cherries.

Black Tartarian
 Oxheart.

Apples.

Cart-horse
 American Pippin
 Turn-of-the-Lane
 Newton Pippin
 Codlin
 Early Harvest
 Maiden's Blush
 Hagloe
 Bevan
 Summer Pearmain.

Plums.

Mirabelle
 Market
 Washington
 Red Magnum Bonum.

Apricots.

Early
 Peach.

Strawberries.

Keen's Seedling.

The descriptions to some of the fruits, and the arrangement of the synonymes, are not so correct as we could wish

to see them; but in a new work, these may be considered as faults of omission. As soon as the work is fully established, we do not doubt the editor will secure the aid of some competent person, fully acquainted with all our fruits, to assist him in the letter-press department: this is all that is wanting, to render the *Companion* a standard work to the American pomologist.

The practical information which the editor has gathered together possesses much interest. Original articles on the cultivation of the grape vine, on transplanting fruit trees, on pruning, and on protection of peach trees from the worm, have been published, besides three articles from our pages, and other miscellaneous matter; the whole forming, when the volume is completed, a valuable work.

In conclusion, we can cordially recommend the *Orchardist's Companion* as a work richly illustrated with specimens of our best fruits, from which the amateur cultivator or the gentleman may select the choicest varieties for his garden.

ART. II. *Fourth Report of the Agriculture of Massachusetts; Counties of Franklin and Middlesex.* By HENRY COLMAN, Commissioner of the Agricultural Survey of the State. 1 large vol., 8vo., 528 pages. Boston: 1841.

MUCH do we regret that it has so early become our duty to record in our pages the opening words of the Agricultural Commissioner, that the volume at the head of this article "constitutes the fourth and last Report of the Agriculture of Massachusetts." The benefits which have been conferred upon the whole farming community, by the labors of the Commissioner, are too apparent to be a subject of remark here. The vast resources of the State have been developed—the zeal of the farmers has been aroused—their profession improved and exalted:—the dissemination of valuable informa-

tion has awakened them to the importance of new and improved modes of cultivation—and by inducing them to read and reflect, while they have been increasing the product of their farms, they have cultivated and enlightened their minds. It is not saying too much, when we affirm that the Agricultural Survey has added thousands of dollars to the Commonwealth, while a false economy, and narrow views of the importance of agricultural labors, have been the means of abolishing an office requiring only the scanty allowance of a few hundred dollars, yearly. On this head, the prefatory remarks of the Commissioner should be read by every intelligent man.

“The survey being now arrested, and, with the popular and severe notions of public economy prevailing, not likely to be renewed, it may not be unsuitable to inquire what has been done, and of what advantage to the Commonwealth has it been instrumental?

“The whole cost of the survey to the State thus far, had it been assessed upon the inhabitants, would scarcely have exceeded a tax of one cent per head; and this for the advancement of the greatest interest of the community, though in many cases the least regarded. Almost all the cost incurred in its prosecution has been expended in the State, and has not gone out of the family. Of the amount (eighteen hundred dollars per annum) paid to the Commissioner, nearly two thirds have gone to the actual expenses of the survey; such as travelling charges, payments for information procured, books distributed, seeds and implements purchased for exhibition and gratuitous distribution among the farmers, and for various incidentals growing out of the commission. The balance, varying from six to eight hundred dollars, can hardly be considered as an over-compensation for the time and labor devoted to this object.

“The next inquiry is, what has the Commissioner done in the premises? Candid minds will not fail to reflect that an Agricultural Survey was in this country a novel and altogether unattempted enterprise; that the act, by which it was established, was couched in the most general terms; and that it was left for the Commissioner himself, unaided and unadvised, without chart or pilot, to navigate an untried sea. In respect to most things in life, it is far less difficult, after they have been done, to say how they might have been better done, than before their accomplishment to say how they may be best done, or even how they may be done at all. I ask no exemption from just and honorable, though it may be severe criticism, as that, should the work be hereafter resumed, will make its execution more easy for those to whom it may be entrusted; but I may claim to have brought to the work the strongest enthusiasm and desire for its success; and to have done what I could to execute it in a creditable manner, and to meet the reasonable wishes of the State. More cannot be had from the highest talents, and it is a consolation to feel that more cannot be demanded of the most humble. A mind actuated by a generous ambition of excellence never meets its own wishes, because, in proportion to its success, its standard of duty and

attainment becomes elevated and enlarged. How can it be expected then to meet the wishes and expectations of others? It is no small gratification to me that the survey has been spoken of in terms of approbation in several parts of the country, and by those in foreign countries, whose esteem is a high honor. If among ourselves, from those whose co-operation seemed most naturally demanded, it has failed, through any motive, to receive the encouragement which it had reason to hope, it has been to me an occasion only of unfeigned regret. It is the misfortune of some minds never to look at any thing but through optics clouded or distorted by a groveling selfishness. To take enlarged and generous views of large subjects, and to merge all personal considerations in the good proposed and sought, belongs only to that small and higher class of minds who preserve their purity untainted, in an age diseased to the very core with avarice, party spirit, or personal ambition. It is sometimes extremely mortifying to learn by what influences many of the most valuable interests of the community are affected. It is sufficiently illustrative of the manner in which public business is sometimes managed, objects are brought up or objects put down, to state, that of a large committee of the Legislature, to whom the inquiry into the expediency or inexpediency of continuing the Agricultural Survey was in one case, if not in more, committed, there is good reason to think that not a single individual of the committee, who objected to its continuance, had ever seen either of the three Reports of the Commissioner, or, in fact, knew what had been done."

We would that our pages would allow us to give a larger extract, for the views of the Commissioner in relation to the improvement of agriculture are our own views; and we wish to have them published far and wide, that all may learn how important it is for the State to foster and encourage a subject of such vital interest.

The Report commences with the county of Franklin, giving an account of the crops—the dairy—live stock—reports of farms—silk culture, &c. This is followed by the county of Middlesex, of which a similar description of the crops and products and agricultural improvements is given. Among the accounts of particular farms, we find that of J. P. Cushing, Esq.; and some excellent hints on the making of manure are given by Mr. Haggerston, the intelligent foreman of the place. Among others, is that of Mr. George Pierce, an extensive market gardener; and in order to give our readers some idea of the extent of this branch of gardening around Boston, we copy the report entire.

"George Pierce, whom I have already named, has a home lot of little more than seven acres which he cultivates, in the same favored district of which I have been speaking. Besides this, he sometimes

extends his cultivation by hiring occasionally small lots in his neighborhood.

"The extent of his out-lots is not given; but it may be inferred from the fact that for one of them he pays an annual rent of 35 dollars; for the other piece 40 dollars.

"The amount of sales from the whole three within the year thus far, is \$3428 54. The amount of sales from his home lot of seven acres is \$2675 54. The amount paid for labor on the whole up to this date (27th Nov., 1841,) is \$499 99, without including the expense of board of the men. This, I presume, does not embrace any charge for his own labor and supervision and marketing. The bills paid since the last spring for manure amount to \$224 75; but he thinks the whole used has amounted to twice that sum.

"His particular aim is to raise fruit and vegetables for the market, such as apples, peaches, strawberries, raspberries; and lettuce, radishes, spinach, and other greens, early cabbage, cucumbers, squashes, melons of various kinds, cauliflower, brocoli, beets, carrots, turnips, peas, beans, onions, &c., all of which are profitable crops, when he is successful in growing them.

"He plants little of corn and potatoes, as he thinks he can use the ground to much better advantage. Some of his most productive crops the present season have been fall-sowed onions, from a piece of land 3 rods in width and 8 rods in length, which gave him 167 dollars. Another profitable crop was saba, or, as they are sometimes called, seve beans. There were 1248 hills, which, on the first picking, yielded 38 dollars. The yield, according to the account kept, amounted to 70 dollars, when, having lost his minutes, he was unable to ascertain the entire amount. Of string beans he had the last season two acres. From this lot it was not unusual to carry ten barrels in a day to market. In two weeks he carried to market from this lot 172 bushels, the average price of which was 67 cents per bushel, or \$115 24. At the same time this ground was occupied with other crops, such as melons, tomatoes, cauliflowers, cabbages, &c. As soon as the beans had ceased to bear, the vines were immediately removed, and the ground being well cultivated, there was ample room and time for the other crops to grow. Many of his early vegetables are forwarded in hot-beds under glass. On most of the ground which he cultivates, he gets from two to four crops. A crop of radishes, lettuce, beans, and cucumbers may be had on the same ground the same season; and to these a fifth crop, fall spinach, is sometimes added. In the past season he says he has had crops, which, by the old modes of husbandry, would have occupied ten acres, growing upon four acres.

"His practice is for the first crop to give such a dressing of manure as will carry that and the succeeding crops well through without renewal. He never manures sparingly.

"His onions are sowed in July or the first of August. They are lightly covered with litter in the fall, and early in the spring are uncovered and become soon fit for the market; and the crop is off the ground in season for its successor.

"Mr. Pierce values very highly stable manure, and wishes to apply it to his crops in its hottest state. It then forces vegetation most rap-

idly and powerfully. He has seen the powerful effects of night-soil more than five years after its application; but it was in this case applied liberally; and it must never be used without composting. For ashes he has a high estimation, and when the soap-boiler calls to buy *his* ashes for the customary price of ten cents a bushel, he replies by offering the soap-boiler twenty cents a bushel for all *he* has, and buys them, if he can. I give his opinions as those of a strictly practical man, of much experience, and perhaps inferior to none in the admirable skill and success of his cultivation. It is pretty evident that he does not wait in the morning for the sun to call him.

“In referring to these extraordinary results, it would be idle to think that they are reached without skill, judgment, energy, perseverance, and toil. But it is a skill which sharpens the wits; and a toil, if not excessive, which quickens the appetite, and strengthens the muscles, and keeps off idle dreams. The earth is a good paymaster; but it does not acknowledge any obligations to those to whom it owes nothing.”

The remarks on Orchards are interesting, and some excellent hints are included: with this extract we shall conclude our notice of the *Report*; not, however, without recording our opinion that it is one of the most plain, concise, and truly valuable contributions to our agricultural literature that has yet been made.

Mr. Colman has left us, to reside in another State, but he carries with him the best wishes of every friend of agricultural improvement, for his future health and prosperity.

“The cultivation of apples in Middlesex county is carried on to a large extent, and might be increased with great advantage. Great pains are taken to produce the very best engrafted fruit, especially for winter, and among these, the Baldwin apple and the golden russet are in most esteem. The Porter apple, which is an early autumnal fruit, is greatly valued. It would be out of my province to go largely into this subject. The amount of sales, however, from some of the farms in the county are quite large. A farmer in Waltham is accustomed to put up for market, from 500 to 700 barrels. On a farm in Woburn, which has been almost created by the labor of its present proprietor, now in a green old age, enjoying the fruits of his indomitable industry, the sales of apples the year before the last amounted to 1200 dollars. There are other farms where the product in fruit is greater than here, but as I have not the precise accounts, I do not state them. These results may surprise many of the farmers in the interior. I hope they will surprise them into the imitation of such industry and enterprise. To many of the farmers in the interior, the extension of the railroads will afford, in this matter and in many others, an opportunity of coming into equal competition with the farmers in the immediate vicinity of the capital. There are new reasons for the cultivation of apples since their value for the feeding of swine and cattle has been discovered. If they

are only half as valuable as potatoes, and many farmers deem them of equal value for this purpose, the ease with which they are raised strongly recommends their cultivation.

"There are many orchards in Middlesex of large extent and in excellent condition. Two were some time since the subjects of premium from the Massachusetts Agricultural Society. The one belonging to Nahum Hardy, of Waltham, who reclaimed eight acres of land from a wild and rude state, and planted it with 500 apple trees, all engrafted fruit; the other of E. Phinney, of Lexington, who brought a rough piece of land into a suitable condition, and planted it with 400 trees. Both these farmers have extended their cultivation since that time, and the admirable condition of their trees evinces the skill and care of their management. The product of the orchard of the latter makes a large item in the returns of his farm. He has more than a thousand trees in bearing.

"Mr. Phinney saved some of his trees a few years since, by a process which is worth recording. They had been completely girdled near the ground in the winter by the mice, who had eaten the bark round to a width of two or three inches or more. By cutting scions, and inserting the ends of several of them in the spring round the tree, under the bark, above and below the injury, so as to form a communication for the sap, the injured parts have begun to grow together, the whole wound may ultimately be covered, and the tree live and flourish. To most persons, after the injury their situation would have seemed desperate. Mr. Phinney avoids planting his trees deep; but cultivates them as near the surface as he can, and at the same time sufficiently to cover the roots.

"John Welles, whose farm is in Natick, in this county, and than whom few men among us have given more attention to the subject of fruit and forest trees, considers the ordinary life of apple trees about sixty years; but it would be desirable to replace them soon after their decline commences. The situation most favorable to an orchard is a sheltered situation with a moist soil. He succeeded in producing a valuable growth of trees on a light and unfriendly soil, by making a hole for planting four feet square; after removing about a foot of the top soil, which was to be returned round the tree, taking out the hard pan at bottom to a sufficient depth to deposit in it a load of stones, and then sprinkling some mould on the stones and planting his tree. The stones served to preserve moisture for the roots, and gave likewise in their interstices room for the roots to extend themselves. No farmer need complain that his land is not suitable for an orchard; because he may make it suitable, at an expense which the fruit of the tree, after it comes in bearing, will soon compensate.

"James Cutter, of Weston, has been remarkably successful in transplanting trees of more than ordinary size. He has removed pear trees of eight and ten inches in diameter. His practice is to clean the dirt entirely from the roots of the tree; to cut off all the roots, at a distance of four or five feet from the tree; and to put no manure in the hole."

MISCELLANEOUS INTELLIGENCE.

ART. I. Domestic Notices.

Horticulture in Philadelphia.—The progress of horticulture in our city is onward; the new Horticultural Society is increasing rapidly, so that we have upwards of eight hundred members, ladies and gentlemen, and increasing monthly. We have taken that large room lately occupied by the Chinese Museum, so that we have ample space for our monthly meetings, as well as our annual exhibitions. Last Tuesday was the first meeting held there, which was filled with the beauty and fashion of the city. Great credit is due to our practical gardeners for the taste displayed in the arrangement of the tables, comprising a great many beautiful and valuable flowers. Mr. Robert Buist had some fine large hybrid rhododendrons, camellias and azaleas. Mr. Peter Mackenzie had a fine show of camellias and twenty seedling varieties of azaleas of the finest kinds. Mr. Pepper's table of camellias was very fine, and justly gained the first prize. Mr. John Sherwood had some fine camellias; we noticed a very large and fine specimen of *C. Fløyii*. Landreth & Fulton had some fine specimens of camellia. Robert Kilvington had some fine plants of various kinds. Ritchie & Dick had some large specimens of camellias; we noticed a very fine flower on the last year's seedling camellia, (*C. var. Hempsteadii*), much improved from what we saw it at first. Alexander Parker likewise contributed largely to the exhibition of the evening.—*Yours, An Amateur, March, 1842.*

The Angora Pear.—There is a pear in the French *Catalogues* very highly praised for its great size and beauty; it is called by the French nurserymen the Angora. I have received letters from several persons in New York and Pennsylvania, requesting to know if I had any knowledge of this pear. Will you please say in your next, that I received a tree of this kind from France, and proved it to be the Catillac; which still continues to be sold by the French nurserymen as the Forty-Ounce pear.—*Respectfully yours, Robert Manning, Salem, March 8, 1842.*

Specimen pears.—Some of the specimens sent you last fall were sent after many selections had been made, always of the largest fruits, which accounts for some of your figures being so small. In describing the new pears, I should have said, that they grew on very poor land, and are not more than half the size they would obtain in rich soil.—*Id.*

Horticulture in Kentucky.—A taste for horticulture is fast taking hold here in the West, and, though very far behind our eastern and northern friends, yet by their aid and example we hope to make great progress. I have been for several years improving my residence with all the hardy ornamental shrubs and trees, that I thought would suit our climate, and have now one among the best private collections in this region, (of course always excepting a few in Louisville.) Yet when I remember all I saw on a visit to your city and other Atlantic cities, in the summer and fall of 1838, I am almost ashamed to mention my scanty collection; yet all things must have a beginning is my encouragement.—*E. D. H., Feb. 23, 1842.*

ART. II. *Retrospective Criticism.*

The Linnæan Botanic Garden and Nurseries, (p. 109.)—I notice, in the last number of the *Magazine of Horticulture*, a communication from the Messrs. Prince, in relation to the *Linnæan Botanic Garden and Nursery*, Flushing, to which is subjoined an editorial note, from which latter it would appear that such communication was inserted under the impression that it was in justice due to Messrs. Prince to correct a supposed error you had fallen into. I presume that when you are apprised of the true state of facts, the like sense of justice to the present proprietors of that establishment will induce you to make a further correction. It has hardly been deemed expedient to notice at all, either in Flushing or New York, the misrepresentations of William R. Prince, the inditer of that communication, the facts and himself being too well known in this vicinity, to render it necessary: but abroad, it may be otherwise. I beg leave, therefore, through your columns, to correct the most material misrepresentations in that communication; and would also, in the first place, advert to a trifling error which you yourself have inadvertently fallen into, to wit, that you supposed, from Mr. Garretson's circular, that *he* had become the *proprietor* of the premises, whereas he merely announces himself as the *conductor* of the establishment for the *new* proprietors. With regard to the *communication*, the facts are these:—The premises designated in Mr. Garretson's circular as the "Linnæan Botanic Garden and Nursery," are the *identical extensive* premises whereon William Prince, Sen. resided for forty-five years; which, during that period, were cultivated by himself, or by himself and sons, as a nursery, and to which, *exclusively*, some forty years since, he gave the name by which it has ever since been designated; he at that time, and for thirty years afterwards, neither owning nor cultivating any other land in Flushing. Some years since, he purchased about seven acres, upon which his father had established a small nursery before the Revolution, but which has not been used for that purpose for several years past, (a considerable portion having been sold for building lots,) except to propagate *Morus multicaulis*, and to which Mr. Prince, Sen. lately removed. About twelve years since, William R. Prince purchased for his residence a house and about fifty acres of ground, adjoining, in the rear of the Linnæan Garden, about half of which was used for Nursery purposes; and four years since, Mr. Prince, Sen. purchased a tract some distance from the Linnæan Garden, as an appendage thereto. Now I would ask, whether the *deception, fraud, and imposition* consist in retaining the name by which this ancient nursery has been distinguished for forty years, which nursery contains within itself the variety of trees, &c. specified in the catalogues, and exclusively so all that are rare, and *all* the green-houses and conservatories—or, in the attempt to transfer such name to three detached pieces of ground, containing, altogether, not one tenth part of the variety embraced in the catalogue issued in imitation of that of the present proprietors of the tract so long designated as the Lin-

nean Botanic Garden and Nursery. As to streets being cut through the nursery, and the same being laid out into lots, thereby intending that it should be inferred that the nursery had been destroyed, a street or avenue for the comparatively short distance of about two hundred and fifty feet only, has been opened into the nursery, on the sides of which are the green-houses, conservatories, and nursery offices, some recently erected: and one other street, to the like extent only, between the nursery and adjoining lands, each contributing part, upon which it is purposed to erect cottages for the workmen; and which streets afford convenient and ornamental avenues to the nursery, being planted with specimen ornamental trees of various kinds. Not a fruit tree was removed from these premises by the Messrs. Prince, except for regular sales. The Linnæan Garden and Nursery, having been sold under a foreclosure of mortgage thereon, and all the rest having been sold under judgments, the Messrs. Prince retain merely temporary possession, they being now enjoined by the Court of Chancery from removing any trees, &c. therefrom. In conclusion, I would add, that Mr. Garretson does not pretend to be agent for the Messrs. Prince, and disclaims all connection with them; and that the present proprietors of the *old* and *real* Linnæan Botanic Garden and Nursery, intend not only to continue the establishment, but to spare no pains or expense to maintain its ancient celebrity for its unrivalled collection of trees, shrubs, plants, &c., and to add to the collection.—*Gabriel Winter, Flushing, March 15, 1842.*

[Our correspondent will perceive that we have omitted one or two lines, which have no bearing upon the question at issue, and the insertion of which would have done no good.

It was no more than justice that we should allow Mr. Prince to correct any error of ours in relation to his own affairs; and if, in so doing, he has made statements which are not true in reference to Mr. Winter, it is no more than equal justice that we should allow Mr. Winter room to reply. Each of them having made their statements, the public can judge of their correctness. We do not wish to make our pages a vehicle of personal altercation between any parties, as the room can be more profitably occupied, and shall therefore not give place to any further communications on this subject. Our *advertising* pages are open to all; and if Messrs. Prince or Mr. Winter wish to make use of them, they can do so to any length they please, on the usual terms.—*Ed.*]

The wrong name.—(Mr. Manning's communication, p. 56.)—Mr. Hovey:—I am not much of a horticulturist, but I always read your Magazine with interest and pleasure. I was much pleased with the cuts of the outlines of new pears fruited by Mr. Manning, in your February number: this simple mode of delineating pears, I think, is very excellent, as it conveys to the eye a good idea of the shape and size of the fruit. The difference in color is not so great in pears as it is in apples. By a representation of the shape, as exhibited in an outline, we obtain nearly as much to aid us in discriminating between different varieties, as we should were the engravings shaded, colored, and finished off at great expense. We have one word of fault, however, to find with Mr. Manning, in regard to the *name* of one of the pears described in his communication, viz., the "Beurré Pre-

ble." He observes that this pear was raised from seed by Elijah Cooke, of Raymond, Me., from whom he received the grafts. Why then, did he not call it Beurré Cooke?

We have nothing to say against the name itself, for the name of Preble is an honor to Maine and to the nation; it has become a "part and parcel" of our history, and I would be the last man to pluck a single leaf from the laurels which the Commodore gained by his valor. But really, I do not see any good reason for attaching a hero's name to a pear, while the real person, to whose industry in the delightful and peaceful pursuits of pomology we are indebted for the production of this new fruit, is passed almost silently by. I move, sir, to amend, by striking out "Preble," and inserting "Cooke," and call for the yeas and nays.—*Very respectfully, yours, E. Holmes, Winthrop, Me., March, 1842.*

Clairmont Nursery, near Baltimore, (p. 11.)—Respected Friends: In your useful and interesting Magazine for January last, in speaking of some valuable fruits I cultivate, you observe I only have about two hundred varieties altogether. To many people, I thought it would rather convey the idea that the value of a nursery depended on the extent or number of the varieties cultivated in it. This, I have long thought, was wrong; thereby increasing the care of the nurseryman, and his difficulty of keeping all correct, and puzzling customers to make a good selection; and in order to be sure of getting the best, they will frequently take one tree of each sort, thereby increasing the nurseryman's trouble to fill the order; and when their trees come into bearing, many will be of secondary quality, and those that prove good they have not enough of to take to market, or for their own use, and if they are apples or pears to be stored for winter, it would seem to require a separate place for the product of each tree. We know that all the various wants of a family can be supplied, both summer, fall, and winter, with ten to fifteen varieties of apple, peach, and pear trees, and fewer of other fruits will be sufficient. We possess information enough from our own and European experience, to make such a selection, thereby rendering the culture and the use of fruits less troublesome. With this view, I have made it my study to collect the very best, and confine my catalogue within moderate bounds, and cultivate largely of known superior varieties; and those only I send to my customers who confide to my selection, and in portions to suit the wants of the various seasons of the year. I am aware that Lindley, Mackintosh, and other European writers, inform us of nurserymen having three hundred varieties of apple, and other fruits in proportion; yet, in my opinion, this is no justification for us. I approve of nurserymen increasing their specimen standard fruit trees to a great extent, in order to test the relative value of fruits, thereby enabling them to select the best, and thus restrict the cultivation of trees to a reasonable extent of known best varieties. I have been planting standard fruit trees for about forty years, which has afforded me some useful experience, and I am decidedly of the opinion that it is for the interest of every person who plants an orchard, to have it composed of as few varieties as will supply fully the wants of his family summer, fall, and winter, and if for market, have a full supply to ripen in regular suc-

cession, thereby requiring a regular and uniform number of hands to gather and market the fruit.

Now, my friends, I would not be understood to be finding fault with your remarks as noted above, well knowing that it is customary in England, and also in this country, with some nurserymen, to swell out a large catalogue of fruits, and I have long thought it my duty to publish my opinion on this subject; and your remarks reminded me of it.—*Your friend, Rob't Sinclair, Clairmont Nursery, near Baltimore, March, 1842.*

Hybridizing Camellias with the pollen of different varieties, (p. 42.)—I saw a statement made in some of the late numbers of your Magazine, relative to the hybridization of camellias in the mode that was adopted by John B. Smith, by mixing the pollen of various kinds before applying them to the pistil: you likewise recommended a trial of it, as Mr. Smith has been so successful in raising the best that have yet been produced. Now, sir, I disagree entirely with the above method: we know that the pistil, at a certain time, is in that state to attract and absorb the pollen, and that the pollen is likewise in the same state; but we are not certain at what precise time they are fit to be applied; besides, the mixing of different kinds of pollen is more apt to destroy its fecundity, than when applied singly. It is a mere assumption to say, or even think, that the pistil is capable of absorbing various kinds of pollens at once; if we were to reason from analogy, we would assume the reverse. In my opinion, it will be found the best to apply each kind of pollen by itself. Let me not be misunderstood that I do not recommend applying various kinds of pollen; it is only individually that I contend they ought to be used. If only one kind and one application was made, it is nine chances to ten that the stigma would not be impregnated at all. Apply different kinds frequently; in case one may miss, another may take, along with a well ventilated house and a clear day: then your chances are good; otherwise it is labor wasted. Our climate, I think, is much better for maturing the seed, at least we should judge so from the splendid specimens which have already been produced, on such a short trial. Nothing has yet been raised, or perhaps ever can be, better than Smith's *Binneyii*. If you had sat down and wished what a flower should be, in every perfection, you there find it; even *Lândrethi* few or none can beat; likewise *Prattii*, besides many others. Even the *C. var. Chalmèri* will not soon be surpassed. In this vicinity, the march is onward: let every one exert himself, that he may contribute something to the many fine hybrids of various kinds that have been raised in our country, so that we may not send abroad for new varieties.—*An Amateur, Philadelphia, March, 1842.*

The Gout Morceau Pear.—On what authority have the Committee who prepared and superintended the publication of the *Proceedings of the Massachusetts Horticultural Society* for 1839, 1840, and 1841, altered the commonly known name of this pear, and called it the Gout Morceau? The chairman of that committee would confer a great favor by giving his authority for so doing, and much oblige one who has always considered the authority of the London Horticultural Society sufficient to establish the name of any fruit.—*A Fruit Grower, March, 1842.*

ART. III. *Massachusetts Horticultural Society.*

Saturday, March 5th.—An adjourned meeting of the Society was held to-day,—the President in the chair.

The Executive Committee presented the names of Gen. H. A. S. Dearborn and the Hon. Edward Everett as honorary members, and they were unanimously admitted.

Mr. C. M. Hovey, Chairman of the Flower Committee, submitted a report, awarding the Society's premium of one hundred and twenty dollars for the destruction of the rose slug, to Mr. D. Haggerston, gardener to J. P. Cushing, Esq., whose letter was read to the Society last June. The report was accepted.

Exhibited.—Flowers: From J. L. L. F. Warren, cut flowers of *Azàlea indica phœnicea*, and *A. ledifolia*, *Ròsa multiflora*, and the following kinds—undulata, yellow tea, and a variety erroneously called the *Grevilleii*; also, *Cinerària marítima* and the var. King, variegated stock, verbenas, quilled asters, geraniums, &c.

Adjourned three weeks, to March 26th.

March 26th.—An adjourned meeting,—the President in the chair.

Mr. Vose read a letter from M. Tougard, President of the Horticultural Society of Rouen, France, acknowledging the receipt of a letter, informing him of his admission as an honorary member of the Society. Mr. Vose was requested, by a vote of the Society, to translate the same for publication. Accompanying M. Tougard's letter, Mr. Vose laid before the Society several pamphlets, containing the *Proceedings* of the Horticultural Society of Rouen, since its organization. The Library Committee were instructed to take charge of them.

Mr. Walker, from the Chairman of the Printing Committee, laid before the Society the pamphlet containing the *Proceedings of the Massachusetts Horticultural Society* for 1839, 1840, and 1841, which had been prepared under their direction, for distribution among the members. The thanks of the Society were voted to the committee, for the acceptable manner in which they had performed their duties.

Accompanying the Report, the Committee presented a circular, also printed under their direction, containing the communications read before the Society upon the destruction of the curculio. They were laid upon the table for distribution.

It was voted, that the Corresponding Secretary transmit a copy of the *Proceedings of the Society* to all the honorary and corresponding members, so far as it was practicable to do so; and that the Treasurer also furnish each subscription and life member with a copy of the same.

Exhibited.—Fruit: From J. L. L. F. Warren, apples called Warren's Spice, a new seedling variety.

Meeting dissolved.

[The official year for 1842 commences the first Saturday in April, when the officers elected in October last will enter upon their duties.]

ART. V. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>		From	To	<i>Pot and Sweet Herbs.</i>		From	To
		\$ cts.	\$ cts.			\$ cts.	¢ cts.
Potatoes:				Parsley, per half peck,	37½	—	
Chenangoes, } per barrel,	1 00	1 25		Sage, per pound,	17	20	
Eastports, } per barrel,	2 00	2 25		Marjorum, per bunch,	6	12½	
Common, } per barrel,	1 00	—		Savory, per bunch,	6	12½	
Sweet potatoes, per bushel,	1 50	—		Spearmint, per bunch,	3	—	
Turnips, per bushel:				<i>Squashes and Pumpkins.</i>			
Common,	37½	50		Squashes, per pound:			
Ruta Baga,	37½	50		Canada Crookneck,	5	6	
French,	37½	50		Autumnal Marrow,	6	—	
New, per bunch,	25	—		Winter Crookneck,	4	6	
Onions:				West Indies,	3	4	
Red, per bunch,	4	5		Pumpkins, each,	12½	20	
White, per bunch,	4	5		<i>Fruits.</i>			
White, per bushel,	—	—		Apples, dessert:			
Yellow, per bushel,	1 00	1 25		Paldwins, per barrel,	3 50	4 00	
Beets, per bushel,	75	—		Russets, per barrel,	2 75	3 00	
Carrots, per bushel,	62½	—		Greenings, per barrel,	2 50	3 00	
Parsnips, per bushel,	75	—		New York pippins, per bbl.	3 00	3 50	
Salsify, per dozen roots,	25	—		Common, per barrel,	2 00	2 50	
Radishes, per bunch,	8	12½		Pippins, per bushel,	1 00	1 25	
Shallots, per pound,	20	—		Sweet, per bushel,	1 25	1 50	
Garlic, per pound,	12½	—		Dried apples, per pound,	4	5	
Horseradish, per pound	10	12½		Pears, per dozen:			
<i>Cabbages, Salads, &c.</i>				Chaumontel,	25	50	
Cabbages, per doz:				Baking, per bushel,	2 00	2 50	
Savoy,	75	1 00		Cranberries, per bushel,	2 00	2 50	
Drumhead,	75	1 00		Grapes per pound:			
Red Dutch,	75	1 00		Malaga, (white),	20	25	
Brocoli, each,	—	—		Pine-apples, each,	25	50	
Cauliflowers, each,	12½	25		Cucumbers, each,	25	—	
Lettuce, per head,	8	12½		Water-melons, each,	25	50	
Spinach, per peck,	25	37½		Lemons, per dozen,	17	20	
Dandelions, per peck,	25	37½		Shaddocks, each,	12½	—	
Turnip tops, per peck,	37½	—		Oranges, per doz:			
Rhubarb, per pound,	12½	—		Havana,	37½	50	
Celery, per root:				Sicily,	20	25	
Giant,	10	12½		Walnuts, per bushel,	1 25	1 50	
Common,	6	8		Chestnuts, per bushel,	2 00	—	
Cucumbers, (pickled) pr gal.	25	—		Butternuts, per bushel,	1 00	—	
Peppers, (pickled,) per gallon	37½	—		Almonds, per pound,	14	15	
				Castana, per pound,	—	—	
				Cocoa nuts,	3	4	

REMARKS.—The season has continued unusually pleasant, and March has appeared much like April, the thermometer having risen, one day, as high as 74° in the shade. During the last week, there has been a slight change, and a light fall of snow was experienced a day or two ago; but at the time we now write, it is nearly gone. Vegetation is much more forward than last year, and unless the early part of April should be cool, fruit trees will be in blossom by the middle of that month.

Vegetables.—Potatoes have continued heavy, and prices tending downwards, until they have fallen to very low rates: the stock is now abundant. Sweet potatoes yet remain in good order, and at reasonable prices. Onions are scarcer: Whites are entirely gone, and but few good reds in bunches are to be had: the stock is composed of yellow, of which there is a limited supply of exceedingly fine quality. Radishes now come in abundant and good. Cabbages are about gone. For the last week or two, no Brocolis or cauliflowers have come to hand, and the season for them is about over. Lettuce is now large and good. Spinach and dandelions, from the open weather, has been very abundant; the present cooler weather has prevented so full a supply. Celery is about gone. Rhubarb has made its appearance the present week, from the green-houses in the vicinity, and now commands our prices; it is quite early for so good an article as has been sold: small lots only come to hand. Squashes are scarce, with the exception of West India, of which there is a fair supply.

Fruit.—In fruit there has been no change; every thing continues dull: apples, well picked, command no higher prices than they did last month; the stock is now mostly reduced to Baldwins and russets. Pears, with the exception of baking, are all gone, and the stock of the latter is not large. Cranberries remain the same, with a moderate stock. A few grapes yet remain, but in poor order. A few cucumbers were brought in the last week, and sold at our quotations; but there is no supply yet. Of pine-apples there are but a few in the market. Oranges and lemons are plentiful, with fresh arrivals every week or two. Nuts remain without any alteration worth mentioning.—*M. T., March 28th, 1842.*

HORTICULTURAL MEMORANDA

FOR APRIL.

FRUIT DEPARTMENT.

Grape vines will now be in full leaf, and show their clusters of flower-buds: the new shoots intended for bearing wood another year should be tied up to the trellis. Give due quantities of air till the buds begin to open, when the temperature should be raised, and syringing dispensed with till the fruit has set; the floor and the flue may be occasionally sprinkled to raise a fine dew, and this should be done immediately after the house is closed, early in the afternoon. Vines may be grafted now if it is desirable to change any particular fruit. Vines in the open air should be uncovered early this month, and such as have not been pruned should be omitted no longer.

Raspberry beds may be uncovered now, and new plantations made if wanted.

Gooseberry and Currant bushes may now be removed with safety.

Grafting may be performed this month with perfect success.

Fruit trees, of all kinds, may be safely removed this month, if the work is properly done: if dry weather ensues, the trees should be carefully watered. Pruning old trees should be completed this month.

New Strawberry beds may be made this month, and old ones may be renovated by a top dressing of very rotten manure.

New plantations of Rhubarb should be made this month.

FLOWER DEPARTMENT.

Dahlias will now be objects of more care, as the season approaches for planting. Pot such roots as are wanted for flowering early, and when the eyes are swelled so as to become prominent, the roots may be separated with one shoot to each, and placed in small pots. Sow the seeds now for producing new sorts.

Calceolarias should be repotted now, being careful to give a good drainage.

Verbenas should again be shifted, if fine large thrifty plants are wanted.

Pansies, sown in pots last month, may be planted out in beds in the open garden, making the soil rich and good. Make another sowing of seed in the open air for a succession.

Roses will need repotting now: give good supplies of water, and syringe freely over the foliage.

Amaryllises, Gladioluses, Tuberoses, &c. may be planted this month in pots, or, if mild weather, in the open garden.

Camellias will now be completing their growth and forming their flower-buds. Water freely at the roots, and syringe over the foliage. Inarching may be yet performed.

Carnations wintered in frames may now be turned out of the pots into the flower border.

Tulip and hyacinth beds should have the soil carefully loosened between the rows.

Annual seeds sown in pots, as recommended in February, may be planted out in the open garden the latter part of the month, unless the weather is cold. Hardy kinds, such as the rocket larkspur, &c., should be sown immediately in beds or in the border.

Chrysanthemums may be propagated now by separating the roots; and placing one sucker in each pot.

Ericas will need attention; water liberally, and syringe occasionally over the foliage; continue to propagate by cuttings.

Cactuses will now be blooming, and must receive good supplies of water.

Perennial plants, of all kinds, may be successfully removed any time during the month.

Pæonies may be removed this month, if done early.

Hardy Roses should be removed in April, and the old plants well pruned.

Oxailses, Ixias, &c., done flowering, should be sparingly watered.

THE MAGAZINE
OF
HORTICULTURE.

MAY, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *Pomological Notices; or Notices respecting new and superior varieties of Fruits, worthy of general cultivation.* By the EDITOR.

IN our last volume, (VII., p. 284,) we gave an account of several new fruits recently introduced into notice abroad. Since then, most or all of those that had not previously been added to our collections, have been introduced, and but a short period will elapse before we shall have the opportunity of giving a better account of them than the mere reports of foreign publications. The influence of our climate may change the character of a variety, and make it better or poorer; and it is only after an actual test of the fruit they produce, that we can speak confidently of a new variety, or ascertain its full value to the American cultivator. Yet, in the absence of such information, we may surely recommend a trial of all new fruits which have been pronounced valuable by foreign cultivators of eminence, in order that their merits may be at once tested, and all doubts respecting their excellence set at rest.

In England, owing to the unintentional mistakes made by the late Mr. Knight, or rather, by his gardener, the scions of some of the new seedling pears which he was successful in raising, were distributed under the wrong names, and it was not until the autumn of 1840, even in the garden of the London Horticultural Society, that the true variety of one of his pears was discovered; this was the Monarch, a first rate fruit. Another of his pears, called the Dunmore, has not been fully proved until within a year or two; it ranks as a first rate fruit. We

shall refer to both of them again in the course of our remarks.

In the fall and winter of 1840—41, Mr. W. Kenrick, author of the *American Orchardist*, made a visit to England and France, and on his return, published the third edition of his work. To this edition, he added a brief description of several new kinds of pears and other fruits, which have recently been brought into notice in France, and which were recommended to him by M. Dalbret, superintendent of the compartment of fruits in the Garden of Plants, at Paris, and Mr. Jamin, nurseryman. We shall notice most of these, as well as others described in the *Bon Jardinier* for 1841 and for 1842, as new and fine kinds.

New additions are constantly making to all our varieties of fruit, and among our amateur cultivators and nurserymen, as well as those abroad, many superior kinds have been lately raised. It will be our endeavor, either at the present time, or in another paper, to notice all the most remarkable of these, that our readers may make trial of them, and ascertain their value in comparison with the well known and commonly cultivated varieties. Our present notices will be wholly confined to new pears.

The Dunmore Pear.—This is one of the late T. A. Knight's seedlings, raised as long since as 1823, and described by him in the second series of the *Transactions* of the London Horticultural Society; but its fruit has not been fully known until its recent production in the garden of the Horticultural Society, where it has proved to be a first rate variety. Mr. Thompson, the intelligent cultivator of the fruit department, has given the following description of it in the *Gardener's Chronicle*:—

“This variety is highly deserving of notice, not only for its intrinsic excellence, but also on account of such a fruit being wanted to come in for use between Williams's Bon Chrétien and the Marie Louise, when there is a scarcity of large and good pears. It has borne fruit in the garden of the Horticultural Society, where it grows vigorously as a standard, producing fruit between four and five inches in length, and three inches in diameter, of an oblong or ovate form; eye small, open, in a shallow depression; stalk from an inch to an inch and a half in length, of medium thickness, somewhat fleshy at its junction with the fruit, which is oblique; skin

brownish red next the sun, yellowish, with a speckling of brown, when shaded, and sometimes a considerable portion is covered with a brown russet; flesh yellowish white, melting, of a beurré consistence, and rich flavor, even in the present not most favorable season," [1841.] Mr. Thompson thinks it is as large as the brown Beurré, and he has never tasted the last named sort better than the Dunmore: when it has remained to ripen and grow yellow upon the tree, he has thought it the most melting pear of its early season. Grafts of it, which were inserted into stocks only two years ago, afforded an abundant blossom, and bore fruit last season, though the weather, last spring, was quite unfavorable, and destroyed the blossoms of the more delicate varieties. The trees are of rapid growth, and the variety appears to be extremely well adapted to cold and late situations.

From this description, it will be at once perceived it is a valuable variety, particularly for our climate. To say a pear is as good as the brown Beurré, is sufficient to recommend it to the attention of every cultivator.

Knight's Monarch.—Another fine variety, also raised by Mr. Knight, and described by him in the *Transactions* above alluded to, and at the same time with the Dunmore. It was named by Mr. Knight, the Monarch, "under the conviction, that, for the climate of England, it stands without an equal; and because it appeared in the first year of the reign of our most excellent monarch," (William IV.) In form it is oblong, tapering somewhat towards the stalk, where it is obtuse; the stem is, in all cases, remarkably short and thick; the eye is open, in a shallow depression; the general color is yellowish brown, tinged with red next the sun, and every where interspersed with roundish pale gray flecks; flesh yellowish, melting, buttery, and rich; slightly musky, but not disagreeably so, and this is less perceptible in a drier season than the past, being then almost lost in the highly saccharine quality of the fruit. The tree grows vigorously, and is a most abundant bearer as a standard, the fruit from which is much higher flavored than from a wall. January is its season of becoming fit for use.

In 1832, Mr. Knight sent scions of what he supposed to be the true Monarch, to the late Mr. Lowell, and from his trees, scions of a pear so highly praised were liberally distributed to nurserymen and cultivators. But this has proved not

to be the *true* Monarch. The same mistake occurred in the distribution of the scions among English cultivators, and it was not until 1840 that the true variety was known in the extensive collection in the garden of the London Horticultural Society. It consequently is an entirely new variety in our collections, the old Monarch being an inferior fruit.

Moccas.—Another fine fruit of Mr. Knight's production, and described at the same time as those above named. It is a very large fruit, and bears well as a standard, ripening in September.

The Suffolk Thorn fruited for the first time in the garden of the London Horticultural Society, in the fall of 1840. It was raised by Andrew Arcedeckne, Esq., from the Gansell's Bergamot. It bears well as a standard, and is of excellent quality.

Mollett's Guernsey Chaumontel.—This is a new pear of great excellence, raised some time since, by the late Charles Mollett, Esq., of the Island of Guernsey, but very lately brought into notice. It is described as a fruit of the middle size, obovate, or somewhat pyramidal, with a remarkably fleshy extension of about half an inch at the insertion of the footstalk, in addition to which, the footstalk is about an inch in length, of medium thickness, and yellow. The eye is in a shallow depression, quite open, the segments of the calyx closely reclining on the fruit. The surface of the fruit is somewhat uneven; the ground yellow, but in a great measure obscured by ferruginous russet, sometimes equally scattered, but often disposed in broad longitudinal stripes; flesh inclining to yellow, very melting and buttery, with a very rich Chaumontel flavor, but more acid and less sugary, qualities which give it additional merit among the mid-winter pears, which generally possess a cloying sweetness, unrelieved by the slightest perceptible acidity. It is in eating in December and January, but the fruit should be taken from the tree in September. It grows well on the quince, and bears abundantly.

The following varieties are of French or Flemish origin, and are said to be very superior fruits.

The Tougard Pear.—Fruit large and beautiful, oval, of a clear yellow, laved and streaked with saffron red; flesh white, very fine and melting; juice abundant, sweet, very good, but not perfumed; ripens the end of September. In-

roduced from Belgium to the environs of Rouen, by M. Tougard, nurseryman, of that city.

Esperine.—Medium size, oblong, obtuse; skin yellowish, shaded with reddish gray; flesh yellowish white, fine, and melting; juice sweet, highly perfumed, and very good; ripens the end of September. Obtained from Van Mons in 1840, and probably one of his seedling varieties.

Wilhelmina.—Form of the Doyenne; skin spotted with gray in the shade, and laved with red in the sun; flesh of a yellowish white, buttery; juice abundant, sweet, and perfumed; ripe in March.

Belle Alliance.—A large new fruit, ripening at Paris in October, melting and excellent.

Belle et Bonne de Hees.—Medium size, melting and perfumed; new; of superior excellence; ripens in September, at Paris.

Belle Henriette.—A large new fruit, half melting, a valuable variety; ripens in November.

Beurré d'Anjou.—Of large size, melting, perfumed, and excellent; ripens in October.

Beurré de Beauchamps.—Fruit nearly round; skin yellowish green, speckled; flesh nearly white, melting, having an agreeable and peculiar flavor; tree productive; ripens in November.

Beurré de Beaumont.—Rather under medium size, but of superior excellence, melting, and fine; ripens in September.

Beurré Montefontaine.—Medium size, and buttery; ripens in October.

Beurré Pater Noster.—Medium size, buttery, and fine; ripens in November.

Beurré St. Quentin.—Small, turbinated, height from two to three inches; skin yellow, laved with red on the sunny side; flesh white, fine, and melting; juice sweet; ripens in September.

Beurré d'Enghein.—Medium size, melting, and of excellent quality; ripens in October.

Beurré Moire.—Medium size, very fine, excellent, and perfumed; ripens in October.

Beurré Rouge.—A new fruit of medium size, melting, and excellent; it bears better than the old brown Beurré; ripens in October.

Delices de Jodoigne.—Of medium size, melting and excellent; ripens in November.

Delices Van Mons.—Medium size, melting, and fine; ripens in November.

Jalousie de Fontenay Vendée.—Already noticed by Mr. Manning, at p. 58.

Madotte.—Large size, beautiful in form and color; even superior to the Duchesse d'Angouleme, as M. Margat informed Mr. Kenrick. It is equally as large as the latter variety, but not quite so broad, and of finer form. Ripens in November.

Marie Louise de Delcourt.—Medium size, melting, perfumed, and excellent; ripens in November.

De Duverny.—Large and excellent, half melting; ripens in October.

De Mons.—Medium size, and of excellent quality; ripens in November.

Triumph de Louvain.—Medium size, melting and fine; a superior fruit; ripens in October.

Beurré Gris d'Hiver Nouveau.—Medium size, melting, perfumed, and a valuable fruit; ripens in January, and keeps through the winter.

Beurré Incomparable.—Large size, melting, perfumed, and a superior variety; ripens in December, and keeps into winter.

Beurré de Noirchain.—Large size, and a superior fruit; flesh melting and perfumed. It ripens late, and keeps till spring. Stated to be very valuable.

Beurré de Picquery.—Medium size, melting, and perfumed. It keeps into winter, and is also stated to be of unrivalled excellence.

Souverain d'Hiver.—Medium size, and a melting fruit of superior quality. Ripens in winter.

Excellentissima.—Medium size, buttery, and excellent. Ripens in August.

Melon de Knops.—Of large size, buttery, and excellent. Ripens in November.

De Louvaine.—Medium size, buttery, and good. Ripens in August.

Des Trois Tours.—Of large size, melting, and excellent. Ripens in December.

Shakespeare.—Small, melting, and excellent. Ripens in August.

Belle de Thouars.—Large size, pyramidal form, flesh breaking. Ripens in winter, and keeps well.

Beurré de Flanders.—Large size, melting, and excellent. Ripens in December.

Bergamot Fieve.—Medium size, melting and good, new, good bearer. Ripens in November.

Bergamotte Cadette.—Medium size, melting, and excellent. Ripens in December.

Beurré de Bolwyller.—Medium size, juicy, and good; grows well on the quince; ripens in April.

Duchess of Mars.—Medium size, melting, and good; tree hardy. Ripens in November.

Sageret.—Large, turbinated, seven to nine inches in circumference; skin green, spotted with brown; flesh melting; sweet, sugary, and slightly perfumed. Tree pyramidal, and vigorous in its growth. Ripens from December to March. This is the Sageret of Van Mons, described in the *Bon Jardinier*, from which we have translated this description, and not that of M. Sageret, an inferior fruit.

There are many other new pears of reputed merit, which we shall notice in a future paper, together with several other new fruits.

ART. II. *On the comparative merits of the Isabella and Catawba Grapes; with a notice of a new native variety called the Ohio grape, and observations on the cultivation of Grapes from seed.* By N. LONGWORTH, Esq., Cincinnati, Ohio.

I WAS surprised, on reading a communication in your Magazine, (Vol. VII., p. 331,) from an intelligent gentleman at Marietta, Ohio, in which he speaks of the Isabella grape as the best native grape cultivated by them, and that they commence using it for the table as soon as it assumes a red color. I should suppose he alluded to the Bland Madeira, did he not speak of that grape in a subsequent part of his letter. I have ceased to cultivate the Isabella for near twenty years, deeming it inferior, as a table and wine grape, to most others. He gives it the preference over the Catawba, as a table grape; with us, it ripens badly, and is subject to rot, and in its best

state far inferior to the Catawba, either for the table or for wine. I have had a bunch of the Catawba to weigh twenty-four ounces. I have a white variety of the Catawba, and another Catawba producing fruit a third larger than the Catawba of Adlum. I say the Catawba of Adlum, for Major Adlum was the first to bring it into notice.

I have three varieties of native grapes, which I consider far superior to the Catawba for the table. They have none of the hard pulp common to the Catawba, Schuylkill, Muscadell, and the Isabella. For the table, they are equal to the Meunier, or Miller's Burgundy, and as free of pulp. One of them, which I first met with a few years since, I call the Ohio grape. The vine is perfectly hardy, a fine bearer, has never had the mildew or rot, and the bunches very large, say four times the size of the Burgundy. I sent a bunch of these grapes to Boston, last fall, but it was too long on the road to be in perfection. I will give five hundred dollars for a root of a native grape, that in quality of the fruit and size of the bunch, shall surpass it. The other two are equally good for the table, perfectly hardy, great growers, but the bunches of fruit are not so large.

I was surprised, when east, to find no good native grapes. At my different vineyards, I have about sixty acres in grapes, but not all in bearing. Last season, I had not half a crop, with the exception of one vineyard, where the fruit was abundant and fine. I made about two hundred barrels of wine, and some brandy. I am now raising large quantities of vines from the seed of my best varieties of native grape, having cleared a piece of new land expressly for that purpose.

The Bland grape is not a native. It was introduced into Virginia from France, about fifty years since, by a French gentleman, as I was informed by Gen. Harrison, who knew the gentleman, and had seen the fruit on his table, more than forty years since. It is a good table grape, but subject to mildew, and does not always ripen its wood or its fruit.

Yours, respectfully,

N. LONGWORTH.

Cincinnati, Ohio, March, 1842.

[We are obliged to our respected correspondent for the above, and hope he will give us an account hereafter of his success in the production of seedling varieties.—*Ed.*]

ART. III. *Some notice of the Poire d'Angora, (Angora Pear,) with a translation of a letter written by M. Leon le Clerc, President of the Academy of Sciences, respecting its origin, &c.* By J. W. KNEVELS, Esq., Fishkill, N. Y.

As one of the speculators in recent importations of the above named article, I feel interested in the judgment pronounced upon it by that experienced pomologist, R. Manning, Esq., that with him, trees under the same name, received from France, have proved to be the Catillac. If the Angora pear, in all cases, is only a synonyme of the well known Catillac, either a gross deception has been practised upon the community, or the French nurserymen are surprisingly ignorant of the science they profess. I am loath, however, without further experience, to adopt Mr. Manning's decision as a definitive sentence, although it is corroborated by the description given of the Catillac, which corresponds with the drawing of the Angora pear, late exhibited in New York.

My first knowledge of the fruit in question was derived from a letter written by the celebrated M. Leon le Clerc to the President of the French Academy of Sciences, &c., read at the sittings of the 4th of February, 1833, and published by the Chevalier Soulangue Bodin, in his *Annales de l'Institut Royal Horticole de Fromont*, Vol. IV., p. 329. I send you a translation of this communication, in order that the weight of the names of Leon le Clerc and Tournefort may lead to a further investigation of the subject, and as it also leaves room for a hope that the fruit lately received from France may prove the genuine Poire d'Angora, and a new and valuable acquisition to the cornucopia of Pomona.

The following is the "Lettre de M. Leon le Clerc, ancien Deputé de la Mayenne au President de l'Academie des Sciences de l'Institut," which I have translated for your pages.

"Mr. President:—It is already more than a century since our illustrious Tournefort called the attention of Europeans to the pear of Angora. Since then, another traveller has also mentioned it with praise, and oral communications enable me to state, that even at the present moment it is still, in winter, *one of the most delicious fruits* of Constantinople. You, sir, know better than I, that our great botanist did not disdain the study of pomology. Thus, when on his journey, as for in-

stance at Tiflis, he happened to meet with any of our varieties, he never neglects to mention it by the name under which it is known to us. This he has not done in the case of the Angora pear, although he had it in his power so to do. It is therefore very probable, or rather quite certain, that the present variety is unknown to us; nor is it less certain that both in respect of its time of ripening and its excellence, it presents a most desirable object for our acquisition. As a zealous amateur of horticulture, I have therefore thought I should be rendering an important service to our Society by endeavoring to obtain a prize pointed out to, but neglected by us, for more than a century. However insignificant it may appear in other respects, in so doing I have encountered difficulties which will occasion no surprise to those who have set on foot similar investigations in the Levant. These difficulties have at last been overcome by the zeal and extreme complaisance of General Guilleminot, our ambassador at the Porte. To him, after many fruitless attempts, and almost in despair, I happily ventured to apply, and he did not think that he was compromising the dignity of his high station in condescending to attend to matters which, more humble but not less useful, might have called up a smile of contempt from a diplomatist more tenacious of official punctilio. He has done better still, and identifying himself with all that insatiability of an amateur, which I did not disguise from him, he has added to the pear a variety of the apple, equally famous in that country, the excellence of which *he himself* has tested."

You will observe, Mr. Editor, that the trees imported by Dr. Bole last winter from Paris, and sold by Messrs. Niblo & Dunlap and others, are certified to have been propagated from the very tree sent to the Horticultural Society of Paris by this very General Guilleminot! and is it credible that an ambassador extraordinary and minister plenipotentiary should have exhausted all his diplomatic talent in sending home from Constantinople nothing better than an old homespun Catillac? Forbid it "la superbe gravité d'un diplomate retranché dans sa dignité," which we republicans would imagine more deeply compromised by such a blunder, than by the simple undertaking the commission to send home approved varieties of foreign fruit trees.

Yours, with great respect,

J. W. KNEVELS.

Fishkill, N. Y., April, 1842.

ART. IV. *Remarks on the method of raising seedling Camellias, as practised in Washington, D. C.* By DR. J. S. GUNNELL.

IN a late number of your Magazine, you alluded to Mr. J. B. Smith's method of raising camellias by hybridization, so as to increase and improve the varieties of this superb flower. In your number for April, which now lies before me, I notice a further account of the experience of another amateur in Philadelphia.

As I have had some considerable experience in producing new seedling camellias, I will give you a brief account of my practice also, not intending to call in question the plan or system of any other cultivator. I generally take a pair of curved forceps, pliers, or tweezers, with which I can pick out all the anthers or stamens from the bottom of the flowers: I then apply the farina or pollen, selected on purpose, directly to the stigma; this I do with one, or as many varieties as I can get from flowers that are suitable to select from. I find, by using the pollen from white camellias, (although it be applied to the stigmas of red ones,) the progeny are apt to be mostly white or light colored varieties; and when the pollen from a white variety is applied to the stigma of another white flower, the young plants are almost certain to produce light flowers, or those with light grounds.

When I have a fine variety in bloom, from which it is desirable to impregnate others, and have no plants in flower to enable me to do so, I frequently select plants which show buds nearly ready to expand, and take off the petals, afterwards applying the pollen in the usual manner, not forgetting, however, to repeat it for two or three days in succession, so as to insure certainty of fecundation. By following this method, complete success has been the result, and the opportunity has not been lost, which may often happen if the cultivator is obliged to wait until a flower is expanded, of impregnating with some of the most superb sorts. I am never influenced by the time of day, or temperature of the house, in my practice, but perform the operation at all times, when convenient to do so, and I have not perceived but that the same success attended all my experiments.

About three years since, I succeeded in seeding the *Camellia maliflora* or *Sasánqua rosea*, but had the misfortune to

lose the seed pod by having it knocked off the plant. I have again, the past winter, succeeded in impregnating the stigmas of flowers of the same species or variety, and they are now swelling, and about the size of peas.

I have occasionally seen a few anthers in the Camellias var. *imbricatà*, *Lándrethi*, Hume's blush, and such like extra or magnificent kinds; but about four weeks ago I was not a little astonished to notice, in the collection of plants belonging to J. Douglass, Jr., of this city, two different plants of Hume's blush, with splendid large flowers on each, and upwards of thirty anthers, covered with fine prolific pollen. One of the plants was imported, and the other was a plant inarched here, but not from the imported one: each of the plants had a number of flowers expanded, some with anthers and some without. Mr. Douglass kindly gave some of the pollen to most of our amateur cultivators, who have fertilized flowers, from which we hope to produce some superb varieties in a few years.

As many of the amateurs in the District of Columbia have succeeded in raising new and fine varieties by the plan now detailed, I have deemed it advisable, especially for the assistance of others who may wish to assist in enriching our gardens with new kinds, to send you this account of our practice.

J. S. GUNNELL.

Washington, D. C., April 14, 1842.

ART. V. *On forcing the Chinese Chrysanthemum, so as to produce flowers in May.* By J. B. GARBER, Columbia, Pa.

I NOTICED an extract in your Magazine, from a foreign publication, some time back, [Vol. VI., p. 76—*Ed.*] that a person in England had succeeded in flowering the Chinese chrysanthemum in the month of May, but that the mode of proceeding was kept a secret. Man is naturally fond of discovering secrets,—and had the plan been fully detailed, the

probability is, that I never should have attempted to flower them at any other than the usual time, which is in November. But, to discover a secret, I set my wits to work; and the result is a bloom at the present time, (and I doubt not for six weeks or two months to come, as I have plants in succession,) as splendid as any can be produced in the fall.

The plan I pursued was simply to detach the sprouts or suckers in the fall; when in full bloom, and plant them in small pots, keeping them in a temperature of not less than 50° Fahrenheit, with occasional shifting as they advanced in growth, not neglecting to keep the soil moist at all times; and the result is as stated above.

From this experiment, I am led to believe that there would be no difficulty in forcing the Chinese chrysanthemum so as to have it in flower the whole year.

Respectfully yours,

JACOB B. GARBER.

Columbia, Pa., April 14, 1842.

ART. VI. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Floricultural Intelligence. New Camellias.—A correspondent, in our last number, (p. 137,) gave some account of

several seedling camellias which had been exhibited before the Pennsylvania Horticultural Society. Since then, we have received the published *Report* of the Society, and from it we take the following descriptions of the varieties which were then alluded to. These descriptions are furnished by the Committee on Flowers, of which, we believe, Mr. Buist is chairman.

Caméllia japónica var. [not yet named.]—A thrifty shrub; leaves thick, three and a half inches long and two and a half broad, ovate, acuminate, and very much serrated, of a deep green color, surface uneven and veined; petiole short; flower full to the centre, color a deep cherry red, No. 6 (Berlése's *Monography*;) the arrangement of the rows of petals partaking of a spiral form; petals ovate and pointed. As the plant is only three years old, and has produced so good a flower, it promises to become, as it matures, a desirable variety. This was raised by Mr. Buist: the parents of the plant are not stated.

Caméllia japónica var. *Chalmèrii* perfécta.—Leaves thick, about four and a half inches long and two and three quarters inches broad, ovate, slightly acuminate, serrated, veined, and of a dark glossy green; petioles short; flower very double, full to the centre, of a beautiful cupped form, color a clear cherry red, No. 1 (Berlése's *Monography*;) petals oval cupped, imbricated, and numerous, texture delicate. From the appearance of the flower on the grafted specimen exhibited, it proves to be one of the finest varieties. This plant was raised by Mr. Peter Raabe, an amateur, we believe, who has named it after Mr. Chalmers, Jr., gardener to George Pepper, Esq. Mr. Chalmers has the stock placed in his hands, for propagation.

New Camellias in Washington, D. C.—Our correspondent at Washington has sent us the following note in relation to new camellias in that vicinity:—

“We have had a considerable number of very fine, and some most magnificent, new seedling camellias flower in the District of Columbia this winter. Six or eight raised by Mr. Joshua Pierce; two or three by Mr. R. Dick; two by Mr. J. Douglass, Jr., and five of my own. Among Mr. Pierce's, there is a very fine white one, equalled only by a few of the older kinds, which he has called *C. var. Pièrcèii*: a complete description of this variety, with several of the others, will be

sent you hereafter.—Yours, J. S. G., Washington, March, 1842.

Azàla indica var. *lateritia* and *variegata* are now in bloom in Hovey & Co.'s collection of plants. The latter is exceedingly beautiful; the petals are of a pale and delicate pink, elegantly streaked with deeper tints, and shading into white at the edge: the habit and growth of the plant is neat, and the foliage small. A. i. var. *lateritia* has light crimson flowers; in habit it resembles the *variegata*. Both of them are fine additions to the tribe, and from their hybridization with the old white and others, many fine new varieties may be expected in the course of a few years.

Epiphyllum Russellianum.—This new, and said to be, pretty, species, will flower in Messrs. Hovey's collection this month: it is now showing several buds.

Ranunculàceæ.

ANEMONE

rivularis Buch. The Rill Anemone. A hardy perennial; growing eighteen inches high; with white flowers; appearing in summer; a native of the East Indies; increased by cuttings and division of the roots. Bot. Reg., 1842, t. 8.

Several of the anemonies are pretty perennial plants, blooming early, and desirable for small collections. The present subject is a neat addition to the flower border, throwing up a stem eighteen inches high, from the summit of which spring numerous small stems, terminated with white flowers. The leaves are three-parted, lobed, and dentate; involucre sessile and three-parted. This species was raised from seeds received from Dr. Falconer, of Saparunpar. It is readily increased, both by division of the roots, and by seeds, and grows freely in any ordinary soil and a situation not too wet, suffering more from moisture than from cold. It has "no inconsiderable resemblance" to our native species, *A. pennsylvànica*. (Bot. Reg., Feb.)

Onogràceæ.

GODETIA

albescens Lindl. Whitish Godetia. A hardy annual; growing eighteen inches high; with bluish-colored flowers; appearing in summer; increased by seeds; a native of Columbia River. Bot. Reg., 1842, t. 9.

"A new hardy annual, not very handsome, but forming an agreeable variety when grown among species of a more spreading habit." The main stem is very thickly clothed with branches, which gives the plant a crowded and compact habit, less graceful than most of the species. The flowers are pink, fading to white near the centre, and are thickly displayed all

over the plant. The seeds were received from the Columbia River, and presented to the London Horticultural Society, by the late Mr. Moreton Dyer. This species belongs to the section which comprehends *G. viminea*, in Torrey and Gray's *Flora*. It requires the same treatment as the other species. The plants flower best if the seeds are sown late in the fall, so that the plants may come up early and become strong before warm weather sets in; but they do very well, sown with other annuals in May, in any good soil. (*Bot. Reg.*, Feb.)

Godétia vinosa, *Willdenovii*, *viminea*, *concinna*, *quadrivulnera* and *bifrons*, are all pretty annuals, well deserving a place in every garden. They may be sown immediately if not planted before, selecting a cool and half shady situation, when they will grow and flower abundantly all summer.

Myrtaceæ.

BABINGTONIA (In honor of Charles Babington, Esq., F. L. S., of St. John's College, Cambridge, a zealous and skilful botanist.) *Lindley*.
camphorosmæ Endlich. Camphor-wort Babingtonia. A green-house shrub, growing six feet high; with pink flowers; appearing in spring; a native of Swan River; increased by cuttings. *Bot. Reg.*, 1842, t. 10.

“A green-house shrub, very graceful in its habit, rendering the green-house gay in autumn and winter.” To the botanist, this plant presents some most remarkable features. The peculiar structure of the flower oversets the theory which has hitherto obtained, that the style is an extension and attenuation and convolution of the carpellary leaf: that it is often of that nature is certain; that it is not always so is proved by this species. In this plant, “*the style itself is a direct prolongation of the placenta, and does not even touch the carpels, but is protruded through a hole in the vertex of the ovary.*” This fact was suggested some time since by Dr. Lindley, and it is now fully confirmed.

Endlicher called this a *Bæckia*, but Dr. Lindley gives his reasons for separating it from that genus, and forming a new one. The plant throws up numerous flower stems, several inches long, pendant, clothed with delicate pink blossoms which resemble a *leptospermum*. The foliage is delicate and fine, somewhat like the heath. The cultivation is simple: cuttings root freely in sand, and if potted off into peat and leaf mould, with but a small quantity of loam, they will flower abundantly during the summer. (*Bot. Reg.*, Feb.)

Stylidææ.

STYLIDIUM

Brunoniæum Benth. Brown's Stylewort. A green-house plant; growing a foot high; with pink flowers; appearing in May; a native of Swan River; increased by seeds. *Bot. Reg.*, 1842, t. 15.

“One of the very neatest of little green-house perennials, remarkable for the fine bloom that overspreads all its parts, and for the whorls of leaves which surround its flower stem.” It flowered in the garden of the London Horticultural Society where the drawing was made. It throws up a dense tuft of leaves: from this tuft springs a flower stem, terminated with a large spike of pink or pale rosy blossoms: the flower stem dies, and the next spring the radical leaves die off; the stem then elongates an inch or two, and another “rosette of ordinary leaves is formed, from the centre of which springs another flower stem.” In this manner it goes on, forming a scaly stem, “each of whose joints is the result of one year’s growth.” It requires the protection of the green-house, and should be potted in light sandy soil composed principally of peat. In winter it should be placed on a shelf, in a cool situation, and be kept rather dry: during summer, when in a growing state, it requires an abundance of moisture. Grows freely from seed. (*Bot. Reg.*, March.)

Compositæ.

SAUSSUREA

pulchella De Cand. Pretty Saussurea. A hardy herbaceous plant; growing two feet high; with purple flowers; appearing in autumn; a native of Russia; increased by seed. *Bot. Reg.*, 1842, t. 18.

A showy herbaceous plant, “resembling a *Liätis* in color and general appearance.” It grows from one to two feet high, with erect branched stems and pinnatifid leaves, terminated with clusters or corymbs of globose purple blossoms. It is perfectly hardy, requiring the same treatment as the *Rudbéckia*, and flowers abundantly during August and September. Owing to its excessive blooming, the plants are rather short lived, and it is best to renew it occasionally from seeds in order to secure strong and healthy plants. (*Bot. Reg.*, March.)

Gesneriææ.

GESNERA

zebrina Part. The Zebra Gesnera. A stove or hot-house plant; growing a foot or two high; with scarlet spotted flowers; a native of South America; increased by cuttings; grown in rich soil. *Bot. Reg.*, 1842, t. 16.

“A plant of striking beauty,” both in its leaves and flowers: the former are soft with down, broad, and beautifully stained with purple in the direction of the principal ribs, so as to have the banded appearance from whence its name. The flowers are nearly half an inch long, hanging gracefully at the

ends of long slender stalks, and are of the richest scarlet and yellow, variegated with crimson spots. It is, in truth, one of the finest gesneras which has ever been introduced, and well worthy a place in every select collection of plants.

According to Mr. Paxton, who first gave a figure of it, in the *Magazine of Botany*, it was introduced by Messrs. Low & Co. from the Botanic Garden at Ghent, and is probably a native of the hotter parts of South America, though its precise locality is unknown. It requires the heat of the hot-house, where it produces a succession of flowers for many months in summer and autumn: it is easily increased from cuttings, and the plants thrive in any rich free soil. During winter it should be kept in a warm dry place, and when signs of growth re-appear it should have a liberal supply of moisture. (*Bot. Reg.*, March.)

Verbenacæ.

CLERODENDRON

spléndens G. Don. Scarlet Glory tree. A hot-house climber; growing ten feet high; with scarlet flowers; appearing in February and March; a native of Sierra Leone; increased from cuttings. *Bot. Reg.*, 1842, t. 7.

Of the many new and beautiful climbing stove plants which have lately been introduced, this, says Dr. Lindley, is "one of the handsomest in the country." The foliage is oblong, undulate, of a deep rich green, and the flowers, which appear in large terminal corymbs, are of the most brilliant scarlet, full as rich as the *Euphórbia spléndens*, disputing the palm even with the superb *Combrétum purpúreum*. The plant flowered at Mr. Knight's, King's Road, where it had been sent by Mr. Whitfield, a zealous collector, who states that he found it in his rambles in Sierra Leone, together with plants of four other colors, viz., crimson, brick-dust red, orange, and bicolor; all these were sent to the Duke of Bedford, twelve months previous to that sent Mr. Knight, but they had not flowered. In a shady situation, the plant attains the height of ten or twelve feet, but if exposed to the full sun, seldom more than three or four. Very little is yet known of its habits; it requires a warm moist atmosphere when in a growing state, at least three or four months' rest in a dry atmosphere, and a free rich soil. It is probably increased by cuttings. (*Bot. Reg.*, Feb.)

Boraginiacæ.

CYNOGLOSSUM

anchusoides Lindl. Engloss-flowered Hound's Tongue. A hardy perennial; growing two feet high; with blue flowers; appearing in July and August; a native of East India; increased by seeds. *Bot. Reg.*, 1842, t. 14.

“Interesting to those who cultivate rare hardy herbaceous plants,” but not so ornamental as many others: the foliage is rather large and coarse, and the flowers, though displayed in paniced racemes, are destitute of that brilliancy which is necessary to be deemed beautiful. It is hardy; grows freely in any good rich garden soil, and is easily increased by seeds, the plants from which, however, do not flower until the second season. It flowered in the garden of the London Horticultural Society, in May, 1841. (*Bot. Reg.*, March.)

Amaryllidæcæ.

AMARYLLIS

Banksiana Lindl. The Banksian Amaryllis. A green-house bulb; growing a foot high; with rose colored flowers; appearing in spring; a native of the Cape of Good Hope; increased by offsets. *Bot. Reg.*, 1843, t. 11.
Syn. *A. grandiflora* var. *Banksiana* Herbert, Am.

A very beautiful species of the Amaryllis, but is rather a shy flowerer, and requires peculiar treatment to make it bloom well. The flowers are not large, but appear in a dense umbel, and are of a clear bright rose color. It is a green-house species, and grows freely in a free rich soil, consisting mostly of sandy loam. It should be kept in a vigorous healthy state while growing, by placing it in a light situation, and giving it plenty of water, and when the leaves die off, to keep the bulb warm and dry. It flowers in the autumn, like the *Belladonna*, and, like that species, is a most ornamental plant. Mr. Herbert, in a note appended to the description, states that the bulb should be wholly buried beneath the soil. Easily increased by offsets. (*Bot. Reg.*, Feb.)

Orchidæcæ.

CYPRIPEDIUM

barbatum Lindl. Bearded Lady's Slipper. A hot-house plant; growing a foot high; with green and crimson flowers; a native of the Straits of Malacca; increased by division of the roots. *Bot. Reg.*, 1842, t. 17.

The East Indian and the North American Lady's Slipper, though so different that the forms of the latter convey no idea of the former, have been found, upon the closest inspection, exactly the same in their organization.

The East India species are all beautiful plants, particularly the *C. insigne*, and, from their easy cultivation, they ought to be found in all good hot-house collections. The present subject is a fine addition to the genus. The petals, which spread out over the labellum, are green at the base, shading into a bright purple at the tip. The labellum is of a rich purplish crimson. The leaves are oblong, acute, green, and spotted

with a deeper tint. The cultivation is precisely like the *C. venustum*. (*Bot. Reg.*, March.)

Iridaceæ.

RIGIDELLA Herbert
immaculata Herbert. Spotless Stiffstalk. A half hardy bulb; growing a foot high; with scarlet flowers; appearing in summer; a native of Guatemala; increased by offsets; grown in any light soil. *Bot. Reg.*, 1841, t. 68.

The genus *Rigidelia* has been established by Dr. Lindley upon some plants sent to the Horticultural Society by their collector, M. Hartweg. The original species is called *R. flammæa*. The genus is very nearly allied to *Tigridia*, and the bulbs require exactly the same management. The present subject throws up a stem a foot high, with branches at its summit, each branch terminated with three to five pendant scarlet flowers, very showy from their great brilliancy, and fine additions to our limited number of summer flowering bulbs. (*Bot. Reg.*, Dec.)

Garden Memoranda. Notices of Gardens in Philadelphia.—Our green-houses, this spring, have had, and even yet have, a most gaudy appearance, with every variety of color that Flora can boast in her train. To enumerate a few would seem invidious, and might give offence where none is meant. I will merely mention those that have come within my immediate notice.

I will begin with Gen. Patterson's, conducted by William Sinton, where every thing is kept in the first order, as well as the general appearance and healthy flowering of the plants: but what most arrested my attention, was the *Clíanthus puniceus*, covered with its splendid scarlet flowers; it is planted on the western wall, is about ten feet high, the branches diverging on each side for about six feet, near the ground: the long time it continues in flower makes it one of the most beautiful ornamental green-house plants that have been introduced. Great credit is due to Mr. Sinton for his assiduity and care in keeping it in such a healthy condition, so that it has flowered freely every year; and, as it is apt to fall a victim to the red spider, great attention is required: the free use of the soap and water daily, whenever they make their appearance, is the only method to keep the plant healthy. Let no one despair, after seeing the great success of Mr. Sinton. Nothing can be produced but with the utmost attention, especially where the ravages of insects are so fatal to some plants.

The next is that of Mr. Dundas, conducted by Alexander Hutcheson, who, like the above, has every thing trig and neat, his plants healthy, and in the best condition. I saw here, for the first time, the *Kennédya Marryátæ*, with its fine scarlet flowers; likewise the *K. ovata*, with its lilac purple flowers; they were trailed against the wall. The kennedyas are fine showy plants when well grown: the first mentioned is one of the finest and largest flowers I have seen; the whole family are exceedingly well adapted for trellises. The *Trapæolum pentaphyllum* was in full flower, hanging in graceful festoons. The conservatory attached to the main dwelling was neatly arranged with flowering plants of various kinds; among them we noticed a fine specimen of the *Cytisus racemosa*, covered with a profusion of fine yellow flowers. Azaleas of different kinds, and some of the newest and best roses, all combined, had a very agreeable and pretty effect. On the wall, are the *Cobæa scândens*, jasmines, roses, &c., and in the window recesses are little boxes filled with the *Lycopodium denticulatum*, which has a singularly fine appearance, with its deep green tints.

Mr. Dundas intends building a hot-house the coming summer, and also speaks of erecting a fine palm-house, which I hope will be put into execution, as it will be something new on this side the Atlantic. He has the means, whenever he chooses to begin.

The collection of George Pepper, Esq., kept by William Chalmers, is so well known for its neatness and order, that it would be superfluous to say another word. His specimens are large and well grown: his cacti are select, and include some very large specimens, and he is making yearly additions in new varieties. His camellia-house is filled to overflowing with a great variety of that beautiful family; the plants healthy, and a few weeks past were covered with a profusion of flowers, and had a most exquisite effect when you entered the house. I believe no amateur in the country has such a fine collection, or that there ever was seen so many fine flowers at one time, perhaps in any part of the world.—*An Amateur, Philadelphia, April 20, 1842.*

REVIEWS.

ART. I. *A Muck Manual for Farmers.* By SAMUEL L. DANA. 1 vol. 12mo., 242 pages. Lowell: 1842.

IF the agriculture of this country is not sensibly improved, it will not be for the want of information which would lead to so desirable a result. It is but a few years since that excellent work, Chaptal's *Agricultural Chemistry*, was given to the American public: subsequently, a still more valuable practical volume, from that pioneer in an improved state of agriculture, the late Judge Buel, passed through several editions: then came the masterly work of Liebig, a complete storehouse of the most useful information upon the subject of agricultural chemistry. Besides these, there have been, in the mean time, the several *Reports* of the Agricultural Commissioner, and the geological *Reports* of Dr. Jackson; each containing practical as well as theoretical hints upon the great science of agriculture. Now, we have the volume named at the head of this article, another and most excellent contribution to the subject on which it treats. Dr. Dana is well known to the Massachusetts farmers, from the communications which have appeared in Mr. Colman's *Report*, in relation to *geine*, &c. He is a practical chemist, and his researches have been made with much care and study. The volume is the substance of eight lectures on the chemistry of soils and manures, delivered to the citizens of Lowell (by their request,) to whom the work is dedicated.

The work is divided into eight chapters, as follows:—I. Geology of Soil. II. Chemical Constitution of Rocks and Soil. III. Properties and Chemical Action of the Elements of Soil. IV. Of the Organic Constituents of Soil. V. Of the Mutual Action of the Organic and Inorganic Elements of Soil. VI. Manure. VII. Artificial Manure and Irrigation. VIII. Physical Properties of the Soil.

The subject is treated in a concise and plain manner. Each chapter is divided into separate sections, the whole numbered from beginning to end, in order to facilitate references to any particular matter.

We have only room for a portion of the closing chapter,

entitled "The Physical Properties of the Soil." It presents Dr. Dana's views of the important agency which *geine* performs in vegetation.

In all attempts at improving soil by manure, two objects are intended, which form the golden rule of applying salts and *geine*; to make "heavy land lighter, light land heavier, hot land colder, and cold land hotter." Are there then, notwithstanding all that has been offered and said, differences in soil? Have not, it may be asked, all the preceding pages been based on the fact, that there is but one soil? True it has been so said; it is said so now. Chemically, the inorganic elements of all soil are alike. The silicates and salts are nearly the same in all; the organic portion, the *geine* varies, and that to a greater degree than any other ingredient. While the silicates compose with great uniformity, from 80 to 90 per cent., and the salts of lime, sulphate, and phosphate, from 1-2 to 3-4 per cent., the *geine* varies from 1 to 20 per cent. The silicates may be finer or coarser, more sandy or more clayey. All these circumstances affect, not the chemical, but the physical properties of soil. The physical properties, then, are the foundation of the great diversity which soil exhibits. The subject of soil will be very imperfectly treated, if a few pages are not devoted to this important subject. The physical characters of soil are embraced under the terms, cold, hot, wet, and dry land. These characters are dependent on four circumstances.

First. The absolute weight of a given bulk of soil.

Secondly. Its color.

Thirdly. Its consistency.

Fourthly. Its power of retaining water.

In other words, the physical characters of soil may be considered under

First. Its relation to heat.

Secondly. Its relation to moisture and gas.

Thirdly. Its consistency.

Fourthly. Its electrical relation.

The relation to consistency makes soil light or heavy; the relation to heat and moisture makes soil hot or cold, wet or dry. The great natural varieties of soil are sand, clay, and loam; first, the great distinction in the scale of soil, is sand and clay; all intermediate varieties proceed from mixtures of these with each other. Now the sand may be silicious, or calcareous—that is, silicates, the distinguishing character of soil in this country, or mixed with a salt of lime, the feature of much European soil. By clay is meant common blue clay, or sub-silicate of alumina, consisting of alumina, 36; silica, 63; oxide of iron, and salts of lime, and alkalis, 6.

Sandy clay is—clay and sand, equal parts.

Loamy clay is—3-4 clay, and 1-4 sand.

Peaty earth is—*geine*.

Garden mould is—8 per cent. *geine*.

Arable land is—3 per cent. *geine*.

Taking these several varieties, it is found, that sand is always the heaviest part of soil, whether dry or wet; clay is among the lightest

part; geine has the least absolute weight, so that while a cubic foot of sand weighs, in its common damp state, 141 pounds, clay weighs 115 pounds, and geine 81 pounds; hence garden mould and arable soil weigh from 103 to 119 pounds. The more geine compound soil contains, the lighter it is.

Among the most important physical characters of soil, is the power of retaining heat; this will be found to be nearly in proportion to its absolute weight. The weight of soil determines with tolerable accuracy its power of retaining heat. The greater the mass in a given bulk, the greater is this power. Hence sands retain heat longest, three times longer than geine, and half as long again as clay. Hence the dryness and heat of sandy plains. Sand, clay, and peat, are to each other as 1, 2, and 3, in their power of retaining heat. But while the capacity of soil to retain heat depends on the absolute weight, the power to be warmed, another very important physical character depends on four principal circumstances: first, the color; second, the dampness; third, the materials; fourth, the angle at which the sun's rays fall. First, color; the blacker the color, the easier warmed. White sand and gray differ almost 50 per cent. in the degree of heat acquired in a given time. As peat and the varieties of geine are almost all of a black or dark brown color, it is seen how easily they may become warm soils when dry; for, secondly, dampness modifies the influence of color, so that a dry light-colored soil will become hotter, sooner than a dark wet one. As long as evaporation goes on, a difference of 10 or 12 degrees will be found between a dry and a wet soil of the same color. Thirdly, the different materials of which soils are composed exert but very little influence on their power of being heated by the sun's rays. Indeed, if sand, peat, clay, garden mould, all equally dry, are sprinkled with chalk, making their surfaces all of a color, and then exposed to the sun's rays, the differences of their temperature will be found inconsiderable. Color and dryness, then, exert a most powerful influence on the capacity of soil to be warmed.

Fourthly, the last circumstance to be noticed, is the different angle at which the sun's rays fall. The more perpendicular, the greater the heat. The effect is less in proportion as these rays, by falling more slanting, spread their light out over a greater surface. But this point, which seems external to soil, need not be enlarged on. Now, the great fact to be observed in this relation of soil to heat, is, that geine exerts the most marked influence. If soil heats quickly, it is because it has a large proportion of geine. Does it cool quickly? it is the geine which gives up heat quickly, referring here to the soil in a dry state, the modification produced by dampness having been already considered.

The relation of soil to moisture and gas is not less important than that of heat. All soil, except pure silicious sands, absorb moisture, but in different degrees. Geine possesses the greatest power of absorption, and no variety of geine equals, in its absorptive power, that from animal manure. The others rank in the following order,—garden mould, clay, loam, sandy clay, arable soil. They all saturate themselves with moisture by a few days' exposure. It is a very interesting question, does soil give up this absorbed water speedily

and equally? Is its power of retaining water equal? As a general fact, it may be stated, that the soil which absorbs fastest and most, evaporates slowest and least. *Geine* evaporates least in a given time. The power of evaporation is modified by the consistence of soil; by a different degree of looseness or compactness of soil. Garden mould, for instance, dries faster than clay. As it has been already shown that the power of being warmed is much modified by moisture, so the power of a soil to retain water makes the distinction of a hot or cold, wet or dry soil. In all the relations to moisture, as to heat, *geine* exercises the greatest influence.

The volume should form an accompaniment to every good husbandman's library; its analyses of soils and manures should be familiar to all who wish to improve their soils, and increase the product of their farms.

ART. II. *Boston Journal of Natural History; containing papers and communications read before the Boston Society of Natural History, and published by their direction.* Vol. IV., No. 1. Boston: 1842.

THE present number commences the fourth volume of the Society's publication. It contains eleven excellent articles on subjects connected with natural history, the only one of which, relating to botany, is that by Mr. *Teschmacher*, describing a new species of the *Rafflesia*, an abstract from which we have already given, (p. 135.)

We are pleased to learn that the Society is in so flourishing a condition. From an extra sheet which accompanies this number, containing a brief review of the Society since its organization, we learn the following in regard to its library.

When the Society originated, the great difficulty in the way of making advances in the study of natural history, was the want of books. No one possessed more than a few volumes on some subject to which he might have given his individual attention. The importance of forming a library was at once felt; and most of these scattered volumes have been collected, until there are now about a thousand volumes in the library. Most of these have been donations, either directly, or after having been purchased by private subscription, nothing being drawn from the general fund of the Society. It

is gratifying to be able to record the liberal donations of Charles Amory, Esq., B. D. Greene, Esq., of the Hon. John Davis, who contributed fifty-two volumes of standard works on Natural History, most of them botanical; the bequest of Simon E. Greene, Esq., one of the original members, who left to the Society all the works in his library on Natural History, amounting to 33 volumes, as well as his large collection of Shells and Minerals; the great work of Audubon on American Ornithology, which was presented by the liberality of Amos Lawrence, B. D. Greene, S. A. Eliot, David Eckley, G. B. Emerson, Chas. Amory, Wm. Ingalls, G. C. Shattuck, G. C. Shattuck, Jr., Mrs. Shattuck, and Geo. Parkman; and the very rare and valuable work of Olivier on the Natural History of Insects, with the Supplement by Voet, in 10 quarto volumes, colored plates, which was purchased of Prof. N. M. Hentz, together with his entire collection of Insects, numbering about 30,000 specimens, by the subscriptions of Drs. James Jackson, John Randall, B. D. Greene; Francis C. Gray, Horace Gray, Jonathan Phillips and David Henshaw, Esquires, and other liberal gentlemen, who prefer that their names should not be divulged; and above all, the princely gift of a superb copy of Audubon's *Birds of America*, full bound in Russia leather and gilt, the most expensive copy in the country, from the Hon. Thomas H. Perkins. In consequence of this last donation, the consent of the donors of the duplicate copy was obtained to exchange it for other standard works, especially works on Ornithology. This was done at nearly the original cost of the work, and the number of volumes in the library was thereby greatly increased.

Another and a permanent source for the constant increase of the library, is the legacy of the late Ambrose Courtis, Esq., of which mention will be made hereafter.

When we consider how essential a library is to the study and arrangement of every department of the Cabinet, it cannot but be felt that the members have done wisely to contribute largely towards it. It is of vital importance that the naturalist, who is engaged in the investigation of any subject, should be able to know *all* that has been written upon his subject. Scientific books are expensive, and no man among us can promise himself such a library as he may need. It is the part of wisdom and interest, therefore, to collect the volumes, which are scattered here and there, into one common stock. They will thus be vastly more useful than when shut up in private libraries.

Any person may become a member of the Society. The privileges of the members are, free access to the cabinet at all times on application to any member of the council—the use of the library—and admission to all lectures given in the name of the Society. Fifty dollars, paid at any one time, constitutes one a *patron*; the immediate members are subject to an annual assessment of three dollars, and any member paying thirty dollars at one time is exempt from future assessments.

MISCELLANEOUS INTELLIGENCE.

ART. I. *General Notices.*

On the management of Bulbs, after being long out of the ground.—One of the commonest questions asked by gardeners, as well as amateurs, is, what they are to do with bulbs they have just received from abroad. That they do not treat them rightly is sufficiently shown by the miserable health of those which are saved from the general loss that so often attends upon all such importations. To this point, then, we address ourselves.

When a bulb has lain dormant in the earth during its natural period, it is ready to spring into renewed life upon the application of warmth and moisture; and it matters little whether it is suddenly transferred from dryness to moisture, or whether the change takes place gradually; because its powers of life are unimpaired, and, like the stomach which has recently digested one meal, it is ready to commence the immediate digestion of another. Not that in nature such sudden changes naturally occur; on the contrary, when rain begins to fall, it soaks but slowly into the earth, and when it does reach the bulb, it is still arrested in its action by the numerous dry coats with which this body is invested, and through which it must gradually filter.

But when a bulb has been long out of the earth, its vital energies are much diminished, and it cannot bear even that slow supply of moisture—its food—which is furnished by wet soil, whose humidity penetrates the bulb coats and is absorbed by the living tissue. To continue the analogy—the bulb is then like the stomach of a famished man, enfeebled by the prolonged cessation of its natural action, and unable to bear any food whatever, except by very slow degrees. If a weakened bulb is suddenly brought in contact with water, it will absorb it, but will be unable to digest it. Then the water will become stagnant and putrid, and destroy the bulb; although, if the bulb could have digested it, it would have been converted into new elements, and have proved its proper aliment.

The rule, therefore, to observe with newly imported bulbs is, to place them where they will absorb moisture slowly. The driest earth is full of water, which can only be drawn off by the application of intense heat. A bulb, therefore, should be planted in what is termed a dry soil, and placed in a shady part of the green-house till it has become plump and begun to shoot: if it has begun to shoot when received, still the same treatment should be observed, and the driest soil used to plant it in. It is only when decisive signs of natural growth can be detected, that a very little water should be given, while the temperature at the same time is slightly increased: and no considerable quantity of water should be administered until the leaves are an inch or two above ground, and evidently disposed to grow rapidly. If these precautions are taken, no failures are ever likely to occur; if neglected, no success can be anticipated. We once saw five hundred bulbs of one of the finest and rarest of all plants destroyed by an unskilful gardener, who planted them in the wet

earth of an open border, immediately after their arrival from a fifteen months' voyage, every bulb of which would have grown, had he known what we have now stated. (*Gard. Chron.*, 1842, p. 3.)

[These hints cannot be too strongly impressed upon the mind of every cultivator of plants, particularly of bulbs. Many fine collections of bulbs have been received here from the Cape of Good Hope, but they have been lost from the same cause as that mentioned above—want of a proper knowledge of their treatment. The same principle even holds good with other plants: how often do we see gardeners and amateurs plunge a tree or plant which has been out of the ground some weeks into a tub of water, and there let it remain for days, rather than place it immediately in a rather dry soil that its roots may gradually absorb moisture, without danger of their being destroyed by a superabundance of water. We must urge our cultivators to read the above attentively, and bear in mind the sound practice recommended, whenever they may receive bulbs or plants that have been long out of ground, and are in a dry state.—*Ed.*]

On the growth of succulent plants.—To be grown well, the whole race of what are termed succulent plants requires to be kept in the lightest possible situation in the green-house. It is true they may be grown in heavy shaded green-houses, but their leaves will never acquire that beautiful color which is seen in light situations, nor will they flower so freely. The coloring matter in the leaves of some of the plants, the *Echeveria gilliflora* for example, is delicate and beautiful; but this is never seen in perfection unless a light situation is attended to.

In an extensive family of this kind, it is difficult to point out the proper soil which ought to be used, as some of the species require it much richer than others. I have generally found the free growing kinds of *alba*, *Crassula*, *mesembryanthemum*, and plants of like habit, do best in a rich free soil, such as equal portions of light sandy loam, and peat or leaf mould, with a small quantity of bruised bricks. For the free growing *Cacti*, such as *Cereus speciosissimus*, the soil ought to be made lighter and richer, by using less loam and more peat, leaf mould, and dung: but for the slow growing *mammillarias*, and the very succulent *mesembryanthemums*, such as *M. tigrinum*, it is best to use about one third light loam, one of peat or leaf mould, and one of bruised bricks and some rubbish. As a general rule, to which, I believe, very few exceptions will be found, I would advise all persons not acquainted with the particular habits of these plants, to use soil richer or poorer, according to the quantity of roots which they produce, at the same time taking care that the poor soil is also loose and open, to prevent the plants from damping. In every case, the pots must be well drained. The best season for shifting is the month of February or March. Once a year will, in general, be quite sufficient for the free growing kinds; and, although many of the others will not require it so often, yet it will be found the best plan to go over the whole at this time, examining the roots, and adding a little fresh soil, taking care not to pot them too deep, nor to overpot them, as they are safest in small pots.

Water should be given to the slow growing kinds at all times with a gradual hand, but particularly during winter, as more plants are

killed by overwatering than from any other cause. At this season, once in ten days will be sufficient, [at least once a week in our climate.—*Ed.*] but this must depend somewhat upon the weather.

Succulents are easily multiplied by cuttings or seeds. If the cutting is soft and liable to damp, it ought to be dried a little before it is put into the sand. Sometimes a little quick lime is used for preventing decay, and can either be used for the base of the cutting, or applied to any part of the plant from which the damping part has been removed. (*Gard. Chron.*, 1842, p. 4.)

ART. II. Foreign Notices.

AUSTRIA.

Description of the Garden and collection of Plants of Baron von Hugel, near Vienna.—The March number of Loudon's *Gardener's Magazine*, contains a long and interesting account, translated from the *Garten Zeitung*, of Baron Hugel's celebrated garden. The description is so interesting, that notwithstanding its length, we have ventured to extract it entire, knowing that it will be perused with pleasure by all our readers. The collection is one of the finest and largest on the continent; no pains or expense have been spared to obtain whatever was new or beautiful, and the garden has been enriched with the productions of all countries. The several green-houses, conservatories, &c., are also put after neat and tastefully arranged designs, by the baron himself; the whole affording one of the most delightful treats to lovers of plants. The following is the description:—

For a full account of this rich collection, I must refer to the systematic catalogue published in 1840, and shall here confine my remarks to plants at present in flower, and particularly remarkable for their beauty, rarity, or size.

The view, immediately on entering the garden, is one very rarely seen, and displays knowledge, taste, and propriety, often looked for elsewhere in vain. I particularly allude to the beautiful terrace in front of the living-rooms, where the pillars, surrounded by climbing plants, seem composed of masses of flowers; where in the beds of flowers between the pedestals, revel, in all the richness of coloring, *Lilium longiflorum*, *Gladiolus psittacinus* and *floribundus*, *Tigrúdia pavónia* Juss. (*Ferrária* L.) *Ferrária undulata*, and numerous *pe-tunias*; and where the wire plant-boxes are overgrown with different species of *Láthyrus*, with a gigantic specimen of *Fúchsia súlgens* and *Lebretónia cocínea* in the centre, by the sides of which are rare specimens of *Scóttia trapezoides* and *dentata*, and new species of *Acácia* and *Gnídia*. The terrace floor is tessellated, and on it

are judiciously distributed stages covered with beautiful flowering plants. Single plants, remarkable for their variety or beauty, stand alone on the terrace before the pillars; and among these some *Proteaceæ* may be particularly mentioned, and a *Burchéllia capensis*, ten feet high, and covered with innumerable flowers. Along the terrace stand large plants, such as aloes and *Phormium tenax*, in beautiful vases, different species of *Phœnix*, large cordylines, *Chamærops humilis* (var. *excelsa*), and boxes of painted china, consisting of square pieces put together, and filled with petunias and verbenas, thus even increasing the richness of the flowers in a manner peculiarly beautiful. From the splendid and most tastefully fitted up apartments of the proprietor, which recall the time when he lived among the princes of India, a view is obtained of great part of the garden, and the eye gets a glimpse of the romantic village of Upper St. Beit, near St. Beiter's Berg, with the beautiful scenery in the distance. The real Chinese furniture on the terrace, the flags hung out above it, consisting of a white middle and red border, and the circular lamps brought by the baron from China, hanging between the pillars, give the whole the appearance of an Oriental dwelling.

On the terrace before the sitting-room of the proprietor stands a colossal group of plants, consisting chiefly of the families *Proteaceæ*, *Mimosæ*, *Myrtaceæ*, and several others. Near this group is situated a grove-like collection of *Conifereæ*. The connoisseur will here find beautiful specimens of *Araucaria braziliensis*, eighteen feet high, *Cunninghãmia excelsa* and *imbricatã*; *Pinus altissima Hort.*, *Banksiãna Lamb.*, *Gerardiãna Wall.*, *halepensis Ait.* (*maritima Lamb.*) *Lambertiãna Dougl.*, *Coultteri D. Don* (*macrocarpa Lindl.*) *monticola Dougl.*; *Abies cephalonica Loud.* (*A. Luscombeana Hort.*, *taxifolia Hort.*), *Menziësi Dougl.*, *Smithiãna Wall.* (*Morinda Hort.*); *Picea Webbiana Wall.* (*Pinus spectabilis Lamb.*); *Cedrus Deodara Roxb.*; and *Deodara* var. *pendula*, *intermedia*, *Podocarpus longifolius Hort.*, *latifolius Wall.*, *nucifer Loud.* (*Taxus nucifera L.*); a remarkable specimen of *Cunninghãmia sinensis Rich.* (*Bêlis jaculifolia Salisb.*) also the rare *Dammara australis* and *orientalis Lamb.* (*A'gathis Salisb.*) *Dacrydium elatum Wall.* (*Juniperus Roxb.*) and many others of the most beautiful kinds of *Conifereæ*; while different species of *Cállitris* and *Casuarina* stand in the centre of the group on a small stage of ornamental iron-work, down the sides of which small varieties of plants are seen gracefully bending. The charm of the whole picture is enhanced by the splendor of *Catalpa syriacifolia Sims* (*Bigonia Catalpa L.*) in full flower, and by the delightful perfume of the blossoms of the shady lime tree, which lends its peculiar charm to the atmosphere.

A complete collection of Indian varieties of rhododendron is situated on the further side of this group, and the whole is remarkable for beauty and luxuriance. More to the right are seen the most beautiful erythrinæ, near which are groups of *Azalea pontica* and *Pæonia Moultan Sw.* (many species,) in splendid flower.

The more the beholder advances, the more he fancies himself transported to Japan, as a forest of camellias in which gigantic specimens stand that once ornamented the gardens of Saxony, and the largest of which is twenty-two feet high, affords abundant shade.

The many hundred lofty stems of camellias, mixed with those of a lower growth, astonish the connoisseur, and especially when he is informed that this collection consists of more than a thousand varieties.

On the lawn on the right stand beautiful exotic trees and shrubs, which have attained a tolerable height; and of these I need only mention *Diospyros Lötus*, *Virgilia lutea*; *Magnolia acuminata*, *tripétala*, *Soulangeana*; *Aràlia spinosa*, *Bétula laciniata* var. *péndula*, *Fàgus sylvatica* var. *purpurea*, *Aucuba japónica*, and several species of *Mahonia*. A group of *Clerodéndrum flor. rub. simpl.*, in the parterre, is worthy also of particular consideration.

You now enter the houses, and come first to the division filled with Cacti. The collection is rich, and part of it was purchased some years ago at Dresden by the baron, where it was under the care of the court gardener, M. Terseheck, and was universally admired. The next compartment contains hot-house plants remarkable for their outward habit, their size, and beauty, such as *Pandanus humilis*, *Dracæna Draco*, *Laurus Cinnamomum*, and some species of *Tillandsia*, &c. The other division of this house is separated into two beds, in which the specimens are planted; these are mostly of the families of *Mimosa* and *Papilionacæ*. I must not omit to mention the beautiful specimens of *Acacia Cunninghamia* Hook., *Juwara*, *decora*, *homomalla*, *polymorpha*, *obovata*, *pentadènia*, *pubescens*, and *vestita*, which are in the middle part of the house, and form an avenue of overhanging trees; also *Gompholobium polymorphum elatum*, *Oxylobium ellipticum*, *Indigofera australis*, *Corræa speciosa*, *Polygala attenuata*, *Eriostemon cuspidatus* and *buxifolius*, *Lissânthe sávida*, *Conostylis juncea*, &c., which stand in a bed like a thick forest; among which are seen *Kennedyia rubicunda* and *longeracemosa*, beautifully winding round the supports of the house. The second bed is principally filled with the rarest camellias, in the most luxuriant condition. There are also other plants among them, particularly many *Proteacæ*; and a plant of *Grevillea robusta* is eighteen feet high, which, unfortunately, must be taken out, as it has already reached the height of the house. All lovers of plants must wish that this somewhat dangerous operation may be carefully performed. In the front part of the first bed in this division, close by the lights, are two *Proteacæ* planted in the ground, and in front of the other bed there are small plants in the open ground. The whole house is divided by a passage up the middle, the supports of which are decorated with twining plants, and the two side passages have wire arches over them, covered with *kennediyas* and climbing plants.

From this house you enter a small, but, as may be expected, tastefully decorated saloon. The floor, like the former, is of mosaic; the painting on the ceiling and walls in the Indian style, and the looking-glasses, drapery, and furniture are of the very newest taste.

Adjoining to this saloon is a conservatory, in which are camellias of all the varieties planted in the soil. Behind them are *Camellia japónica* fl. *álba pleno*, *anemoneflora*, *althæiflora*, *rosea pleno*, *Sassánqua*, *Gussóni*, &c., grown as espaliers, which have already covered the whole wall. A narrow path separates this from beds filled with high camellias and Indian azaleas. Among the camellias, the

one most worthy of notice is *C. reticulata*, fourteen feet high, with a head five feet in circumference. Near the front lights, separated by the principal passage, are small beds, likewise filled with camellias planted in the soil; and by the sides of the pillars, which extend to the back part of the house, are the most beautiful acacias.

You then pass under arches formed of wire, on which kennedias and other climbing plants grow, also *Dioclea glicinoïdes*, which had already unfolded its splendid deep red flowers, mixed with camellias and acacias fastened to the wire; and on descending a few steps you enter a small house in which the baron has wisely placed the whole collection of plants in small specimens, so that not one may escape notice, and so be perhaps entirely lost, a frequent occurrence in large assemblages. This collection resembles a living index.

You next enter another house, constructed exactly like the preceding, in which small plants are most tastefully grouped among tufa; and as you passed through an ornamental arch, and descended a few steps to this house, in like manner you now ascend a few steps to the camellia-house already described, to which adjoins a long row of houses intended to contain at another season of the year those plants at present grouped in the open air.

On the left is the orchideous house, in which is a collection of eighty-three genera and nearly two hundred species, most of them grown on the trunks of trees; or planted in little baskets, from which they hang down. As this was only used as an orchideous house last year, it cannot be expected to be very rich in flowers. Some very fine forms and colors begin to unfold. Among these may be mentioned, *Catasëtum luridum*, *bicornutum*, *tricolor*; *Epidëndrum crassifolium*, *Oncidium Bäueri* *Cynoches Loddigësi*, *Calanthe fuscata*, *Acropëra Loddigësi*, and many other species; some dendrobiums, maxillarias, oncidiums, &c. *Nepënthes distillatoria* also unfolds its blossoms. This house is heated by steam.

You next find yourself in a large conservatory with upright lights, in winter chiefly filled with camellias; the next has slanting lights, and leads to a large saloon, through which you pass to the living-rooms, and, on again reaching the open air, you pass by the terrace already described.

But another most delightful scene is still reserved, and that is a mosaic picture of flowers, a so called Roccoco garden;* and we have to thank the Baron von Hugel for setting the first example of a style, since generally imitated, both here and in the vicinity. A garden

* Roccoco.—We have hitherto been in the habit of considering this term as synonymous with what may be called the shellwork arabesque; but on asking a critical friend for the true meaning of the term, he sent us what follows:—

“Roccoco is one of those words which, although they are in vogue both in conversation and writing, are not to be met with in dictionaries, any more than are the thousand and one terms employed either in millinery or in cookery. All, therefore, that I can say of it is, that it is one which seems to have been lately invented by the French, and was first applied to the antiquated frivolous taste of the period of Louis XV. It is now used as a general term of reproach to what is old-fashioned and tasteless in literature and art, and appears to correspond in some degree with our English ‘crinkum crankum.’ Instead of being *au courant du jour*, dictionary-makers are always half a century behind the rest of the world, and seldom explain the very words one is most at loss to understand.—*W. H. L.*”

laid out in this manner requires much skill and ability on the part of the gardener, as well in the arrangement as in the choice of the flowers; and he must also be careful that, throughout the whole summer, there be no lack of flowering plants. It is but justice to the baron's head gardener (M. Abel,) to say that he not only has fully accomplished this task, but has also been successful in all the requisites of this garden. The connoisseur, however, does not see the usual ornamental plants in this sea of flowers, but a great many rarities; and, in short, here, as in every part of the grounds, the æsthetic taste of the baron is paramount. Beautiful is this garden within a garden, and hence it has become the model garden of Austria. Here the most beautiful landscape opens on the view; the gently swelling hills appear in the most romantic forms, and on one of these is seen the pretty little garden-dwelling of Dr. von Malfatti. At a short distance behind you stands one of the tasteful edifices of the proprietor, which are one story high, viz., a summer-house. The painting of the saloon is in the Indian style, from a design by the baron, the ceiling consisting of various-colored ornaments, and the walls of paintings on a red ground. Small brackets are fixed on it here and there, on which statues are placed. The chairs and sofas are covered with silk, which the baron brought from India and China, and the whole is arranged and kept up in the Oriental style. On the right is a smaller saloon, and on leaving this you enter the open air, where the eye is delighted with the beautiful flowering climbers, and the tastefully arranged flower-beds which surround the building. Some of the climbers grow on yellow and red rods, which support a projection of the summer-house, and thus form a kind of covered terrace. Farther on is a beautiful *Catalpa syringæfolia*; and on leaving the building, which is girded, as it were, with a band of flowers, the eye glides over a carpet of turf to a green hillock, where the prospect becomes more extensive. On the left, towards the west, are the villages of Upper and Lower St. Beit; and on the right, and somewhat more to the north-west, on the side of a gently swelling hill, are the villages of Baumgarten and Hutteldorf.

We now leave this part of the garden to enter the propagating department. This house is 125 feet long, with slanting lights facing the east and west. It is heated by hot water under the direction of M. Daniel Hooibrenk, Baron Hugel's garden director, and is most admirably suited for the purpose. We have to thank M. Hooibrenk for having introduced this method of heating in Austria. He erected the first apparatus in 1837, and it has not only been imitated here, but in Hungary, and also in other countries. The utility of this method of heating in propagating plants may be easily seen when compared with the old manner, still to be met with here and there, of heating by means of tan and horse dung, which is always dirty, and very uncertain.

What M. Hooibrenk has effected by this means in propagation may be witnessed in the propagating garden here, where the present extensive collection was obtained by the above method; and of these plants I need only mention the propagation of the *Coniferæ* from cuttings; and other plants that are difficult to strike, such as *Agnóstus sinuata*, *Dracophyllum attenuatum*, *Magnolia grandiflora*, *Plex*

Aquifolium, *Quádría heterophylla*, *Stadmánnia austràlis*, *Dacrydium elàtum*, *Sàpium berberidifolium*, *Lomàtia ilicifòlia*, *Dámmara austràlis*, *Nepénthes distillatòria*, *Grevillea robústa*, *Araucària*, &c.; and the innumerable specimens of these show that success is not accidental. There are whole beds of Pontic rhododendrons, ericas, camellias, Indian and Pontic azaleas, pæonies, &c., all of which have been propagated by the above method. The construction of the houses already mentioned, fourteen in number, is likewise adapted for the propagation of plants, and does great credit to the skill and knowledge of M. Hooibrenk. The apparatus for heating those houses for propagation, and for the growth of young and tender plants, is usually flues. The baron, after a complete examination of all kinds of heating, has been fully convinced that a system of smoke flues at a moderate depth in the soil is the best method of heating; but these must have all the joints or seams stopped up by means of a very effective cement, consisting of a proportionate mixture of finely sifted or beaten clay, ashes, and stone in a powdered state, mixed with salt water; and the covering should be plates of cast iron, a few lines in thickness. When the cold is very severe, a basin of water should be placed over the place where the fire is, and thus a medium of moisture produced in the air, without which the great dryness would be very injurious.

In conclusion, allow me to add, that, by the kindness of the proprietor, every respectable person is admitted to visit the garden, which no doubt contributes greatly to increase the love for one of the noblest pleasures. (*Gard. Mag. for March.*)

ART. III. Domestic Notices.

Pennsylvania Horticultural Society.—Our second meeting of the Horticultural Society took place in the Museum, and, notwithstanding the disagreeable wet night, the room was filled with the beauty and fashion of our city, as well as with a fine collection of plants. The room was tastefully laid out, and had a beautiful effect. The specimens were very fine, especially the azaleas of George Pepper, Esq., which were large and in full flower. We noticed a new hybrid Epiphyllum, called the Mayflower, (*Mayfly?*) the finest of all that have been produced; from its appearance, it seems to be from the *E. Ackermánnii* and speciosíssima, the flower large, of bright red, and tinged with purple inside; it is well worth adding to the collection of every amateur. Mr. Buist's table was filled with some choice Australian specimens in fine bloom. We saw a large branch of the *Clíánthus puníceus* in fine flower. Robert Kilvington contributed largely that evening, as the whole of the plants were to be sold the next day: they were in fine flower, and in good order. Mr.

Parker, as usual, had a great variety. Mr. McKenzie exhibited some choice roses, particularly the *R. devoniensis*, in beautiful bloom. The vegetables exhibited for competition were of the finest quality, and reflected great credit to the growers. The accession to our number has been great; forty-four new members were proposed that meeting.—*An Amateur, Philadelphia, April 23, 1842.*

The Cinnamon Rose for a Stock for Budding.—Will you have the goodness to mention, in the *Magazine of Horticulture*, whether the cinnamon rose is a suitable stock to inoculate or bud roses upon; or what is a more suitable stock for that purpose?—*Yours, C. F. J.* [The cinnamon rose is too weak a growing kind for a stock; the sweet brier is much better: the old blush rose of the gardens, and the Boursalt rose, are also good stocks, particularly the latter.—*Ed.*]

Horticulture in Western New York.—I have taken great pleasure in cultivating a few of the native plants of this region, and were I sure that they are not common with you, it would give me a florist's gratification to send you seeds of some of them, but I am no botanist, and do not know how to describe them. The pulmonaria is freely growing here in meadows, and is called "blue-bell." I have cultivated it, as have many others, with success. I have a very handsome perennial, flowering about the 1st of July, in cultivation, from the woods, growing to the height of two feet, with three-lobed leaves, and white flowers of five petals growing singly on rather a long foot-stalk. I have never seen it in Connecticut, nor have I ever found a name for it here, as "wild flowers" are much despised. From this miserably imperfect description, can you divine what it is? and will you have the seeds? I call it *Estella*, though the flowers are not star-shaped.

I have raised the *Bartonia aurea* and *Nigella hispánica* from seeds received from Hovey & Co. two years since, more beautiful than Mrs. Loudon's engraved representation. Indeed, all the seeds I procured from those gentlemen were very successful.

There is a growing taste for floriculture and horticulture in this remote region. At Cortland Village, Mr. Randall has a fine greenhouse and beautiful grounds; the only private greenhouse I know hereabout. We have procured fine plants (perennials) from Rev. Mr. Bostwick, of Hammondsport, to whom we owe the introduction of the Chinese pæonies, and some other rare floral ornaments. You will pardon these notices, as I know you are desirous of receiving information on these subjects, however superficial, which shows the dawn of a brighter day in floricultural knowledge.—*Respectfully yours, S. W. J., Oswego, Tioga Co., N. Y.*

Botanical Intelligence.—Our botanical friends will be pleased to learn that Dr. Asa Gray, the able coadjutor of Dr. Torrey, in the publication of the *Flora of North America*, has been appointed to the Fisher Professorship of Natural History in Harvard University. We may congratulate Dr. Gray on his appointment to fill such a situation, and doubt not but that he will be the means of awakening an interest in botanical studies, which have, since the resignation of Mr. Nuttall, as Curator of the Botanic Garden, been almost, or quite, given up.—*Ed.*

ART. IV. *Retrospective Criticism.*

Linnæan Botanic Garden and Nursery, Flushing, L. I. Correction.—I request the favor of you to correct a typographical error in my communication in relation to this establishment, inserted in the last number of the Magazine of Horticulture, (p. 153.) The premises therein referred to, as having been purchased by William R. Prince for his residence, comprise only about *five* acres of land, instead of fifty acres.—*I am, very respectfully, your obedient servant, Gabriel Winter, Flushing, L. I., April, 1842.*

Caméllia var. Covingtónii,—*error corrected.*—Dear Sir: your Horticultural Magazine, for April, 1842, has just come to hand, and I find upon the 123d page, 3d line from the top, that you give me the credit for raising *Caméllia Covingtónii*, and also *Caméllia Judge Washington*, which is an error; the *Caméllia Covingtónii* was raised by Col. R. Carr, of Bartram's gardens, near Philadelphia, and the *caméllia Judge Washington* was raised by Mr. J. J. Frobel, in Fairfax county, Va. On the same page, 28th line from the top, you say that I propagate the *Euphórbia jacquínæflóra*, by inarching, which is a mistake: they were propagated by layings in the common way. [We did not notice this error—layering was intended.—*Ed.*] By correcting the above in your next number, you will confer a singular favor on,—*Respectfully yours, J. S. Gunnell, Washington, April, 4182.*

[Many of our memoranda made during our visit, were noted down so hastily that we had not time to particularize; and trusting much to memory, the time which elapsed before we wrote them out in full, led us into an occasional error. We are gratified to be corrected.—*Ed.*]

Caméllia var. Hempsteàdii and Lándrethi.—In the last number of the Magazine, I saw some remarks relative to the merits of *Caméllia var. Hempsteàdii* over that of *Lándrethi*. Whoever the writer is, he certainly never saw a good flower of *Lándrethi*, as it is impossible he should have made such a comparison. There is a delicacy in the petal of *Lándrethi* which the other does not possess. There is a decided coarseness of petal in *Hempsteàdii*, that makes the greatest objection to its being rated as one of the first rate seedlings: it seems to be an improvement of *C. elàta*, raised by Cunningham, in Edinboro'. I have made the above remarks as my opinion of the superiority of the one over the other, without any intention of detracting from the merits of *Hempsteàdii*, for it is undoubtedly a good seedling; yet I think *Lándrethi* better, nay, even one of the best that has been produced.—*An Amateur, Philadelphia, April, 1842.*

The Garden and Grounds of the President's House, (p. 128.)—In your present number, you call the gardener at the Capitol Murphy, instead of Maher; and the garden of the President's house is not the three mounds you describe, but a very well arranged kitchen garden, under the management of a very scientific and skilful man, Mr. Owsley, who has obtained several premiums from the Columbian Horticultural Society, for superior fruits and vegetables raised there by him.—*Yours, J. F. Callan, Washington, D. C., Jan. 1842.*

ART. V. *Pennsylvania Horticultural Society.*

The Society held its stated meeting at its hall, on the 15th of February.

The Committee appointed at the stated meeting in January, under the Resolution in regard to new Plants, Flowers, Fruits, and Vegetables, reported the following rules prescribing the limits within which plants, flowers, fruits and vegetables shall be deemed new, within said resolution, and other regulations in regard to that subject.

Rules of the Committee on new Plants, Flowers, Fruits and Vegetables, reported under the third Resolution.

I. Plants, flowers, fruits, and vegetables shall be deemed *new*, within the meaning of the Resolution, whether they be new genera, species, or varieties, provided they have not been known and described in some public work for more than eighteen months previous to the year, according to the calendar in which they are exhibited, and are exhibited before this Society, at the following times: 1. In the case of plants not in flower—within six months after their first introduction into some collection, garden or field, in the United States: 2. In the case of flowers—at their first flowering after such introduction: 3. In the case of fruits and vegetables—during the first season of their maturing after such introduction.

II. Persons presenting for exhibition any plant, flower, fruit or vegetable, as new, must present to the Committee a statement written and signed, showing—1. The systematic as well as the English name, the habit, habitation, in the garden, popular character, time of flowering, fruiting or ripening, color, size or height: 2. If an exotic, the year of its introduction into the United States; if indigenous to any of the United States, its locality: 3. Its mode of propagation, and appropriate soil: 4. A colored figure or representation, if the Committee shall require it.

III. The subject shall thereupon be examined by all the Committee who shall be present, and the description shall be referred to a sub-committee of two, who shall be appointed by the chairman, who shall thereupon report to the Committee.

IV. The Committee shall make its report in writing to the Society, at the same or the next monthly meeting.

The Special Committee were directed to contract with the agents of the lessee of the lower saloon of the Philadelphia Museum building, in which to hold their future meetings.

A great number of plants were exhibited at this meeting. The following is the report of the Committee awarding premiums:—

For the best ten varieties of camellias, to John Sherwood. For the most interesting collection of plants in pots, to R. Kilvington. For the next best collection of plants in pots, to Alexander Parker. For the best bouquet, to John Sherwood. For the next best bouquet, to Robert Kilvington. For the most interesting display of vegetables, to Jacob Engleman.

ART. VI. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>	From		To		<i>Pot and Sweet Herbs.</i>	From		To	
	\$	cts.	\$	cts.		\$	cts.	\$	cts.
Potatoes:					Parsley, per half peck.,	25		37½	
Chenangoes, { per barrel, . . .	1	00	1	25	Sage, per pound,	17		20	
{ per bushel, . . .		45		50	Marjorum, per bunch,	6		12½	
Eastports, { per barrel, . . .	1	75	2	00	Savory, per bunch,	6		12½	
{ per bushel, . . .		75	1	00	Spearmint, green, per bunch,	3		6	
Common, { per barrel, . . .	1	00		—					
{ per bushel, . . .		45		50	<i>Squashes and Pumpkins.</i>				
Sweet potatoes, per bushel,	1	50		—	Squashes, per pound:				
Turnips, per bushel:					Canada Crookneck,	5		6	
Common,		37½		50	Autumnal Marrow,	—		—	
Ruta Baga,		37½		50	Winter Crookneck,	4		5	
French,		37½		50	West Indies,	3		4	
New, per bunch,		—		—	Pumpkins, each,	12½		20	
Onions:									
Red, per bunch,		5		6	<i>Fruits.</i>				
New white, per bunch, . . .		6		8	Apples, dessert:				
White, per bushel,		—		—	Baldwins, per barrel,	5	00	—	
Yellow, per bushel,	2	00		—	Russets, per barrel,	3	00	3	50
Beets, per bushel,		75		—	Greenings, per barrel,	2	50	3	00
Carrots, per bushel,		62½		—	New York pippins, per bbl.	—	—	—	
Parsnips, per bushel,		75	1	00	Common, per barrel,	2	00	2	50
Salsify, per dozen roots, . . .		12½		—	Pippins, per bushel,	—	—	—	
Radishes, per bunch,		6		8	Sweet, per bushel,	—	—	—	
Shallots, per pound,		20		—	Dried apples, per pound, . .	4		5	
Garlic, per pound,		12½		—	Pears, per dozen:				
Horseradish, per pound		10		12½	Chaumontel,	—	—	—	
					Baking, per bushel,	2	00	2	50
<i>Cabbages, Salads, &c.</i>					Cranberries, per bushel, . . .	2	00	2	50
Cabbages, per doz:					Grapes per pound:				
Savoy,		—		—	Malaga, (white),	20		25	
Drumhead,	75		1	00	Pine-apples, each,	12½		25	
Red Dutch,		—		—	Cucumbers, each,	12½		25	
Brocoli, each,		—		—	Water-melons, each,	25		37½	
Cauliflowers, each,		12½		25	Lemons, per dozen,	12½		17	
Lettuce, per head,		6		8	Shaddock, each,	12½		—	
Spinach, per peck,		17		20	Oranges, per doz:				
Dandelions, per peck,		12½		—	Havana,	37½		50	
Turnip tops, per peck,		20		—	Sicily,	20		25	
Rhubarb, per pound,		6		8	Walnuts, per bushel,	1	25	1	50
Asparagus, per bunch,		12½		—	Chestnuts, per bushel,	2	00	—	
Celery, per root:					Butternuts, per bushel,	1	00	—	
Common,		—		—	Almonds, per pound,	14		15	
Cucumbers, (pickled) pr gal.		25		—	Castana, per pound,	—	—	—	
Peppers, (pickd,) per gallon		37½		—	Cocou nuts,	3		4	

REMARKS.—The weather during April, though quite variable, has not been marked with any extremes of heat or cold: no frosts have occurred to do any damage to vegetation, and the season now promises well. Considerable rain has fallen the latter part of the month, but owing to the previous dry state of the soil, it has not but very slightly retarded spring operations. The cherry and plum trees are

now pushing their flower-buds, and, in some favorable situations, are already open, at least twenty days in advance of last spring.

Vegetables.—There has been some change in potatoes since our last: the stock of Chenangoes is not large, and there is a steady demand, but prices cannot be quoted higher: Eastports are abundant, and not very good; they did not appear to fully ripen last year, and owing to the great quantity which was thrown into the market in the autumn, a great part of those now remain on hand, they go off heavily at a considerable reduction from the usual rates, Chenangoes being preferred: long reds are very plentiful, and selling from the wharf at very low prices: Sweet are well supplied for the season; the whole stock of those now sold was wintered by one of the market gardeners of the vicinity; they were kept in a room heated by anthracite coal, prepared on purpose for wintering squashes, sweet potatoes, and other roots. Turnips are plentiful and good. Onions are scarcer, and prices have materially advanced; new white are now brought in of fair size and quality. Parsnips are nearly gone, and those of good quality command an advance. Salsify is well supplied, but rather inferior. Radishes are now brought in in large quantities. Lettuce is abundant, large, and handsome: the weather has been favorable. Spinach, dandelions, and other greens, are now supplied in such quantities as to stock the market. No celery, we believe, is now to be found. Asparagus made its first appearance the present week, but the cool weather of the last few days has prevented a good supply. Rhubarb is now brought in well grown; the demand for this vegetable has wonderfully increased within a year or two, and the supply has also been so abundant as to keep the price at a reasonable rate. West India squashes are abundant, but the stock of other sorts is nearly exhausted.

Fruit.—Apples are nearly gone; with the exception of Russets and Baldwins, scarcely any other kinds remain on hand. Pears are about gone. Cranberries are without alteration, though the stock is small; the supply of rhubarb has lessened the demand at this season. Grapes are all gone. Pine-apples are abundant; one or two cargoes have just arrived, which have supplied the market. Cucumbers are brought in quite plentifully for the season, and prices are moderate. A few water-melons have come to hand. Lemons are abundant, and prices very low.—*M. T., Boston, April 28, 1842.*

HORTICULTURAL MEMORANDA

FOR MAY.

FRUIT DEPARTMENT.

Grape vines in the grapery will flower this month; when the buds shew signs of opening, increase the temperature, and omit syringing until the fruit is set: the walks of the house, however, may be sprin-

kled after warm days, in order to create a fine steam, which will be beneficial to the plants; lay in the bearing wood for next year, as it proceeds in growth. New borders may be now made, and the plants set out any time this month with safety, if the vines are in pots.

Raspberry beds should be dressed, and the vines tied to stakes.

Grafting may yet be performed with perfect safety, provided the scions have been cut in due time.

New beds of strawberries may be made this month; old beds will be in bloom; water the plants after the fruit is set.

Fruit trees will need some pruning, if previously omitted; keep them free from insects by the use of whale oil soap.

FLOWER DEPARTMENT.

Dahlias.—When there is a great number of plants to set out, operations may be commenced the latter part of the month; but if only a few are to be transplanted, it is best to put them into the border about the first of June, and from that time to the 15th. Those planted late produce the best flowers in September.

Roses, of the monthly and other tender sorts, may now be turned out of the pots into the border.

Camellias will need attention; water freely, and syringe over the foliage at least three times a week.

Chrysanthemums should be potted this month, if not done before.

Pansies may be transplanted in the border, and seeds may be sown now for a succession of plants.

Verbenas may now be turned out into the border.

Geraniums will now be flowering: give plenty of water and air.

Ericas may be propagated by cuttings now.

Annual seeds, of hardy kinds, may now be sown in the open border, such as poppies, larkspurs, candytuft and others, where they are to stand, as they do not bear removal without injury. *Asters*, *bal-sams*, &c., forwarded in boxes, may be transplanted into the border this month.

Erythrina crista galli.—Plants of this splendid flower may be turned out of the pots, in which they were wintered, into the border.

Calceolarias will need repotting again this month for the last time.

Cactuses will now be flowering, and should be more freely watered.

Cyclamens may be turned out of the pots into the open ground, selecting a cool, moist situation.

Hardy Roses should receive attention: as soon as the *slug* makes its appearance, the plants should be syringed with whale oil soap, every three or four days.

Perennial flower seeds may be planted the latter part of this month.

Salvia splendens, *fulgens*, &c., kept in the green-house, should be turned out into the border.

Chinese Primrose seeds may be sown this month.

Green-house plants of most kinds may be removed to the open air, selecting a cool and half shady situation.

THE MAGAZINE
OF
HORTICULTURE.

JUNE, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *On the cultivation of the Grape Vine in Graperies; being a Diary of the progress of the vines, from the first application of heat to the maturity of the fruit.* By O. JOHNSON, Esq., Lynn, Mass.

[IN a previous volume (V., p. 293,) we gave an account of the amateur garden of Mr. Johnson, and, in particular, alluded to the fine crop of grapes which was then ripening (July, 1839,) in the vinery. Being so highly pleased with the excellent appearance of the crop, we requested Mr. Johnson to send us a communication, detailing his mode of practice; for although several articles had appeared on the growth of the grape vine in our earlier volumes, we felt desirous of giving our readers the experience of an amateur cultivator; professional men, in their articles, often omitting many things which, though to them of little importance, are the most needed by new beginners. For his gratification and amusement Mr. Johnson had kept a diary of the progress of the vines, and had made memoranda of every thing which had appeared useful for future reference or improvement; and he kindly offered to give us an abstract from this at a future time, should we deem the information in any way useful, or adding value to our pages. We have now the pleasure of laying this diary before our readers, and we may safely recommend it to all amateur cultivators of the grape, and to gentlemen who manage a grapery for their own amusement, as an excellent guide to the successful cultivation of this delicious fruit; when they have produced as fine a crop as we have seen on Mr. Johnson's vines, they may feel gratified at their success. They should not, how-

ever, omit to read the works of professional men, to whom Mr. Johnson was indebted, in connection with his own practice, for the information which aided him in the management of his vines.

It only remains for us to say that the vines were planted out in the border in May, 1835; they were then one year old in pots. In 1836 and 1837 they were headed down. In 1838 they bore a few bunches of grapes, and made fine wood for the following year, when the date of the diary commences. *Feb. 1839.—Ed.*]

FEBRUARY.	Temperature.			
	Morn.	Noon.	Night.	
13				Commenced fire heat in the vinery. [The thermometrical observations are taken at 6 o'clock in the morning, at noon, and 10 o'clock at night.]
14	50	80	60	Placed horse manure in the house to warm the border. Washed the house. Took up the vines, (which had been covered to protect them from the frost,) and washed them with warm soap suds: raised as much moisture as possible. Weather moderate and cloudy.
15	50	70	58	Weather quite moderate and thawy. Sleet.
16	48	60	55	Covered inside border with sand for sprinkling. Thaw. Whitewashed the vinery.
17	50	55	58	Earthen pans on the flues kept filled with water, but syringing suspended on account of the moisture in the atmosphere, it having been damp for three days. Cloudy.
18	51	67	60	Washed vines with soap suds. Weather moderate: a slight snow last night.
19	40	75	60	Pans kept full of water for the sake of steam, and vines syringed <i>twice</i> a day in sunny weather. Weather changed suddenly last night; cold, and temperature fell 10° below minimum point.
20	57	70	61	A Sweetwater vine in a pot, taken from the cellar on the 18th, and pruned at that time, is now bleeding profusely. At this season of the year, in order to economise with fuel, the furnace should be managed carefully. We found it a

				good plan about 10 o'clock at night, to close the door of the ash-pit and furnace, and push the damper in the chimney as far in as possible. No air is then admitted, except through the crevices of the iron-work. The thermometer fell only 4° during the night. Watered vines with soap suds.
21	57	75	61	The last seven days have been very mild for the season: to-day appears like an April day.
22	57	64	63	Weather became cold during the night.
24	60	63	64	Weather cloudy and thawy for the last three days. The floor of the vinery kept constantly damp, and the flues watered twice at night.
25	57	64	64	Rainy and thaw.
26	59	70	65	Muscat of Alexandria vine bleeding at the buds. Weather clear and rather cool.
27	59	64	64	Muscat vine continuing to bleed excessively, and finding all attempts to stop it unsuccessful, we hastily concluded to prune it down beyond the bleeding bud, and cover the wound with bladder of triple thickness (two very fast:) this, it was supposed, would stop it; but in a few moments the sap reappeared, forcing its way through other buds, and even through the smooth bark in many places. The buds on the Sweetwater vines in pots began to swell. Rain last night: dull weather during the day: snow nearly gone.
28	53	75	65	Morning fine; afternoon cloudy. When the fire is at a red heat, the damper and furnace door are closed to keep up the heat.
MARCH.				
1	56	80	71	Bright morning; weather cool.
2	64	70	68	Quite warm and pleasant for the season.
3	58	64	64	Weather changed last evening suddenly; a cold snow storm set in to-day. Afternoon clear.
4	62	80	63	Buds of some black Hamburg vines beginning to swell. Dug up the inside border, and, notwithstanding all precautions, destroyed a few of the grape roots, which were within three inches of the surface. From this circumstance, we have determined not to disturb the border

				outside, but merely to loosen two inches below the surface: we are satisfied that the vines have been injured by deep digging the borders. Cold severe: last night temperature 2° below 0.
5	51	70	68	The cold very severe. The sudden changes render it almost impossible to keep a regular temperature in the house, which should not stand (at this stage of forcing) below 60°. The house having originally been intended for a grapery without fire heat, it is not well adapted to forcing.
6	60	73	68	Weather cool and pleasant.
7	62	75	68	Buds of the vine in pot breaking.
8	59	74	64	
9	60	75	63	Buds of Hamburgs breaking. Snow last night.
10	60	73	63	
11	50	75	60	Quite cold last night. Windy.
12	54	76	62	Buds of Hamburgs mostly breaking. Owing to the changeable weather, there is some fear that there has been too much heat, as a few of the shoots appear weak. Plenty of air has been given daily.
13	60	75	64	Buds of Muscat of Alexandria breaking. Fruit buds appear on the Hamburgs.
14	60	74	60	
15	54	70	64	
16	60	75	61	
17	60	80	61	The buds have broken remarkably fine: almost every bud throughout the house is opening. Longest shoot on Hamburg was four inches at noon. The Muscat, which broke first last year, is now the most backward. Quere—Is it not owing to excessive bleeding?
18	63	63	64	
19	62	60	63	
20	62	65	64	
21	62	62	66	
22	60	60	66	
23	62		66	After this period, the thermometer was observed only at morning and at night.
24	60		69	

			The temperature ranging from 62° to 80° during the remainder of the day, with an abundance of air in good weather.
25	60	65	
26	62	63	
27	63	64	
28	61	67	
29	64	67	
30	66	68	
31	62	70	The last six days cloudy; wind east; quite cold last night for the season.
APRIL.			
1	60	72	
2	62	71	
3	66	70	
4	64	74	
5	65	73	
6	66	76	Topped the fruit-bearing shoots one joint above the fruit, and when the lower shoots appear weak, top the leading shoot of the vine.
7	74	66	
8	62	72	Discontinued syringing the vines.
9	66	74	
10	64	73	
11	70	73	A few clusters of flowers began to open on two vines.
12	73	78	
13	66	80	
14	68	76	The last three days wind north-east, with much rain; to-day sleet and rain. Grapes blooming beautifully: keep up a high temperature with moisture, when the weather is cloudy during the day.
15	67	77	
16	72	77	Floor sprinkled to create a fine steam.
17	77	74	
18	66	78	A few clusters of flowers open on the Muscat of Alexandria.
19	73	77	
20	70	76	
21	64	78	Temperature kept up. The thermometer should not be allowed, at this stage of the growth of

			the vines, to fall below 75°; but owing to the faulty construction of the house, it has been almost impossible to keep up a regular heat.
22	71	78	The grapes on the black Hamburg vines are mostly set; those at the top of the house as large as small peas, while those below are just out of bloom. Many of the bunches show great promise, and the vines look remarkably vigorous and strong, with the exception of one vine, next the partition glass, which made the largest wood last season, apparently fully ripe and little pith; notwithstanding these favorable promises, it showed little fruit, and the shoots are small and weak.
23	69	81	Cut out about fifty bunches in thinning.
24	77	75	
25	74	78	
26	77	63	
27	71	80	
28	73	75	
29	70	70	
30	70	70	Commenced syringing again, twice a day, in fine weather. Moisture is also plentifully supplied by keeping the pans well filled with water.
	MAY		
1	70	70	
2	68	66	
3	66	68	Much rain during the last week: have kept a brisk fire in the day, and admitted air. The vines look finely. Continue thinning and shouldering the bunches, after cutting out about one half their number. [By shouldering is understood tying up the shoulders on the large clusters to the trellis, so that they may not press upon the lower part of the bunch.— <i>Ed.</i>]
4	68	70	
5	60	77	
6	61	62	
7	59	66	
8	57	73	Plenty of air admitted.
9	70	68	
10	58	62	
11	56	54	Grapes now swelling off finely.

12	56	71	Abundance of moisture kept up.
13	65	66	
14	63	73	A fine rain to-day. The month has been rather cool; several nights the past week the earth has frozen slightly. The grapes are now swelling finely. Continue to thin the fruit daily.
15	65	68	The process of thinning the berries continued, taking out some almost every day, and always the smallest.
16	69	70	
17	68	61	
18	58	71	
19	68	74	Abundance of air given in fine weather.
20	68	69	
21	62	67	
22	70	76	
23	66	72	
24	69	72	Next year's bearing wood carefully laid in.
25	70	72	
26	68	72	
27	72	74	
28	74	72	
29	73	72	
30	70	70	
31	62	68	The month of May has been, as a whole, unfavorable for the grape. Much rainy and dull weather: we have been obliged to light fires every night, and occasionally in the day. The grapes have been often looked over and thinned, yet there is no doubt the scissors have been used too sparingly.
JUNE.			
1	69	68	
2	66	66	
3	66	64	
4	66	68	All lateral branches cut clean out.
5	61	68	
6	64	76	
7	60	70	Bunches supported by tying to the trellis.
8	61	70	
9	62	70	
10	64	69	The grapes have now completed their stoning process, and a few near the furnace swelling off.

			No mildew, or disease of any kind, has yet been discovered, and the vines generally have the most healthy and vigorous appearance. The weather has been dull and disagreeable, which has rendered fires necessary.
11	64	64	
12	55	69	
13	66	66	A few of the black Hamburgs and Zinfindals, near the flue, perceived to be changing color. Weather quite unfavorable; fires at night.
14	65	71	
15	71	62	Syringing now discontinued.
16	61	68	
17	58	66	
18	59	66	The month, thus far, has been remarkable for high winds, which have injured many plants.
19	61	60	
20	56	68	
21	66	67	
22	60	67	
23	64	62	The grapes are now swelling finely. Those at the western flue mostly colored; also the Zinfindal next. The second vine from the partition, having to sustain the heaviest crop, is rather backward, and we fear some of the berries may shrink: having left different quantities on vines of the same apparent strength, we shall be able to ascertain their powers of maturation. After this period the thermometrical observations were discontinued; as the crop was now beginning to color, and the weather generally warm, abundance of air is admitted in all fine weather.
26	-	-	Bunches of the Zinfindal near the furnace, and at the top of the house, are now perfectly colored, and apparently ripe. Ceased making fires.
29	-	-	A little air is admitted at night. Weather delightful.

July 4.—Cut six bunches of Zinfindal grapes; the largest a pound and a half; weight of the whole, five pounds and a quarter.

6th.—Exhibited Zinfindal grapes at the Massachusetts Horticultural Society.

13th.—Exhibited black Hamburg grapes at the Massachusetts Horticultural Society's room.

15th.—A few bunches of the Muscat of Alexandria are now ripe; the flavor exceedingly fine.

20th.—Continued to cut Zinfindal grapes.

22d.—The ripening of all the grapes being now completed, we have not deemed it necessary to continue the diary. In the vinery we shall cut about two hundred and thirty pounds of grapes from nine vines, [being about twenty-five pounds to each.] The Hamburgs average nearly one pound and a quarter to the bunch throughout.

In the cold house, separated from the vinery by the partition, a little mildew was perceived. By dusting sulphur on the infected bushes, the mischief is instantly checked. Most of the cultivators with whom we have conversed complain grievously of mildew this season, and some have lost part of their crops by inattention on its first appearance.

Aug. 10th.—Again exhibited some of the Hamburg grapes at the Massachusetts Horticultural Society's room. One fine bunch weighed two and a half pounds, and a beautiful cluster of Muscat of Alexandria one pound. Some of the berries of the former measured three inches in circumference, and the latter three and a quarter by three and three quarter inches.

Another season we intend to use a larger quantity of soap suds on the grape border. Have not paid sufficient attention to the watering of the border, and the inside, especially, must have suffered. Another fault to be removed next year is, to tie up all the projecting grapilons as well as the shoulders, which would allow the grapes to swell without crowding.

The grapes in the cold house are swelling finely. The bunches were thinned much more severely than in the vinery, but, notwithstanding this, they are all filled up, and many are too crowded. The berries are also larger than the grapes in the vinery, though none of the clusters have attained the same size.

Much has been written upon the subject of the *shrivelling* or shrinking of grapes: none of the clusters in the vinery were affected; but in the cold house, some shrivelling was perceived on a few bunches. We are inclined to believe that

the moisture given after the grapes begin to color, and want of sufficient air, are the causes.

To insure a good crop of grapes, we are satisfied that they must have—*plenty of heat—plenty of air—plenty of moisture—severe thinning of bunches—and severe thinning of berries.* The vines, also, must be pruned often, and kept free: the wood *never* crowded. Great attention must be paid to the airing of the house, which must be done gradually, that there may be at no time a *sudden* change in the temperature.

With such attention, and the prerequisite of a rich border, on a dry subsoil, good crops of fine grapes are always to be obtained. The vines require much moisture until they have completed their last swell, when the moisture should be withdrawn.

O. JOHNSON.

Lynn, Mass., April, 1842.

ART. II. *On Root-pruning of Pear Trees; to which is added a short Treatise on the subject, read before the London Horticultural Society, April 7, 1840.* By T. RIVERS, JR., of the Sawbridgeworth Nurseries, near London.

SOME time since, we adverted to the subject of root-pruning trees, which has been much discussed in the English gardening newspapers and magazines during the last year, and yet continues to be a topic of great interest. We also stated that we should prepare an abstract of what had been written, for our pages, in which we should embody the substance of all the various communications which have appeared on the subject. Since then, the treatise of Mr. Rivers, which was read before the London Horticultural Society in April, 1840, and which first called the attention of cultivators to the system, has been kindly forwarded to us by the author. Since the original paper was written and published in the *Transactions* of the Society, Mr. Rivers has revised his communication, and after adding “additional hints, suggested by recent experiments,” has published the whole in a small pamphlet. As this paper goes into a detail of root-pruning, and gives all

the information which is necessary to practise the plan successfully, it relieves us of the duty of collating from the various articles which have appeared, the same information, though in a more diffuse form, and suggested by cultivators whose experience is by no means so extensive as that of Mr. Rivers, who has practised root-pruning six or eight years, with the greatest success, as will be perceived after a perusal of his paper.

The publication of Mr. Rivers's pamphlet, and the interest he has taken in the subject of root-pruning, has subjected him to the attacks of several writers, who have charged him with claiming the system as one of his own invention—if invention it may be called—and they rarely quit the subject without referring to its being “old as the hills,” &c. Mr. Rivers, however, does not lay any claim to its originality. Root-pruning, to a certain degree, was practised more than forty years ago: one or two articles have appeared in the earlier volumes of the *Gardener's Magazine*, giving an account of the success of the operation on fruit trees on walls; and Hayward hints at the subject, in his *Theory of Horticulture*. Mr. Rivers has been, however, the first to carry the system out to its full extent, and to show to the cultivator of trees the great claims it has upon his attention. In this respect, it may be truly called—as it has been, in a ridiculing manner—“Mr. Rivers's system.” It loses nothing of its value from having been known forty or fifty years, if, until now, no really useful results have ever been derived from its practice.

Amputation of a few roots, to check luxuriant growth, is nearly all that has been heretofore recommended. No previous writers, we believe, have adverted to its importance in bringing young trees into an early bearing state, by applying root-pruning to maiden trees in the nursery. It is this part of Mr. Rivers's pamphlet, which gives it its value. It has been a desideratum with all possessors of gardens, to cultivate a variety of fruit trees in a small space. This they have been unable to do, if standard trees are selected; espaliers have been too expensive, and attended with much trouble; and dwarfs or paradise stocks produce too small a quantity of fruit for general purposes. How, then, shall the object be attained? In no way but that recommended by Mr. Rivers. A hundred trees may be cultivated on the root-pruning system, as practised by him, in a space of ten times as many square

feet, and an abundance of fruit obtained in a short period after planting.

One portion of Mr. Rivers's system is certainly new and original with him. This is that part of his paper which treats of the application of strong manure to the trench around the tree operated upon, in order to keep up its vigor. By this means trees are rendered almost independent of the natural soil in which they grow, a barrowfull annually applied to each, enabling them to produce a good crop of fruit.

There are other advantages attendant upon the plan of root-pruning: one is the early period at which young trees produce fruit, thus gratifying the impatient cultivator with a taste of what he possesses; another, perhaps equally important, is the facility with which such trees are removed at the age of eight or ten years and upwards. We noticed an account in the *Gardener's Chronicle*, in which the writer stated he purchased a few pear trees of Mr. Rivers, which had been root-pruned in the nursery, and the following year after they were received, they produced a fine crop of fruit. Those who have had their patience tried for at least half a dozen years, while waiting the fruiting of some choice pear, will at once appreciate the value of a system which shall remove this season of suspense.

But Mr. Rivers does not need to be defended by us. However much some may cavil at his practice, and call it an old system, it has its merits, and a perusal of the paper will carry conviction to all, that it is one of the most valuable communications which has ever been read before the London Horticultural Society.

An attentive perusal of Mr. Rivers's paper will be necessary for all who intend to carry root-pruning into effect. Success at first, and in every instance, must not be expected. It will be better to err on the wrong side, and prune too little, rather than too much. Experience must be the only sure guide, and after obtaining the results of one season, on trees more or less severely pruned, another year will enable the cultivator to apply the spade in a judicious manner. The coming autumn will be the time to commence; and, by fully understanding the directions which are given, success will, in a short time, attend every operation.

“It is now about ten years since, in consequence of being much inconvenienced by the confusion in the names of new

pears, I felt myself called upon to plant specimen trees of all the varieties I then possessed. But fearing that much ground would be wasted in the experiment, I kept my mind on the alert to arrest superabundant growth and induce early fruitfulness; this I then thought could be best done by planting the trees in small square brick pits, leaving holes at the bottom for drainage. Plunging trees in large pots also occurred to me; but as I soon found these methods too expensive, I took advantage of a piece of shallow loamy soil resting on a substratum of very hard white clay, to carry out my ideas; for I calculated that the roots of the trees would not penetrate the clay, and that the soil on the surface might be made rich enough to support the trees without vigorous and unruly growth. However, I soon found that the roots of trees are not so easily kept within bounds, and that those of my pear trees, in search of nutriment, not being able to enter the hard clay, were wandering far and wide, the branches also keeping pace with the roots, and growing much too rapidly for my calculations as to the space each tree ought to have occupied. I had previously remarked for many years that apple trees growing in a firm loamy soil in this nursery, if removed one or two years consecutively, which in nursery culture often occurs, acquired a stunted and prolific habit, making abundance of bloom buds and bearing profusely. On examining these trees I found they had no large feeding roots, but only a mass of fibres. I also found that if such trees were by accident planted near, or in rich soil, comparatively large feeding roots were formed; they commenced growing with vigor, and their fruit-bearing propensities were proportionately diminished, their tufty fibrous roots gradually disappearing. I mention this without endeavouring to draw any conclusions from it, as it is intended simply to state the progress of my ideas. It then occurred to me that if I could keep the roots of my pear trees in a fibrous state by frequent removals, I should make them acquire the stunted and prolific habit I had so long observed in apples.*

“In attempting to remove my pear trees, a second thought occurred, that it would be less trouble to dig a trench round them and cut all their roots at a certain distance from the stem,

* I think I may say that I knew a small and neglected quarter of apple trees, in my younger days, that were six to eight years stationary as regards growth, but perfectly healthy and bearing every year profusely, the soil a stiff loam.

and this completely fulfilled my anticipations. I have pruned thus radically for five seasons, and with the most satisfactory result.

“The five following paragraphs refer to specimens of bearing branches, sent to the Horticultural Society, with this paper.

“Shoots of the Autumn Bon Chrétien of last season’s growth were only three to four inches long, the root having been pruned December, 1838. A tree in this state should have one or even two years’ rest, that is, its roots should not be again pruned till it makes shoots, six to eight inches long in one season.

“The Passe Madeleine, whose roots were pruned in December, 1838, has made no shoots, but is covered with blossom buds; the roots of this, may also have one, or, if it makes no vigorous shoots the ensuing season, even two years’ rest.

“In the Vallee Franche, the maximum of last year’s shoots was four inches; this tree was arrested by root pruning in December, 1838, and is now covered with blossom buds. As this variety is inclined to vigorous growth, it will not be proper to give it more than one year’s rest, and this, in general will be found enough for all trees that are strong growers; for those of more slender growth, two and often three years’ cessation from root-pruning will be necessary to prevent the fruit being small and inclined to grittiness, a common fault in pears that lack nourishment from the soil or the stock.

“The Autumn Bergamot is well known to have supported the Herefordshire distich,

“He who plants pears,
Plants for his heirs.”

“With root-pruning, it seems inclined to be as prolific as the new varieties. I may here mention, that a Gansel’s Bergamot, being pruned rather too harshly in December, 1838, bloomed most profusely last spring, and died in the summer.

“In the Winter Nelis, the last season’s growth was three inches; the tree is now covered with blossom buds.

“In all these cases, the shoots are in a state of perfection as regards prospective fruitfulness.

“It now only remains for me to give some hints and directions as to the mode of operation. The best description of trees for what I may perhaps be allowed to call garden or-

chards, are half standards with round well-formed heads, the same trained *en quenouille*, and dwarfs in the usual bush fashion. For immediate effect, these should be prepared by annual root-pruning, for one, two, or three years, in the nursery; but if not so prepared, trees of the usual size and quality may be planted, and suffered to remain two years undisturbed, unless the soil is rich and they make vigorous shoots the first season after planting; operations may then commence the first season: thus, supposing a tree to be planted in November or December, it may remain untouched two years from that period, and then, early in November, if possible, a circumferential trench, ten inches from the stem of the tree, and eighteen inches deep, should be dug, and every root cut with a sharp spade, which should be introduced quite under the stem, at about fifteen inches in depth, so as completely to intercept every perpendicular root. The treddle spade used in this part of Hertfordshire is a very eligible implement for this purpose, as the edge is steeled and very sharp. The following year, the third from planting, a trench may again be opened at fourteen inches from the stem, so as not to injure the fibrous roots of the preceding summer's growth, and the spade again used to cut all the circumferential and perpendicular roots that are getting out of bounds: the fourth year, the same operation may be repeated at eighteen inches from the stem, and in all subsequent root-pruning, this distance from the stem must be kept; this will leave enough undisturbed earth round each tree to sustain as much fruit as ought to grow, for the object is to obtain a small prolific tree. I assume, that in the course of years a perfect ball of fibrous roots will be formed, which will only require the occasional operation of a trench being dug, and this ball of earth heaved down to ascertain whether any large feeders are making their escape from it. But it must be borne in mind, that this circular mass of soil will, in a few years, be exhausted; to remedy which, I have had left round each tree, a slight depression in the soil, or, in other words, the trench has not been quite filled in: this circular furrow I have filled with fresh night-soil, which has had a most excellent effect; any other liquid manure would undoubtedly be equally efficacious, but my soil was poor, and I thought it required strong manure; as it did not come in contact with the roots, no injury resulted from using such a powerful raw manure. There is perhaps no absolute

necessity for liquid manuring, as common dung may be laid round each tree in the autumn, and suffered to be washed in by the rains of winter and drawn in by the worms. In mentioning liquid manure, I give the result of my own practice: the great end to attain seems (to use an agricultural phrase) to be able 'to feed at home,' that is, to give the mass of spongioles enough nutriment in a small space, but not too much, so that a tree will make shoots about four inches long in one season, (for such, I conceive, ought to be the maximum of growth,) and at the same time be able to produce abundance of blossom buds and fruit: on trees of many varieties of pears, the former will be in too great abundance; I think removing a portion in early spring would be an improvement in pear culture. I have not mentioned the necessity of pruning the branches of pear trees thus brought into early fruitfulness; all that is necessary is the occasional removal of a crowded branch, the fact being that root-pruning almost does away with the necessity of branch-pruning. Sometimes, however, a root will escape the spade, and then in the following summer, a vigorous shoot or two will make their appearance; these should be shortened in July,* to within four buds of their base, and the following autumn the feeding root must be diligently sought for and pruned.

"To prune roots with a spade may be thought a rough and ungardenlike operation, but to use a knife would be tedious. In defence of spade-pruning, I can only say, that it seems to answer perfectly with my trees, and experience is generally a tolerable guide.

"I have also practised root-pruning on apple trees for two years, and have reason to hope for perfect success. Some trees have been arrested in a most extraordinary state of vigorous growth, making, previously to their being root-pruned, shoots from four to five feet in one season, having been planted about five years. From plums and cherries I have reason to hope for the same results.

"I have not mentioned the possibility of root-pruning fruit trees of twenty or thirty years' growth, with advantage. Irregular amputation of the roots of fruit trees, too vigorous, is, I am aware, an old practice, but the regular and annual or biennial pruning of them, so as to keep a tree full of youth

* All inclining to vigor should be shortened this month, as it tends so much to the formation of bloom buds.

and vigor in a stationary and prolific state, has not, that I am aware of, been recommended by any known author, although it may have been practised. In urging its applicability to trees of twenty or thirty years' growth, I must recommend caution; the circular trench should not be nearer the stem than three feet, and only two thirds of the roots should be pruned the first season, leaving one third as support to the tree, so that it is not blown on one side by the wind; and these, of course, must be left where they will best give this support. The following season half of the remaining roots may be cut, or, if the tree is inclined to vigorous growth, all of them, but, if it gives symptoms of being checked too much, they may, on the contrary, remain undisturbed for one or even two seasons. If as is often the case in pear trees, the roots are nearly all perpendicular, the tree must be supported with stakes for one or two years after complete amputation.

“I may, perhaps, be allowed to conclude this too long paper by stating, that, as the end of all gardening operations ought to be to give much in little space, root-pruning of trees, carried on systematically and regularly, seems to approach that desirable object, and I cannot help flattering myself, that by its means complete collections of pears, and other fruits, may be grown advantageously, in comparatively small gardens.

“In addition to the foregoing, and in answer to numerous inquiries, I can now (February, 1841) state, that for root-pruning I prefer the pear to be grafted on the pear stock, as the quince, unless in very rich soils and moist situations, will not give vigor enough; in saying this, I allude to the quince stock in common use, but I am inclined to think that the Portugal or orange quince, at present very scarce, will prove, from its luxuriant growth and abundance of sap, the very best stock that can be used for all such pears as will grow upon the quince; for it ought to be generally known, that many varieties of pears will not exist more than a year or two, when grafted on this stock; a little more experience is required before a correct list can be given of such sorts as will not flourish on the quince.

“As regards the space required for each tree, when subjected to root-pruning, planted in squares or in rows by the sides of garden walks, six feet, tree from tree, will be found

sufficient. For the form of the tree, the conical* is indubitably the most agreeable, and generally convenient; but for facility of protection from spring frosts, or from birds by the cheap netting now so much used, trees trained as spreading bushes, the branches kept near the ground by hooked pegs, either of wood or iron, ought to be tried. I feel confident the size and flavor of the fruit would be improved from being near such a radiating surface as the earth.

“To obtain well ripened fruit from cherries, in all wooded districts where birds abound, nets are quite necessary, therefore the only mode of cultivating these trees should be as dwarf bushes; for this purpose they should be grafted on the perfumed cherry (*Prunus Mahaleb*,) which seems to bear root-pruning better than the common cherry stock, and also to induce a more humble growth.

“Apples grafted on the paradise stock are astonishingly fruitful when root-pruned, but in dry and poor soils, I should recommend the crab as a preferable stock. From the experience of the last season, I can now confidently state, that plums become equally prolific with other fruit trees, when root-pruned; and such esteemed nuts as the Cosford, the frizzled filbert, and the dwarf prolific nut, may be made objects of much garden interest by being root-pruned; the common filbert might also be experimented on. The best form that can be given all the varieties of nuts, is the dwarf standard, with clear stems, two or three feet in height, and close compact heads, yet their shoots not too much crowded.

“It will not, perhaps, be out of place to enumerate here a few of the advantages of systematic root-pruning.

“1st. The facility of thinning, and, in some varieties, of setting the blossoms of shy bearing sorts, and of thinning and gathering the fruit.

“2d. It will make the gardener independent of the natural soil of his garden, as a few barrowsfull of rich mould will support a tree for a lengthened period, thus placing bad soils nearly on a level with those the most favorable.

“3d. The capability of removing trees of fifteen or twenty years' growth, with as much facility as furniture. To tenants this will indeed be a boon, for perhaps one of the greatest annoyances a tenant is subject to, is that of being obliged

* This will perhaps convey the meaning of the French term “*en quenouille*.”

to leave behind him trees that he has nurtured with the utmost care.

“4th. The possibility of netting over a complete miniature orchard, so as to protect it from the nipping frosts of spring, and the depredations of birds in summer.

“In conclusion, I must again recommend *caution*; enough of vigor must be left in the tree to support its crop of fruit, and one, two, or three seasons’ cessation from root-pruning, will often be found necessary.

“By beginners, the following directions should be observed: If a number of established trees are to be operated upon, I should recommend them not to be all pruned in one season: thus, I would prune one third the first year, and the remainder the two seasons following; for it must be recollected, that trees in a state of uncontrolled luxuriance, suddenly and severely root-pruned, will not be able to bring any fruit to perfection the following season.

“It is perhaps departing from the fruit garden rather suddenly, but I cannot forbear suggesting, how exceedingly ornamental, even to the smallest lawns, may be made (by root-pruning,) some of the most beautiful of our flowering trees, such as the varieties of the hawthorn (*Cratægus*) *pyrus*, more particularly *Pyrus spectabilis*, a most splendid tree, but too luxuriant for small flower gardens; above all, the varieties of *Robinia*, which, at present, owing to their rudeness of growth, and consequent liability to being wind-riven, cannot be planted in any flower garden, or on any lawn; with root-pruning, they may be made (particularly as standards) objects of extreme beauty.

“The varieties of the horse-chestnut, many of which are too rude for small lawns, may also be made to produce their flowers abundantly; and some of the climbing roses, such as the Banksian roses, varieties of *Rôsa sempervirens*, the Boursault and Ayrshire roses, may be checked by root-pruning, so as to produce their flowers in incredible abundance; I need not point out to the rose cultivator the great advantage of keeping these too vigorous species of roses in bounds; if the soil is rich, and they are trained to pillars, they soon get unwieldy and suffer much from the wind, and if the knife is used, it only induces an abundance of shoots, and checks all tendency to the production of flowers. Now radical pruning at once remedies the evil, and pillars of roses from six to eight

feet in height may be kept at that height, producing every season thousands of their beautiful flowers, and never giving any annoyance from their over-luxuriant habits. Climbing roses should be root-pruned every autumn, if cultivated as pillar roses on small lawns, and no floral ornament can be more interesting and beautiful; those who have had their pillars of roses prostrated by a high wind in June, will, I flatter myself, appreciate this hint, and be able, by root-pruning, to make their climbing roses fit subjects even for a small rose garden."

ART. III. *Notes on Belts of Trees in Ornamental Plantations.* By A. J. DOWNING, Botanic Garden and Nurseries, Newburgh, N. Y.

DURING a hasty visit to the finest places in the suburbs of Boston, last autumn, we were greatly pleased with the general taste, and especially the horticultural skill, evinced in their gardens and grounds. In respect to general design, high keeping, and good culture, the cottage and villa residences of Brookline, Watertown, Roxbury, and the other "surroundings" of Boston, are undoubtedly superior to those of the environs of any other city in the Union. The remarkably picturesque character of a portion of Brookline, studded with pretty gentlemen's seats, and threaded by intricate and gracefully winding lanes or roads, feathered with indigenous and exotic shrubs and trees, in some cases quite to the carriage track, renders it a neighborhood of rural beauty, such as is rarely seen in this country.

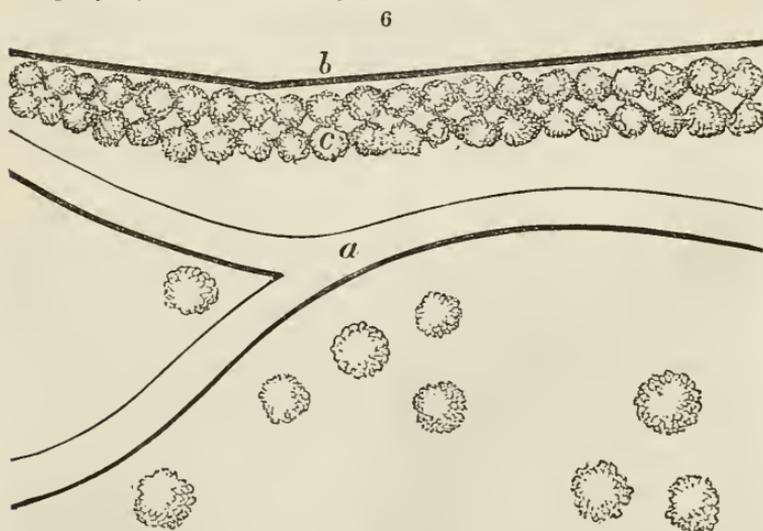
We were struck, however, with a defect in the arrangements of the plantations intended for *belts* or *screens*, which, indeed, is so common an error in the landscape gardening of all parts of the country, that we desire to draw the attention of such of your readers as may be engaged in plantations of this kind, to the subject.

In almost every country residence of any extent, in order to produce certain desired effects, or to conceal some unsightly object, it is found necessary to plant a thick belt of trees, or trees and shrubs intermingled, which, after a few years of

growth, more or less, may produce the effect, by interposing their thick masses of foliage between the eye and the object or scene to be hidden. In the ancient or geometrical style of laying out grounds, this was readily and correctly attained by planting one, two, or any necessary number of rows of trees in straight parallel lines, which, when fully grown, formed tall walls or hedges of verdure, in good keeping with the highly artificial and uniform character of the rest of the grounds.

Now, although the superior merits of the natural style of landscape gardening, with its graceful lines and beauty of expression, is at present so generally admitted by all refined and intelligent minds in this country, and its principles followed with more or less skill by our amateurs, although the arrangement of trees singly, in groups, and in connected masses, is constantly followed, yet, in the same residences, we see the *belt* retaining its antique stiff appearance, enjoying some unaccountable exemption from the otherwise well recognized rules of taste, and destroying that unity of character which is felt to be the highest charm in a tasteful and harmonious residence.

To illustrate our remarks more fully, we subjoin the accompanying sketches. In *fig. 6*, is shown the belt as it fre-



quently appears. In this, we shall suppose *a* to be the entrance road to a residence, from which it is desired to con-

ceal the boundary, out-buildings, or other unsightly objects at *b*. To effect this, the planter disposes two or three regular parallel lines of trees and shrubs. Now it will be evident, we think, on a little reflection, that this disposition is in bad taste; first, because there is a want of harmony or congruity between the graceful curved line of the road and the rectangular one formed by the trees; and secondly, on account of the sameness, or want of variety in the outline of such a belt, as seen from the road.

In the second sketch (*fig. 7,*) is presented the same road, with the belt, *d*, correctly planted. This arrangement har-

7



monizes with the road, as the natural and graceful groups seem to advance or recede in correspondence with its direction, so as to give a meaning for its curves; it forms a thicker and more impenetrable screen, as the trees being irregularly arranged, have more opportunity to expand their heads or branches in various directions; and to the spectator riding or walking along the road, it affords a thousand times more *variety* than the common regular belt. If we examine the belt, *c*, (in the first sketch,) from the road, we shall find its characteristic quality to be a sameness not much unlike that of an enormous hedge: the trunks of the trees range in straight

lines, and the tops form a nearly even, or, at most, only a jagged surface of foliage.

On the other hand, if we examine the belt *d* in like manner, we shall find it much more varied and interesting to the eye. While there is a back ground of foliage near the boundary, there is also an irregular outline formed by the advancing and receding groups of trees and shrubs. In some places, *e*, these groups approach quite near to the margin of the road, while at others, *f*, they steal back, forming little openings, recesses, or nooks of verdure, which, to the eye passing along, will form constantly new sources of interest and beauty. The variety will be still further increased, if we suppose the belt composed of a number of species, judiciously grouped, so as to produce distinct and successive impressions on the mind.

The love of uniformity and right lines, every where discernable in the works of a novice in an art of taste, arises from the fact, that the simplest minds recognize the beauty of order and regularity, while our taste requires development or cultivation, before we value the higher beauties of variety and artistical irregularity.

A. J. D.

ART. IV. *Description of three new Seedling Camellias, raised in Georgetown, D. C.* By ROBERT DICK.

HAVING raised a few seedling camellias, some of which I consider worthy of naming, I have thought proper to give you an account of some of the varieties, which, if you think interesting to amateurs of this fine tribe, you can insert in your valuable Magazine.

1. *Caméllia japonica* var. *británia*.—This is a seedling of the *Caméllia* var. *coccinea*. It is very much like its parent: the flower is of a beautiful cherry red, with twenty-eight large petals, and one hundred and twenty-eight smaller ones; about ten of the large petals are intermixed with the small petals, so as to form an irregular pæony or ranunculus-shaped centre: it has neither stamens nor stile. Superb.

2. *C. j. var. Montgomery*.—Another seedling of the *C. var. coccinea*. It has rather broader foliage than its parent: the flower is of a light cherry red, with sixteen large guard petals, and twenty-six small ones; in flower similar to *C. var. carnea*, though a freer flowerer; it has a number of anthers, and an imperfect stile. Very good.

3. *C. j. var. Seneca*.—This was also raised from the *coccinea*. Its foliage is rather narrower than the parent; the flower is of a beautiful pale or light pink, with seventeen large petals, with very few stamens, and an imperfect stile. Very pretty.

I have several more seedling camellias, which I expect will bloom another winter. Should any of them prove valuable varieties, I will send you a description of them in due season.

Yours,

ROBERT DICK.

Georgetown, D. C., Feb. 20, 1842.

ART. V. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Botanical and Floricultural Intelligence. Tuckermánia californica.—This is the name of a new genus, dedicated by Mr. Nuttall to his friend, E. Tuckerman, Jr., whose con-

tributions to the cryptogamia flora of New England have been of such signal service to botany. The plant was introduced by Mr. Nuttall, on his last return from the North West Coast, and has lately flowered in Philadelphia, in the collection of Mr. R. Kilvington, who has great success in the cultivation of indigenous plants. It was exhibited at a late meeting of the Pennsylvania Horticultural Society, but no description is given of the flower.

Cereus cærulæscens.—A fine specimen under this name flowered in the Botanic Garden at Kew, in July, 1841. The specimen was about four feet in height, and nearly three inches in the thickest diameter of its unbranched stem. In point of magnitude, and delicacy of texture, they are equal, and even superior, to those of the far-famed *C. grandiflorus*; they are white, with the margins of the petals crisped and serrated. The flowers do not appear to have been known by any author. The plant is of a singularly blue or glaucous color, with about eight deep furrows. This is undoubtedly the *C. cæruleus* of our collections; under this name we received the first plant we ever saw, from M. Soulange Bodin, of Paris. It is now about fifteen inches high, but would have been much larger had we not topped it for propagation. As its flowers were unknown, not much care was taken to encourage its growth or induce it to bloom. So far as regards its growth and habits, it is one of the very finest of the tribe, erect in its stature, with a clean glaucous blue stem, and black spines; it forms a pleasing contrast with the other species. As it produces so splendid a flower, we must urge cultivators to be careful in the treatment of their plants, in order to induce them to bloom.

Lophospermum erubescènte-scândens.—A new variety, raised ed from the seed of the *L. scândens*, fertilized with the *L. erubescens*. It has been called the *L. Hendersonii*, from the circumstance of its being cultivated in Mr. Henderson's nursery, Pine-apple Place, London, in fine perfection. It is a fine plant, "remarkable for its strong growth, its bright green foliage, and above all, the extreme abundance of its flowers; many who have seen it trained up against the old abbey walls, have pronounced it to be one of the finest ornaments for a wall or trellis that our gardens can boast." It is probably as easily grown as the old *L. scândens*.

New Fuchsias.—From the advertisements in the English papers, there appears to be a great number of new seedling

fuchsias, some of which, from the descriptions, are exceedingly splendid. In order that our florists may see to what extent the cultivation of this plant has reached, we add the names and description of four of the best:—

Fuchsia tricolor.—Beautiful blush white, with sepals tipped with green. A free grower and bloomer.

Fuchsia conspicua arborea.—Flowers of a delicate carnation or flesh color; sepals beautifully tipped with a distinct green, having, when fully out, an expanded bright scarlet corolla; pistil and stamens rather more rosy than the sepals; plant vigorous and erect in its growth, with a bold and ample foliage.

Fuchsia Venus Victrix.—Flowers white; sepals delicately tipped with green, with a superb bright purple corolla; the stamens are of a delicate rose, and the pistil white. Of excellent habit, with small neat foliage.

Fuchsia Monypennii.—Flowers as large again as those of *F. Standishii*, in racemes, in vast profusion, of a most beautiful rosy carmine; habit strong and good.

Besides these, which are the most rare, several cultivators offer from six to thirty new and selected kinds in their catalogues. The fuchsias are becoming very popular plants for turning out into the ground in summer, where they have a splendid effect when planted in circles or masses.

New Verbenas.—Some very beautiful seedling verbenas have been lately raised by the English florists. Among many that are advertised, we notice a white one, which is different from any thing in our gardens, and must be a most desirable acquisition. It is called "The Queen." It has the habit of the old *Tweediana*, blooming equally vigorous and profuse, and the flowers are of a pure white, and sweet scented. The old white, or *teucroides*, is too coarse in its habit, and the flowers too dingy a color, to render it a valuable variety for planting out with the other sorts.

Achimenes longiflora, a new and extremely splendid species, is figured in a late number of the *Botanical Register*, and we shall refer to the description as soon as the work comes to hand. It is said to be one of the finest acquisitions which has been made for many years.

Epiphyllum Russellianum.—This epiphyllum is one of the most beautiful of the tribe. The flowers are about two inches long, very regular in their formation, and of a fine deep rose color, pendant from the neat stems of the plant. Grafted in

the way of *E. truncatum*, a large plant in bloom would be one of the most showy objects, in the green-house, in May and June.

Dahlia repens is the name of a very pretty little annual, growing one foot or more high, with single purple flowers, about the size of half a dollar. Cut flowers, from plants grown in the green-house of T. Lee, Esq., were exhibited by him at a late meeting of the Massachusetts Horticultural Society.

Garden Memoranda. Notices of Green-houses and Gardens in Philadelphia.—The season is getting rather late to continue my remarks on the green-houses and gardens of this city. Many of the plants are put out for the summer, and others have done flowering for the spring.

Messrs. Landreth & Fulton's, in Federal Street, the well known garden and nursery, has been in fine condition. Mr. Landreth having very lately associated with him in his business, Mr. Fulton, a first-rate gardener and propagator, and besides, a gentleman, will be ready at any time to supply his customers as formerly. In the green-houses, I noticed a great quantity of young thriving plants of various kinds, among which were many roses. I saw here the finest specimen, I believe, in the country, of the *Rhododendron arboreum*, and I think the first one introduced into the country. It had been in full flower, and was now full of seed, from which Messrs. Landreth & Fulton intend to raise a stock of plants. In walking through the garden, I was most gratified to see our native azaleas in full bloom; among them were the calendulæa, crœcea, póntica, nudiflora coccinea, and some beautiful pale straw-colored hybrids, with great trusses of very large flowers. The halesias, with their delicate snow-drop looking blossoms, the *Chionanthus virginica* or fringe tree, and the *Cornus paniculata* were exceedingly showy. A variety of magnolias, among which were the *M. glauca*, tripétala, acuminata, cordifolia, and grandiflora, were splendid. Many other native trees and shrubs in this old nursery have a fine appearance. It is almost unaccountable that our fine squares were not filled with specimens of the above, and other trees equally desirable, that could have been readily obtained at Bartram's Botanic Garden: they might then have been botanical gardens for future generations to study from. Instead of this, they are filled with the button-wood (*Platanus occidentalis*), and the

silver maple (*Acer dasycarpum* Torrey,) two trees that are the least suitable for the purpose. Look at Fairmount, the boast and glory of our city, laid out and planted with the commonest trees, and the most unfit for such a place: but so it is; all corporations are alike careless in appointing men who are entirely incapacitated for the situation, and who leave the work of planting to men who have no taste in making a proper selection of kinds, or who are interested in the sale of particular kinds of trees. I would, in my remarks, except Washington Square, though there is a great deal of trash there.

Mr. Fulton, in pointing out some plantations of trees, remarked that he had lately practised what he considered a decided improvement in planting out shrubs and fruit trees; that is, lifting them and transplanting every two years, so that when they come to be permanently put out, they never fail to grow. Although attended with some labor, yet the advantage is manifest in confining the roots to a small space. [This is analogous to root-pruning, and is attended with similar results: the article on the subject, on a previous page, may be read in connection with this hint.—*Ed.*]

The garden of Mrs. Stott, in Turner's Lane, under the management of Mr. Chalmers, Sen., is in fine condition. The houses are small, but filled with the most choice plants and specimens that can be procured, Mrs. Stott being very fond of plants. A small grapery is attached to the house, where the grapes are in a forward state, and the bunches shouldering well. The main garden is nearly square, laid out in rectangular beds, with an oval in the centre filled with many choice roses, and plants of various kinds. The borders are full of fine roses and herbaceous plants, and with the rarest and best annuals to be found: the whole in the finest keeping imaginable, rendering it a perfect jewel of a place, and well worth inspection when you visit our city again.

Lemon Hill, the well known and once beautiful garden of the late Henry Pratt, Esq., is now occupied by Mr. R. Kilvington, who has a fine collection of plants. Mr. Kilvington is one of the most ardent students of botany, and is the only one who cultivates our native plants: of these he has many fine specimens. The situation being in the neighborhood of the city, is always the resort of the amateur and lover of nature, and is kept in very fine order.—*Yours, An Amateur, May, 1842.*

MISCELLANEOUS INTELLIGENCE.

ART. I. *General Notices.*

Cultivation of Sálvia fúlgens.—*Sálvia fúlgens* may be propagated by cuttings, in the early part of June, and after being potted a short time, should be shifted into pots five or six inches across, filled with a soil composed of peat, loam, and leaf mould. They should be grown out of doors until the latter part of September, and then removed into the green-house, where they form a striking contrast with the chrysanthemums in flower. From its tendency to bloom late when propagated in this way, *Sálvia fúlgens* is a great acquisition to the green-house at this season. (*Gard. Chron.*, 1842, p. 38.)

Cultivation of Rhubarb.—Rhubarb requires soil as rich as that for asparagus, prepared in the following way:—In an open situation, make a trench three or four feet wide, and two feet deep if the good soil will admit of it. Then place at the bottom of the trench about six inches of good rotten dung: fill up the trench with the soil which had been previously taken out, or, if the soil is not rich, mix with it a little rotten dung, before filling up the trench: it will then form a bed, some inches higher than the common level of the ground. Early in the season [as late as June will do,] procure pieces of the old roots, with only a single crown on each, and plant them in the centre of the bed, at intervals of five or six feet, and cover the crown about two inches deep; when planted, throw a little straw dung over each plant, to protect it from the severity of the weather. Nothing farther is requisite, except to keep the plants free from weeds, for some years. None of the leaves should be used the first year; and when they are afterwards gathered, they should always be pulled off, and not cut, as is sometimes done. (*Id.*, 1842, p. 57.)

On the cultivation of Asparagus in Spain.—As a meeting of the London Horticultural Society, March 1, a paper was read on the cultivation of the asparagus, as practised in San Sebastian, in the province of Guipuscoa, North Spain; and as it appears to contain many valuable hints for the improved cultivation of this delicious vegetable, we extract the same:—

The asparagus is grown in beds about five feet wide, and from twenty to sixty feet long: the beds have no previous preparation beyond digging and raking: in March, the seed is sown in drills eighteen inches deep, and about two feet asunder. When the plants are six inches high, they are thinned to about one foot apart; the thinnings are transplanted in similar beds, and watered once a day by one of the never failing rills that run through the flat on which the beds are formed. In the following March a layer of night-soil, a few inches thick, is laid on the bed, and dug in when the plants have done growing in the autumn. The asparagus is fit to cut the third year after sowing; and in the spring, a layer of leaves, about eight inches thick, is laid over the bed, and when the plants come through this, the cutting begins. By this treatment, the writer of the paper stated, he had seen asparagus from two to six inches,

or even more, in circumference: he also observed, that, at times, the roots of the plants were, at spring tides, under salt water, which the growers considered beneficial. (*Gard. Chron.*, 1842, p. 159.)

In an editorial note on the above method of cultivation we find the following useful information upon that no less important point, the future treatment of the plants.

“You cannot have fruit without leaves; and the more abundant the leaves are, provided they are fully exposed to light and air, the larger and more excellent will be a crop of fruit, within certain limits. This truth we have frequently impressed upon our readers. But if it is true of fruit within certain limits, it is absolutely true of sprouts, such as those which the asparagus plant produces; and the reverse of the proposition is equally unexceptionable: that is to say, the fewer leaves are left upon a plant, the more feeble will be its sprouts. To push the illustration to its utmost limits, we may add that the destruction of the leaves is eventually the destruction of the plant.

Those thread-like bodies which clothe the stems of the asparagus in summer time act as its leaves, and are incessantly engaged in robbing air and earth of the matter out of which future sprouts are to be formed. That matter the stems convey down into the roots, where it is stored up until it is wanted. The more stems clothed with leaves, the more of such matter, and, consequently, the stronger the sprouts in the succeeding season; and *vice versa*. If the summer shoots of asparagus are strong, it is impossible that the sprouts should be weak; if the summer shoots are weak, it is impossible that the sprouts should be strong.

These are facts about which there can be no mistake; but we fear they are far from being always sufficiently considered. We know very well that, in practice, gardeners will continue to cut sprout after sprout of asparagus, until the roots are so much weakened, that the latter shoots, which are allowed to grow, are thin, feeble, and evidently struggling with exhaustion. Such debilitated shoots can do little for the roots during the summer; they can barely maintain their own existence, and are, consequently, preparing no new matter out of which sprouts can be formed the succeeding spring, when the crop is therefore necessarily weak and worthless.

The conclusion to be drawn from this is obvious. No one should cut too many sprouts from his asparagus beds; no one should remove limb after limb of his plants, until they produce nothing but what is too small for the table. On the contrary, the gardener should take care to leave at least two or three strong sprouts to grow from every root; or, what is better, his beds should be rested one year, and cut another; for he may be certain, from the strength of the summer shoots, what sort of sprouts he will have to cut the succeeding year—remembering always that it is useless to manure asparagus beds for sprouts independently of summer shoots. If a bed of asparagus is weak, manure in the autumn will do but little for making it bring strong sprouts the next season. All that the manure can then do is to feed abundantly the summer shoots of the succeeding summer, and so enable them to prepare plenty of materials out of which a second season's strong sprouts may be pushed forth. (*Id.*, 1842, p. 233.)

New Method of supporting annuals.—Amongst our most showy hardy annuals and other out-door plants, are several species of such a brittle nature, that during stormy weather many are often irrecoverably broken or torn to pieces by the wind. Numbers of beds in the flower garden are thus rendered, in the height of their beauty, perfectly unsightly. To prevent this sort of havoc, I have seen many plans resorted to, and often witnessed some that were any thing but useful or neat. I will therefore mention a simple mode particularly suited to such kinds as are grown in beds, and which combines all the advantages necessary to avoid the disastrous consequences referred to. When the plants are about three inches high, thinned, and properly cleaned, I select a number of neat twiggy branches, such as dry fresh pieces of spruce, &c. These I prepare about eighteen inches long, pointing them at the end so as to resemble pea stakes in miniature; when ready, they are placed firmly among the plants all over the bed, leaving them, when finished, about a foot high, so as to be completely out of sight when the plants are in flower, always leaving the stakes of such a height and distance as the taste or judgment shall deem sufficient for the habits of the various kinds thus treated. So completely do the plants grow up and intermingle themselves in all directions among the branches, and with such security that no breeze ever affects them, while the beds exhibit that freedom and elegance of appearance which I have never seen so effectually accomplished by any other method. Some may consider these dry branches disagreeable to the sight in connection with a flower garden, before the plants rise to hide them; but when neatly done, the reverse is the case. It is in this as in other matters; while one person will perform the work with such materials as will of themselves be ornamental without either flowers or foliage, another will manage it so clumsily, that it would defy the growth of a bramble bush to hide the awkward deformities of his handywork. However skillfully plants may be selected as regards their natural beauty, arrangement, or high keeping, one misplaced stake or ill-tied plant will mar the effect of the whole. (*Id.*, 1842, p. 286.)

Cultivation of the English and Spanish Irises.—A tribe of very beautiful plants, which is much neglected by admirers of flowers, is the iris; only a few of the more common are seen in our gardens, and these generally in ordinary condition: the bulbous kinds, better known perhaps as the English and Spanish irises, are rarely used in ornamenting the flower border, although they are in reality easily grown, and are among the prettiest flowers of June. The following method of cultivating them will, we hope, induce amateurs who appreciate this class of plants to set out a few roots the coming autumn:—“About August prepare a bed two feet deep, the soil of which must be composed of equal parts of rich loam, sandy peat, and either well rotted dung or leaf mould, all well incorporated together. The beginning of September plant the bulbs about three inches deep, placing a little fine sand round each, and afterwards cover and level the surface; nothing else will be required, except stirring the surface of the soil in the spring. [In our climate the bed should have a covering of an inch or two of strawy manure or leaves.—*Ed.*] The irises

will bloom about the middle of June, and the seeds will begin to ripen in the beginning of August, when, if it is required, the bulb should be taken up: but it must be observed that when they are removed, they seldom flourish well the ensuing season, and therefore should not be replanted more than once in five or six years. When the bulbs are taken up, they should be placed in dry sand for about a month, and afterwards planted in the manner before mentioned. Seeds of irises should be sown in drills, in September, in light sandy soil; they will come up the following spring; but the bulbs should remain for two or three years before they are removed. The Persian iris is tender, but they are pretty plants to bloom in the parlor, treated as follows:—Plant the roots in October, in pots filled with a mixture of either sandy loam, well drained, and leaf mould, or sandy peat and well rotted dung, and set them in some dry pit [protected from frost,] where they may remain all winter, and be taken into the parlor as they are wanted to flower. They may also remain in the pit till the latter part of March or beginning of April, and then turned out into beds, where they form a gay ornament during April and May. Take up the roots in August, and pot them again in October, and give them the same treatment as above. (*Id.*, 1842, p. 113.)

Flower beds on Lawns.—Many of our correspondents are desirous of knowing what plants are best adapted for a circular or oval bed upon a lawn. Through the kindness of a friend, we are enabled to furnish them with a list of some which have the most ornamental effect when arranged in the following manner:—In the centre of the bed, a patch of the purple *Phlòx paniculàta* should be planted, around which should succeed a circle of the white variety of the same parent. Then follows a range of *Calliòpsis tinctoria*; after which may come one of *Pentstemon gentianoïdes*, and *P. gentianoïdes coccineum*, but most of the latter. Next, a plant of *Phlòx omniflora*, surrounded by one of the tallest pink sorts of verbena [*V. Eyreana*,] then another of the dwarfer kinds of scarlet verbena, the outside of the whole bed being planted with *Lobelia azurea* [*Clintonia pulchella*.] In this list, the tallest plants are planted in the centre, and they are so arranged as to form a pleasing contrast, whilst the brilliancy of colors possessed by some, and the length of time they will continue in flower, renders them a striking ornament until destroyed by the autumnal frosts. (*Id.*, 1842, p. 236.)

[To those who wish to form circular beds of *annuals*, we might substitute the following, in the same order as they occur above:—first, a circle of African marigold; second, one of *Málope grandiflora*; third, *Calliòpsis tinctoria*; fourth, *Eútoea viscida*; fifth, *Phlòx Drummondii*; seventh, *Erysimum Peroffskyànum*; eighth, *Alyssum maritima*; and ninth, finishing with a circle of *Nemòphila insignis* and *Nolana atriplicifolia*, mixt together.—*Ed.*]

To stop the bleeding of vines.—Take one fourth of calcined oyster shells, beaten to fine powder in a mortar, and three fourths of cheese worked together, until they form a sort of paste. After pruning, press this mixture into the pores of the wood, either with the thumb or any other means, and it will effectually stop the flow of sap: sometimes a repetition may be necessary. (*Id.*, 1842, p. 206.)

ART. II. *Domestic Notices.*

Pennsylvania Horticultural Society.—Our third meeting of the Pennsylvania Horticultural Society took place in our new room in the Museum, and the attendance was even more numerous than ever. The accession to our number is immense. The large room was full of the beauty and fashion of our city, not merely as spectators, but as amateurs, from the interest they took in examining the many fine flowers exhibited. As usual, the plants were tastefully arranged, and had a fine effect. The vegetables were objects of much examination from their general superiority. The mammoth rhubarb and the cauliflowers, exhibited by Mr. Engleman, were uncommonly large; the rhubarb was upwards of five feet in height, and the cauliflowers were exceedingly large and tempting. Col. Case exhibited a bunch of the butorice rhubarb, upwards of five feet high, and thick in the stem; it is a fine variety; indeed the whole of the vegetables did great credit to the gardeners; an improvement in growing vegetables is increasing yearly. The flower tables exhibited contained many very fine specimens and showy flowers; we noticed William Chalmers, gardener to Mrs. Stott, had a fine variety, and justly obtained the first premium. He exhibited the *Schizanthus diffusa*, upwards of six feet high, covered over with its beautiful butterfly looking flowers; a *Clarkia elegans rosea*, seven feet high, loaded with flowers; a *Mahernia pinnata* var. *coccinea*; *Fuchsia Standishii*; *F. carnea*, a very fine variety; *Iberis coronata*, *calceolaria* *Widnall's Meteor*; *Collinsia grandiflora*; and a fine annual, covered with its delicate pink flowers; *Godetia venusta*. These are a few that we noticed as being very fine. The tulips exhibited by R. Kirkwood, gardener to Mrs. Roland, were very fine. Mr. Buist had *Azalea lateritia* in flower, a fine variety, and another, the name of which I do not know.—*Yours, An Amateur.*

Mr. Perry's collection of Plants for sale.—We learn from our correspondents in New York, that the elegant residence of J. W. Perry, of Brooklyn, together with the plants &c., is offered for sale. Some noble specimens of palms are in his collection, and we hope they will be purchased by some gentleman who will erect a house for their exclusive growth.—*Ed.*

New work on Cottage Residences.—We are gratified to announce to our readers, that our correspondent, Mr. A. J. Downing, whose excellent treatise on landscape gardening we reviewed in our last volume, has now nearly ready for publication a new work on cottage residences. It will be handsomely illustrated, and will contain not only views and plans of cottages and cottage villas, but also descriptions and details of the architecture and the grounds &c. Such a work is much needed, and will undoubtedly meet with a ready sale, and contribute to the spread of a better taste for villa residences.

We perceive that Mr. Downing has lately had the honor of being elected corresponding member of the Royal Botanic Gardening Society of Berlin, and the Royal Botanical Society of London.—*Ed.*

ART. III. *Retrospective Criticism.*

Errata.—In our last number, p. 170, fourteen lines from the bottom of the page, for "Dr. Bole" read "D. Boll." The error escaped our notice until too late for correction.

Pennsylvania Horticultural Society, &c. Errors corrected.—A few errors have inadvertently crept recently into your useful Magazine of Horticulture, which you will have the goodness to correct.

An "Amateur" correspondent, in a communication to the April number, p. 152, in relation to the Pennsylvania Horticultural Society, which has had an existence of some fourteen years, calls it "the new Horticultural Society."

Under Floricultural Intelligence, in the last number, after the descriptions of the new camellias exhibited before the Pennsylvania Horticultural Society, as taken from the published *Report* by the Society, is this paragraph—"This plant was raised by Mr. Peter Raabe, an amateur, we believe," &c., which does not occur in the *Report*; it states that Messrs. Chalmers and Raabe are joint owners. You remark that the descriptions are furnished by the Committee on Flowers, of which you believe Mr. Buist is chairman. Descriptions are not furnished by committees, neither is Mr. Buist chairman of the Committee on Plants and Flowers, but Thomas C. Percival, Esq.—*Yours, &c., An Old Member, Philadelphia, May, 1842.*

Fisher Professorship of Natural History in Harvard University, (p. 175.)—In our last number, in noticing the recent appointment of Dr. Gray to the Fisher Professorship of Natural History in Harvard University, we expressed our hope that it would be the means of awakening an interest in botanical studies, which had been almost or quite given up since the resignation of Mr. Nuttall as curator. Our remarks were intended to apply wholly to what had been done by the University, in keeping up the character of the Botanic Garden connected with the institution; and we regret that we unintentionally did injustice to our friend, Dr. T. M. Harris, the librarian of the college, by whose exertions botanical studies have been kept up, and a class formed for the study of natural history, particularly botany. Dr. Harris, in connection with our correspondent, E. Tuckerman, Jr., Esq., has discovered several new plants in the vicinity of Boston, and found others whose nearest localities in Bigelow's *Florula Bostoniensis*, are in New Hampshire and the remoter parts of this State. One of Dr. Harris's papers, enumerating some of the plants, appeared in our Vol. VII., (p. 245.)

Dr. Harris, in addition to his arduous duties as librarian, which, one would suppose, are sufficient to occupy all his time, has delivered weekly lectures to a class of botanical students, and has always had, when to be procured, the specimens before him, freshly gathered from the woods and meadows. But the interest which he has taken in botanical studies has been more from his love of botany than from any desire of the Institution to cultivate this branch of natural science.

We gladly make this correction, as Dr. Harris is a gentleman

whom we highly esteem, and who is too modest to claim full credit for his labors.—*Ed.*

Glout Morceau Pear.—The inquiry of "*A Fruit Grower*," at page 156, did not meet the eye of the subscriber until within a few days. We would now respectfully state, that the committee had no instruction to go behind the authority of the London Horticultural Society. The error of *Gout* instead of *Glout* rests with the printer or the writer, no matter which, as our copy is probably destroyed; we therefore acknowledge our mistake, and of course that matter is settled. But in reference to this subject, will "*A Fruit Grower*," to whom no doubt it is familiar, be so kind as to give the signification of the term *Glout* in connection with the word *Morceau*, and oblige other fruit growers, and also his obedient servant,—*Samuel Walker, Roxbury, May 17, 1842.*

ART. IV. Massachusetts Horticultural Society.

Saturday, April 2, 1842.—The officers of the Society for 1842 entered upon their duties to-day—the President, M. P. Wilder, in the chair.

It was voted that the thanks of the Society be presented to Isaac Chase, for a donation of vine cuttings, sent to the Society for distribution. Adjourned four weeks, to April 30.

April 16th.—Exhibited.—Fruit: From William Kenrick, an apple, believed to be a native fruit, and called the *Masters* apple, from the supposition that it originated on the farm of Mr. Masters, Greenland, N. H. Bears constantly: keeps well. The Committee state that the fruit was past its eating state, but so far as any estimate could be formed of its quality, it had the evidence of a first-rate apple: the Committee remark that they would be glad to receive specimens in good condition, another year.

April 30.—An adjourned meeting of the Society was held to-day—the President in the chair.

Mr. Vose read to the Society a translation of M. Tougard's letter. Meeting adjourned two weeks, to May 14th.

Exhibited.—Fruit: From L. P. Grosvenor, seedling apples called the Company apples, which the Committee called handsome and juicy for the season.

May 7th. Exhibited.—Flowers: A beautiful bouquet from Dr. J. C. Howard, Jamaica Plain.

May 14th.—An adjourned meeting of the Society—the President in the chair. No business of importance was transacted, and the meeting was adjourned for two weeks.

May 21st. Exhibited.—Flowers: From T. Lee, beautiful cut flowers of the dogwood (*Cornus florida*), *Eutoca viscida*, *Lupinus Cruikshankii*, *Magnolia purpurea*, *Clarkia pulchella alba*, *Dahlia repens*, *Geum coccineum*, *Linum tryginum*, *Urvularia grandiflora*, with geraniums, two kinds of godetias, nasturtium, and the following roses:—*Amie Vibert*, *Belle Parisien*, *Belle noisette*, and noi-

sette Bourbon. From S. Walker, *Lonicera tartaricum*, and *Dodecâtheon Meadia* and *integrifolia*, *Troïllius europæus*, and *Lychnis Floscuculi* fl. pl.

From Hovey & Co., a fine specimen of the yellow noisette rose, with six full blown flowers in one cluster; and several varieties of verbenas. From J. Kenrick, red and white Tartarian honeysuckles, purple beech, Judas tree, *Pæonia Moûtan* *Banksia*, and *Ribes sanguineum*. From B. V. French, fine specimens of *Pæonia Moûtan* *Banksia*.

Fruit:—From Dr. J. C. Howard, very fine specimens of black Hamburg grapes; the clusters of large size, and berries well colored. From J. L. L. F. Warren, cucumbers. From Horace Gray, Weedon cucumbers, nearly two feet long.

Vegetables:—From J. L. L. F. Warren, good specimens of rhubarb.

May 28th.—An adjourned meeting—the President in the chair. No business of importance was transacted, and the meeting was adjourned one week to June 4th.

Exhibited.—Flowers:—From the President, cut flowers of the following new geraniums, many of which were very superb:—King John, Coronation, Erectum, Alicia, Gaines's King, Decorum, Matilda, Sylph, Alexandrina, Nonsuch, Florence, Portia, Joan of Arc, Climax, Garth's Perfection, Annette, Siddonia, Pixey Queen, Juno. From W. Kenrick, white and scarlet hawthorn, *Pæonia Moûtan* *Banksia*, *Wistaria Consequana*, purple beech, *Berberis* sp., and bouquets. From Dr. J. C. Howard, bouquets.

From J. A. Kenrick, white and scarlet hawthorn, *Lonicera caucasicum*, *Côrchorus japonica*, *Halèsia tetrâptera*, purple beech, *Pæonia Moûtan* *papaveracea* and var. *Banksia*, *Wistaria Consequana*, and azaleas. From Messrs. Winship, bouquets. From Joshua Norton, Jr., fine specimens of *Pæonia Moûtan* *Banksia*. From J. L. L. F. Warren, bouquets. From Misses Sumner, bouquets. From S. Sweetser, fine cut flowers of rose Lamarque, yellow noisette, and Triumph of Luxembourg, and *Cereus Jenkinsonii*. From B. V. French, fine flowers of *Pæonia Moûtan* *Banksia*, and *P. officinalis rubra plèno*. From S. Walker, bouquets.

The tulip show for premiums took place to-day: the only competitors were Messrs. Walker and Johnson. C. M. Hovey and J. Breck were the judges, and awarded the premiums as follows:—

For the best display of flowers, to S. Walker.

For the second best display of flowers, to S. R. Johnson.

Fruits:—From Dr. J. C. Howard, fine black Hamburg, Miller's Burgundy, and Chasselas grapes. From T. Needham, gardener to H. Gray, Esq., Hector cucumber measuring twenty-six and a half inches, and Weedon cucumber measuring twenty-two and a half inches in length.

Vegetables:—From S. Butterfield, West Cambridge, very fine radishes. From J. L. L. F. Warren, asparagus and rhubarb. From S. Fisk, Waltham, two bunches of very superior asparagus, one bunch of twenty-four stems, weighing four pounds five ounces, well grown, and of handsome appearance. From D. Hill, West Cambridge, asparagus.

ART. V. Faneuil Hall Market.

Roots, Tubers, &c.		From	To	Pot and Sweet Herbs.		From	To
		\$ cts.	\$ cts.			\$ cts.	\$ cts.
Potatoes:				Parsley, per half peck,	25	—	
Chenangoes, { per barrel,	1 00	1 25		Sage, per pound,	17	20	
Eastports, { per barrel,	45	50		Marjorum, per bunch,	6	12½	
Common, { per barrel,	1 75	2 00		Savory, per bunch,	6	12½	
New, per peck,	75	1 00		Spearmint, green, per bunch,	3	6	
Sweet potatoes, per bushel,	1 00	—		<i>Squashes and Pumpkins.</i>			
Turnips, per bushel:				Squashes, per pound:			
Common,	45	50		Canada Crookneck,	5	6	
Ruta Baga,	50	—		Autumnal Marrow,	—	—	
French,	1 50	—		Winter Crookneck,	4	5	
Onions:				West Indias,	3	4	
Red, per bunch,	75	1 00		Pumpkins, each,	12½	20	
New white, per bunch,	75	1 00		<i>Fruits.</i>			
White, per bushel,	50	—		Apples, dessert:			
Yellow, per bushel,	—	—		Baldwins, per barrel,	5 00	—	
Beets, per bushel,	2 00	—		Russets, per barrel,	3 50	4 00	
Carrots, per bushel,	75	1 00		Common, per barrel,	2 00	2 50	
Parsnips, per bushel,	75	1 00		Dried apples, per pound,	4	5	
Salsify, per dozen roots,	12½	—		Strawberries, per box:			
Radishes, per bunch,	2	3		Common,	50	62½	
Shallots, per pound,	20	—		Early Virginia,	75	1 00	
Garlic, per pound,	12½	—		Gooseberries, (green) per q't			
Horseradish, per pound	10	12½		Common,	12½	—	
<i>Cabbages, Salads, &c.</i>				Pears:			
Cabbages, per doz:				Baking, per bushel,	2 00	2 50	
Drumhead,	75	1 00		Cranberries, per bushel,	2 50	3 00	
Red Dutch,	—	—		Grapes per pound:			
Brocoli, each,	—	—		Forced,	1 50	—	
Cauliflowers, each,	12½	25		Pine-apples, each,	12½	25	
Lettuce, per head,	3	6		Cucumbers, each,	12½	25	
Spinach, per peck,	12½	—		Water-melons, each,	25	37½	
Dandelions, per peck,	12½	—		Lemons, per dozen,	12½	17	
Turnip tops, per peck,	12½	—		Shaddocks, each,	12½	—	
Rhubarb, per pound,	3	—		Oranges, per doz:			
Asparagus, per bunch,	10	12½		Havana,	37½	50	
Beet tops, per peck,	12½	17		Sicily,	20	25	
Peas, { per bushel,	1 75	—		Walnuts, per bushel,	1 25	1 50	
Cucumbers, (pickled) pr gal.	50	—		Chestnuts, per bushel,	2 00	—	
Peppers, (pickd,) per gallon	25	—		Butternuts, per bushel,	1 00	—	
	37½	—		Almonds, per pound,	14	15	
				Castana, per pound,	—	—	
				Cocoa nuts,	3	4	

REMARKS.—The weather, during the month, has been cool, with occasional showers, and free from the easterly storms which usually occur during the month of May. The early part of the month indicated a very early season. But although planting has not been retarded by too much wet, yet the continued cool nights and northerly winds have put a check upon vegetation, which at this time is not so

forward as last season. Frosts have occurred, and last week it was so severe as to cut off the corn, potatoes, beans, &c. in low and rather cool situations: fruit, however, does not appear to have suffered in the least.

Vegetables.—Potatoes are very dull, and prices, if any thing, tend downward: a great supply of Chenangoes and Long Reds have been brought in from the eastward, and retailed at our quotations from the vessel. Sweet potatoes yet remain on hand, and of good quality: a few barrels of *new* potatoes have been sent in from Charleston, S. C.; they came in good order, and are readily taken at our prices. Turnips are very scarce, and those of handsome size and appearance command our highest rates, a price greater than has been obtained for several years; no new ones have yet come in. Onions are nearly gone: but to take the place of the old ones, good new whites are now to be had. Carrots and beets are reduced to a small stock, and prices have advanced. Radishes are now exceedingly abundant, good, and cheap. Horseradish is nearly gone. Cabbages are all gone. Lettuce is now supplied, of very fine size. Spinach and dandelions are plentiful; and beet tops have been brought in the past week. Rhubarb is plentiful and cheap. Asparagus, from the cool weather, has not been very abundantly brought in, and prices have kept up. Peas are in the market, from New Jersey; they are tolerably well filled, but not very fresh. Parsley is plentiful and lower. Of squashes there is now no supply but the West Indias; of these there has been small arrivals, but, after this season, when there is a good supply of rhubarb, squashes are not in so much demand.

Fruits.—The stock of apples is nearly gone; only a few russets remain by the barrel; some Baldwins may be had in small quantities. Cranberries are higher. Green gooseberries have made their appearance from the south, and supplied at the low rate of our quotations. Strawberries, from New York, have been in the market several days, and, owing to the cool weather, they have come in good order: a few boxes from the vicinity were brought in to-day, but they were from protected plants. Some few watermelons have arrived. Pine-apples are not so abundant as at the time of our last report: a few of extra quality may be obtained. Lemons are abundant and low. In nuts there is no change, and very little doing in the article.—*M. T., Boston, May 28, 1842.*

ART. VI. *Obituary Notices.*

Died at Flushing, on Saturday the 9th of April, *William Prince*, aged 76 years, well known as the proprietor of the Linnæan Botanic Garden and Nurseries, which he in connection with his sons has long conducted with distinguished ability. For many years he has been a communicant of the Episcopal Church, and he partook of

the communion shortly before his death, in the full use of his mental faculties, and with the fullest reliance on the mercy and beneficence of his Maker. It may most truly be said of him, that no man ever led a more spotless life, and the annals of his native town bear record to his zeal and liberality, manifested through a long life in all objects of public improvement, and which have caused him to be universally looked up to as a public benefactor. (*N. Y. Com. Adv.*)

[Mr. Prince was one of the oldest nurserymen in the country, and from his establishment at Flushing great numbers of trees have been distributed over the United States. Mr. Prince was the first to introduce many of the plants now common in our gardens, and his exertions to add all the newest varieties of fruit will be remembered by cultivators. Mr. Prince was also the author of one or two volumes on horticulture, which have been considered valuable contributions to our garden literature.—*Ed.*]

Death of M. A. P. De Candolle.—The last number of *Silliman's Journal* contains a notice of the death of this eminent botanist, whose works have been the admiration of all who have studied botany as a science. From this notice we learn that M. De Candolle was born in Geneva, in 1778, of an ancient family, which, as long ago as the sixteenth century, was distinguished in the republic of letters. From his earliest years he devoted himself to botany, and in his twenty-first year published his history of succulent plants. From and after that period he continued to lay before the botanical world his valuable works: his last and greatest effort was his *Prodromus*, which he left unfinished at his death. (*Silliman's Journal.*)

Alymer Bourke Lambert, Esq., F. R. S., &c., for many years Vice-President of the Linnæan Society, died at his residence near London, Jan. 10. Mr. Lambert was the author of a splendid work on the genus *Pinus*. (*Gard. Mag.*)

Archibald Menzies, Esq., F. L. S. &c., died at his residence, Ludbrook Terrace, Kensington Gravel Pits, on the 16th of February. He was the first discoverer of many Californian plants, having brought home numerous dried specimens, thirty and forty years before Mr. Douglas. Among them was the *Ribes sanguineum*. (*Id.*)

David Don, Esq., Professor of Botany in King's College, and Librarian to the Linnæan Society, died Dec. 8, 1841, much regretted by his friends and all who knew him. (*Id.*)

HORTICULTURAL MEMORANDA

FOR JUNE.

FRUIT DEPARTMENT.

Grape vines in the grapery will now be setting their fruit. Discontinue syringing until the berries are the size of large shot; then continue it again. Keep up a good temperature; close up the house

early in the afternoon, and give air early in the morning. Sprinkle the walks to create a fine steam.

Raspberry vines should be neatly and securely tied up to strong stakes.

Strawberry beds will require attention. New beds will need hoeing, and if dry weather, a sprinkling of water. Old beds should be kept clear of weeds, and well watered.

FLOWER DEPARTMENT.

Dahlias may be set out from the 1st to the 25th of the month with perfect success. Turn the plants out of the pots into the soil, first preparing it by digging and manuring. Select an open airy situation, not under the shade or drip of trees, although they will do well if they have the sun only part of the day, provided they are not *under* trees.

Camellias should now be taken out of the green-house, and placed in a situation where they will only receive the morning sun an hour or two. Keep them well watered, and syringe every other day. In-archings put on in March may now be cut off from the stock, and the young plants placed in a frame, if there is a number of them, and kept shaded a week or two.

Chrysanthemums should be potted, if not already done.

Roses may still be turned out into the border. Prune them down, and put in the cuttings if an additional stock is wanted.

Azaleas will now be growing: if any of them need repotting, now is the time the operation should be performed. Top all the plants which have a tendency to run up without branching, and keep them well watered.

Hardy roses will need attention: if duplicate plants are wanted, lay down a few of the young branches the latter part of the month.

Cactuses which are now flowering should be freely watered, and as soon as their bloom is over, trim out the old wood so as to have a young and thrifty growth. They need the knife as well as other plants.

Hyacinth and Tulip bulbs should be taken up the latter part of the month.

Geraniums may be cut down the latter part of the month, and the young wood put in for cuttings.

Annual seeds, such as balsams, asters, &c., sown in boxes in the hot-bed or frame, should now be pricked out into beds where they are to bloom. Larkspurs, and other hardy kinds, sown in the open border, should be thinned out.

Perennial flower seeds may yet be sown with perfect success.

Green-house plants of many kinds may be propagated now by division of the roots, such as the Canary aster, calceolaria, double polyanthus, &c. Plant in pots, and place in a frame till they get rooted, and then remove to the open air. Cuttings of heliotropes and other plants may now be put in.

Carnations should have attention: keep the stems tied up, and give the plants liquid manure occasionally.

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OF
HORTICULTURE.

JULY, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *On the Study of Natural History; being extracts from an Address delivered before the members of the Harvard Natural History Society at Cambridge.* By J. L. RUSSELL, A. M., Prof. of Botany, &c., to the Massachusetts Horticultural Society.

[IN our last number we took occasion to correct a wrong impression under which we labored, in reference to the exertions of our excellent friend, Dr. T. W. Harris. Since then we have had put at our disposal the MS. of the Anniversary Address delivered before the members of the Harvard Natural History Society, May 5, 1842, by our correspondent Prof. John Lewis Russell; from which we present to our readers the following extracts.]

“I have thus gone over the ground of pursuit in natural history in this *broad view*, and taken so *extensive a sense* of its merits as a subject of study, because it seems to me most conducive to the interests of your own Society. I by no means wish to depreciate the value of a more particular attention to single departments of research: for without such instances among the most distinguished naturalists, the cause of natural history would have been retarded. There can be but little danger, too, of any want of a direction to a single favorite subject, where there is a decided inclination for that branch of investigation. But where, as is too often the case of necessity, and more especially in societies intended the rather to foster a *taste* for natural history than to pursue it in its *minuter* details, there do not exist the *means*, the *time*, or the *materials*, it were *better* to regard Nature as a great whole,

and to devote one's moments of leisure or of relaxation to every department in which are the means most available. You, gentlemen, engaged in the classical studies of a prescribed course, are not supposed to be devoted to any foreign to it. The moments of relaxation and of leisure which you devote to the cabinet and the collection, to the research into the mysteries and wonders of nature, are admirably beneficial to that degree of physical health and mental vigor, without which the midnight hours of the study would be weary and depressing. It is well that the classical and industrious student can find pleasure and profit in such pursuits as bring, with instruction, the glow of health and the strength of body. In them he may be laying the foundation, not only of long life, but of a refined taste. The high standard of scholarship which the *alma mater* is yearly demanding, is taxing to the utmost the physical and mental powers. To be faithful to her expectations demands a most careful and attentive regard to a healthy condition of body and mind. To strengthen those and improve these should be the earnest and constant aim. How essential, then, that something should be found which should be likely to secure this. The most careful and methodical arrangement of hours of study and of exercise will not necessarily produce the effect. The mental energies, like the physical functions, are always demanding nutriment, and a varied diet is as essential to the one as to the other. The silent solitary walk of the student, at close of day, with the shadows of damp night falling about him, with no interest in any thing around, and bent on the prescribed length of the way, or engrossed on the next lesson, can necessarily give no requisite solace nor respite. To his ear the music of busy nature is unheard; or, if he wanders forth at other times, the mysteries of organic change are unnoticed. Absorbed in his books and studies, I have met the man of deep thought and intense research, in whose countenance I could trace anxiety, and whose frame indicated a lack of that exercise which he was vainly seeking to obtain. Well, then, I repeat, is it for the student to find other themes of reflection and instruction; to find 'books in the running brooks, sermons in stones.' That he can leave behind the classic halls for a brief hour or so, and, amid tangled woods and untrodden recesses, feel gushing into his bosom those healthful emotions of joyous wonder and rapturous delight which nature always can communicate

to whomsoever seeks her aid. And while thus with 'no calling left, no duty broke,' he finds sympathy with the exquisite beauty of this outward world, the student is none the less, aye, I may say, he is the better fitted for other pursuits that demand the uninterrupted attention and silence of the study and closet. Were there then no higher motive, no further end to be gained, than the securing of a more vigorous and energetic frame, the institution of your Society would be deemed sufficiently important. But I should do injustice to my subject, were I to admit this inference as the only tenable ground for such pursuits; nor can I think that any are unmindful of other considerations connected with the researches of natural history.

“An interest in those subjects which it is the province of the naturalist to investigate, will insensibly increase as they are more extensively pursued. The perception of beauty, order, and arrangement, belongs of right to the cultivated mind. Methinks we do great injustice to our mental faculties when we suffer them to become insensible to these. Those systems of education, therefore, which *confine* themselves to *single* or particular departments of human science, are defective. Such has been too much the case hitherto. To cast aside, as worthless, the richly illuminated pages of Nature's great volume, in order the more sedulously to imbibe the learning of past ages, or to ponder on treatises of human invention, is not answering the intention of our destiny. Why this inimitable harmony, this stupendous skill, this exquisite design, if not for our admiration? For what end, the wondrously contrived eye, and the delicately formed ear? Why the nice adaptation of our organs to trace and understand the laws of matter, and to receive impressions of delight? If intended to be insensible to the minuter wonders of Creative Power, or indifferent to the mysteries of Nature, a duller and more imperfect vision and perception were enough. As to the penetrating eye of the astronomer, some *new world* developing itself in space, extends the grandeur of his ideas on the vastness of creation, and offers new proofs of the correctness of the theory of motion, and of laws which govern the universe, so to the naturalist every new investigation extends the powers of his mind, and convinces him of the consummate design of the whole. Would we prove true, then, to the purpose of our being, we should by no means become

forgetful of the relation we hold to this world of beauty. The inexhaustible sources of instruction it possesses, will always command the respect of the student of truth. The effect of such studies will be to create a more refined taste, a nicer perception of good, and a delicate sensibility to whatever is excellent. Free from the prejudices, the passions, and the interests of the world, he partakes of that divine spirit of beneficence which breathes throughout nature, and one with the Great Mind, he will acknowledge to himself the relation he holds with Divine Intelligence, the fountain and source of all good.

“To pursue with efficient usefulness, any or all of the departments of natural history, demands of the inquirer certain requisites of the utmost importance, even to the *general* student. To reduce to system and order the diversified forms of organic life and bodies, is one of the great ends of science. The nice perception of analogies or differences, on which a system should be established, will call forth the energies of the mind to a happy result. To the scholar, these cannot but be highly beneficial. The progress which natural history has been making towards such a natural system, as it is called, exhibits, in a forcible manner, the necessity of great exactness and method. All system, however, is artificial; nature itself knows no method, no nice chain or order of being. The human mind needs such aids and helps; and to assist it to comprehend, as it were, at a glance, the extent of nature in all its modifications and diversities, it were necessary that it have resort to artificial method. Analysis, too, is requisite; and this begets habits of scrutiny and the nicest discrimination. What some of the higher branches of mathematical science are to the scholar, the pursuits of natural history may become. To determine with accuracy what it is requisite to know, will be strengthening the reasoning powers, and aiding the facilities of sound and just reflection.

“The formation of a new society for the promotion of the study of natural history may be deemed evidence of the fact, that this subject, so long overlooked, is beginning to be appreciated as part of a system of education. Attention to such pursuits is much needed in all our schools and colleges. We have been sadly behind other countries in this particular. Let me congratulate you then, gentlemen, on the prospects of your own Society. The spot on which we stand may be

considered already *sacred* to literature and to science. The names of distinguished men in American natural history are familiar to the walls of Cambridge. The progress which much of the natural history of the day has made, is due to exertions of Cambridge scholars. In botany, its woods and fields, how exuberant in rarer plants! In the science of ornithology, not a few rare birds have been added from its precincts; and in entomology, the name of our librarian is too well known and regarded to need any comment. Indeed, were I to bestow an eulogium on his merits, its *happiest* would be my *silent* respect, standing so high and distinguished as he does, as the patient and untiring investigator in those departments of natural science, so little understood by the general mind. To his efforts in your behalf—in raising your Society to its standard of usefulness and importance—in watching over its germ and its development—in devoting his moments of leisure and relaxation—his few and brief hours, left after the discharge of arduous duties of his office, to advance a taste for science—to his urbanity and unwearyed kindness in affording every aid, and in rendering the stated recitations even, the illustrations of a lecture—to his zeal as an *Alumnus*, in the interests of our university, and to his extensive and liberal views of the value of such studies—you are well aware to what extent you are indebted. The delightful intercourse it has been my good fortune to maintain for many years, will not soon be forgotten; recreant, as I should be, to natural history, in whose annals his name will survive, while Nature in her wondrous harmonies shall gladden our bosoms, and guide to divine emotions the finer feelings of our hearts.

“The efforts towards a botanic garden, under the auspices of the Agricultural Society, some thirty years since, and the institution of a professorship of natural history in 1805, have been of considerable importance in the annals of science. To the genius and patience of Peck, the avocations of agriculture are yet indebted. Within the area of that early garden some of his favorite plants yet remain. The superb individual of the *Caméllia japónica*, in one of the green-houses, furnished a memoir of its natural history; and although, since that day, what changes have been effected in the diversity of forms and flowers of that species, yet to the eye of the botanist of Cambridge it loses none of its merits. Those walks and avenues the enterprising and modest Nuttall trod,

and in the humble capacity of curator delighted and instructed the *world* with the rich variety of his scientific research. Within its inclosures are lowly but sweet flowers of native growth, the offerings of humbler names, culled by enthusiastic zeal from the wide-apart portions of our country. In woods and by ponds, in sandy tracts and often trod bye-ways, the indefatigable zeal of other and younger botanists have discovered rarer species, escaping the eye of those who have preceded them; while the name of one now absent in Europe, and revelling amidst the richest treasures of herbaria from every clime, bears high testimony to the exuberance of fruitful subjects of research in the curious and mystic department of cryptogamic botany. To the ancient town of Ipswich, as early as 1785, A. D., the first volume of the American Academy is indebted for a paper on the indigenous plants of the vicinity, with no other guide to determine our flora than the few foreign works then scarce in this country; and where in the annals of botanical science, and of elegant preparation of dried specimens, is the name of *Oakes* unknown? If we inquire for the useful and learned in our days, for the promoters of our own science in other departments of natural history, we have only to refer to the college catalogue to find the names of members of several scientific societies in our vicinity. To *such, especially*, is the natural history of this State, lately published, indebted, its treasures revealed, *unknown* before, its science made precise. The depths of the ocean, the surf washed shores, the stilly lake, and the babbling brook, have been made subservient to the searching skill of exploration; the mollusca of stationary habits, and the finny wanderers of ocean's stream, have received their allotted place and position in scientific arrangement. Into the secrets of departments of science, hitherto considered difficult, we have been introduced, and the minuter things of nature have been made to minister to our instruction and delight. Still further investigations into, and revelations of, the wonders of vegetable organography, and of precise botanical arrangement, we may expect in the lately appointed Professor of Natural History, Dr. Gray.

“The question often occurs to those *unacquainted* with the extensive nature of our studies, what is there now to be investigated, what new thing to be discovered? A cursory examination of the several excellent reports to which I have already alluded, would be sufficient to answer this inquiry. Scarcely

a day passes, which does not bring to light some hitherto undiscovered fact. We cannot open a number of a scientific journal without finding something wondrous, strange. What circumspection and inquiry, what research and investigation, are yet requisite to develop the habits of organized living beings! The student of nature, who endeavors to discover *what* has been really done, is amazed to find, after all, how *little* has been effected. The field of inquiry is as boundless as creation itself! A few grand leading facts and truths have been established, through the lapse of centuries; beyond these how much uncertainty yet! This seeming endless variety in the forms of organized bodies is as wondrous as it is overwhelming. Every where is stamped in characters too plain to be overlooked the wisdom and power of creative energy. The vastness of this idea can only be appreciated by him who is in some measure conversant with studies like those peculiar to natural science. At no time is the *investigator* at a loss to find the means of enkindling his enthusiasm, or of awakening his zeal. In the humblest department, as in the most exalting and noble, are themes of intense interest and of delightful inquiry. The spirit of the day is eminently that of a general thirst for knowledge, and in every possible channel for acquiring that, have the minds of men run. Scientific research has not been tardy in this respect, and this may be esteemed the golden age of Science and the Arts."

ART. II. *A new Disease of the Plum.* By Dr. T. W. HARRIS, author of the Entomological Report of the State of Massachusetts.

LAST year an undescribed disease of the plum made its appearance in some gardens of this vicinity, in the latter part of the month of May, and has been observed again during the present season. Soon after the blossom had fallen, the fruit began to swell rapidly, and, in the course of two or three weeks, it had grown to more than ten times the size that it ordinarily attains in the same period. It was soft and compressible, as though

it were puffed up with air, being filled with an elastic spongy substance of a whitish color. In some of these inflated plums no vestige of a kernel remained; in others, a little, soft, and empty shell was found. After growing from one half to more than three quarters of an inch in diameter, the fruit dropped, and by the middle of June no more of it was to be seen on the trees.

The cause of this puffy swelling of the fruit, and abortion of the kernel, is a little *thrips*; and several of these minute insects were found, on the 28th of May, on almost all the diseased plums. It is probable that they begin their attacks in the blossom, and that they prevent the impregnation of the ovule or young kernel, by destroying the pollen; and, by subsequently puncturing the plum, produce an irritation, which is followed by a rapid swelling and diseased condition of the fleshy substance of the fruit. Preternatural enlargements and distortions of the parts of flowers and of fruits are known to be occasioned by the attacks of other species of *thrips*. This may be seen in the blossom of the black whortleberry, (*Vaccinium resinodum*;) all parts of which, calyx, corolla, stamens and ovary are sometimes enormously enlarged, and entirely changed in texture and appearance, in consequence of the punctures of a kind of *thrips*.

It is not yet known how far this affection of the plum has extended. In this vicinity it seems to have been confined to certain trees only. Should the insects multiply and spread to other trees and other places, they will prove very destructive to the fruit hereafter. It remains, therefore, for the practical gardener to watch for their first appearance, and to devise some sure means of killing them, while the trees are in blossom and the fruit is forming.

T. W. H.

Cambridge, June, 1842.

We invite the attention of our readers to the above. New insects and diseases appear to be upon the increase, and it becomes the intelligent cultivator to watch attentively for the causes which produce such dire effects on his fruit trees. We trust we shall be able to offer other communications from Dr. Harris, on the habits of the various insects which annoy trees and plants, and thus be the means of leading to discoveries for extirpating them.—*Ed.*

ART. III. *Pomological Notices; or Notices respecting new and superior varieties of Fruits, worthy of general cultivation.* By the EDITOR.

AT page 161, we gave an account of a number of new varieties of the pear, which have been recently introduced to notice in France and England, adding a particular description of some of those raised by the late Mr. Knight, President of the London Horticultural Society.

We now resume this subject, and shall give some account of other new varieties of pears, as well as the descriptions of several new apples, plums, and other fruits, which we find recommended in foreign publications as worthy of cultivation, or, at least, as worthy of being tried, in order to ascertain how valuable their merits are, in comparison with the old and well known kinds.

The accession to the list of superior kinds of fruits is not so rapid as many suppose from the great number of new names with which the catalogues of nurserymen are filled: a great many of them often prove synonymous with the older varieties, and a portion of them are quite inferior, leaving only a few which will stand the test of time, and become permanently established favorites with the fruit cultivator. It is our object, in presenting these notices, to lay before the amateur who has leisure, and feels an interest in cultivating the novelties of the day, the names and descriptions of such as are reputed good, that he may have the opportunity to procure them at an early period, and thus sooner ascertain how far they may safely be recommended for general cultivation. No individual in this country has done more than our correspondent, Mr. Manning, to accomplish this object, and we trust that others may emulate his example, and assist in the dissemination of information which shall lead to so important and useful results.

PEARS.—At page 161, we enumerated nearly all the new varieties of this fruit.

Hacon's Incomparable.—This highly esteemed variety, about which so much has been said, we find noticed in the *Gardeners' Chronicle*, with an outline engraving of the fruit. There appears also to be some question as to the origin of

the fruit. A correspondent of the above paper states that it was raised from a pip of a pear gathered off Rayner's Seedling, which is now growing in the yard of a baker of the name of Hall, at Downham. The original Hacon's Seedling is now growing in Mr. Hacon's garden, at Downham; and if the fruits of the two trees be compared together, it will be found that although like as to form, the Hacon's Seedling is superior in flavor. The writer states that when Mr. Hacon first introduced the pear to general notice at the horticultural show at Norwich, he asked him to give it a name for that exhibition prior to sending it, and, from its great excellence, he called it "Hacon's Incomparable." It was raised about twenty-eight years ago. This is the true history of the origin of this variety. Mr. Rivers states that he has received grafts from the Rayner Seedling which prove identical with the variety distributed by Mr. Hacon.

The following are the names of several new varieties of pears, grafts of which have been received by Mr. Kenrick, from M. De Wael, Secretary of the Horticultural Society of Antwerp. Mr. Kenrick states them to be of unquestionable excellence, and were sent as the selections of his own private and immense collection of over eight thousand varieties of fruits:—D'Amande, Arbre Courbe, Beurré de Kent, Beurré Tacon, Charlotte de Bromer, Dingler, Doyenné Caroline, Doyenné Soulange, Fausse Spreaw, Fondante de Charneuse, Fondante Grise, General Obdam, Grand Soliel, Hernandes, Immense bis d' Ete, Jaminette d' Hiver, Las Cassas, Leon le Clerc, Louise Morell, Marquis de Bedmar, Meuris d' Hiver, Princess d'Orange, Rousselette d' Espereu, Seigneur Tachete.

APPLES.—Several new varieties from Ohio have been added to the nurserymen's catalogues, but of their merits enough is not known to warrant us in making mention of them here. The following are given on good authority:—

Golden Ball.—A very beautiful and superior fruit, supposed to have originated in Maine, but very lately introduced here. The fruit measures three inches in height and three and a half inches in breadth; form Calville-shaped, or ribbed at the sides; color golden yellow; stalk in a broad shallow cavity, but little depressed; juice, rich, sweet, aromatic, with a just proportion of acid. A winter fruit. In Portland this apple commands a higher price than any other variety.

Jewett's fine red.—This is a very beautiful apple, of large

size and good flavor, ripening late, and keeping till February. We were furnished with a fine specimen by Mr. Cole, editor of the *Farmer's Journal*. It promises to become a favorite apple. Mr. Cole has introduced several other varieties, but we are desirous of seeing the specimens another season before we recommend them to notice.

The Bevan apple.—Under this name a variety is figured in the *Orchardist's Companion* for October last. It is thus described:—

Size medium; form somewhat flat; skin with a yellow ground, striped with bright red; flesh white, crisp, and juicy; flavor sprightly, very pleasant, much similar to the summer Pearmain. Tree robust and thrifty. Ripens from the 4th to the 20th of July. The following is the history of this new variety, as given with a figure of the apple:—The parent tree was discovered about forty years since by a Mr. Samuel Bevan, on the edge of a swamp near Salem, N. Y., where it had evidently grown up from a seed: from thence he removed it to his orchard, and subsequently presented buds to Mr. Reeve, with a view to propagating the variety for sale.

Within a few years, since the variety has appeared in the Philadelphia market, there has been an increased demand for the trees, and Messrs. Reeve have disposed of a large number. Its productiveness renders it a profitable tree for the market.

CHERRIES.—Last season, we made mention of the new early Bigarreau cherry, exhibited by Mr. Wilder: from an inspection of the tree the present spring, we are satisfied it is a new and exceedingly early kind.

Large black Bigarreau of Savoy.—Last season, a large black cherry of beautiful appearance, even excelling in this respect the black Tartarian, was exhibited before the Massachusetts Horticultural Society. The name of the kind was unknown. The original tree was imported from the south of France about ten years ago, and no name was ever received, or, if received, subsequently lost; but from its great resemblance to a variety imported a few years ago by Capt. George Brown, of Beverly, from Italy, and lately come into bearing, we think it one and the same kind. The present season will enable us to set this matter at rest; but, in the mean time, we can recommend the variety as one of the handsomest and richest cherries we have ever seen.

Rivers's early Heart.—A medium sized cherry, early, and of good quality; hardy, and a good bearer.

Rivers's early Amber Heart.—Of large size, very early, and excellent flavor; a hardy tree, and good bearer. This and the last named were raised by Mr. Rivers, nurseryman, Sawbridgeworth, England, and are desirable additions to this fruit.

PEACHES.—A great number of new varieties have recently been brought into notice, and we intend, at a future time, to enumerate all that are considered valuable. For the present we merely notice a few new kinds, which we find more particularly described.

Tippecanoe.—In the *Orchardist's Companion* for April, is a fine fruit figured under this name, and thus described:—

Size very large; form nearly round, with rather more fullness at the lower extremity; skin yellow, with a fine red blush next the sun; flesh yellow, fine and juicy; flavor good, possessing an agreeable acidity. It is stated to have been raised by Mr. George Thomas, of Philadelphia, and the first fruit brought to notice in the autumn of 1840; the tree is an abundant bearer; ripens the end of September. The fruit has been exhibited at the two last annual exhibitions of the Pennsylvania Horticultural Society, and much admired for its beauty. The name of this variety, unless given previous to the autumn of 1840, should be cancelled, as in our Magazine for the same year, (Vol. VI., p. 348,) an account of a new seedling, under the name of the Tippecanoe, was there published. The variety was the production of our correspondent, Mr. Lazell, of Columbus, Ohio; and through his kindness we received scions in a *newspaper*, which came alive, and were inserted in young trees, one of which we have now in bearing. As Mr. Lazell's name has the priority, to prevent confusion it should be known as the real Tippecanoe peach, and the name of Mr. Thomas's altered.

Eastburn's Choice, another new variety, figured in the same publication. Size large; form nearly round; skin pale yellow, with a fine blush on the sunny side; flesh yellowish white, with a tinge of red round the stem, which is very small; flavor exceeding pleasant and sprightly, with a very juicy flesh. Ripens late in September. Raised about five years since, by Mr. Keith, of Kensington, Philadelphia. The name is given in honor of the Rev. Mr. Eastburn, who was formerly

stationed at the Mariners' Bethel, in Philadelphia. Trees have been produced from the seed through three generations, without variation, and it seems to substantiate the opinion, that if peaches are kept distinct, they vary but slightly from the parent tree, when raised from the stone.

GRAPES.—Some few new grapes of excellent quality have lately been produced. The Victoria we have already noticed; but of its value as a forcing grape we have no knowledge further than has been given. It will probably fruit in the graperie of the Hon. T. H. Perkins, whose paper relative to the same, in our last volume (VII., p. 423,) is undoubtedly fresh in the minds of lovers of the grape.

Wilmot's new black Hamburg.—This new grape has been already mentioned by our correspondent, Mr. Kenrick, in his article in our last volume (p. 283.) In the *Gardeners' Chronicle*, after some remarks upon new productions in general, this variety is thus described:—

In the opinion of some of our correspondents, that noble variety called Wilmot's new Hamburg is only the black Hamburg well cultivated: one, who says that he saw it growing on the tree, declares that he can see no difference between it and the black Hamburg. Now, in general, one may take the word of an honest man for what he sees, but not always, and especially in such a case as this. Mr. Wilmot's grape has small, round, loose, bunches, with very large uneven berries; that is not the usual character of the black Hamburg, but the latter may be made to assume such an appearance by thinning and high cultivation; indeed we must admit that we have seen single berries of the black Hamburg grape even larger than any of Mr. Wilmot's. It is, however, to be observed, that in such instances, the berries were the exception to the usual rule, while the large size and rugged appearance of Mr. Wilmot's are evidently the habitual marks of the variety. What, however, are of far more importance than size and the surface of the fruit, are its taste and texture. If the former can be influenced by cultivation, the latter cannot. A gardener may thin a white Muscadine grape till its bunch and berries are like those of a Muscat of Alexandria, but he will never make it have either the musky flavor or the firm solid flesh of the Muscat. Now this is very nearly the case with Mr. Wilmot's: it has a flesh almost as solid as a Portugal grape, and it is not at all like the black Hamburg in those important par-

ticulars; there can therefore be no doubt that it is quite distinct from that sort. If we are asked whether it is equally distinct from other black grapes, we answer, without hesitation, yes, so far as we can ascertain. We have consulted some of the most skilful grape growers of the country, and the Continent, and we cannot learn that any one is acquainted with it.

This variety has been introduced, and will probably fruit in a year or two.

Wilmot's Early Muscat.—This is a new variety raised by Mr. Wilmot, and cultivated very extensively by him in his graperies for the London market. It is exceedingly productive, and ripens its fruit in perfection from March till October.

Seedling of Bloom Raisin.—Under this name, Mr. Kenrick, in the last edition of the *American Orchardist*, gave an account of a new grape, upon the authority of Mr. Robert Thompson, of the London Horticultural Society's Garden, where it produced its fruit in 1837. Bunches as large as the black Hamburg, but more loose; berries blacker, and of higher flavor. It ripened by the side of the black Hamburg near a month earlier; hence it will be duly appreciated by those who cultivate early fruits. In our climate it might undoubtedly be grown in the open air, and we hope it will be speedily introduced.

STRAWBERRIES.—In our last volume, we incidentally alluded to some of the new kinds which have been lately brought into notice. We now add the following descriptions of two new kinds.

Myatt's British Queen.—Some five years since, Mr. Myatt produced a new variety of the strawberry, called Myatt's Pine, which was considered a most excellent variety; but, though a good fruit, it has been found so difficult to cultivate, that it has lost much of its value. It is a handsome and fine-flavored fruit; but so shy is it to grow and bear, that for one person who cultivates it successfully, fifty fail; it is even asserted that Mr. Myatt himself is losing his power over it. The production of this variety, however, was sufficient to make the name of Mr. Myatt familiar as a strawberry grower.

The British Queen is a late production, and was first offered for sale, we believe, in the spring of 1841. It is thus described in the *Gardeners' Chronicle*:—

It is said to be an abundant bearer, and very free grower,

and is certainly a very remarkable variety. As to size, we have measured many which averaged six inches in girth; as to weight, we picked out seventeen which weighed sixteen ounces; as to productiveness, we have found several stems, a foot high, bearing from five to seven strawberries, and in two cases there were ten and eleven on a stem; finally, as to quality, the variety is inferior to the old Pine and Myatt's Pine, but it is better than Keen's Seedling, having more flavor; it is, in fact, a very delicate agreeable variety, without the insipidity and wooliness of the coarse and large strawberries. The only variety with which it can be compared is the Downton, itself one of our best strawberries: it has much less acidity, and does not require to be almost black before it is eaten; on the contrary, its greatest excellence seems to be when it is of a clear bright rose color. Vines, we believe, have been imported, and probably another year we may have the opportunity of seeing the fruit.

Newsome's Princess Royal.—This is the name of a new variety, of which we have seen no account, except that in the advertisement of the plants. It is there stated to be a very large fruit, twelve of the berries having weighed sixteen ounces: this excels, in size, the British Queen. Nothing is stated in relation to its hardiness, habit of growth, excellency of flavor, free bearing, &c.

Myatt's Eliza.—This is a third variety produced by Mr. Myatt, and is advertised as a celebrated fruit, though not, of course, equal to the British Queen, as it was brought into notice before that variety, and has now been cultivated three or four years. Its peculiar qualities are not stated.

The Elton strawberry is yet quite a new fruit in our gardens. It is one of the late Mr. Knight's productions, but its excellence was overlooked by him until some time after its production. His seedlings were given to the London Horticultural Society, and when, a few years since, they came into bearing, among them a superior fruit was found, which is now called the Elton. Berries have been produced in England, weighing an ounce and a half each. It deserves trial.

RASPBERRIES.—The old red and white Antwerp yet continue superior kinds, and by many writers are considered better than any others. The Franconia is now becoming extensively cultivated, and from its great beauty and exceeding productiveness, is very highly esteemed. There is great confusion

in regard to the *true* red Antwerp: at least six or eight kinds are cultivated as the red Antwerp, and we are in doubt whether either of them are the genuine kind. To set the matter beyond doubt, we have imported a few vines from the best sources, and when they come into bearing, we hope to accomplish this object.

The Victoria raspberry, of which we gave an account last year, has been introduced, and will probably fruit next year.

The Turkish Turban is the name under which we have seen a variety advertised in the London magazines, as a fine fruit.

The new red Antwerp.—Under this name we have received a few plants from our correspondents, Messrs. A. J. Downing & Co., of Newburgh, N. Y., which they state to have originally been discovered in a garden near that city. It is considered by them as preferable to the red Antwerp.

The Ever-bearing Raspberry.—In our Vol. III., p. 154, under our Miscellaneous Notices, we gave an account of this fruit, which had then just been brought into notice: since then, we have heard very little of it till the past year. It is now attracting more attention, and as it is deemed a valuable acquisition, we have copied a further description of it below, which we find in the *American Agriculturist*:—

The Ohio Ever-bearing raspberry was first discovered some fifteen years ago, in the northern part of the State, near lake Erie, but in what particular part is unknown. Mr. Longworth, of Cincinnati, introduced it into his garden in 1832, at which period he was driven into the back country by the cholera, where he found it growing. It has been little known, however, in Cincinnati, until within the last two years, but there is now great effort made by the gardeners to cultivate it for the market of that city. The fruit resembles the wild native raspberry, but is much larger, more fleshy, and of a much finer flavor, and is also a very profuse bearer. In Cincinnati, the wood of the previous year bears one crop in June, after which it soon dies; the young shoots then come into bearing, and continue doing so into October, till the frost cuts them off, when may be seen buds and blossoms, and the fruit in every stage from green up to full ripe, on the bush, stayed by the hand of nature in the midst of their productiveness. The fruit is preferred by many to the red Antwerp, and with its large erect clusters of flowers, presents a beautiful appearance.

Mr. Longworth, in a communication describing this fruit, in the *Gardeners' Magazine*, states that the plants, in light dry soils, are not very productive in the autumn crop; but if grown on a stiff loam, on a clayey subsoil, bear profusely till destroyed by frost. From all that has been said in relation to it, it appears a desirable fruit, and we hope soon to test its qualities ourselves.

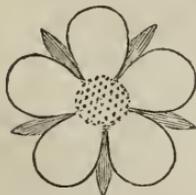
ART. IV. *Observations on different varieties of Strawberries; and the means of producing good crops of fruit.* By N. LONGWORTH, Esq., Cincinnati, Ohio.

I SAW a bed of Hoveys' seedling strawberry, last spring, in a gentleman's garden in New Jersey. There were no other kinds near them, and there was not a perfect fruit on the whole bed. It was out of blossom; but I cannot be under a mistake when I say that your strawberry is, in common with the Methven Castle, Hudson, and all other good bearers that produce very large fruit, defective in the male organs, and must, in your variety, amount to a complete separation of the sexes, and require other plants, perfect in the male organs, near them. I have kept the male and female Hudson in separate compartments for twenty years, to enable me to make a suitable selection in putting out new beds; those never had either produced a perfect fruit. When at Mr. Cushing's, at Watertown, I was surprised to learn that his Keen's seedling bore fruit in a compartment where there was no other variety near. The Keen's seedling imported by Mr. Buist and myself, is defective in the male organs, and an acre of them, if not mixed with males, would not produce a perfect fruit. I examined Mr. Cushing's Keen's strawberry when in blossom, and found them perfect in the male organs, and generally perfect in the female organs also. His fruit cannot be as large, or his vines as abundant bearers, as mine, but his plants would be valuable to mix with mine, say one to ten. His will be found to ripen some days earlier, the fruit less abundant but of greater sweetness, and a portion of the blossoms will blast.

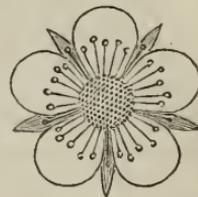
This is the objection to Wilmot's Superb strawberry: it is so defective in the female organs, that with me, not one blossom in fifty will produce a perfect fruit; but in a stiff clay it would bear better. From the appearance of the vine of your strawberry, I anticipate a very large fruit; but I shall not risk it without a male Hudson near, except it be a single plant as an experiment. The moment I can see the blossom, I shall be as well satisfied as after cultivating it for years.

I have been surprised to find no English gardeners that understood the true character of the strawberry. There is no strawberry that produces abundantly and very large fruit, where the male and female organs are perfect, in the same blossom. In some varieties only, it amounts to a complete separation of the sexes; in others, those abounding in the female organs never bear a perfect fruit. Those abounding in the male organs sometimes produce a fair crop, and where a few fruit only, it is often very large. I am the more surprised at this, as the discovery was made by Dachesne, and communicated to Linnæus, and his views are sustained by all writers of eminence who have written on the strawberry since his day. In raising from seed, both kinds are produced, but if suffered to run together, as the male vine is the more vigorous, it will make ten new plants where the female produces one, and will soon root out all the bearing plants. In all the monthly and white variety of the strawberry that I have seen, the male and female organs are perfect in every blossom, and, as a natural consequence, the fruit is never large. The small Virginia scarlet produces about half a crop of delicious fruit, but it is always small. I add a sketch of a male and of a female blossom of the Hudson strawberry.

8

*Female flower.*

9

*Male flower.*

You will observe the male blossom is largest. By separating the hull from the stem of the female plant, the female organs will be found attached to the stem, and the male

organs to the hull, but the latter so small as to be incapable of impregnating the female. In this variety, which I consider far superior to Keen's, Methven Castle, or the Pine, it amounts to a complete separation of the sexes; neither will produce a perfect fruit when separated from all others, nor would either ever produce a plant of a different character were they to run for fifty years. Many intelligent horticulturists, and among them the elder Prince, have an idea that the strawberry vine becomes barren by running. He inferred this; for where he had both bearing and barren vines in a bed, in two or three years the former disappeared entirely. The reason for this I have stated.

I intended writing a few lines only, but knew not where to stop. When your strawberry is in blossom I will again trouble you with my views of its character. The question has been lately started in England, whether all strawberries are mere varieties, or whether there be different species. I consider this question settled by the fact, that the Hautboy strawberry and some others cannot be impregnated by the Hudson, Virginia Scarlet, or our native strawberry.

Yours, truly,

N. LONGWORTH.

Cincinnati, Oct., 1841.

P. S. *May 16, 1842.*—My plants are now in blossom, and young fruit. I have plants, with males of the Hudson variety near them, and not a blossom will fail to produce a perfect fruit. As an experiment, I placed a vigorous plant where it could be impregnated by no other variety, and the result is, what the blossom satisfied me it would be, it will not produce a perfect fruit. But this is a vigorous and hardy variety, and my present impression is, that it will prove superior to Keen's seedling in all respects. In my opinion, its being defective in the male organs increases its value; but it is necessary that those cultivating it should be informed of it, and plant a few vines, perfect in the male organs, near them.—*N. L.*

No subject is of more importance to the horticulturist than the unsettled question in relation to the existence of separate sexes in the strawberry plant. Though we have been well aware that there were *fertile* and *sterile* plants, yet we have been unwilling to believe that there existed *separate* male and female flowers, amounting to a complete separation of the sex-

es. The subject has been more than once mentioned in our previous volumes, by ourselves and contributors; and in an excellent article on the cultivation of the strawberry, (Vol. IV., p. 161,) by our correspondent, Mr. Downing, he has given directions for the best mode of securing a crop of fruit of those kinds which are imperfect in the blossoms. Mr. Longworth was the first to point out this fact, so long overlooked by scientific men, to Mr. Downing, and the truth of it confirmed by an examination of the plants.

We are happy in being enabled to offer the above remarks of Mr. Longworth at this time; not only because he has brought the subject up in such a manner, but because it has called our attention to it, and given us an opportunity to confirm what he has stated, in relation to our seedling strawberry, and to other varieties mentioned in his communication; and to correct an error under which we labored, in regard to the *perfect* character of the blossoms of the former variety.

In our article upon our seedling, (Vol. VI., p. 284,) we alluded to the fact of there being *sterile* and *fertile* plants of the Downton, Bishop's Orange, and others, and remarked that "a want of a knowledge of this fact had heretofore occasioned much disappointment in the cultivation of these varieties." We also stated that such was not the case with our own variety; that every flower was perfect, and followed by a full sized fruit. Our opinion was not based upon a very minute inspection of the flower, but from what we thought a safer mode of judging, the fact that every single bloom which opened produced a fruit: this the plants did in 1838, '39, '40, and '41; and to such a degree was the original bed, which was not destroyed till the present summer, productive, that many of the most intelligent cultivators who saw it, among whom we may name Mr. Haggerston, gardener to J. P. Cushing, Esq., assured us that they had never seen it equalled. We took it for granted that there could be no such thing as a *sterile* plant, when all bore a crop of fruit.

In the spring of 1841 we had occasion to make a new bed, more particularly for the growth of young plants than for the fruit: this bed, in order to be sure that the variety should be kept distinct, was placed in a remote part of the garden, at least fifty yards from any other kind. During last season they made a good growth, and covered the ground with the vines in the autumn. From this bed immense quantities of plants

were taken for sale at that time, and the present spring; yet there was a sufficiency left to produce a good crop, and before the plants began to throw up their flower stalks, Mr. Longworth's communication came to hand, and we were quite astonished to hear that he had seen a whole bed, in which there was not a perfect fruit: we at first believed he could not have seen the true variety; but knowing Mr. Longworth to be a gentleman distinguished in horticulture, and upon whose statements we could rely, we determined to watch the bed carefully when the plants began to bloom, and satisfy ourselves. This we did; and the most rigid examination has convinced us that he is correct. The new bed above alluded to flowered freely, but it has not produced twenty quarts of fruit, though it was large enough to produce at least two bushels. In this bed of upwards of five thousand plants, we did not find a flower with perfect *stamens*. We then had recourse to the original bed, where a few straggling plants were growing; after a careful inspection we found from forty to fifty, out of perhaps a hundred left, which had perfect flowers, that is, producing both stamens and pistils; these we took up carefully, and they are now doing well. The question then recurred to us, whether the original plant might not have been perfect in its flowers, but by the rapid manner in which the runners had been increased, the flowers had become imperfect. If this had not been the case, where should the *staminate* plants have originated, when not one was found in the new beds? Could they have been accidental seedlings? This question cannot be settled until the plants have produced fruit another year.

But it may be asked, how our plants in the original bed should have produced such crops. This is easily explained: in *parallel* beds of fifty feet in length, each containing two or three rows, we cultivated the Wood strawberry, Keen's seedling, Methven, pine, Early Virginia, and some others. The consequence was, that however deficient our seedlings might be in stamens, the abundance of them in the other kinds was sufficient to fertilize the whole bed. It was probably this which deceived us, and led us to the conclusion that the flowers were perfect, and the distance at which the bed we have before mentioned was placed from all other kinds, has been the means of convincing us of the truth of Mr. Longworth's statement.

It is somewhat singular that none of the English writers on

gardening have mentioned the subject, except a remark in the London Horticultural Society's *Catalogue*, that there exists in all sorts of *Hautbois* both the "prolific," and also those sterile plants commonly called *males*, which have "long runners." No reference is made to the other classes of this fruit, which contain so many sorts, and so many of which in the same work are set down as bad bearers. The French writers appear to have been the first who discovered it, and alluded to it in some of their late publications.

After what has been written, it is only necessary to know that our Seedling, the Methven, Downton, and others, should be set out in beds, *near to a bed of Early Virginia, or some other staminate plants; not barren ones, or those devoid of pistils, as some cultivators have advised, as it is just as well to have such as will produce a crop of fruit.* Those who may have found our strawberry a shy bearer, after this explanation will be able to produce as great a crop as they could wish.

An inspection of the engravings of the two kinds of flowers, in p. 258, will enable the cultivator to detect them very easily. In our engraving the two flowers are nearly of a size. Mr. Longworth's sketch was made last fall, probably from recollection, and was somewhat imperfect. Our present drawing was made from a flower as we took it from the vines.

MISCELLANEOUS INTELLIGENCE.

ART. I. *General Notices.*

Pruning black Currants.—The best method of pruning black currants is to thin out the branches when they are too thick, and not shorten, unless when a shoot or branch requires to be cut back, in order to produce one or more additional, to fill up an adjoining opening. (*Gard. Chron.*, 1842, p. 25.)

Hemerocallis carulea, and the other species, require to be planted in loamy soil, kept rather dry in winter, but freely supplied with moisture in the growing season. They are also the better if planted in a situation where they are partially shaded from the mid-day sun. The Japan species, now called *funkias*, are more delicate, and are apt to suffer from superabundant moisture during the winter; they

should be protected with a flower pot inverted, to keep them dry. (*Id.* 1842, p. 25.)

To kill Moss on Gravel Walks.—One ounce of sulphate of copper, dissolved in a gallon of water, is strong enough to kill moss in gravel walks. (*Id.*, 1842, p. 57.)

Taking up Hyacinth Bulbs.—When taken up the bulbs should be removed to a shed, sheltered from the sun, but free to air, and any earth adhering to the fibres of the roots should remain for some little time: after two or three days they should be looked over, and loose earth shaken from them, and as the leaves decay they should be occasionally removed. I have generally placed my bulbs at first in the ground, in the tool shed, and as they got dry removed them to an airy shelf. When the leaves are nearly decayed, I place them in very shallow baskets, and allow as much air as practicable to be between each root, to harden them, turning them every two or three days. By this treatment, and rubbing off any portion of mould attached to the bottom and sides, they are in a fit state to be placed for the summer in a dry room, and by a little occasional attention, the rough and outside coat will, by a gentle pressure of the thumb, be effectually removed, and exhibit the appearance of the bulb clean, smooth, and in good condition. The latter process I generally do in the latter part of August, and at the same time remove the remains of such part of the root of the former year as may not have dropped off previously to this time. It is hardly necessary to state, that any bulb in an unsound state, either from appearance of decay, or from having been injured in taking up, should not be put with those intended for future planting. (*Id.*, 1842, p. 107.)

Pruning Forest Trees.—Always look at the top of a tree to be pruned—and every tree requires pruning every eight or ten years, at least—and observe if it be double or round headed. If double topped, cut away the worst and most crooked, leaving only one leading shoot; then look down the stem, and if the tree be vigorous, cut away the strongest branches, say two, three or four of them, according to its vigor. If weakly, take only one of the thickest away, and on no account touch the smaller and lower branches, which aid the growth of the stem, whilst the large branches are perfect robbers of the sap. If the head be round, and without a straight, good leading top shoot, better cut the head completely away, when it will make a fresh straight shoot; or if it be of the pine tribe, cut it down altogether; it can never reach a valuable size, or be ornamental. (*Id.*, 1842, p. 110.)

Treatment of some kinds of Dahlias.—Lee's Bloomsbury, Beauty of the Plain, Dowager Lady Cooper, &c., should not be thinned out, as that would tend to increase their coarseness; but by allowing them to have free growth, part of the nourishment that would go to the flowers is directed to other purposes, and the blooms are consequently finer in quality. (*Id.*, 1842, p. 113.)

*Cultivation of *Salvia patens*.*—In the autumn dig up the roots with the dahlias, and after drying them they are stood in some good dry and cool shed or cellar, sufficiently warm to keep them from freezing, and they must be occasionally examined. About the middle of February, take a few roots into the vinery or green-house, where

there is a moderate temperature, and start them before potting, in the manner of dahlias. In the course of a month, the buds will be advanced an inch in length. Then divide the roots into as many parts as there are young shoots; leaving one or more tubers to each: pot them in rich soil, shifting as they require it; and pinch the bloom from a portion of them, as it appears to insure a succession. (*Id.*, 1842, p. 143.)

Characteristics of new Dahlias.—For the information of dahlia growers who may be cultivating flowers for exhibition, and who may wish to know beforehand how much they can depend upon certain varieties for the purpose, we have added the following notes on a few of the newest kinds, extracted from an article in the *Chronicle*, in which upwards of a hundred are named. So far as we have grown the sorts, the writer's remarks appear correct.

Admirable (Sparry's.) Rosy purple. The flower appears rather too much quilled in the centre, from the petal being a little too long: it is a useful show flower.

Advocate. Buff; good petal, but too much sunk in the eye. Useless.

Beauty (Parsons's.) White, tipped with purple; very uncertain, but occasionally produces fine show flowers.

Britannia (Ring's.) Rose; a second rate flower, of little use.

Bridesmaid (Brown's.) White, tipped with purple; a well formed flower, of good substance; a very useful and desirable variety.

Burnham Hero (Church's.) Dark crimson; a very constant and desirable flower, of good symmetry, and well up in the centre; an excellent flower for exhibition.

Conservative (Low's.) Purple; occasionally very fine.

Conqueror of the World (Stein's.) Primrose, edged with rosy purple; a very pretty flower, of good form; uncertain. We recommend it to be tried another season.

Constancy (Keynes's.) Purple; good second rate flower.

Dowager Lady Cooper (Jackson's.) A very beautifully colored flower, being a delicate rosy lilac; extra fine petal and form; a hard-eyed flower, occasionally producing very fine show blooms.

Eclipse (Widnall's.) Scarlet red; a good and useful flower; the petals are sometimes slightly serrated. It has appeared in most of the many stands during the past season.

Eclipse (Cattleugh's.) Vermilion rose. This is a fine deep flower, with petal of first rate quality; the centre is a little depressed; it is in the greatest perfection in the beginning of the season. The color is very beautiful and distinct. It is worthy of being grown by every dahlia fancier, as it is a good show flower, and from its dwarf habit it makes an excellent border variety.

Fanny Keynes. Shaded rose; a useful second class flower.

Haidee (Wildman's.) White, tipped with rose; too coarse.

Highgate Rival (Stein's.) Crimson: the flower resembles, and is an improvement upon, the Marquis of Lothian; a useful second rate variety.

Indispensable (Girling's.) Rosy purple; good general form, and fine petal; a flower of excellent properties.

King of Roses (Thompson's.) Petals rather too broad, but a constant and useful second rate flower.

- Maid of Bath (Davis's.) French white, laced with purple; the petals are rather too broad and shallow, and not sufficient in quantity. It is, however, a very constant and useful flower, and has been a great favorite during the past season, having been shown in most of the winning stands.
- Orange Boven. Uncertain, sometimes producing fine show flowers. Poole's white. Worthless.
- Queen (Ansell's.) White, laced with pink; seedy eye; worthless.
- Queen (Widnall's.) Color peach blossom; very constant, and occasionally very beautiful; general form of the flower very fine.
- Regina (Gregory's.) Crimson; a constant and very useful show flower.
- Revenge (Cox's.) Sulphur; worthless.
- Rival Revenge (Cox's.) Sulphur; worthless.
- Scarlet Defiance (Cozzens's.) A desirable variety, from the distinctness of its color, being a bright orange scarlet; it is a well formed and useful flower.
- Scarlet le Grand (Wingfield's.) The petal of the flower is of first rate form and quality, but it has a hard eye, and is never to be seen in showable condition; useless.
- Tournament (Cattlough's.) Scarlet red; a flower of good properties, rising well in the centre; a very constant and desirable variety.
- Unique (Walton's.) White, edged with lilac; a very useful flower.
- Uxbridge Magnet (Cattlough's.) Purple; a flower of good substance; occasionally confused in the centre, but producing, at times, fine show flowers.
- Yellow Climax (Wildman's.) Fine color; uncertain; occasionally produces good show flowers.

Some of the hard eyed flowers may do better here than in England, while those which are thin, and inclined to show a centre, may not do as well. We, however, are inclined to the opinion that climate makes but little difference: a dahlia which is really good in England, will prove so here; at least, such has been the case heretofore. (*Gard. Chron.*, 1842, p. 155.)

Bone dust for Manure.—With respect to bone dust, twelve months ago we had a ton of it to mix along with the earth in the vine border. I took two or three barrowfulls of the smallest, and mixed it with some compost in which I was potting some pelargoniums, and the result was, that I lost every plant. I likewise tried it upon some chrysanthemums, and they grew and bloomed splendidly. The remaining portion of the compost I united with soil, which I put to some strawberries, and I had an excellent crop. When I had filled up my vine border, I had about two dozen barrowfulls of compost left, which I put into my celery trenches, along side some that were well manured with cow-dung; and the difference was quite visible all the time the plants were growing; and on taking them up, and comparing the largest heads of each, I found that those grown with the bone dust were the heaviest by two pounds a head. (*Id.*, 1842, p. 158.)

Nitrate of Soda.—Nitrate of soda, applied at the rate of one pound to the rod, when roses commence growing, will much improve their vigor, and seems to prevent their being attacked by the green

fly during the summer. Care must be taken that none of the nitrate lodge on the leaves or young shoots, as it will destroy them, and particularly if applied in dry weather. (*Id.*, 1842, p. 161.)

Cultivating China Roses.—China roses do not require much pruning, beyond cutting the longest shoots to strong eyes. They like good rich soil, with plenty of manure, and form beautiful objects when trained on three stakes in a pyramidal form, or when growing over a wall or trellis. (*Id.*, 1842, p. 161.)

Vanilla.—M. Neumann, the gardener who has the management of the hot-houses at the Garden of Plants, at Paris, has succeeded in obtaining a crop of vanilla. His plant is reported to have produced one hundred and seven ripe fruits, the pulp of which was of exquisite flavor and perfume. The plant itself is said to have suffered, but whether or not from overbearing is not ascertained. (*Id.*, 1842, p. 288.)

New Ribes.—Messrs. Lowe, of the Clapton Nursery, have flowered a new hybrid *Ribes*, which is likely to prove a valuable addition to our collection of hardy kinds. It was raised by Mr. Beaton, from seeds of *Ribes sanguineum*, fertilized with the pollen of *R. aureum*, and partakes equally of the properties of both parents; the flowers being of a reddish yellow color, more slender than those of *R. sanguineum*, while the leaves bear a strong resemblance to those of *R. aureum*. In its mode of growth, however, it widely differs from both, being of a much more erect and graceful habit; bearing its flowers with that profusion which is so beautifully characteristic of *R. sanguineum*. (*Id.*, 1842, p. 288.)

Bokhara Clover.—A specimen of this species of clover, which has acquired some notoriety the past year or two, was exhibited last autumn at a meeting of the Yorkshire Agricultural Society, by Mr. Stickney, who states "that if allowed to flower, it becomes perennial, and that a single plant, in rich soil, kept clear of weeds, will cover a circle of two yards in diameter, and attain the height of fifteen feet. It dries down in the autumn, and in the spring shoots out again from the crown. Horses, and all kinds of cattle, eat it freely, either in a green or in a dried state. It may perhaps prove useful in alternate husbandry, as it produces a great height of herbage, and has, at the second cutting in September, attained the height of two feet." (*Id.*, 1842, p. 288.)

A hardy sort of Rice.—The Rev. M. Gabet, a French missionary at Ichat, in Mongolia, has lately forwarded to France a variety of rice, which may turn out very useful to the agriculturists of other countries. Whilst the rice hitherto cultivated requires a damp soil and irrigation, the present variety grows in dry localities, and is cultivated like wheat. A distribution of the seed among the agriculturists of France has been ordered by the Académie des Sciences, and, as this variety is mentioned in Chinese works, M. Stanislaus Julien has printed from the Chinese *Cyclopædia* some notices relating to its mode of culture, amongst which the following possess the greatest interest:—"This species of rice at the present time is cultivated in the province of Fokien. It requires to be sown in an elevated situation, being equally productive in the northern and more arid regions of China, and in those parts where the supply of water is more

plentiful. In general, it is sown and cultivated exactly in the same manner of wheat. When the ground is prepared, the seed is steeped in water for one night; after sowing it, the land is well soaked with water in which the *ashes of rice straw* have been previously mixed. It is then hoed at three different times, and is each time watered with liquid manure." (*Id.*, 1842, p. 223.)

[The introduction of this variety may be of great advantage to the northern states, and enable them to produce their own rice.—*Ed.*]

Nitrate of Soda on Evergreens.—Mr. Rivers, of Sawbridgeworth, has applied it at the rate of one and a half to two hundred weight per acre, at the time when spruce firs were making their shoots, and the change produced in the appearance of the trees operated on was most remarkable. From a pallid, yellow hue, the leaves became of the richest and deepest green, and the trees grew twice as fast as those not nitrated. It is the only form of manure, that, as far as we know, has ever been found possible to apply to coniferous plants with advantage. Common farm-yard manure is well known to be fatal to them; and we apprehend that other complicated manures, such as guano, will be found equally deleterious. (*Id.*, 1842, p. 250.)

Cypripedium insigne.—Allow me to call the attention of your readers to a plant calculated to ornament the drawing-room during the cheerless winter's gloom, and are so easily managed as to be within the reach of most persons possessing only a limited garden. I allude to *Cypripedium insigne*. On the first of December I placed eight plants in the drawing room; there they revelled in the greatest luxuriance for three successive months, and when taken out in March were as fresh and vigorous as the day they were put in. (*Id.*, 1842, p. 252.)

Guano Manure and Potatoes.—During the last year or two, the article of *guano* has attracted much attention among English agriculturists, and its value as a manure has been stated to be very great. Even gardeners have made use of it, and many have recommended it as a valuable manure for plants. In connection with the subject, we have copied the following, on the great value of this manure to the potato crop, and invite the attention of our readers to it. At a future time, we shall endeavor to offer a digest of the opinions of cultivators upon the use of the *guano* for garden purposes.—*Ed.*

We have before alluded to this new manure, which is exciting so much interest in England, as one of the most efficient yet known. In C. W. Johnson's great work, the *Farmer's Encyclopedia*, now publishing in numbers, we find, under the article *Guano*, some facts, which, as exhibiting several matters comparatively, are of interest to the farmer, we give for the benefit of our readers. From a series of careful experiments, Mr. Johnson considers thirty-five bushels of *guano* equal to seventy loads of good rotted manure, in its effect upon crops. *Guano*, it may not be amiss to add, is the dung of sea-fowls, and found on some islands in the Pacific, on the shores of Peru. Considerable quantities have been imported to England, and as the quantity is apparently inexhaustible, the use of it promises to extend rapidly. It consists of the most active ingredients, bone earth, uric acid, and ammonia. The experiments of the table below were made by Gen. Beatson; and in every instance, thirty-five bush-

els guano, thirty-five loads of horse-dung litter, and thirty-five loads of hog-dung litter per acre, were used. The potato was the root planted, and the table will show in what manner.

Large Potatoes planted whole.

Depth planted.	Guano. bush.	Horse dung.	Hog dung.	Simple soil.
12 inches deep.....	499	492	408	397
9 inches deep.....	466	460	427	327
6 inches deep.....	554	583	447	395
3 inches deep.....	531	479	414	311

Large Potatoes cut in pieces.

12 inches deep.....	595	648	369	285
9 inches deep.....	557	589	434	382
6 inches deep.....	589	531	466	408
3 inches deep.....	557	511	375	414

Middle eye of Potato cut out.

12 inches deep.....	382	479	298	165
9 inches deep.....	375	479	298	210
6 inches deep.....	576	563	405	337
3 inches deep.....	453	382	405	343

Small Potatoes planted whole.

12 inches deep.....	492	401	592	369
9 inches deep.....	557	512	525	440
6 inches deep.....	628	583	544	570
3 inches deep.....	557	414	440	440

The comparative produce in pounds of potatoes from these manures, was therefore as follows:—

Guano	639
Horse dung	626
Hog dung.....	534
Simple soil	446

The effect of different depths in planting is as follows, in the total produce of bushels at each depth; a difference worthy the notice of the farmer, as showing that a depth of six inches is better than one greater or smaller.

12 inches deep	7181 bush.
9 inches deep	6828 bush.
6 inches deep	8177 bush.
3 inches deep	7106 bush.

Another result is shown in this experiment, and that is the difference in the crop where large or small potatoes, whole ones or cut, are employed for planting. In Gen. Beatson's experiment, the advantage is greatly in favor of small potatoes planted whole; and there are not wanting many farmers in this country, who maintain the same position.

Large potatoes, planted whole.....	7390 bush.
Large potatoes, cut in pieces.....	7620 bush.
Middle eye of potato, cut out.....	6230 bush.
Small potatoes, planted whole.....	8464 bush.

We are not aware that guano has been imported; but we hope, if to be procured, a trial of it will be made. (*Cultivator.*)

Stopping Vines.—Vines may be stopped close to the fruit without receiving an injury; indeed, it is the best system for pot culture: the peduncles are strengthened, the berries produced are equal in flavor to those grapes which are grown on vines stopped one joint above the fruit, and it seems to lessen the liability of portions of the bunches to die before they ripen. (*Gard. Chron.*, 1842, p. 178.)

ART. II. Foreign Notices.

FRANCE.

Cultivation of Roses.—All the tender kinds, such as Bengals, Teas, Noisettes, and Isle de Bourbons, are propagated by cuttings and leaves perpetually, and hybrids between them are also raised in the same manner, but not so expeditiously as by grafts. The bottom heat, whether by tan or hot water, is kept as nearly as possible at 25° Reaumer, (88° Fahrenheit:) the compost in general use is equal parts of peat and white sand. Some use a kind of black sand, which is found to answer very well: this is shaken down rather firmly in the pot, and the leaves or cuttings planted just below the surface, and sometimes even laid upon it. Particular regard is necessary to this, because much of the after success depends upon the way in which this is done, for experience has clearly proved that subjects thus treated will root much sooner than those planted deeper: another advantage is, that they are not so liable to fog. They were then plunged in the tan or bed, and bell-glasses tightly placed over them, so that the full benefit of a close humid atmosphere may be imparted. Every third or fourth day they are slightly syringed: immediately the roots appear, they are potted in thumbs, one fourth leaf mould being added to the former compost, and again plunged as before: in about a fortnight they will be sufficiently advanced for removal to other glasses, when air is freely given, and are thus hardened off for the frames or the open ground. The cuttings are always taken from young wood, but care is necessary to ascertain that it is sufficiently ripe, otherwise loss is sure to follow. Leaves may be taken from wood somewhat older, but the eye must not be injured, and a portion of the rind, both above and below, attached to it: these form plants quite as fine as cuttings, and within nearly the same time. During the first and second stages of this operation the houses are entirely shaded from the sun, either by canvass or whitewashing the glass inside: it is of the first consequence to attend to this, because however necessary light may be as a stimulant, yet if allowed too much power, it will assuredly prove highly prejudicial. Cleanliness is also considered as necessary as light or heat: the bell-glasses are kept constantly clean, by being wiped out every two or three days. If the least impurity is allowed to generate, the plants soon become sickly. A pure atmosphere is quite as necessary for vegetable as animal life: both may exist, but neither can thrive without it. Herein consists the superiority of the French propagators, and the means

by which they are enabled to supply the world with roses and camellias at a rate so much cheaper than other countries. Some of the florists in Paris have a way of striking cuttings which I have not observed elsewhere; it is this,—Large upright pots, similar to those used for hyacinths, but about six or eight inches across, are half filled with compost, and the cuttings planted in them. They are then plunged in tan, nearly up to the brim, and a flat glass placed upon the top; by this means a more even heat is said to be imparted, and the rooting is performed in less time. (*Gard Chron.*, 1842, p. 238.)

ART. III. Domestic Notices.

Cattle Show and Fair of the New York State Agricultural Society.—The Executive Committee of this Society, at the last monthly meeting, voted to hold their next annual cattle show and fair at Albany, on the last week in September next. The list of premiums offered amounts to \$2000. It is expected that this fair will far exceed in number and quality of the stock, implements, &c., exhibited, as well as in the attendance of the public, any thing of the kind ever got up in this country. The facilities for travelling to and from Albany from all quarters, are such as will undoubtedly, with the attractions offered, induce a very general attendance from the neighboring states. The fair is to be held in the beautiful grounds adjoining the new Bull's Head tavern, Troy Road, on the northern boundary of the city, and such arrangements have already been made, as will assure all who intend to bring stock, either for competition for the prizes, or for sale, that they will be accommodated. The exhibition will commence on Tuesday, the 27th, and continue till Friday, the 30th, on which day there will be a sale of stock sent for that purpose.

Among the exhibition are horticultural productions, such as flowers, fruits, and vegetables. The committees for awarding premiums on such articles are as follows:—

On Flowers.—Alexander Walsh, Lansingburg; Rev. J. O. Choules, New York; Prof. J. W. Jackson, Schenectady; A. P. Hewitt, Troy; and T. Dunlap, New York.

On Fruit.—A. J. Downing, Newburg; James Powers, Catskill; J. J. Thomas, Macedon; R. S. Underhill, New York; Alden Spooner, Brooklyn.

On Vegetables.—T. Bridgman, New York; James Wilson, Albany; — Colman, New York; M. B. Batcham, Rochester; D. Belden, Troy.

Our readers will recognize among the committees several of our correspondents. We hope it will be in our power to be present at the fair, to enable us to give a report of the exhibition.—*Ed.*

New seedling Strawberry.—We have lately received some fruit of a seedling strawberry, from our friend Luther Tucker, Esq., of Albany, which were grown in the garden of Mr. J. Wilson, nursery-

man, of that city. Mr. Tucker gives the following account of this variety:—

“On visiting the garden of Mr. James Wilson, nurseryman, of this city, one day last week, he called my attention to a bed of strawberries, which were raised from the seed by Mr. Alexander Ross, of Hudson. On examination, I found they were not only larger, but *much more* productive than any other kind on his premises. On a single stem which he picked for me, there were twelve or fifteen berries, three of which were ripe, and measured three and a half, four, and four and a half inches. Of these three I have had a drawing made, and shall insert a cut of them in the August number of the *Cultivator*. Not being aware of their value, they were planted in a very poor soil, and no pains had been taken with them. Under such circumstances, I thought them the more worthy of notice, and on seeing Mr. Wilson to-day, I proposed to him to send you a specimen of the fruit. He said the finest bunches had been gathered, but that he would send me a small box, if I would take the trouble to forward it. Not having opened the box, I do not know how favorable a specimen he was able to get, but if any thing like the bunches he favored me with, I think you will be pleased to see them.—*Respectfully yours, Luther Tucker, Albany, June, 1842.*”

The specimens sent us were somewhat damaged, and we could not judge fully of their flavor, but the variety appears exceedingly productive, the berries of good size, slightly coxcomb-shaped, of a dark color and handsome appearance, but rather acid, and not very high flavored. Picked fresh from the vines, however, makes a material difference in the flavor of this fruit, and it would be unfair to judge of it from specimens picked two days, and much bruised from carriage. If a hardy vine, we should consider the variety well worthy of cultivation.—*Ed.*

Live Plants, Seeds, Bulbs, &c., from the Exploring Expedition.—The ship *Vincennes*, one of the vessels attached to the Exploring Expedition, lately arrived at New York. Messrs. Breckenridge and Pickering, the botanists who accompanied the Expedition, have also arrived, bringing with them live plants, seeds, &c., which have been sent on to Washington, and the plants deposited in our correspondent's, Mr. Douglas's, garden. We learn that there are over one hundred species of live ones, and a great variety of roots, bulbs, seeds, &c., from different parts of the world. It is also said that the total number collected by the Expedition amounts to over ten thousand specimens of different species, probably not including duplicates.—*Ed.*

Hovey's Seedling Strawberry.—Your strawberry offers to be a beautiful fruit, and very prolific: perhaps it is not so rich in flavor as some, yet it will be a leading article for the market. It appears to grow almost as fast as Jonah's gourd.—*Respectfully yours, R. Buist.*

[Mr. Buist did not receive his plants till last autumn, quite late, and of course his bed, this year, would not be even a fair specimen. Another season, he will be better able to judge; and we are very greatly mistaken if he does not find it *superior to any other variety cultivated in this country*; at least, such is the opinion of many good judges who have tried it.—*Ed.*]

Horticultural Exhibition in Hartford, Ct.—We are gratified to learn from the receipt of a paper sent us by our correspondent, Dr. E. W. Bull, that the amateur cultivators of that city have commenced a series of Shows of Flowers and Fruits, and it is hoped that this beginning will be a stimulus for every friend of the science to aid in forwarding an object capable of affording so much pleasure in a natural and useful way. The Show was held on Wednesday, June 22d, and was well attended. There was a good display of plants, roses, &c. The report of the exhibition we shall present with others at the close of the volume. The next show of carnations and other flowers will take place July 10. (*Hartford Courant.*)

ART. IV. *Pennsylvania Horticultural Society.*

The stated meeting of the Society was held at the saloon of the Museum, on Tuesday, April 19, and the following plants were exhibited.

By Peter Mackenzie, not in competition,—two fine specimens of that celebrated new plant, the *Rosa devoniensis*; *Azalea indica* álba, A. i. seedling, A. i. variegata, *Caméllia japonica* var. *myrtifolia*, *Ixora coccinea*, *Justicia calytricha*, *Plumbago rosea*, roses of varieties, Bengal—Carminé du Luxembourg, Fabvier, Louis Phillippe d'Angers, and Setula; Ile de Bourbon—*Agrippina* and *Hermosa*; Tea scented jaune; and *Noisette Lamarque*.

By Robert Buist, not in competition—*Amaryllis amabilis*, *Azalea indica* álba, A. i. lateritia, A. i. rubro pléna, *Cassia* sp. *Chorózenia varium*, *Cytisus ramósus*, *C. rhodáphne*, *Cineraria Hendersóni*, *C. insignis*, *C. Kingii*, *C. versicolor*, *Dodecátheon Meàdia*, *Epiphyllum Quill ardítia*, [?] *E'pæris grandiflora*, *Erica rubra calyx*, *Euphórbia Brydóni*, *E. spléndens*, *Gesnèria magnífica*, *Kennédya cordifolia*, *K. speciosa*, *Lechenaúltia formósa*, *Metrosidèros floribúnda*, *Pelargónia* var. *Blandina*, *Discount*, *lillicina*; *Pimelèa hypericifolia*, *Raphiólèpis indica*, and *Rose Ile de Bourbon Jaques*.

By William Chalmers, Jr. gardener to George Pepper, Esq.—*Azalea indica* álba, A. i. *Gillinghámi* A. i. *phœnicea*, A. i. *Smithii coccinea*, *Azalea sinénsis*, *Caméllia japonica* var. *fimbriata*, *C. j.* var. *myrtifolia*, *C. Sasánqua rosea*, *Epiphyllum Jenkinsóni*, *E. mayfly*, *Justicia calytricha*, *Pelargónium* var. *Dennis's Perfection*, *Rhododéndron hybridum*, *Sansevièra guineénsis*, and *Veltheimia viridifolia*.

By Robert Kilvington—new plant, *Tuckermánia californica*; *Agathæa cœlestis*, *Azalea indica* álba et *phœnicea*, *Aloe pentagóna*, *A. verrucósa*, *Cineraria eruénta*, *C. Kingii*, *C. lanata*, *Collinsia bicolor*, *Cereus flagellifórmis*, *Dianthi* seedlings, *Dracocéphalum canariéuse*, *Epiphyllum Ackermáni*, *Gardènia rádicans*, *Globulària* sp. *Heliotrópium intermèdium*, *Jasminum grandiflorum*, *J. revolútum*, *J. sambac*, *Moræa fimbriata*, *M. variegata*, *Nemóphila insignis*, *Verónica agrés-tis*, *Ornithógalum aúreum*, *Passiflora álata*, *Pittósporum undulátum*,

P. Tobira, *Pelargonia*, *Prímula aurículæ*, *Richárdia æthiópica*, *Ròsæ* of varieties, *Schizánthus pinnátus*, *Verbènæ*, etc.; also a bouquet of indigenous flowers.

By Alexander Parker—*Artrocárpus integrifólius*, *Aster argophylus*, *Azàlea índica álba*, *A. i. phæníceæ*, *A. i. purpúrea*, *Caméllia japónica* var. *alàta*, *C. Sasánqua ròsea*, *Cácti*, *Ceratònia síliqua*, *Cine-ràriæ*, *Colútea frutésceus*, *Coronilla gláuca*, *Crassùla*, *Diósma erici-fòlia*, *Heliotrópia*, *Jasminum revolútum*, *Laúrus glandulòsus*, *L. nóbilis*, *Mahérnia odoràta*, *Melaleucæ*, *Meliánthus màjor*, *Nandína doméstica*, *Pelargonía*, *Petuniæ*, *Pittósporum undulátum*, *Plectránthus fruticòsus*, *Rhododéndron máximum*, *Sparmánnia africàna*, *Verbènæ*, etc.

By Peter Raabe—*Prímula aurículæ*, and specimens of a seedling rose from the variety of King of Lombardy, a very free bloomer. By Ritchie & Dick—*Caméllia japónica*, and a cut specimen of a new hybrid rhododendron. By Miss Percival, a beautiful bouquet. By William Chalmers, Sen., gardener to Mrs. Stott—pansies, and a large tasteful bouquet.

Vegetables: By James McKee, gardener to C. Chauncey, Esq.—sea kale, cauliflowers, potatoes, lettuce, asparagus, radishes and rhubarb. By Jacob Engleman—edible rhubarb, yellow butter-head lettuce, early scarlet and turnip radishes, salsify, borecole, spinach and parsley. By William Chalmers, Sen.—cucumbers, asparagus, potatoes, spinach, borecole, lettuce, radishes, rhubarb, and parsley. By Thomas Mullin, gardener to Miss Gratz—cauliflowers, sea kale, and cucumbers.

Fruits: By Thomas C. Percival, Esq.—dishes of shaddocks, limes, grape fruit, and Forbidden fruit from St. Croix.

May 17.—The stated meeting of the Society was held at the new Hall this evening—the President in the chair.

The display of objects on this occasion was highly attractive; several fine collections of plants were presented, consisting principally of pelargoniums, roses, and a number of other select plants. Of vegetables, there were specimens of the finest; particularly the edible rhubarb, of which some bunches exceeded five feet in length; the varieties were the Victoria, Mammoth, Washington, Goliath, and Giant. The cauliflowers and potatoes were remarkably fine, and the peas grown in the open ground in Pennsylvania, commanded special attention. The following were the awards of premiums:—

For the best and next best geraniums, to Wm. Sinton, gardener to Gen. Patterson. For the best and next best ever blooming rose, to John Sherwood. For the best and next best single tulips, to Robert Kirkwood. For the most interesting collection of plants in pots, to Wm. Chalmers, Sen., gardener to Mrs. Stott. For the next most interesting collection of plants in pots, to Wm. Chalmers, Jr., gardener to George Pepper, Esq. For the best display of indigenous plants, to Archibald Henderson, gardener to Wharton Chancellor, Esq. For the best bouquet, to Wm. Chalmers, Sen. For the next best bouquet, to Robert Kilvington.

For the best asparagus and forced potatoes, to George Robinson, gardener to Horace Binney, Esq. For the best blanched rhubarb, to Jacob Engleman. (*Society's Report.*)

ART. V. *Massachusetts Horticultural Society.*

Saturday, June 4th, 1842.—An adjourned meeting of the Society was held to-day—the President in the chair.

Walter Baker, of Dorchester, was admitted a subscription member. Meeting dissolved.

Exhibited.—Flowers: From the President of the Society, cut flowers of pæonies and other plants, and a number of superb geraniums, among which were Florence, Gaines's King, Garth's Perfection, Coronation, Erectum, Matilda, Sylph, Alicia, decorum, &c. From J. A. Kenrick, cut flowers of ten varieties of azaleas, very fine and well grown; early white Italian honeysuckle, scarlet hawthorn, Scotch laburnum, *Wistaria Consequana*, Caucasian honeysuckle, *Aristolochia Siph*, and the following pæonies:—*P. Moultan papaveracea*, and *P. M. Banksia*; also, *P. tenuifolia*, rosea, albicans plèno, and albiflora erubescens. From W. E. Carter, of the Botanic Garden, perennial poppy, pæonies of sorts, *Magnolia auriculata*, *Lupinus polyphyllus*, geraniums, and bouquets. *Trifolium incarnatum* from Capt. Lovett. From J. F. Trull, *Magnolia tripétala*. From Dr. J. C. Howard, pæonies and bouquets. Bouquets were also exhibited by S. Walker, W. Kenrick, J. Hovey, and J. L. L. F. Warren. Native plants from B. E. Cotting.

Fruits:—From Dr. J. C. Howard, fine specimens of black Hamburg, Miller's Burgundy, and white Chasselas grapes. Vegetables: From J. L. L. F. Warren, cucumbers.

June 11. Exhibited.—Flowers: From the President of the Society, a fine collection of cut flowers of geraniums of the following sorts:—Alicia, Florence, Bridegroom, Clarissa, decorum, erectum, Fireball, Matilda, Victory, Sylph, Siddonia, Conservative, Gaines's King; also, yellow Harrison rose, pæonies, and other flowers. From W. Meller, the following geraniums in pots, for premium:—Climax, Lowndes's Perfection, Prima Donna, Beauty of Ware, Alexandrina, Lady Mary, Alicia, Alarme, Vivid, Sylph, Conservative, *Diadematium tricolor*. From W. E. Carter, double red hawthorn, white fraxinella, pæonies, Scotch and Ayrshire roses, and fine specimens of *Philadelphus pubescens* and grandiflorus; also bouquets. From Capt. Lee, Ayrshire and Boursault roses, *Mimulus cardinalis*, &c.

From Hovey & Co., Amadis or crimson Boursault, common Boursault, yellow Noisette, white tea, and other roses, and a large plant of the *Epiphyllum Ackermannii* in fine bloom. From W. Kenrick, purple beech, laburnum, bouquets, &c. From W. Wales, a seedling geranium. From A. Bowditch, Harrison rose, geraniums and other flowers, and bouquets. From S. Walker, bouquets. From J. A. Kenrick, Harrison and Irene yellow roses, several varieties of azaleas, fine kinds of honeysuckles, fine kinds of pæonies, white fringe tree, flesh-colored horse-chestnut, Austrian red and yellow rose, *Hemerocallis flava*, Scotch laburnum, *Wistaria Consequana*, new scarlet hawthorn, &c. From J. L. L. F. Warren, cut flowers of pelargonium var. Dennis's Perfection, Joan of Arc, Tam O'Shanter, Alexandrina, Capt. Cook, Sir John Broughton, Climax, Garth's Perfection, Prima Donna, Jewess, purple Perfection, &c. From Messrs. Winship, purple beech, red valerian, weeping ash, fringe tree, *Lonicera caucasicum*, &c.

Fruits:—From Capt. George Lee, beautiful peaches, well colored, and of fine flavor, from a tree grown in a pot and forced in the green-house. From Dr. J. C. Howard, black Hamburg, Miller's Burgundy, and Chasselas grapes. From J. L. L. F. Warren, early Virginia Strawberries.

June 18. Exhibited.—Flowers: From the President of the Society, *Pæonia albiflora Pótsii* and *Whitlèji*, dwarf rocket larkspur, *Ænothèra Frasèri*, *Calceolaria Royal Standard*, large and fine; *Spiræa japonica*, beautiful; *Lupinus polyphyllus*, *Maurándya semper-virens*, *Hemerocállis Grahámi*, *Hesperis matronális fl. pl. álba* fine, *Passiflora bractæata*, *Azælea phœnicea álba*, roses, and twenty varieties of geraniums. From F. Putnam, Salem, *Epiphyllum Ackermánnii* and *speciosus*, and *Cereus Jenkinsónni* and *speciosissimus*; *Pæonia albiflora, Pótsii, Reèvesii* and *Whitlèji*; *Alstrœmèria psittacina*, and *Flos Martini*; *Euphórbia splendens*, and the following roses:—crimson Perpetual, George IV., white Moss, *Harrisóni*, *Smithii*, yellow Tea, &c.

From Hovey & Co., *Pæonia albiflora Whitlèji*, and *Pótsii*; *Crimson Boursault*, George IV., and *Ne Plus Ultra* roses and pansies; also a fine plant of *Epiphyllum Ackermánnii*. From W. Kenrick, *Pæonia Moútan papaveræa*, and *P. albiflora Whitlèji*; *Hemerocállis flava*, *Fris sibèrica* and *pállida*, *Guelder rose spiræa* and *S. ulmària*, *Philadélfus grandiflorus*, scarlet trumpet (monthly,) yellow trumpet (monthly,) orange colored, variegated and *Douglas's Canadian honeysuckles*; purple beech, *laburnum*, roses, &c. From Messrs. Winship, *Dictámmus álbus*, *Campánula persicifolia plèno*, *Orobus niger*, *Spiræa stipulæa*, *Phlóx Listoniána Philadélfus pubescens*, *Deutzia scabra*, a fine shrub, *Chionánthus virgínica*, and *pæonies* and bouquets.

From John A. Kenrick, a superb specimen of *Magnòlia macrophylla*, being one of eleven flowers on a small tree; also, *M. tripétala*, twelve varieties of roses, including white and red moss, and the *Harrison* and *Irene* yellow; *Pæonia albiflora frágans*, *Whitlèji*, and *Reèvesii*; *Kálmia latifolia*, six kinds of honeysuckles, azaleas in variety, &c. From A. H. Hovey, *Amaryllis formosissima*. From W. Meller, fourteen seedling geraniums, some of them equal to any of the newest English seedlings, *Cereus speciosissimus*, pansies, and bouquets. From F. W. Macondry, roses of several kinds. From J. F. Trull, *Chionánthus virgínica*, *Liriodéndron Tulipifera*, and bouquets.

From W. E. Carter, *Pæonia albiflora Whitlèji*, *Pótsii*, *Reèvesii*, and *Húmei*, *Magnòlia gláuca* and *tripétala*, irises, bouquets, &c. From J. F. Allen, *Pæonia albiflora Whitlèji*. From S. R. Johnson, rose *Lamarque* of fine size, and several other varieties of tender roses. From A. Bowditch, cut flowers of *Epiphyllum Ackermánnii* and *Cereus speciosissimus*; also roses, pinks, bouquets, &c. From Dr. J. C. Howard, specimens of the *Høya carnòsa*, monkshood, and *Pæonia officinális albicans*. From T. Needham, gardener to Horace Gray, Esq., a plant of *Leschenaúltia formòsa*. Bouquets from J. Hovey, Misses Sumner, Capt. Lee, J. L. L. F. Warren, S. Walker, and others.

Fruits:—From Dr. J. C. Howard, fine specimens of black Hamburg, Miller Burgundy, and white Chasselas grapes. From J. F.

Allen, black Hamburg, and a black variety of grape from St. Michael; also figs of excellent quality, and beautiful specimens of Royal George clingstone peaches. From J. F. Trull, Dorchester, early Virginia strawberries. From F. Putnam, early Virginia strawberries.

From the President of the Society, Methven Castle and early Virginia strawberries. From Dr. John Barstow, Bangor, handsome specimens of peaches, supposed to be the yellow rareripe and early Royal George.

Vegetables:—From Dr. J. C. Howard, excellent early dwarf peas. From A. Bowditch, fine early peas. From F. Dana, Roxbury, rhubarb. From T. Needham, gardener to H. Gray, Esq., fine specimens of Weedon and Tester's superb cucumbers. From J. L. L. F. Warren, long green prickly cucumbers, of good appearance.

June 25.—The show to-day was one of the best of the season. The display of roses and pæonies was remarkably fine, and embraced some superb specimens of the former flower. Now that cultivators have overcome the ravages of the rose slug, they appear to have increased their collections of this favorite flower. The new kinds of roses are great additions to the family, and as they will speedily be introduced, we hope to see them in collections of all amateurs. The premiums offered by the Society are liberal, and are intended to induce cultivators to renewed exertions to add the newer and better kinds to their gardens. The regulations of the Society for the exhibition of the flowers were not complied with this year, but another season they will be strictly adhered to, and it will be for the interest of those who wish to exhibit for premiums, to see that their collection contains at least fifty good kinds.

The awards of the Committee, for Pæonies and Roses, were as follows:—

For the best display of Pæonies, the premium was awarded to W. E. Carter.

For the second best display, the premium was awarded to Messrs. Winship.

Messrs. J. Breck and S. R. Johnson, judges.

HARDY ROSES.

For the best display of Roses, the premium was awarded to S. R. Johnson.

For the second best display, the premium was awarded to J. A. Kenrick.

For the third best display, the premium was awarded to A. Bowditch.

BENGAL, TEA, AND NOISETTE ROSES.

For the best display, the premium was awarded to S. R. Johnson.

For the second best display, the premium was awarded to A. Bowditch.

Messrs. J. Breck and W. E. Carter, judges.

Exhibited.—Flowers: From the President of the Society, fifty varieties of beautiful roses, (not for premium,) among which the following were conspicuous:—*Moss*: Luxemburg, white, blush, and common:

Perpetual: Marie Denise, Mad. Laffay, Princess Helene, Billard, Mad. Februrier, and Antinous; also, painted damask, Adelmone, George IV., King William, La Tendresse, Jongleur, Brennus (a fine one,) Ponceau Capiaumont, Wellington, Hebe's Lip, La Dominante, Belle Marie, Velouis Episcopal, Miralba, Duke of Devonshire, Ball of Snow, Gen. Lamarque, Horace, Magna Plena, &c.; fine specimens of *Cypripedium spectabile*, *Spiræa japonica*, and *Pæonia albiflora Humei*, *Pótszi*, *Reèvesii*, and *Whitlèji*. From W. Meller, eleven seedling geraniums, pansies and pinks, and large and small bouquets.

From W. Kenrick, *Pæonia albiflora Whitlèji*, *Humei*, and fragrans; moss roses and other sorts, *Hemerocallis flava*, irises, orange colored, oak leaved, yellow monthly, Canadian and Douglas's honeysuckles; *Clématis alpina*, purple beech, Siberian spiræa, Chinese larkspurs, &c. From Messrs. Winship, by E. A. Story, a large and fine bouquet, principally composed of pæonies, but very showy from its great size. From J. A. Kenrick, upwards of sixty varieties of roses, embracing many fine kinds, azaleas, *Kálmia latifolia*, *Rhododéndron máximum* and other flowers, and the following pæonies:—*P. albiflora Humei*, fragrans, *Reèvesii*, and *Whitlèji*.

From S. R. Johnson, a great variety of hardy roses; also superb specimens of Bengal and Noisette roses, among which were Noisette, Lamarque, and Jaune Desprez: Mr. Johnson is very successful in the cultivation of the tender kinds of roses; the plants are grown in the open ground, and protected in winter by a frame. From W. E. Carter, *Pæonia albiflora fragrans*, *Whitlèji* and *Humei*, *Philadelphus pubescens*, roses, geraniums, &c.; also fine specimens of red Valerian, *Cenothèra Frasèri*, *Phlòx suavèolens*, *Lonicera pubescens*, &c. From H. Malon, Somerville roses. From F. W. Macondry, roses. From Cheever Newhall, sixty varieties of fine roses.

From A. Bowditch, hardy roses, including a number of fine kinds; also tender roses, including yellow Tea, Undulata, Lamarque, &c., together with bouquets, &c. From J. L. L. F. Warren, a variety of cut flowers, among which were Virgin Queen, Duchess of Richmond, and Mrs. Broadwood dahlias; also foxgloves, phloxes, sweet-williams, roses, verbenas, &c., and the following geraniums:—Smith's Perfection, Prima Donna, Alicia, Alexandrina, Dennis's Perfection, *Speculum mundi*, *Diadematum*, Sir John Broughton, Countess of Plymouth, and two seedlings. From S. Walker, pinks and bouquets. From J. Hovey, bouquets and roses. From Misses Sumner, bouquets.

Fruits:—From the President of the Society, fine early Virginia strawberries. From O. Johnson, fine early Virginia strawberries. From Hovey & Co., very fair specimens of Hovey's seedling strawberries. From E. Vose, fine specimens of Methven scarlet strawberries. From F. R. Bigelow, fine Methven scarlet strawberries. From J. L. L. F. Warren, Methven scarlet seedling strawberries, and handsome specimens of Early Royal George peaches. From Dr. J. C. Howard, beautiful black Hamburg, Miller's Burgundy, and Chasselas grapes. From J. F. Allen, Royal George clingstone, and Admirable peaches, the former very rich and well colored specimens; also Montmorency cherries.

Vegetables:—From Dr. J. C. Howard, Early Dwarf peas, well

filled; also handsome ears of Imperial cabbage, and Royal Cape lettuce. From A. Bowditch, fine Cedo Nulli peas and rhubarb. From J. L. L. F. Warren, Early Hill peas.

ART. VI. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>	From ¢	To cts.		From \$	To cts.
Potatoes:			<i>Squashes and Pumpkins.</i>		
Chenangoes, { per barrel, . . .	2 00	2 25	Squashes:		
{ per bushel, . . .	75	1 00	Canada Crookneck, per lb.	5	6
Eastports, { per barrel, . . .	—	—	West Indies, per pound, . .	3	—
{ per bushel, . . .	75	1 00	Bush summer, each,	4	6
Common, { per barrel, . . .	1 50	—			
{ per bushel, . . .	62	75	<i>Fruits.</i>		
New, per bushel:			Apples, dessert:		
Early Hill,	1 50	2 00	Russets, per barrel,	4 00	—
Chenangoes,	2 00	—	Common, new, per bushel, . .	1 25	1 50
Sweet potatoes, per bushel, . .	1 50	—	Dried apples, per pound, . .	4	5
Turnips, per bushel:			Strawberries, per box:		
New, per bunch,	5	6	Wood,	17	20
Onions:			Early Virginia,	20	25
Red, per bunch,	5	6	Keen's Seedling,	25	37½
New white, per bunch,	4	6	Methven Scarlet,	25	51
Beets, new, per bunch,	5	6	Peaches, per dozen,	3 00	1 00
Carrots, new, per bunch,	5	6	Cherries, per quart:		
Parsnips, per bushel,	75	1 00	Downer,	17	—
Radishes, per bunch,	2	3	Common,	8	10
Shallots, per pound,	20	—	Black Tartarian,	12½	—
Garlic, per pound,	12½	—	Gooseberries, (green) per qt.		
Horseradish, per pound	—	—	Large,	10	12½
<i>Cabbages, Salads, &c.</i>			Small,	8	10
Cabbages, each:			Blueberries, per quart,	12½	—
Early York	6	8	Currants, per quart:		
Early Dutch,	6	8	Red,	6	—
Cauliflowers, new, each,	12½	3	White,	6	8
Lettuce, per head,	2	3	Grapes per pound, (forced:)		
Spinach, per peck,	12½	3	Black Hamburg,	1 00	—
Rhubarb, per pound,	2	3	White Sweetwater,	75	—
Peas, per bushel:			Nectarines, per dozen,	3 00	4 00
Common early,	50	—	Cranberries, per bushel,	3 00	4 00
Marrowfat,	50	62½	Pine-apples, each,	12½	25
Beans, string, per peck,	50	—	Water-melons, each,	25	37½
Cucumbers, (pickled) pr gal.	25	—	Lemons, per dozen,	12½	17
Peppers, (picked,) per gallon	37½	—	Oranges, per doz:		
<i>Pot and Sweet Herbs.</i>			Havana,	37½	50
Parsley, per half peck,	25	—	Sicily,	20	25
Sage, per pound,	17	20	Shaddocks, each,	12½	—
Marjorum, per bunch,	6	12½	Walnuts, per bushel,	1 25	1 50
Savory, per bunch,	6	12½	Chestnuts, per bushel,	2 00	—
Spearmint, green, per bunch,	3	6	Butternuts, per bushel,	1 00	—
			Almonds, per pound,	14	15
			Cocoa nuts,	3	4

REMARKS.—A continuation of rather cool weather has put back vegetation considerably; the frosts of the early part of the month were so severe that potatoes were cut down in many localities, and the growth retarded a week or two. All kinds of vines, particularly melons and cucumbers, have suffered severely, and it is doubtful, from present appearances, whether the crop of either of them will be very plentiful this season, in this vicinity. For the last week or two, there have been several fine warm days, accompanied with showers, and corn has taken a sudden start; but at the best, the season, though promising early in May, is full as late as the average.

Vegetables.—Potatoes have taken a sudden rise; the whole stock on hand is now about exhausted, and for some time the supply from the east has been so scanty that prices have ranged very high: new ones have just come in, but they are yet small, and prices high, and, in consequence, old ones are in good request: Chenangoes are worth fully our quotations, and few in market; the largest quantity on hand is long reds: sweet potatoes are yet to be had, of fair quality. Old turnips are all gone, but the supply of bunched new is abundant and good. Onions of the old stock are nearly gone: new white are plentiful and of fair size. Old beets and carrots are gone, and in their place is a good stock of new in bunches. Radishes abundant. Horse-radish is about done for the season. New cabbages have made their appearance this week, but the supply is yet limited. New cauliflowers have come to hand of fair size and quality. Lettuce abundant and good. Rhubarb is yet brought in, but as new apples come in, and the supply of gooseberries is abundant, there is less demand. Peas were never more plentiful; those of the best quality, and well filled, may be had at our quotations. String beans have just come to hand; the coldness of the season has somewhat injured and retarded the crop. Bush squashes came to hand this week, of fair size: a very few crooknecks remain on hand, as also some West Indias.

Fruit.—Our quotations for the old stock of apples are about done: a very few russets only may be found, and those of inferior quality: new apples of ordinary quality have been received from the south. Strawberries are exceedingly abundant and good, and there has been a good supply of all sorts. Cherries are plentiful, but not so fair as in some seasons; the rains damaged many of the earliest ones. Peaches and nectarines are supplied at our quotations. Green gooseberries abundant. Currants have begun to come in, but they are not yet quite ripe. Blueberries have made their appearance. The supply of forced grapes is limited, but they are well grown, particularly the black Hamburgs. Pine-apples are very abundant: several cargoes have arrived since our last. Cranberries are nearly gone; what remain command good prices. Cucumbers are scarce for the season; the supply is now principally from New York, and it will be some time before they will be brought in from the vicinity in any quantity. Some water-melons have arrived, and being of good quality, were taken readily. Oranges of good quality, and in good order, command advanced rates, and are in request. The season promises well for a good supply of late fruits.—*M. T., Boston, June 28, 1842.*

HORTICULTURAL MEMORANDA

FOR JULY.

FRUIT DEPARTMENT.

Grape vines in the grapery will now have set their fruit, which will be swelling off finely. Thinning the berries should now be commenced and continued until the whole of the clusters are finished; the large bunches should also be shouldered. Give abundance of moisture, and keep the border well watered if dry weather sets in. Attend to airing; give a little in the morning, and larger quantities in the middle of the day. Attend to the pruning of the vines; keep all superfluous shoots cut out.

Strawberry beds will need hoeing and weeding, and preparations should be made to set out new ones in August.

Fruit trees should be gone over now, and summer pruned, that is, to cut away all superfluous shoots now, rather than let them remain till the autumn, leaving only such as will be wanted to form a good head to the trees. Budding plum and cherry trees may be commenced the latter part of the month.

FLOWER DEPARTMENT.

Geraniums should now be attended to: cut down the old plants, and put in the cuttings to make new ones: after the plants are pruned, place them in a shady situation till they begin to break, when they should be removed to a sunny place.

Roses may be increased; the tender kinds by cuttings, layers, and by budding, and the hardy kinds by layers and by budding.

Chrysanthemums will need heading down soon; keep the plants well watered.

Ericas should receive due attention: such as need it should be re-potted before they are removed from the house.

Sparaxises, Ixias, Oxalises, and similar bulbs, should now be taken out of the pots, and laid away in bags in a dry room.

Tree pæonies may be grafted this month.

Pinks and Carnations should be layered this month.

Dahlias must be attended to: stake the plants, if not already done, and prune off all the superfluous branches.

Camellias must be duly syringed, and the larger plants kept properly watered at the root. Cuttings may now be put in.

Azaleas will now be growing, and will need liberal supplies of water.

Cactuses will now be growing; keep them duly watered.

Oxalis Bowiei may be potted the latter part of the month for blooming in August.

Green-house plants may be propagated at this season; a frame or shady border will answer the purpose, placing the cuttings in pots, and plunging them in the ground.

Perennial flower seeds, sown last month, will by this time have produced plants, which should be transplanted into the border, where they are to stand.

THE MAGAZINE
OF
HORTICULTURE.

AUGUST, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *Pomological Notices; or Notices respecting new and superior varieties of Fruits, worthy of general cultivation. Notice of forty-four varieties of Cherries, fruited at the Pomological Garden, Salem, Mass., in the season of 1842.* By R. MANNING, Esq.

IT is with extreme gratification that we are enabled to lay before our pomological friends the following valuable paper, describing forty-four varieties of cherries, the qualities of which have been proved by Mr. Manning, in his Pomological Garden at Salem, during the present season. Those who have read Mr. Manning's communications in our previous volumes, on pears and other fruits, will at once appreciate the importance which attaches to his descriptions of fruits. No cultivator in this country, and we might say no individual in any country, has ever fruited and proved the same number of varieties of the cherry which are here described. The catalogues of some of our nurserymen, it is true, contain from fifty to one hundred names of varieties, but such confusion exists in regard to them, that probably not one third of them are really distinct; but if distinct, where can a comparative view of their qualities be found, that an individual wishing to make a choice selection, may do so without the fear of disappointment? No where but in the *Catalogue* of the London Horticultural Society; and even that is imperfect compared with Mr. Manning's list; for he has described nearly twenty new kinds of recent origin, most of them American seedlings, and particularly adapted to our climate, which are not found in that *Catalogue*.

The cherry, though a small fruit, is not less varied in the qualities of the several sorts than the apple or pear; size,

color, flavor, period of ripening, firmness of flesh, and many other qualities, such as keeping well on the tree, liability to be damaged by heavy rains, as well as the beauty and vigor of the tree, hardiness, &c., are all to be taken into consideration when estimating the quality of a fruit. Mr. Manning has had the opportunity of comparing the merits of each, and his descriptions are made up after a deliberate and careful examination.

Among the varieties it will be seen that Mr. Manning has produced five or six seedlings, some of which are valuable additions to this fruit; three other sorts are quite new, except in the vicinity of Salem, where they originated.

In conclusion, we may here recommend to amateur cultivators the propriety of attempting the growth of seedling cherries, with a view to the production of improved kinds. The success which attended the late Mr. Knight's experiments is well known; some of his seedlings are the finest in cultivation, and we doubt not that, under the hands of skilful cultivators, many new and superior varieties to any we now possess, may be raised.—*Ed.*

1. *Manning's Early Black Heart*.—Of the same size, form, and color, as the Old Black Heart from which it originated; it ripens ten days earlier; very juicy and fine; the tree is more spreading than its parent. Ripe June 23d.

2. *Bowyer's Early Heart*.—Medium size, pale red, mottled with yellow; obtusely heart shaped; flesh tender, juicy, and very fine. Ripe June 25th.

3. *Early Red and Yellow*.—Medium size, obtuse heart-shaped; light red on a yellow ground; sweet, juicy, and good; raised by myself from a stone of the White Bigarreau. Ripe June 27th.

4. *Royal Duke*.—Very much like the May Duke, but a longer stem. Ripe June 28th.

5. *Jeffry's Duke*.—Very much like the May Duke. Ripe June 28th.

6. *Madison Bigarreau*.—Heart shaped, long stem, red and yellow skin; very fine; raised by myself from a stone of the White Bigarreau, a great bearer. Ripe June 29th.

7. *Holman's Duke*.—Very much like the May Duke. Ripe June 30th.

8. *Early Richmond*.—An early and abundant bearer; fruit small; light red skin; very sprightly. Ripe June 30th.

9. *May Duke*.—An old and well known variety. Ripe June 31st.

10. *Belle de Choisy*.—Medium size, round shaped, red, mixed with yellow; flesh tender, juicy, and sweet. Ripe June 31st.

11. *Davenport's*.—Resembles the Black Heart, but is a few days earlier; the leaves of a lighter green. Ripe June 31st.

12. *Knight's Early Black*.—Obtuse heart shaped; size large; skin nearly black; flesh very fine. Ripe June 31st.

13. *Mottled Bigarreau*.—Large size, heart shaped, nearly round; skin yellow, beautifully mottled with red; very juicy, sweet, and excellent. Raised by myself from the stone of the White Bigarreau. Ripe July 1st.

14. *Turkey Bigarreau*.—Resembles the White Bigarreau; but the flesh is not so firm, and is more juicy and sweet. Ripe July 2d.

15. *Ox Heart*.—Large size, very long heart shaped; skin dark red, with black blotches; the flesh and juice of a dark red. Ripe July 2d.

16. *Black Heart*.—Well known. Ripe July 2d.

17. *Arden's White Heart*.—Medium size, heart shaped, skin white, with bright red cheek; an abundant bearer. Ripe July 3d.

18. *Black Tartarian*.—Well known as the largest and best of the black cherries. Ripe July 2d.

19. *American Heart*.—Resembles Arden's White Heart, if it be not the very same. Ripe July 3d.

20. *White Tartarian*.—Size small, obtuse heart shaped; skin of a cream color, with somewhat of a transparent appearance; flesh very sweet and fine. Ripe July 3d.

21. *Common White Bigarreau*.—The size is large, obtuse heart shaped; skin white, with a beautiful bright red cheek; flesh very firm and breaking, from which circumstance it is not so liable to be destroyed by the birds, which renders it valuable for market fruit. It is one of our most admired cherries. Ripe July 4th.

22. *Large Heart Shaped Bigarreau*.—Of large size, shape long and pointed like the Elton; skin a cream color, with bright red cheek; flesh tender, juicy and fine. Ripe July 4th.

23. *Elton*.—Of large size, long heart shaped; skin a light yellow, with bright red, next the sun; flesh very rich and sweet. Ripe July 5th.

24. *Florence*.—Of large size, heart shaped; skin of an amber yellow, with bright red cheek; flesh very juicy and sweet; an excellent cherry. Ripe July 5th.

25. *Honey or Sparhawk's*.—Medium size, form round; skin when fully ripe of a bright red; flesh very sweet and good; bears abundantly. Ripe July 6th.

26. *Black Eagle*.—The size is large, obtuse heart shaped; skin nearly black; flesh very juicy and rich. This is one of the finest of cherries. Ripe July 8th.

27. *Waterloo*.—Of large size, round or obtusely heart shaped; skin black; flesh firm and excellent. Ripe July 8th.

28. *Napoleon Bigarreau*.—The size is large, its shape is long, but not pointed; the skin a pale yellow, for the most part mottled with bright red; flesh very firm and good. I think this fruit has been overrated. Ripe July 10th.

29. *Downer's Late*.—The size is large, shape nearly round; skin red and white; flesh firm and good; very productive, and profitable for the market. Ripe July 12th.

30. *Downton*.—The size is large, form obtuse, heart shaped; skin yellow, mottled with pale red; flesh is yellow, tender, and high flavored. Ripe July 10th.

31. *Gridley*.—Of medium size, form nearly round; skin black; flesh firm, juicy and excellent. It is an abundant bearer. Ripe July 12th.

32. *Manning's Late Black*.—Of large size, nearly round; skin, when perfectly ripe, nearly black; flesh firm and good. Raised by myself from a stone of the Black Heart. Ripe July 10th.

33. *Late Duke*.—Of the same size, form and color as the May Duke, but ripens later. Ripe July 10th.

34. *Large Black Bigarreau*.—Of medium size; skin black; flesh remarkably firm; resembles the Elk-horn Cherry described by Mr. Prince. Ripe July 10th.

35. *Wilkinson*.—In size, form and color it resembles the Black Heart, but is a more sprightly fruit, and ripens much later: said to be a native fruit from Rhode Island. Ripe July 15th.

36. *Hyde's Red Heart*.—This fruit was taken by the birds before it came to maturity. The tree is extraordinary for its vigorous growth, and from its appearance will bear well.

37. *Sweet Montmorency*.—Medium size, form round; skin light red, with a few yellow spots; flesh tender, juicy and

sweet. It was raised from a stone in the garden of J. F. Allen, Esq., Chestnut street, Salem. In its external appearance it resembles the short stem Montmorency. Ripe July 25th.

38. *Roberts's Red Heart*.—Large size, obtuse heart shaped; skin a bright red; an excellent cherry, which originated in the garden of David Roberts, Esq., Winter street, Salem. Ripe July 25th.

39. *Richardson's Late Black*.—The size is rather small, form round; skin black; flesh very juicy and good. It originated in the garden of Dr. William P. Richardson, Essex street, Salem. It is a very productive variety, ripening late in July.

40. *Long Stem Montmorency*.—Of medium size, the form is round, rather flat at the stem; skin of a bright red. Its taste is pleasant, though a little acid. Ripe late in July.

41. *Belle Magnifique*.—The fruit is large, form round; skin of a light red, with patches of a darker red. It appears to be a good bearer, although rather acid; it is considered a valuable fruit, ripening late in July.

42. *White Mazzard*.—This fruit is of medium size, heart shaped; the skin is cream color, with a bright red cheek. Although this cherry is not of the finest flavor, yet its being a very abundant bearer, and ripening late, renders it valuable for the market. Raised by myself from seed. It has sometimes hung on the tree till the 10th of August.

43. *Du Nord*.—This is a medium sized, acid cherry; the skin dark red, when ripe nearly black. It appears to be a good cherry for kitchen use, but not equal to the following.

44. *Plumstone Morello*.—This is one of the largest cherries; obtuse heart shaped. When ripe it is a very dark red, approaching to black; it is too acid for a table fruit, but excellent for kitchen use, remaining on the tree perfectly fair till August.

The ripening of some of these cherries was probably retarded, by the necessity of enclosing them in wrappers of muslin to protect them from the birds. Several of the specimen trees I imported from Europe; so far as I have had an opportunity to judge, the names are all correct. But some of them, in size, color, and the period of maturity, certainly approach very near together.

R. MANNING.

Pomological Garden, Salem, July, 1842.

ART. II. *Some Account of a new variety of the Malus microcárpa; translated from the Bulletin of the Societie d'Horticulture d'Rouen, for 1841. By the EDITOR.*

[THE Massachusetts Horticultural Society have lately received from the Horticultural Society of Rouen, through their President, M. Tougard, who has been elected an honorary member of the Massachusetts Horticultural Society, several pamphlets, containing the doings of the Rouen Horticultural Society, from its organization up to the year 1842, a period of seven years. These pamphlets, or bulletins as they are called, contain a report of the principal meetings of the Society for each year, an account of the annual "Exposition Publique," or annual exhibition, and also papers and communications read before the Society from time to time, by various individuals, members of the Society. Among these papers we have found some which are interesting to cultivators, and we shall embrace the opportunity to lay some of them before our readers. We have now translated the following account of a new and highly ornamental variety of the Crab apple, well worthy of introduction into our gardens.—*Ed.*]

You will recollect, perhaps, gentlemen, the infinitely small red apples which I have several times exhibited before you: these were the fruits of the *Malus microcárpa*, the diameter of which was only five to seven millimetres,* and the size only that of small peas or gooseberries.

But, notwithstanding its small size, this apple contains in its five cartilagenous cells the kernels which are perfect, and agree, in all their proportions, with this family of fruit.

The 20th of March, 1830, I sowed several of these seeds or kernels; but I succeeded in raising only four vigorous trees, two of which have not yet flowered (1841,) the other two have flowered and fruited, one in 1839 for the first time, and the other in 1840; both have presented the same character in the flowers and fruit; but as that which flowered and fruited in

* A metre is about thirty-nine and a half inches; a centimetre, a hundredth part of a metre; and a millimetre, a thousandth part of a metre.—*Ed.*

1839 is the most vigorous, the most beautiful, and the most fruitful, I shall speak of it more particularly.

This tree has preserved, in its buds, leaves, and stems, the general aspect of its parent; but it is far more vigorous, of a more beautiful carriage (*port*;) the branches are more ramifying and stronger, and have a vertical or oblique direction, very ascending.

The tree has attained a total height of five metres, seventy centimetres, [about seventeen feet.]

The flowers, which open at the same time of those of the *Malus baccata* and *M. prunifolia*, are numerous, large, of a pure white, and very odoriferous.

The fruit is so abundant that, notwithstanding hundreds fell off by the wind, previous to the commencement of September, the tree was then covered; and besides the intense frost and the effects of the snow and the sun, they were yet very sound, and of a beautiful red color. The fruit is generally round, though some are a little oval; others are flattish, and a few are of a conical shape. Their diameter the largest way is from twenty-five to thirty millimetres. The peduncle is slender, filiform, ordinarily rose or red, and united in a deep cavity; its length ranging from four to six centimetres. The eye is small, and generally slightly sunk; the sepals soon decay. The skin is yellow, laved with clear red, and very smooth; the flesh is yellow, firm, and the juice acid. The kernels or seeds are of a clear brown, and part of them always abortive.

This tree is much superior to the *Malus hybrida*, called also the Siberian apple, for its more elegant carriage, its figure, its more abundant foliage, the number, the fulness, and the odor of the flowers, the abundance of its fruit, their color a deeper red, more brilliant, and, above all, the advantage which it possesses of remaining attached to the trees, for a long time after the fall of the leaves, producing an effect in winter very remarkable. Those which grew in 1839 remained hanging to the tree until the end of February, and at this time there are some, notwithstanding their decomposition by the intensity of the frost, the snow and the sun, which are still firmly attached to the branches.

NOTE.—In July, 1841, a considerable quantity of the fruit of 1840 was then attached to the branches, dried up, and contrasting singularly with the new fruit, which had already attained half its size.

ART. III. *Some Remarks on the cultivation of the Strawberry, with reference to the diœcious character of the large varieties.* By J. C. G.

[THE following interesting communication we have received from an amateur cultivator of fruits. Being desirous of ascertaining the correctness, as far as possible, of the diœcious character of some varieties of strawberries, he was induced to look into several English and French works, by authors of eminence, who have written upon the cultivation of the strawberry. The results of these investigations, which were for the writer's own use, and not intended originally for publication, are detailed below; and we are indebted to him for his kindness, in enabling us to lay them before our readers.—*Ed.*]

I was much gratified by the letter from our respected friend, Mr. Longworth, of Cincinnati, published in your present number, as well as by your comments thereon. I had the pleasure of conversing with that gentleman on the same subject a few weeks since, and have since ascertained some facts which confirm the opinions expressed by him and you.

I have a strawberry bed of about three hundred square yards, which I have carefully examined this year, while in flower. It is filled with four kinds of strawberries—1st, the round red and white, called by you, I believe, the Wood strawberries; I examined several plants of this description, and found not a single flower which was not perfect, *i. e.* bearing both stamens and pistils. Both these, however, were smaller and shorter than in my other kinds. These other kinds are the Downton, the Scarlet, and the Pine-apple; at least these are the names under which they came to me a few years since; for every one knows that there is much confusion in the naming of strawberries. Among these I examined three rows in different parts of the bed. In the northern row were nineteen plants; of these, fourteen had pistils or stiles only, without a vestige of a stamen. The remaining five flowers were perfect. In the southern row I examined thirty-two plants, of which only five were perfect, the remaining twenty-seven being entirely female, that is, bearing stiles only. In the next row to this, last summer, I found thirteen plants in succession, all of which bore perfect flowers.

I afterwards examined a large number of plants promiscuously; the great majority bore only female flowers; the remaining flowers had both stamens and stiles. I found no flower with stamens exclusively, though there were a very few where the pistils were so small, that they had proved entirely abortive, and had withered. This bed has borne abundantly, and I doubt whether a single plant, except those last mentioned, failed of producing large and finely flavored fruit.

The next fact which I have to state is much more decisive. Last fall I bought a dozen of the Hoveys' Seedling. These I planted by themselves, at a distance of *at least eight rods* from any other strawberries. They threw out several flowers this spring, all of which were without stamens. I anticipated a poor crop of fruit, and so it proved. A few berries were set, but of a very diminutive size, and not one fairly ripened.

In the height of the strawberry season I visited a friend who had a very large bed of the Methven Castle. The fruit was well colored, but exceedingly diminutive. I examined the few flowers which still remained in blow, and found all of them without stamens, and I presume, therefore, that all the flowers in the bed were of this description.

These facts confirm the conclusions at which I understood you to arrive,—

First—That no good fruit can be expected from a bed of strawberries where there are no stamens, or where there are stamens only.

Secondly—That perfect flowers answer as well for fertilizing the stile-bearing plants, as flowers with stamens only, and, as they give fruit, are more profitable; and such I see is your conclusion.

These points have been little regarded, because, in making up strawberry beds, gardeners generally happen to collect a sufficient number of strawberries with perfect flowers; but that some strawberries are always diœcious, and that many are often so, is distinctly asserted by eminent French writers.

It has been less precisely noticed in English works, for the reason given just above, but you will still find the fact recognized incidentally. Thus we have, in the second volume of the *Transactions of the London Horticultural Society*, a communication from Mr. Keen, in which he states that he procured no fruit from a plat of the hautbois, on account of the want of perfect flowers, and that this defect was remedied

by placing in bottles, in the neighborhood, such flowers from other varieties.

I have no doubt that many a bed of good strawberries has been rooted up as worthless, which would have produced an abundance of fine fruit, if properly supplied with fertilizing plants.

I do not think it probable that any of your seedlings produce perfect flowers, as you have not yet succeeded in finding any. The original plant was probably exclusively pistilliferous or female, and, as there is generally only one original plant in each new variety of cultivated fruit, you must seek your fertilizers in other kinds. This is a matter of no moment; for it seems well established, that whether a pistil-bearing flower is fertilized with the pollen of its own, or of any other variety, is a question of no consequence as to the flavor of the fruit, whatever may be the difference of effect on the seed which is imbedded in it, and the new variety raised therefrom.

Boston, July, 1842.

ART. IV. *On the cultivation of Lachenalias.*

By the EDITOR.

AMONG the small number of plants which are adapted to parlor cultivation, we may name some of the species of the *Lachenalia*. Of dwarf stature, scarcely ever exceeding a foot high, of delicate growth, and, withal, possessing a variety of coloring, rarely found in any other plant, they can well claim a place among the many showy ornaments of the parlor window; equally desirable are they to the amateur cultivator of a small collection of green-house plants, offering, by the green, yellow, and scarlet tints of their neat spikes of pendulous bells, a succession of blossoms in the early spring months, which add to the gaiety of the neatest group of plants. The *lachenalias* belong to the liliaceous tribe of plants, and there are upwards of forty species and varieties; we have, however, only cultivated three of them, which we believe to be the *L. quadricolor*, *tricolor*,

and *péndula*. Their treatment is exceedingly simple, and may be detailed in a few words.

Pot the bulbs which are not large in No. 2 pots, three bulbs in a pot. This should be done in September; the soil should be a mixture of peat and sand, three parts of the former and one of the latter, with a very small quantity of leaf mould added. Select good sound bulbs for flowering, and pot the small offsets by themselves; give a good drainage to the pots.

After they have all been planted, remove the pots to a frame, where they will have the light, and not be exposed to the cold autumn rains. Keep them in this situation until November, or when the nights become quite frosty, giving very little water, just sufficient to keep the earth moist. At that time they may be removed to the parlor or green-house, placing them in a light situation, and watering them cautiously until they begin to grow. In February the flower stems will appear, when more water should be given, though with care: the flower stems will now shoot up, and in the course of a few weeks will be beautifully in bloom, remaining so for two or three weeks, and much longer if they are kept in a partially shady place.

In May, when the foliage has done growing, and begins to turn yellow, the pots may be removed to the open air for a few weeks, when the bulbs should be taken out of the pots, and laid away in a dry, cool place, until wanted for planting again in the autumn.

ART. V. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Parton's Magazine of Botany, and Register of Flowering Plants Each number containing four colored plates. Monthly. 2s. 6d

each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Botanical and Floricultural Intelligence. Seeds and Plants from the Exploring Expedition.—We learn from our correspondent Mr. Douglas, of Washington, in whose green-house the plants brought home by the Exploring Expedition are placed, that it is the intention of the Government either to build a house for the plants, or procure that of Mr. Douglas, for the especial purpose of propagating the plants for distribution. There is a sufficient amount of money appropriated to the preservation of dried specimens, &c., and we think no better mode could be devised to enable the Government to give an equal distribution of the plants. Among the species brought home are many rare and beautiful productions from the two Continents.

Lilium speciosum, and the other Japan species, hardy.—J. W. Boot, Esq. informs us that he has tested the hardiness of these splendid productions the past winter. A few bulbs of the several sorts were left out, and they have already thrown up strong and healthy stems, which promise to afford a magnificent bloom. This fact is well worth knowing, as it will give a double value to the already highly estimated worth of these the most brilliant of all the liliaceous tribe.

Doryánthes excélsa.—This noble plant has lately flowered in the collection of John Sherwood, Philadelphia. From the last report of the Philadelphia Horticultural Society, we learn that it flowered in the large green-house of George Pepper, Esq., where Mr. Sherwood removed his plant, that it might be made accessible to the public when in bloom. The following account was given by the committee of the Pennsylvania Horticultural Society, who inspected the plant when in bloom, by the invitation of Mr. Sherwood:—

“This plant was imported by its proprietor in 1828, and is an offset of the celebrated specimen which bloomed at Edinburgh in 1825.

“It is of the genera *Amaryllidææ*; leaves radical, numerous, long, narrow and sword shaped; scape arising from the centre of the leaves, beset with acute sheathing leaves, in height ten feet; inflorescence a terminal head in fascicles; flowers bright scarlet.

“Mr. Sherwood states that he has grown it in heath mould, commonly called peat earth, and shifted or repotted it every spring before commencing to grow; he has generally kept it during summer in an exhausted hot-bed, shading from the hot sun, but exposing it at night for the purpose of receiving the dew; when it became too large for the hot-bed, he introduced it into a pit under glass shading as before, when in this moist atmosphere it grew luxuriantly;—during the last winter he kept it in the hot-house. The flower stem commenced its growth about the first of December last, making its greatest growth in midwinter, and began to bloom about the first of June.

“Mr. Sherwood is entitled to great credit for the skill and patience with which he has cultivated and reared this rare and beautiful plant. It is the first specimen imported into the United States, and the first that has flowered.”

Agave americana.—An old plant of this species, in the collection of General Van Rensselaer, of Albany, is about flowering. The flower stem is now shooting up rapidly, and will soon begin to open its blossoms. It is to be exhibited in Albany for the benefit of the Orphan Asylum of that city. It is stated that this plant had been upwards of half a century in this collection of plants.

Mr. Hartweg, the botanical collector.—Advices from Mr. Hartweg have been received down to the 28th of January: he was then at the foot of the Chimborazo. He has made some rich collections in that vicinity, which “include several vacciniaceous plants, probably Thiebaudias, and possibly Macleania and Cavendishia, many bulbs, between eighty and ninety kinds of seed, and between two and three hundred species of dried plants.” These had all been despatched to London on the 1st of January, and have probably arrived some time since. At Cuenca he had fallen in with some beautiful species of *Berberis*, with small leaves and large flowers, a gigantic *Tropæolum*, with pale yellow flowers, and enormous seeds, ascending to the summit of the tallest trees. (*Gard. Chron.*)

New Variety of the Cereus.—Mr. W. Chalmers, gardener to George Pepper, Esq., Philadelphia, has raised a beautiful *Cereus* between the *C. speciosissimus* and *Epiphyllum Ackermánii*: it has the rich tinge in its petals of the *C. speciosissimum*, and possesses much of the habit of *Epiphyllum Ackermánii*. A description of it from one of our correspondents

has been mislaid; but he states that it is one of the most desirable kinds for a collection.—*Ed.*

Ranunculàcæ.

HELLEBORUS

orientalis *Decand.* Eastern hellebore. A green-house or frame plant, growing two feet high; with purplish colored flowers; appearing in February and March; a native of Eastern Europe; increased by division of the root and by seeds. *Bot. Reg.*, t. 842, t. 34.

A "welcome addition to our collections," producing large, purplish-colored, pendulous flowers, at the end of tall stems, which have a showy appearance. This is supposed to be the Black hellebore of the ancients, which produces the deadly poison known by that name. The roots were gathered on the Bithynian Olympus, and sent to the London Horticultural Society, where it flowered in February and March. It is supposed to be hardy, though, from its rarity, it has been kept in the green-house. It requires a damp, shady situation, with peaty soil to grow in, and is readily increased by division of the root. (*Bot. Reg.*, June.)

Leguminòsæ.

MIMOSA.

Uruguensis, Benth. The Uruguay Mimosa. A green-house shrub, growing three or four feet high, with red flowers; appearing in June; a native of Buenos Ayres; increased by cutting and seeds; grown in loam and leaf mould. *Bot. Reg.*, 1842, t. 33.

"A pretty green-house shrub," with delicate foliage, and reddish flowers, which appear in globular heads on short peduncles, and have a pretty appearance, surrounded with the small and delicate leaves. It is a native of Buenos Ayres, from whence seeds were received by the Hon. W. F. Strangways, and presented by him to the London Horticultural Society, where it flowered in June, 1841. (*Bot. Reg.*, June.)

Crassulàcæ.

ECHEVERIA

rosea *Lindl.* Rosy Echeveria. A green-house plant; growing two feet high; with yellow flowers; appearing in spring; a native of Mexico; increased by cuttings, &c.; grown in light soil. *Bot. Reg.*, 1842, t. 22.

A new and pretty species, with cylindrical spikes of "yellow flowers, with rose-colored bracts, which render it very gay." There is only one other species described, in which the flowers are of the same color. It has the habit of the other tall growing echeverias. It should be grown in the green-house, succeeding best in a light soil well drained, and placed as near the glass as convenient. It is readily increased from the leaves or cuttings, and is easily cultivated. It was introduced from Mexico, and flowered in the garden of the Horticultural Society in 1841. (*Bot. Reg.*, April.)

acutifolia Lindl. Sharp-leaved Echeveria. A green-house plant; growing two feet high; with scarlet flowers; appearing in spring; a native of Mexico; increased by cuttings; grown in light soil. Bot. Reg., 1842, t. 29.

This is another of the acquisitions of Mr. Hartweg, who sent it home from Mexico; so tenacious of life was it, that its stems came alive, and soon flowered in the garden of the Horticultural Society. The leaves are sub-rhomboid, acute, and concave; the stem reddish, and terminated with erect cylindrical spikes of scarlet flowers, tinged with yellow; having a showy and pretty appearance, and decidedly one of the finest species. Its treatment is the same as that of the *E. rosea* and other species. (*Bot. Reg.*, May.)

Ericaceæ.

CLETHRA

quercifolia Lindl. Oak-leaved clethra. A green-house shrub; growing four to five feet high; with white flowers; appearing in March; a native of Mexico; increased by layers or seeds; grown in loam and peat. Bot. Reg., 1842, t. 23.

A handsome shrub, with "deliciously fragrant flowers." The leaves are obovate, lanceolate, acute, rugose, tomentose, and slightly ferruginous, on the under side; the flowers appear in terminal, loose, spreading racemes, giving the plant a showy and ornamental character, independent of their great fragrance. This species differs from *C. mexicana*, and is the same as the *C. tinifolia* of Schlecht. It was found in the neighborhood of Jalapa, in Mexico, and flowered in the garden of the Dean of Manchester, in March, 1841. Its treatment is the same as *C. arborea*, an old green-house plant. (*Bot. Reg.*, April.)

AZALEA

var. *alta clerensis*. The Highclere azalea. A hardy shrub; growing six feet high; with rosy flowers; appearing in June; a hybrid seedling; increased by layers. Bot. Reg., 1842, t. 27.

Since the first production of hybrid azaleas, many splendid varieties have been the result of the labors of cultivators; hundreds have been raised, all differing somewhat, yet many of them too much alike to deserve a distinctive name. The present subject, however, is not one of these; it certainly stands preeminently above the majority of seedlings which have been produced; like its near ally, the *Rhododendron alta clerense*, originated at the same place, it will rank as one of the most beautiful hardy azaleas which has ever been raised. We cannot better describe it than in the words of the originator of the plant, J. R. Gowen, Esq.

"This, the most charming, perhaps, of hardy azaleas, uniting to the utmost beauty of form, and arrangement of color, a most delicious fragrance, is one of the many additions made to

our horticultural treasures, in this family, by the gardens at Highclere. It was produced by fertilizing the flowers of *Azalea sinensis*, with the pollen of the late flowering variety of *Azalea viscosa*, called by the nurserymen *Azalea rubescens major*. It bears the most decisive evidence of its double parentage, having the glaucous foliage and inflorescence of *Azalea sinensis*, modified by the pale crimson tints of *Azalea rubescens major*. It is most profuse of its odorous flowers, which cover the whole bush, and is altogether a very striking production.”

The individual flowers bear a similar resemblance to those of *A. variegata*, with the exception that they have not the delicate texture of the latter. We consider it a variety worth a dozen of the common imported kinds.

In connection with this subject, Dr. Lindley states, what may be interesting to some, viz., when the branch now drawn was sent him, he stripped off a twig or bud of the young wood, inserted their ends in a phial of water, and placed them in a Ward's case in a sitting room. They remained for nearly three months healthy, but scarcely green; they, however, formed a callosity at the lower end, and he has no doubt they would have rooted had they been placed in a little bottom heat. He thinks that in a Ward's case azaleas might easily be made to root. (*Bot. Reg.*, May.)

Convolvulaceæ.

MINA Llave and Lex, (after Don Francisco Xavier Mina, a Mexican Minister.)

lobata La Llave and Lex Lobe-leaved Mina. An annual climber; growing several feet high; with yellow flowers; appearing in summer; a native of Mexico; increased by seeds. *Bot. Reg.*, 1842, t. 24.

A beautiful annual, with so much of the habit of growth and general appearance of the common *Ipomœa*, that if the flowers were removed, no one would scarcely detect it; “but remove the leaves, and it loses all appearance of the convolvulaceous order, so unusual is it among such plants to have racemose flowers, erect, and arrayed almost in the scorpeoid manner of a borage, to say nothing of the uncommon form of the corolla, and its peculiar color, at first rich crimson, but changing through orange to pale yellow as the blossoms unfold.” As this plant is common with the Mexicans, and is used for the purposes of decoration, it is somewhat singular that it was never introduced to Europe until last year, when a packet of seeds was presented to the Earl of Burlington, in whose garden it flowered; the plant afterwards died, and only a few im-

perfectly ripened seeds were saved, which have been sown in the garden of the Horticultural Society. It will be a fine addition to our annual climbers. (*Bot. Reg.*, April.)

Jasminiæ.

JASMINUM

caudatum *Wall.* Tail-leaved Jasmine. A stove plant; growing ten feet high; with white flowers; appearing in summer; a native of India; increased by cuttings. *Bot. Reg.*, 1842, t. 26.

A fine, but scentless, species of Jasmine, with opposite serrate leaves, deep green, tapered into very narrow points, from whence its name. The flowers appear in dense terminal cymes, or panicles, snow white, and have a showy appearance. It is well adapted for a stove, where it grows in great luxuriance trained up the back wall, on the rafters, or round stakes placed in a pot. It grows in a mixture of loam, leaf mould and rotten dung, and is easily multiplied by cuttings. (*Bot. Reg.*, May.)

Gesneriæ.

ACHIMINES

longiflora *Beath.* Long-flowered achimines. A green-house plant; growing eighteen inches high; with blue flowers; appearing in summer; a native of Guatemala; increased by the roots or bulbs; grown in any rich soil. *Bot. Reg.*, 1842, t. 19.

“No individual, whether potentate or commoner, no government, no association of individuals in any country, ever embellished their native land, in the same number of years, with such a multitude of rare and beautiful plants as the Horticultural Society of London has brought into England, either through their correspondents, or by the means of their collectors, among whom Forbes, Parkes, Douglas, and Hartweg stand prominent. The annuals, the perennials, the hardy deciduous shrubs, the evergreens, the creeping plants, the green-house and stove plants, now in cultivation, have principally sprung from the rich mine in the Society’s garden; and now, after twenty years’ importation of novelties, here is one which yields to nothing except the *Wistaria* (*Glycene*) *sinensis*. More beautiful than the gayest of our stove herbaceous plants, as easy to cultivate as the commonest of perennials, more prodigal of flowers than the finest of the *gloxinius*, ever blooming, except during the few months when it sinks into its winter’s rest, this *Achimines longiflora* is an invaluable gift by the Society to every one who has a small green-house.” Such is the account given of this new plant by Dr. Lindley, which we have extracted entire, preferring it to any description of our own. From the representation in the drawing, its merits are not overrated.

The plant has the habit of *A. coccinea*, with slightly larger foliage, but the flowers are two and a half inches across, of a rich violet color, having much the outline of a good heartsease.

It is easily grown; the little scaly bulbs should be potted in spring in any fine soil, and the plants will grow rapidly; they should first be placed in small pots, and shifted as they increase in size. They will flower in August, and continue to bloom for three or four months. After the flowering season is over, the stems die off, and the pots should be placed away on an airy shelf free from frost, until the growing season, when they should be repotted again. M. Hartweg found the species in Guatemala. (*Bot. Reg.*, April.)

pedunculata *Benth.* Long-stalked achimenes. A green-house plant; growing eighteen inches high; with scarlet spotted flowers; appearing in autumn; a native of Guatemala; increased by division of the roots. *Bot. Reg.*, 1842, t. 31.

Another fine species, but quite different from the last; the foliage is larger, the flowers smaller, and the plant more robust in its habit. The flowers are very brilliant and showy, being scarlet, richly marked with rows of deep crimson spots. It is, however, a fine species, and we hope the whole three, viz: *A. rosea*, *longiflora*, and *pedunculata*, will soon be added to our gardens. In the treatment of the latter species, the same directions are to be observed as for the others. (*Bot. Reg.*, June.)

Coniferae.

THUJA

filiformis *Loëdiges.* Weeping arborvitæ. A hardy tree; growing fifteen or twenty feet high. *Bot. Reg.*, 1842, t. 20.

"A beautiful and quite hardy tree" in the climate of England, and would undoubtedly prove so here; "with long, slender, weeping branches." The finest plant in England is in the arboretum at Kew, and is now ten feet high. Though one of the most elegant evergreens, and long since introduced, it is surprising that it has not become more common in collections, as it is readily increased from cuttings. This species is figured by Mr. Lambert as the *T. pendula*, but it appears from a close botanical examination to be entirely different. (*Bot. Reg.*, April.)

Amaryllidaceæ.

HABRANTHUS

pratensis *Herb.* Meadow Habranthus. A stove-bulb; growing a foot high; with crimson and orange colored flowers; appearing in April; a native of Chili; increased by offsets; grown in light loam. *Bot. Reg.*, 1842, t. 35.

Syn. *Amaryllis pratensis.* *Pæppig.*

A large flowered species of the Habranthus, having a "peculiarly brilliant appearance on account of the contrast between

the rich yellow at the bottom of its flowers, and bright crimson of their limb. The foliage is linear, deep green, and convex; the stem terminated with an umbel of from two to three flowers. Its cultivation is simple: after the flowers fade, the bulb should be placed in a light situation, and freely watered, in order to enable it to perfect its foliage; when full grown, and it begins to die off, the watering should be discontinued, and the plant removed to a dry shelf till the growing season. (*Bot. Reg.*, July.)

Liliæcæ.

ORNITHOGALUM

divaricatum *Lindl.* Straggling Star of Bethlehem. A hardy bulb; growing two feet high; with white flowers; appearing in July and August; a native of California; increased by offsets; grown in rich soil. *Bot. Reg.*, 1842, t. 23.

A hardy species of the ornithogalum, throwing up a branched panicle of pretty white flowers, slightly pendulous. All the genuine ornithogalums having erect stems, Dr. Lindley doubted the propriety of referring this plant to the genus; but for the present he considers it most prudent to let it form a section. It is a native of California, and sent home to the London Horticultural Society by Mr. Hindes, surgeon of the Sulphur surveying ship. It grows freely in any good, rich, sandy soil, and is increased by offsets. (*Bot. Reg.*, May.)

Garden Memoranda. *Hawthorn Grove, Col. M. P. Wilder.*—Some few weeks since we made a short visit to this place. It was just previous to the rose season, and they had not then begun to bloom: the collection here is superb, many additions having been made during the present year. Among the tender sorts, however, we found several in bloom, though the season was too early to show the character of the newer kinds. During the present month, or in September, we hope to be able to see them again, when they will be in good condition, and note down the names of the most beautiful and desirable for a collection.

Passing into the green-house, where nearly all the plants were yet remaining, we found a superb collection of geraniums in flower; the plants large and well grown, and throwing up fine trusses of blooms. The finest were Gaines's King, Magna Charta, Matilda, Florence, Decorum, Sylph, Siddonia, Carnation, Clarissa, and several others whose names we did not note down. Some fuchsias struck us as very beautiful, particularly *F. eximia* and *Standishii*, the former very brilliant.

F. corymbiflora, of which there is here a plant, was not in very good condition to bloom; but Mr. Wilder hopes to flower it during the season.

The camellias were looking well, but were now out of flower; several new ones have been recently received from France. *C. var. Wilderi* is growing vigorously, and will soon again become sufficiently strong for blooming. Mr. Wilder pointed out to us a few pots of seedling lilies, being the production of seeds raised from the *L. speciosum*, *lancifolium album*, *tigrinum*, and others, impregnated with one another by various crosses. Something good, we trust, will come out of them. We have thought, for some time, that there was quite a field for improvement in this family; so varied are the colors and the habits of the different species, that we are assured some singularly pretty varieties might be produced.

In the open garden, we were particularly struck with the size and beauty of a few roots of Myatt's *Victoria* rhubarb: it will prove, we think, the finest variety in cultivation. A bed of Hovey's seedling strawberry, set out on a piece of ground trenched two feet deep, was looking finely, the plants throwing up foliage of immense size, and vigorous runners already emitted from the roots. On one side of the bed, at the distance of six or eight feet, Mr. Wilder has also a bed of Early Virginias, which will serve to fertilize the bed of seedlings. The fruit trees were looking uncommonly vigorous and healthy.

Belmont Place, Mr. Cushing's.—This beautiful place is now in fine order; the plants are all removed from the houses, and placed in their summer quarters in the rear of the large range of houses. In one of the stoves we noticed the pitcher plant, (*Nepenthes distillatoria*,) with upwards of a dozen of its singular pitchers, the largest full eight inches long, and more than an inch in diameter. We here also saw a plant of the celebrated Fejee Island tomato, of which so much was said last year, and seeds of which were sent home by the exploring expedition. The plant has full as much the appearance of an egg plant as the tomato; it seems intermediate as regards its foliage. It was showing two of its fruit, about the size of a large egg; the form is a roundish oval, and the color of the skin nearly white. The fruit is not yet ripe. It undoubtedly requires a longer season to perfect its growth than the egg plant, and on that account, unless it should prove a remarkable table fruit, it

will be unfit for general cultivation. Mr. Haggerston's plant was raised from seed last year, and placed in his hands by a gentleman who managed to keep it through the winter, and it has now fruited for the first time. The plant is growing in a large pot, and is nearly three feet high, with an erect stem.

The grapes in the stoves have all been cut, and they are now fully ripe in the succession house; some of the clusters of Muscat of Alexandria were the largest and finest we ever saw; those in the cold house are coming on well, and show a fine crop. Mr. Haggerston prunes his vines on the spur system, throughout. A few peaches, plums, apples, &c., in pots, were ripening small crops.

In the open garden, the borders were enlivened with a good show of perennial and other plants: *Oenothera macrocarpa* was very brilliant, with its large deep yellow flowers; it is a fine perennial, and worthy the best place in the border. *Yucca filamentosa*, with its stately panicles of waxy looking bells, is a superb plant, not half so much cultivated as it should be. A bed of picotees and carnations had made a fine show, but the plants were now past their finest bloom. Mr. Haggerston has a large bed of seedlings coming on, for another year. Around the circle, in the centre of the garden, groups of verbenas were displaying their varied tints, making a splendid show. *Salvia patens* was showing a few of its deep blue flowers, contrasting prettily with the scarlet tints of the old species.

It is astonishing to see what a different appearance the roses have here, compared with their appearance two years ago, before Mr. Haggerston made the discovery of the efficacy of whale oil soap in destroying the rose slug. We recollect of being at the garden at that season, and the bushes were completely stripped of their foliage, although every means had been used to prevent it: snuff, lime, sulphur, covering the bushes, &c., but all without effect. The whale oil soap, however, accomplishes the object at once; and the rose slug, as well as the aphides, is completely under the hands of the gardener.

The dahlias are making a fine growth, and have already put forth many beautiful flowers. Mr. Haggerston has a fine collection, including most of the new kinds; and, as the ground was well prepared, a superb show may be expected in September.

MISCELLANEOUS INTELLIGENCE.

ART. I. *General Notices.*

Preserving flowers fresh for a long period.—The following plan is recommended for preserving flowers in a fresh state for some time:—Procure a flat dish of porcelain, into which pour water sufficient to nearly fill it; in the water place a vase of flowers; over the vase place a bell-glass, with its rim in the water. This is similar to a “Ward’s case” in principle, although different in construction. The air that surrounded the flowers being confined beneath the bell-glass, was constantly moist with the water that rose into it in the form of vapor. As fast as the water was condensed, it ran down the sides of the bell-glass back into the dish; and if means had been taken to enclose the water on the *outside* of the bell-glass, so as to prevent its evaporating into the air of the sitting-room, the atmosphere around the flowers would have remained continually damp. This plan is designated by the editor as the “Hoopen apparatus,” under which name he will refer to it again. Those who wish to try the experiment on a small scale, may do so by inserting a tumbler over a rose-bud, in a saucer of water. (*Gard. Chron.*, 1842, p. 315.)

Cultivation of choice kinds of Petunias.—Early in September, the cuttings should be put into 60 sized pots [No. 1,] and placed in the front of a hot-bed until they have struck root, which will be in three or four weeks; they may then be removed into the greenhouse. Early in February, they should be shifted into 48 sized pots [No. 2,] in a mixture of sandy peat, leaf mould, and loam, and repotted as fast as the pots become full of roots, using an inch and a half of small charecoal for drainage. During the time they are growing in pots, they should be watered two or three times a week with warm water; and the latter end of May, they may be turned out into the flower garden. The soil which suits them best is a light rich loam, mixed with well decomposed dung. They form splendid objects, when planted on the lawn and trained to a wire trellis or stake, of any shape which may be agreeable. (*Id.*, 1842, p. 316.)

Gas Tar for Gravel Walks.—Gravel walks may be kept free from worms and weeds, by coating the first layer of material (supposing it to be of either stone or rubbish, from six to twelve inches deep,) with a wash of gas tar and water, in the proportion of half a gallon of the tar to a large water-pot of the water. It is to be applied with the rose on the pot, and kept well stirred. After putting another layer of rubbish or drift, or a coat of coarse gravel about two inches thick, apply another lotion of gas tar water, which need not be quite so strong as in the former application. The writer states that he has never been troubled with either weeds or worms, and has used only the above means to guard against them. (*Id.*, 1842, p. 318.)

New method of growing Asparagus at Nice.—The following is the method of growing asparagus at Nice, of which a high account has been given, viz:—Take a quart wine-bottle, such as fresh wine is sold in; invert it over the head of an asparagus just rising from the ground, and secure it by three sticks so that it cannot be knocked over. If left in this state, the asparagus will grow up into the interior of the bottle, and, being stimulated by the unusual heat and moisture it is then exposed to, will speedily fill it. As soon as this has taken place, the bottle must be broken, and the asparagus removed, when it will be found to have formed a thick head of tender delicate shoots, all eatable, and as compact as a cauliflower. (*Id.*, 1842, p. 331.) [We recommend a trial of this method.—*Ed.*]

ART. II. Foreign Notices.

ENGLAND.

Exhibition of the London Horticultural Society for May, 1842.—This Society holds three monthly exhibitions during the summer season, one in May, another in June, and a third in July. We already possess reports of the May and June exhibition, and that of July will reach us before our next number appears.

The exhibitions have been unusually splendid this year, exceeding those of any previous one. The reports in the *Gardener's Chronicle* are given at length, and each occupy at least ten of our pages. We cannot, of course, give them entire, but we have extracted the most interesting portion of the report of the May exhibition below, and shall give that of the June one in our next, and of the July exhibition in a succeeding number, if it possesses the same interest as the others. Nothing that we can find in the foreign journals interests us more than these reports, and we doubt not that a majority of our readers will be pleased to share with us in the gratification we have derived from them.

The exhibition was attended by a great concourse of people of all classes, including the Queen and Prince Albert, the Duke of Devonshire, and others. Upwards of five thousand five hundred tickets were sold. Of the beauty of the exhibition, and of the rich and varied display, the best idea can be formed after reading the report. But one of the most important facts connected with it was the high cultivation of many of the species of older plants, rather than the gathering together of mere novelties—thus showing that the legitimate objects of the Society are attained, and good gardening promoted. It is to this particular feature of the report that we would call the attention of cultivators: the sight of such fine specimens of azaleas, ericas, cactuses, and pelargoniums, as are mentioned, would be worth a host of all the novelties which could be gathered together.

It will be seen that the most popular tribes of plants are the azalea, erica, cactus, pelargonium, calceolaria, fuchsia, roses, the family of climbing plants, and the orchidaceæ. At the May show the azaleas took the lead, and were objects of unbounded admiration, to such a state of perfection has their cultivation arrived.

We must invite our cultivators to attempt an improvement in their management of this plant; for it is rare to see even a decent looking specimen, being, for the most part, tall straggling plants, half clothed with foliage, and quite unsightly only at the time that they display their large and showy flowers.

How seldom is it that a climbing plant in a pot is seen in our green-house collections; and yet, how much of beauty and interest must they possess, when brought to that state of growth described below. Many individuals are inclined to look upon a running plant as an object unworthy of growth, and some cultivators discard them entirely from their collections. We trust a better fate awaits them, and that we may see the long neglected *Sóllya*, *Manéttia*, *kennedias*, *clematises*, *anagallises*, *passifloras*, yet holding a conspicuous place among green-house plants.

In our next number, when we give an account of the June exhibition, we shall embrace the occasion to offer some further remarks.

“Neither the most zealous devotee of horticulture, nor the most ardent patriot, could have afforded a more striking proof that their pursuit or their country were not in an inactive or declining state, than was furnished at the Exhibition of last Saturday. It is difficult to decide whether the natural beauty of the flowers, their tasteful arrangement, the tokens of skill in cultivation they afforded, or the interest which the company evinced in their inspection, was the more gratifying or remarkable. The previous rains had brought everything in the gardens to the highest perfection. The day was fine, with a genial, but not oppressive warmth, the lawns and walks neither damp nor dusty; vegetation just clothed in that lovely green which is peculiar to the present season. The noble *Wistaria sinensis*, that finest of hardy climbers, was completely laden with its newly opened and delicately perfumed blossoms: the plants in the great conservatory yet more luxuriant than those in the open air, and some of them splendidly in flower; the collection of exotics in the exhibition, varied and rich in the extreme, their disposition as to the diversity, contrast, and yet harmony of their colors, was the subject of admiration; and the visitors were numerous, but select, and by no means crowded. The three military bands performed in their usual style; and, as if to finish the whole, and give an additional zest to all the other attractions, a friendly nightingale

‘All day long her amorous descant sung’

within fifty yards of the principal tent.

“Cultivators will be pleased to learn that their productions were gazed upon with approbation by her Majesty and Prince Albert, who, with the Duke of Devonshire, the Duchess of Sutherland, Lady Carlisle, Lady Newburgh and suite, honored the exhibition with their attendance. The other visitors, including many illustrious names, amounted to 5,500. The subjects of exhibition were so abundant, and generally so fine, that nothing but a mere outline can be attempted.

The tribe which of all others attracted and deserved most notice was the azaleas; the specimens sent far surpassed those brought in former years. They were treated in four different ways: First and rarest, there were plants exceedingly dwarf and bushy, with the branches actually depending over the edges of the pots. These were peculiarly interesting, and confined mostly to *A. lateritia* and *variegata*. Next, there were some almost equally low, but very spreading, and with their branches also inclining downwards. While the former were not more than a foot or eighteen inches in diameter, these were from three to five feet across, and included the White Indian and a few of the crimson-flowered kinds. Again, there was a group which had been left to grow naturally, with perhaps the principal stem fastened to a stake to keep it upright, and two or three of the branches 'tied in a little to draw the flowers more into a mass. Lastly, there were many, both with and without a bare stem, of one or two feet in height, that had the points of their branches brought into a flat, or nearly flat, surface—thus throwing all the flowers to the front, and, of course, rendering that front far more thickly studded with them than an ordinary bush could be. The specimens of the first class had been procured from cuttings, or by grafting very low on the stocks, and pruned freely, as well while growing as during winter. The branches had also most likely been tied down at the points. Those of the second tribe had been raised similarly, and perhaps treated in the same manner, but were commoner and stronger growing sorts, and had been kept in a very light house, near the glass. The third group, which was the least ornamental, exhibited a want of culture, or, at least, showed by their defects what the aid of art had accomplished in other instances. Their shoots, having been tied up for the occasion, evinced, too, the injudiciousness of attempting to train a plant after it has perfected its growth. Several of the flowers were unavoidably turned inwards, or on one side, instead of towards the spectator. In the fourth class, however, a good effect was produced by training all the shoots so as to present only one front. A specimen of *A. lateritia* so arranged was brought by Mr. Green, gardener to Sir E. Antrobus, Bart., and was certainly an admirable specimen of culture. The blossoms were so close that it seemed almost impossible for them to exist in such a crowded state. It was four feet high, on a stem about a foot long. The same variety was exhibited from the same collection only one foot in height, extremely dense and beautiful. Mr. Green also had *A. indica variegata* as large as the first mentioned *A. lateritia*, and scarcely less prolific of flowers. To those desirous of improving the race of green-house azaleas, these two kinds may be pointed out as models in respect of the form of their flowers. From Mr. Green there were, further, an *A. splendens*, seven feet high, with immense deep crimson flowers, and in a magnificent condition; *phœnicea* and *Smithii*, equally good; two very remarkable plants of the splendid double red variety, one being quite six feet high, and full of blossoms; and a gorgeous specimen of a new kind called *A. Greenii*, which has rich and well-formed crimson flowers. All Mr. Green's azaleas appeared to be trained with the view of bringing the flowers to the front; and hence their peculiar splendor. The dwarf specimen we have spoken of is obviously excepted from

this remark. Mr. Croucher, gr. to J. Allcard, Esq., of Stratford, exhibited a very beautiful dwarf plant of *A. indica variegata*, and a superior specimen of the same variety, together with a splendid plant of a deep crimson sort. A very pretty white kind, fully six feet high, and profusely covered with bloom, came from Mr. Falconer, gr. to — Palmer, Esq., of Cheam. From Mr. Barnes, gr. to G. W. Norman, Esq., there were a double red azalea in a nice dwarf state; *A. lateritia*, also dwarf, but with small flowers; the variegated variety, exceedingly good, two feet high; and a crimson azalea, with semi-double flowers, four feet in height, and particularly fine. An extremely handsome specimen of the white Indian azalea was sent by Mr. Flogan, gr. to H. Pownall, Esq., Spring Grove. It was three feet high, and at least four feet broad. In another collection by Mr. Barnes, there was a plant of *A. Smithii*, three feet in height, which presented a superb mass of blossom; a bright red-flowered variety, one foot high, very full of bloom; one called *Semidouble Scarlet*, with particularly large and brilliant flowers, which have a slight tendency to become double; *A. sinensis*, finely grown, and with its rich yellow inflorescence creating a delightful variety among the rest; a double crimson-flowered variety, beautifully in flower; and *A. Gledstanesii*, eighteen inches in height, and well covered with blossom. The last kind was exhibited, too, by Mr. Green, as a detached specimen, and drooped over the sides of the pot in an elegant manner. Its flowers are formed like those of *A. indica variegata*, and are mostly white, with here and there a stripe more or less distinct and broad, of deep pink. Mr. Hunt, gr. to Miss Traill, besides good specimens of *A. phœnicea*, and a very luxuriant one of the white sort, had an admirable plant of *A. Danielsiana*, four feet in height, and blooming most abundantly. The flowers were rather pale red, from having been forced, and the plant is easily known by its small, neat, and compact foliage. Mr. Goode, gr. to Mrs. Lawrence, Ealing Park, contributed several specimens, which were conspicuous for their health, as well as for the number and size of their blossoms; of *A. splendens phœnicea*, one much resembling the first-named; a particularly good white variety, which was like a hillock of snow, and the double pink sort, dwarf, but more than four feet in breadth, and extremely delicate. A quantity of new varieties were furnished by Mr. Smith, nurseryman, of Norbiton, Surrey, and amongst them were several with striking flowers. One, which had very pale and transparent red or salmon-colored blossoms of a large size, and tolerably good form, appeared to divide its claims to superiority with another of a most intense crimson hue, having numerous dark spots. A semi-double crimson one was also good; and there was a fine white kind, named *A. phœnicea alba*. A selection of hardy azaleas, in baskets, from Mr. Donald, of the Woking Nursery, had an interesting appearance. After the azaleas, cacti and heaths commonly occupy the foremost rank. On this occasion, however, we think precedence is due to the climbing plants. It is with delight that we note, having called attention to the subject in our report of last year, that there were a great many species of these charming objects present, and that many of them were superlatively fine. The possibility of growing even rambling and luxuriant climbers in pots to trellises not more than four or five feet

high, has now been fully demonstrated; and it is alike palpable that plants so managed constitute some of the most beautiful objects which can engage the cultivator's notice. The trellises most common were those with flat surfaces, exhibiting an oval or irregular contour, some expanding at the bottom so as to cover the pot, and such as resemble a barrel, or are simply cylindrical in figure. Two or three were completely globular, except on the lower side, and some were of a common cylindrical form, but low, and covered at the top, with the plants trained over them so closely, and branching out from their surface so naturally, as to give them the aspect rather of dwarf bushes than of trellis-supported climbers. The most noticeable feature in their culture was the training of the shoots so closely together as almost to hide the trellis, and to display as continuous a sheet as possible of foliage and flowers on the exterior. It was observable that where this had been most carefully effected, by far the most splendid results were realized, and certainly nothing could be more demonstrative of the good effects of any treatment than were some of the climbers of that we have just referred to. Probably the best plan, where immediate display is not wished for, is to train the plants thinly to the top of a suitable trellis, take the principal shoots again to the bottom, and re-direct them upwards, between the older portions. The first wood is thus better matured, and though two or three years will elapse without any striking result being obtained, the ultimate effect will be all that could be desired. In all cases, however, a high trellis must be guarded against, as it is not a tall specimen, with the flowers principally at the top, that is most beautiful—but one over which the leaves and blossoms are pretty regularly and generally distributed. These hints were suggested, and will be borne out, by the climbers exhibited. The specimen which struck us as being most astonishing was one of *Zichya glabrata*, from Mr. Clarke, gr. to G. Smith, Esq., of Shirley Park. It was about three feet high, the same breadth, on a flat trellis, and had a cluster of flowers to almost every square inch of surface. The bunches of blossom, from standing out on long flower-stalks, had their beauty greatly increased. A plant of *Kennedyia monophylla*, four feet in height, proportionally broad, on a similar trellis to the last, and so densely covering it that it could not be seen through, was sent by the same person, and by the profusion of its large deep green leaves and blue flowers, made a very admirable display. Mr. Clarke further exhibited *Philibertia grandiflora*, in a good flowering condition; *Tweedia cœrulea*, affixed to the front of a flat trellis, and producing a lively effect; a species of *Maurandya*, probably *pulchella*, with light lilac flowers, and forming an interesting and close pyramid four feet high; *Kennedyia nigricans*, on a round trellis, with its noble foliage, and curious blackish and yellow flowers; *Kennedyia longiracemosa*, four feet high, on a circular flat trellis, remarkably good; and *Sollya heterophylla*, with its pretty drooping blue blossoms. A *Zichya coccinea*, four feet high, from J. Allnut, Esq., of Clapham, was a magnificent specimen; and Mr. Wilson, gr. to J. Labouchere, of Bedford Hill, Streatham, produced the same species, six feet high, with a prodigious quantity of flowers; it was supported on a fancy trellis, the figure being contracted towards the top. Mr. Redding, gr. to Mrs. Marryatt, of Wimbledon, brought a

plant of *Clematis cœrulea*, which, though hardy, flowers most perfectly under protection; and *Clematis Sieboldi* came from Mr. Hogan, gr. to H. Pownall, Esq., Spring Grove: the latter being on too large a trellis, and its branches, leaves, and blossoms too much diffused, did not look so well as it does when these are more concentrated. Mr. Barnes, gr. to G. W. Norman, Esq., contributed a handsome *Kennedyia monophylla*, and a superb plant of *Zichya coccinea*, on a trellis five feet in height. From Mr. Hunt, gr. to Miss Traill, of Hayes Common, there was an excellent *Gompholobium polymorphum*, which had many blooms expanded, and a greater quantity in the bud state; it requires to be trained very closely, being of such a slender habitude. *Tropæolum tricolorum*, or a variety of it, was likewise in Mr. Hunt's large collection; it was fastened to a trellis four feet high; which came down over the pot, and the plant was in more vigorous health, and the flowers larger and richer, than we have ever before seen them. Mr. Redding, gr. to Mrs. Marryat, and Mr. Davis, gr. to Lord Boston, had also plants of *Tropæolum tricolorum*, in both a healthy and a free flowering state. A plant of *Zichya pannosa*, from Mr. Green, gr. to Sir E. Antrobus, Bart., was five feet high, and approached, in point of merit, the *Z. glabrata* before named: it was a brilliant object, and the species has more handsome leaves than many of its allies. Mr. Bruce, gr. to B. Miller, Esq., of Mitcham, showed an attractive specimen of *Kennedyia monophylla*, not more than a foot high, completely hiding a trellis by which it was sustained, and throwing out its branches like a small shrub; although so dwarf, it had a singularly healthy look, and was blossoming most liberally. But the greatest variety of climbers was derived from the gardens of Mrs. Lawrence, Ealing Park; among these was a tall plant of *Aristolochia trilobata*, trained on a funnel-shaped trellis, and bearing a prodigality of its grotesque looking blossoms; *Thunbergia Hawtayneana*, the flowers of which were not very perfect; *Ipomœa Hardingii*, which is allied to *I. scabra*, but is much larger in all its parts—a good instance of how the strongest plants may be grown on a low trellis; a new species of *Ipomœa*, with attenuated fig-shaped leaves, and large deep purple flowers, which have a tube that contracts greatly towards the base; *Manettia cordifolia*, on a spherical trellis, and in the finest health; *Gompholobium polymorphum*, spread over a flat trellis, three feet high, and beautifully in flower; *Stephanotis floribundus*, an immense plant, singularly robust, but only just beginning to flower; *Zichya pannosa*, or a species very near it, five feet high, in capital condition; *Zichya coccinea*, trained to the height of six feet, peculiarly splendid; *Kennedyia monophylla* and *longiracemosa*, each from three feet to four feet high, cultivated to an amazing degree of perfection; and *Poirrea coccinea*, twined round a barrel shaped trellis, and flowering in the greatest freedom. Two novel species of *Tropæolum* were in the exhibition: one named *T. polyphyllum*, being sent by Mr. Green, gr. to Sir E. Antrobus, Bart., and having leaves with numerous narrow segments, and bright yellow flowers, the shape of those of *T. tuberosum*; the other, *T. edule*, with somewhat similar leaves, and dark orange blossoms, like the others in figure: the last was from F. Coventry, Esq. Of Cacti there was the usual assemblage of sorts. Few

flowers, however, of *Cereus speciosissimus* were expanded, though there was a very richly grown specimen of it from Mr. Kyle, gr. to D. Barclay, Esq., of Leyton; and two equally well-cultivated plants of the same species, from Mr. Barnes, gr. to G. W. Norman, Esq.; *C. speciosus*, five feet high, from Mr. Barnes, was very well-flowered; and a dwarfer specimen, three feet in diameter, was still more finely in blossom. Two plants of *Epiphyllum Ackermanni* were produced by the same cultivator, and were really superb. *Cereus Jenkinsonii* was sent from Mr. Goode, in excellent order, and a singularly spreading plant of *C. speciosus*, astonishingly prolific of flowers. The most noticeable cactaceous plant, however, was a *Cereus flagelliformis*, grown by Mr. Green, market gardener, of Turnham Green: its shoots hung down for a great length, around the pot or box in which it was planted, and bore several large tufts of lovely crimson flowers.

The Pelargoniums were splendid: Mr. Cock in this department still maintained his ascendancy; he exhibited twelve magnificent specimens (not for competition:) it is impossible to convey a just idea of the appearance of these plants; their large size, regular form, and abundant bloom, were such, that surely the cultivation of this beautiful flower cannot be carried further. Orange Boven, Garth's Victory, Bridesmaid, and Coronation, were perfect and covered with bloom, and though the others presented no deficiency of flowers, it was suggested by some growers that two or three days more would have improved the remainder. Mr. Catleugh, in the nurserymen's class, gained the gold medal for twelve finely bloomed and neatly trained plants; they were well selected as regards color and the beauty of their flowers. The collection consisted of the following sorts:—Erectum, Coronation, Garth's Victory, Una, Comte de Paris, Sylph, Orange Boven, Climax, Magna Charta, Lady Mayoress, Ovid, and Eliza superb. These plants were grown short, and trained rather flat on the crown, and as the pelargoniums were exhibited under the eye, these had the advantage of being seen in perfection. Erectum and Orange Boven were perfect, fine in color, and covered with bloom. Those who doubted the possibility of producing the Sylph with a fine head of bloom, had an opportunity here of being convinced of their error, as this plant was in splendid condition; so also were the Lady Mayoress, Comte de Paris, Victory, and Coronation. Mr. Gaines, among his twelve, exhibited some very fine specimens, but how could a grower of his experience allow such a flower as *Diadematum rubescens* to make its appearance in his collection? nothing but dire necessity, we should imagine, could have sanctioned its being there. Foster's Matilda was shown in this collection, in a very fine state, no want of bloom, and with the spot in fine color, and well developed. The Emperor, a flower of extraordinary color, was very attractive from its brilliancy. The collection contained the following sorts:—Matilda, Emperor, Climax, Alicia, Juba Mabel, Grace Darling, Grand Duke, seedling Eliza superb, *Diadematum rubescens*, and Raffaele. In the collection of six varieties, Mr. Catleugh exhibited Coronation, a magnificent specimen of Discount, Garth's Victory, Jewess, Climax, and Eliza superb. Mr. Gaines had Lady Bulteel, Grand Duke, Louis Quartorze, Cli-

max, and two others we did not ascertain the names of. Each of these collections received the same award—the highest prize offered by the Society. They were very attractive from their being so finely grown, and shown in such perfection. Mr. Beck was the most successful exhibitor in the amateurs' class; his plants were well grown, but not sufficiently in bloom; the selection of the sorts was unexceptionable, as the following list will show:—Nymph, Sultan, Matilda, Erectum, Vivid, Vulcan, Rienzi, Deborah, Gipsy, Sylph, James, Hebe. There is no doubt, had Mr. Bromley exercised the same judgment in the choice of his plants, Mr. Beck would not have been so successful, as the plants in Mr. Bromley's collection were generally well grown, and well bloomed; the state in which Lady Denbigh, Victory, Jewess, Discount, and Dennis's Perfection, were exhibited, will bear us out in our opinion; but in the present state of this beautiful class of flowers, to see such sorts as Lady Murray, Diadematum rubescens, and Garth's Perfection, with but a few blossoms expanded, was a circumstance sufficient to condemn any collection; and to this cause we attribute the decision that was given. Mr. Stowe's collection was not well managed; they appeared to have been tied up so short a time before the exhibition, that the flowers and leaves had not had sufficient time to recover from their altered position. There was no deficiency of bloom on the plants. At the end of the tent, a single specimen (Florence) was exhibited by Mr. Cock: a magnificent plant, covered with flowers. Those who were in search of novelties, flocked to the small tent appropriated to the exhibition of seedlings; this tent was much crowded—a proof of the interest taken in floricultural productions. Several seedling pelargoniums were shown, but two only selected for prizes—Symmetry, raised by the Rev. R. Garth, a beautiful flower; the under petals have a broad band of very delicate pink, which is changed to white in the centre; the upper petals have a blotch of deep maroon, a little softened at the edge, with a broad band of pink around them. The plant was exhibited, (which is the best mode of showing seedlings,) as evidence is at once obtained of its being a free bloomer, with good sized trusses. Gaines's Amulet was the other seedling selected; a very finely formed flower—the under petals particularly fine; the flower is novel in appearance; the ground color is rather a deep rose, carried round the spot in the upper petals by a broad band. There were other seedlings meriting attention, but not shown in their greatest perfection; we think this was the case with Gaines's Orange Perfection, a beautifully colored flower. Mr. Pontey's seedlings were seen under great disadvantages; the distance they had to travel had no doubt caused the petals to flag and to reflex; one called the Duke of Cornwall—a flower of extraordinary brilliancy of color—we trust to see again under more favorable circumstances. The June show will prove the great contest for seedling pelargoniums, and we hope to see as many as possible exhibited on the plants. (*Gard. Chron.*)

Great Crop of Grapes.—In the *Gardener's Magazine* we find the following notice of a grapery, with the product of fruit the present season. Length of house forty-five feet; breadth ten feet; height at back ten feet; at front three feet. Heated by one fire, over which

is a boiler, the water from which circulates in pipes at the back of the house, while the smoke flue passes along the front. The vines have been six years planted, are spurred in, and on each shoot only one bunch is left to be matured; these bunches commonly weigh one pound each. They are calculated to ripen the first week in July. The weight of grapes cut annually from this house is 3 to 3½ cwt. (or three hundred and thirty-six to three hundred and ninety-two pounds.) This, the conductor states, is very seldom equalled, and he is not aware that it has been often surpassed.

Compare this account with the crop produced by our correspondent, Mr. Johnson, whose diary of the culture of the grape we gave at p. 209. *Nine vines*, occupying less than thirty feet in length of a house of about the same dimensions, as regards breadth and height, as that given above, only four years planted, produced two hundred and thirty pounds! the bunches averaging nearly a pound and a quarter throughout. Certainly our amateur cultivators need not give up to the most successful of our transatlantic professional men.—*Ed.*

ART. III. Domestic Notices.

Fourteenth Annual Exhibition of the Massachusetts Horticultural Society.—The Committee of Arrangements for the coming annual exhibition in September have been chosen, as will be seen by our report in another page. This committee have appointed Wednesday, Thursday, and Friday, the 14th, 15th, and 16th of September, as the days for holding the exhibition. A collation will be provided for the members, to which ladies will be invited to attend. As the season is auspicious thus far, we anticipate a splendid display of flowers, and a rich treat of the finest fruits.—*Ed.*

Mr. Walker's Carnation Show.—We intended to have improved the opportunity, when Mr. Walker's carnations were in bloom, to have visited his garden and inspected the flowers; but we were prevented from doing so by other engagements. Several of the blooms which he has exhibited at the Massachusetts Horticultural Society's rooms have been very splendid, and show that the carnation and picotee can be grown in this country, if sufficient care is taken in procuring good sorts, and giving them due attention during their growth.—*Id.*

Fine seedling Pinks in Washington.—Our correspondent, Mr. Suter, of Washington, has succeeded in raising a great variety of carnations and picotees, some of which are said to be superb. Mr. Douglas, of that city, who has been on a visit here, informs us that he has seen none to equal them since he left Washington. Mr. Suter is a successful cultivator, and has raised several fine roses.—*Id.*

Cereus Napoleonis, in the collection of Mr. Cushing, Watertown, has lately expanded five or six of its large and superb blossoms, very much resembling *C. triangularis*, of which it appears to be a variety, and not specifically distinct. The plant is growing in the stove, and is trained to a trellis on the back wall.—*Id.*

Sun Dials for Garden Ornaments.—It will be recollected that some time since (Vol. VII., p. 403,) we noticed the cast iron sun dials made by Mr. S. Moore, of Connecticut. They were calculated for a northern latitude. In a late letter to us, Mr. Moore states that he is now making one for a southern latitude, 35°, which will answer for all places south of Mason and Dixon's line. We recommend these dials as neat ornaments to a garden, and quite as useful as ornamental.—*Id.*

ART. IV. *Retrospective Criticism.*

Glout Morceau pear, (p. 235.)—The answer to my remarks, relative to the origin of this pear, by Mr. Walker, the chairman of the committee, was duly noticed, but not in time to reply in your last number. The chairman states that the committee had no instructions to go behind the authority of the London Horticultural Society. He also says that the error rests with the printer or with him: there is no doubt of this; but as the error is committed, I believe, in every instance where the *Glout morceau* is named, it could not have been an error of the printer. But as the mistake is frankly acknowledged, that is of no consequence. The chairman then asks us to give the signification of the term *Glout* in connection with the word *morceau*.

Now it is well known that the French and Flemish pears, in many instances, have local names attached to them, for which it would be almost impossible to give a proper and correct signification. But as the cases are few where such names cannot be ascertained, it may perhaps be well to inquire whether the name *Glout* is one of these unfathomable ones, to which no English term will apply. Upon some little consideration it seems not. In the French dictionary is found the word *Glouton*, signifying greedy; *Glout* is undoubtedly an abbreviation of this, and, in connection with *Morceau*, (signifying mouthful,) seems a very proper name for this fine pear, which is indeed a *greedy mouthful*, when eaten in perfection.

Goul, the French term for taste, can in no way be applied to *morceau* with any meaning, and whether the explanation above be correct or not, it is better to follow after *all* the eminent French and English pomologists who have mentioned it, and call it the *Glout morceau*, rather than to coin a new name, which is equally as deficient of a sensible construction as the old one.—*Yours, A Fruit Grower, July, 1842.*

ART. V. Massachusetts Horticultural Society.

Saturday, July 2, 1842.—An adjourned meeting of the Society was held to-day—the President in the chair.

Mr. Teschemacher, the Corresponding Secretary, read a letter from Prof. Fischer, Director of the Imperial Botanic Garden at St. Petersburg, Russia. The letter was accompanied with pamphlets, which were laid before the Society. The thanks of the Society were voted to Prof. Fischer.

The Corresponding Secretary also laid before the Society a package of seeds, received from Dr. King, Curator of the National Institute, Washington. They were some of those collected by the Exploring Expedition, on the western coast of America. The thanks of the Society were voted to Dr. King for his acceptable present. The seeds were placed in the hands of the Chairman of the Flower Committee for distribution.

A committee, consisting of Messrs. Walker, French, and C. M. Hovey, was appointed to consider the expediency of holding an Annual Exhibition of Flowers and Fruits, in September next, and to report at the next meeting.

Mr. John Dean was admitted a subscription member.

Adjourned two weeks, to July 16.

Exhibited—Flowers: From the President of the Society a variety of beautiful roses, some of them extra fine; the following comprises a few of the best—Painted Damask, La Dominante, Gen. Lamarque, Brennus, Beauty of Billard, Duke of Devonshire, Miralba, La Importante, Glorie de France, Foulard, Village Maid, Warwick, red Moss, Blush Moss, Luxemburg Moss, Roi de Hybrids, Victor Hugo, Laura, Colbert, &c.; also fine specimens of *Cypripedium spectabile*, *Rhododéndron maximum*, *Spiræa sorbifolia*, *Gladiolus communis*, &c. From W. Kenrick, *Pæonia albiflora* *Whitlèji*, *Hùmèi* and *fràgrans*; *Harrisòni*, and other roses and bouquets.

From Hovey & Co., George IV., Ne Plus Ultra, Eliza, Blanche Superb, Painted Damask, and other roses and bouquets. From S. R. Johnson, superb specimens of Chinese and Noisette roses, particularly those of the Noisette Jaune Desprez, which were remarkably large; also a great variety of hardy roses. From Dr. J. C. Howard, bouquets, containing dahlias and other fine flowers. From A. Bowditch, roses, pinks and bouquets. From W. Meller, thirteen seedling geraniums, some of them very fine, equalling the newest English varieties; also very pretty bouquets of roses, and other delicate plants. From S. Walker, bouquets. From J. Hovey, bouquets.

From W. E. Carter, specimens of cut flowers, of the following sorts:—*Spiræa ulmifolia*, *sorbifolia* and *triloba*, *Verónica carnea* and *australis*, *Magnòlia glauca* two varieties, *Málva sinénsis*, *Astrantia major*, *Tròillus europæus*, *Cenothèra Frasèri*, double blue and white *Campánula persicafolia*, *Clématis viórna* and *viticèlla*, *Coreòpsis lanceolata*, carnations, clove and picotee pinks, roses, honey-suckles, pæonies, &c.

From F. R. Bigelow, dahlias and bouquets. From J. L. L. F. Warren, bouquets and other flowers.

Native Plants: A great variety from B. E. Cotting.

Fruits: From J. F. Allen, fine specimens of Zinfindal and Chasselas grapes, and a new variety from St. Michael; also very beautiful Royal George Clingstone peaches. From Dr. J. C. Howard, fine black Hamburg, Miller Burgundy and Chasselas grapes, and excellent specimens of cherries, called the Napoleon Bigarreau. From Capt. Robbins, South Boston, two boxes of very superior Methven scarlet strawberries. From J. A. Kenrick, black Tartarian and white Bigarreau cherries. From Geo. Walsh, Belle de Choisy cherries.

From O. Johnson, handsome specimens of Coolidge's Favorite peaches and black Tartarian cherries. From J. L. L. F. Warren, fine peaches and cherries. From A. H. Hovey, Early Virginia strawberries. From Win. Hawkes, Lynn, Methven scarlet strawberries. From S. Walker, Wood strawberries raised from seed, large and handsome. From F. R. Bigelow, fine Methven scarlet strawberries. From L. Ware, Boston, black Tartarian cherries.

Vegetables: From J. White, gardener to T. H. Perkins, Esq., cucumbers.

July 9th. Exhibited.—Flowers: From Hovey & Co., Bourbon, Tea and Bengal roses, of the following kinds: *Bourbon*—Henry Plantier, and Marshal Villars; *Tea*—Odoratissima, Golconda, and Countess of Albermarle; *Bengal*—Belle Anielie, Mrs. Bosanquet, Roi de Cramoise; and *Noisette* Nouvelle Republic; also seedling verbenas and Picotee pinks. From D. Haggerston, upwards of sixty dahlias, among which were fine blooms of Ne Plus Ultra, Egyptian King, Uxbridge Magnat. From J. White, gardener to T. H. Perkins, Esq., Beauty of the Plain, Euterpe, Rival Sussex and Unique dahlias. From F. R. Bigelow, dahlias. From Dr. Howard, dahlias and bouquets. From W. Meller, eighteen fine seedling geraniums and bouquets. From A. Bowditch, roses of several kinds, and bouquets.

From S. R. Johnson, superb specimens of Jaune Desprez, Tagliani, Amie Verbert, and other tender roses. From W. Kenrick, *Spiræa japonica*, and other kinds, white lilies, striped white lily, Ohio lilies, pæonies, roses, &c. From Messrs. Winships, specimens of *Spiræa ulmifolia*. From J. F. Trull, *Hoya carnosa*, and Marshal Sout, Mrs. Rushton, and Springfield Major dahlias. From S. Walker, handsome carnations and picotees, and bouquets.

From T. Warren, Esq., Portland, a fine bouquet of Moss roses: in a note accompanying them, Mr. Warren states he has fifty bushes, which produce from two hundred to three hundred flowers daily; the foliage was very healthy and clean, and the roses remarkably large. From J. L. L. F. Warren, dahlias and bouquets. From Misses Sumner, bouquets. From J. Hovey, bouquets.

Native Plants: From B. E. Cotting, several species of native plants.

From Dr. J. C. Howard, black Hamburg, Miller Burgundy, and Chasselas grapes; also cherries, called the Bigarreau of Heildersheim. From Dr. Z. B. Adams, cherries, supposed to be the Napoleon Bigarreau. From E. Vose, fine white Antwerp raspberries. From S. R. Johnson, gooseberries. From George Walsh, Great

Bigarreau of Savoy cherries, and large peaches. From A. Bowditch, fine specimens of Wood strawberries. From J. L. L. F. Warren, Sparhawk's Honeyheart, white Bigarreau, and Napoleon Bigarreau cherries; also handsome peaches, a musk-melon, and white Antwerp raspberries. From S. Pond, beautiful Downer and black Bigarreau of Savoy cherries. From F. R. Bigelow, Bigarreau cherries, and white thimbleberries. From J. White, handsome cucumbers.

Vegetables: From J. L. L. F. Warren, Chenango potatoes.

July 10th.—An adjourned meeting of the Society was held—the President in the chair.

Mr. Walker, from the committee appointed to consider the expediency of holding an annual exhibition in September, made a report that it was expedient for the Society to have its annual display of flowers and fruits, which report was accepted.

A committee was then chosen, consisting of Messrs. Haggerston Pond and French, to report a committee of arrangements for the Exhibition—and the following members were appointed that committee:—

Committee of General Arrangements.—Samuel Walker, Jonathan Winship, William Oliver, B. V. French, L. P. Grosvenor, M. P. Wilder, Josiah Stickney, J. L. Russell, R. T. Paine, C. M. Hovey, J. E. Teschemacher, Otis Johnson, David Haggerston, William H. Cowen, Robert Manning, Josiah Lovett, 2d, A. E. Story, Cheever Newhall, Joseph Breck, Alexander McLellan, William Kenrick, S. R. Johnson, Samuel Sweetser, P. B. Hovey, Jr., J. L. L. F. Warren, John A. Kenrick, William E. Carter, Samuel Pond, John Hovey, Azell Bowditch, E. M. Richards, John C. Howard, H. W. Dutton, Ebenezer Wight, Parker Barnes, J. F. Allen, J. Wentworth, Hugh M. Tuttle, F. W. Macondry.

Committee to decorate the Hall, and to take charge of the Fruits, Flowers, and Vegetables.—Samuel Walker, William Oliver, B. V. French, L. P. Grosvenor, M. P. Wilder, C. M. Hovey, Josiah Stickney, E. M. Richards, Samuel Pond, David Haggerston, S. R. Johnson, Azell Bowditch, A. E. Story.

Committee to make Reports on Fruits, Flowers, and Vegetables.—Samuel Walker, B. V. French, Samuel Pond, C. M. Hovey.

The committee above referred to also recommended to the Society the propriety of having an anniversary address, and a collation, to which the ladies should be invited. It was then voted that the same committee should be appointed to invite some gentleman to deliver an address.

It was also voted, that a select committee of five be appointed to carry into effect the arrangement for the collation, and the following gentlemen were chosen:—M. P. Wilder, S. Walker, B. V. French, C. M. Hovey, and D. Haggerston.

Mr. Paine, the former Corresponding Secretary, read a letter from Gov. Everett, the American Minister at the Court of St. James, acknowledging the receipt of a diploma constituting him an honorary member of the Society.

Adjourned three weeks, to the first Saturday in August, (the 6th.)

The exhibition of carnations and picotees, for prizes, took place to-day. The show was very good, though the number of competi-

tors was small. The principal stands were those of S. Walker, J. Breck & Co., W. E. Carter, and Hovey & Co., the latter, however, being mostly picotees and clove pinks. The premiums were awarded as follows:—

For the best display of Carnations and Picotees, the premium was awarded to S. Walker.

For the second best display, the premium was awarded to J. Breck & Co.

For the best seedling carnation or picotee, the premium was awarded for the latter to J. Breck & Co.

Messrs. D. Haggerston and S. R. Johnson, judges.

Exhibited.—Flowers: From the President of the Society, fine specimens of *Spiræa lobata* var. *americana*, seven feet high, *Delphinium Barlowii*, *Phlox Thompsonia* and *Cleopatra*, *Lychnis chalcédonica flore pleno*, and *Gladiolus floribundus*. From W. Kenrick, roses in variety, honeysuckles, *Hemerocallis cærulea*, a fine specimen of variegated monkshood, lilies, &c. From P. Barnes, *Gladiolus floribundus*, *Dahlia Constantia*, and a plant of the double oleander. From Messrs. Winships, *Spiræa ulmaria* var. *variegata*. From George Walsh, two plants of *Agapanthus umbellatus*.

From Hovey & Co., picotee and clove pinks, verbenas, *Lilium japonicum*, *Hoya carnosa*, and the following roses: *Teas*—*Gigantesque*, *odoratissima*, and *Belle Marguerette*; *Bengals*—*Mrs. Bosanquet*, *Agrippina*, *Roi de Cramoise*, *Triumphante*, *Reine de Lombardy*, and *Sanguinea*; *Bourbons*—*Hermosa*, and *Marshal de Villars*, with other varieties not named. From W. E. Carter, *Lilium japonicum*, *eximium*, and *canadensis rubra*, *Coreopsis Drummondii*; and a variety of carnation and picotee pinks, among which were Sharp's red Rover, Cornfield's Duke of Bedford, Hill's Standard picotee, Kirkland's *Cleopatra*, Wood's *Le Brillante*, Clarke's *London*, &c. From S. Walker, some fine carnations and picotees, among which were *Carnations*:—*Lancaster Lass*, *Flora McIvor*, *Pretender*, *Lady Goodhue*, and *Cleopatra*; *Picotees*:—*Venus*, *Red Rover*, *Isabella*, *Antoinette*, *Grandissima*, *Duke of Bedford*, &c.; also bouquets.

From Joseph Breck & Co., fine seedling picotee pinks. From A. Bowditch, *Bengal*, *Tea* and *Noisette* roses, *Yucca gloriosa*, and bouquets. From S. R. Johnson, fine specimens of the double scented pomegranate, carnations, picotees and tender roses. From D. Haggerston, upwards of sixty good blooms of dahlias. From W. Meller, small and large bouquets. Bouquets were also contributed by Dr. J. C. Howard, J. Hovey, Misses Sumner, J. L. L. F. Warren, and others.

Fruits: From O. Johnson, very fine specimens of black Hamburg grapes. From W. Oliver, very large and fine gooseberries. From S. R. Johnson, gooseberries. From J. Hovey, fine gooseberries. From S. Pond, handsome *Franconia* raspberries. From John G. Thurston, *Lancaster*, gooseberries. From S. & G. Hyde, Newton, Hyde's seedling cherries. From J. F. Allen, sweet Montnorenicy cherries, a seedling variety, very handsome and of excellent quality, being valuable from its lateness. From A. D. Weld, *Franconia* raspberries.

From Hovey & Co., very fine *Franconia* raspberries. From Dr. J. C. Howard, black Hamburg grapes, green Chisel pears, and white

and red Dutch currants. From George Walsh, white Antwerp raspberries, gooseberries, black Bigarreau of Savoy cherries, and peaches. From J. L. L. F. Warren, handsome peaches, red and white currants, seedling Franconia raspberries, late Bigarreau (?) and Warren's Transparent cherries, the latter a seedling, and very good for a late variety.

Vegetables: large Chenango potatoes, from A. D. Williams.

July 23d. Exhibited.—Flowers: From the President of the Society, a few good dahlias, viz: Rival Revenge, Uxbridge Magnet, Widnall's Eclipse, Argo, Fanny Keynes, Danecroft Rival, and Ne Plus Ultra. Carnations and picotees, and a number of beautiful Noisette and Bengal roses were shown from S. R. Johnson. From S. Walker, a collection of handsome picotee and carnation pinks and bouquets. From W. Kenrick, roses, pinks, and other flowers. Dahlias from F. Barnes, comprising Andrew Hofer, Ne Plus Ultra, Unique, Miss Johnson, Brees's Rosa, Pickwick, and Marshal Soult. A variety of bouquets, containing dahlias, from Dr. J. C. Howard. From A. Bowditch, Bengal and Tea roses and bouquets.

From Hovey & Co., a collection of roses, among which were some fine kinds; the names were as follows:—*Bourbon*—Ninon de L'Enclos; *Teas*—Odoratissima, Bougere, large and fine, Gigantique du Lima, large tinged rose, Princess Maria, beautiful rose, Victoire modeste, and Philadelphia; *Bengals*—Cramoise superieure, Roi de Cramoise, deep crimson cupped, Etna of Luxemburg, changeable rose, Eugene Perolle, pink, Triumphant; *Noisettes*—Conque de Venus cream and rose, Suter's pink, very beautiful, and the old pink; also *Lilium japonicum*, and several bouquets. O. Johnson exhibited a fine specimen of *Pentstemon gentianoides*. Dahlias, in variety, from J. F. Trull. *Yucca gloriosa* and dwarf horse-chestnut, from Messrs. Winships. Bouquets, from J. Hovey. From H. W. Dutton, dahlias, viz: Uxbridge Magnet, Mrs. Rushton, and Striata formosissima. Bouquets, from W. Meller and J. L. L. F. Warren.

Fruits: From the President of the Society, handsome red Astrachan apples. Some very beautiful grapes, large clusters and berries, and very deeply colored, were shown by O. Johnson; also fine Zinfindal grapes. Next to these were some superb clusters of the white Frontignac and white Sweetwater, from J. C. Lee. From J. F. Allen, sweet Montmorency cherries, and fine large black figs, the tree received from St. Michaels. From S. Pond, Franconia raspberries. From G. Walsh, cherries and pears. From A. Bowditch, gooseberries. From Dr. J. C. Howard, red and white Dutch currants. Mulberries, and red and white Dutch currants, the latter fine and large, from A. D. Williams.

From Hovey & Co., handsome Franconia raspberries. Fine seedling currants were shown from Capt. Lovett; also gooseberries. From J. Hovey, large gooseberries, red and white Dutch currants, black mulberries, and Early Harvest apples. From A. D. Weld, Franconia raspberries, and red and white currants. Black currants and gooseberries, from W. Kenrick. From J. L. L. F. Warren, seedling Franconia and red Antwerp raspberries, Transparent cherries, peaches, gooseberries and tomatoes.

Vegetables: From Dr. J. C. Howard, good sized Early white potatoes.

nights of early June. Potatoes never promised better: the main crop is now beyond the reach of drought. Fruit also looks well.

Vegetables.—New potatoes have come in abundantly within a few days, and though prices are variable, according to the stock daily brought in, our quotations may be considered as the average; old ones are nearly gone. Bunched beets and carrots come in now of large size. Radishes are now out of season. Cabbages now come in tolerably plentiful and of good size; drumheads have made their appearance, but are yet small; the supply is mostly of early sorts. Lettuce is plentiful. Rhubarb is supplied in small quantities, but the sale is quite limited now. Peas are scarce; good marrowfats are in better demand. Of beans there is a good stock of common string, and a few of the cranberry have come to hand; shelled have also been brought in in small lots. The warm weather has forwarded the growth of beans exceedingly. Squashes of winter kinds are about gone; but of the summer kinds there is a good supply.

Fruits.—New apples come in freely from New York, and of good size and quality; the best are readily taken at our quotations; the common sorts are cheap. Strawberries are all gone, except a few boxes of the Wood. Peaches have made their appearance from the south, but they are yet small; good forced ones yet command fair rates. Cherries are all gone, except a few mazzards. Gooseberries are ripe and good, and a fair supply of fruit has been brought in in small lots. Plums from the south have come to hand in fair order. Pears of the earlier sorts are plentiful. Raspberries are in demand, and there is not a full supply; our quotations will pay the grower well for this fruit. Whortleberries now come to hand, and are taken at prices. Currants are abundant, large and fine. Tomatoes have been received, and are selling at quotations. Forced grapes are not yet very freely brought in. Cranberries have fallen down to our present rates, and a small demand; very few, however, remain on hand. Oranges and lemons are scarce, and prices have advanced materially.—*M. T., Boston, July 26, 1842.*

HORTICULTURAL MEMORANDA

FOR AUGUST.

FRUIT DEPARTMENT.

Grape vines in the vinery will now begin to color their fruit: give little air early in the morning, and more as the day advances, and shut up early in the afternoon. Prune off all superfluous laterals and shoots. Syringing must be discontinued when the berries have all begun to color. Vines of inferior sorts can now be inarched with better kinds, if the plants of the latter are in pots.

Strawberry beds must have attention; keep the old ones free of

weeds, and encourage vigorous runners. Prepare to make new beds by the middle of the month. Select the strongest runners for this purpose, and choose a cloudy day to set them out.

Fruit trees of many kinds, such as the plum, cherry, and pear, should be budded this month. Select good thrifty stocks, and procure good buds to insert in them. Keep the insects off of trees by occasional syringings of whale oil soap.

FLOWER DEPARTMENT.

Dahlias must be attended to: if any plants are not yet staked, see that they are attended to. Prune off the superfluous lateral branches, and keep the main branches tied neatly to the stakes. Look out for insects.

Roses may now be propagated, both by cuttings and layers.

Geraniums not yet cut down should be attended to this month, and cuttings put in to form young plants.

Chrysanthemums should be repotted this month, and the plants occasionally watered with liquid manure: plunge the pots in the soil.

Ericas will require looking after: if any are suffering from dryness replot them. Keep them in a frame where they can be shaded part of the day, or on a north border, plunging the pots in sand or coal ashes.

Cactuses may be increased by cuttings now, and stocks may now be grafted.

Pinks and Carnations should yet be layered.

Oxalis Bowiei should be repotted this month, to flower in September.

Azaleas, in small pots, should now be shifted into larger ones, and cuttings may be put in.

White lilies should be taken up the latter part of the month.

Ten Week Stock seed may be sown this month for flowering during the winter.

Mignonette should be sown now to flower at Christmas.

Camellias should be kept well syringed: attend to the saving of seeds, which had better be sown as soon as ripe.

Primula sinensis.—Seedlings of this fine plant should now be repotted into the next size.

Hardy shrubs, of all sorts, should be layered this month.

Green-house plants, of all kinds, should be thoroughly looked over this month, that all may be in readiness to place in the house in September. Repot, prune, &c.

Verbenas should be layered into small pots the latter part of the month, if a stock is wanted for next season.

Calla athiopica should be repotted the latter part of the month.

Tree pæonies may be grafted now on the tubers of the common red.

Amaryllis Belladonna should now be potted for blooming in September.

Orange and Lemon trees should be budded this month.

Pansy seed should now be sown, if a fine bed is wanted for next season: cuttings of fine sorts may now be put in.

Hydrangeas may be propagated from cuttings now.

THE MAGAZINE
OF
HORTICULTURE.

SEPTEMBER, 1842.

ORIGINAL COMMUNICATIONS.

ART I. *The Canker Worm; its Habits, and Remarks on the best means of preventing its Ravages.* By J. S. G.

DEAR SIR—I send you a few remarks on that well known pest of orchards, in this vicinity, the canker worm. I need not begin by describing this insect; this has been done accurately and scientifically, by the late Professor Peck, some years since, and very lately by Dr. T. W. Harris. My object is merely to offer a few practical remarks on its ravages, and the best modes of diminishing them. Every body who has been visited by this troublesome guest, has learned that the female (a grub without wings) generally climbs the tree for the purpose of depositing her eggs at certain well known periods in spring or autumn. All may not be aware of the violence of this instinct to climb. I once placed several of these grubs under a tumbler, the edges of which inclined inwards. Those who were once fairly started on their way, ascended the smooth surface without difficulty; but so eager were they all to reach the top, that they actually clambered over each other's shoulders, and fell back together, and thus very few could gain their object. Every one knows that if their ascent on the tree is prevented, the tree is saved. But any expedient, which shall be an effectual remedy, must possess the three following requisites:—

First, it must not be injurious to the tree.

Secondly, it must be thorough, so that no insects, or very few, can evade or surmount it.

Thirdly, it must be economical.

The favorite mode of placing leaden gutters round the trunks of the trees, seems to me wanting, in a degree, all these requisites. The oil or tar placed in the gutters is liable to be

driven out both by winds and rains, and thrown on the bark of the trees to their great injury, at least unless better remedies can be devised than I have seen put in practice. The gutters also, as they are generally made, are quite too narrow, and if the insects are in great force, are quickly choked up or bridged over. They should be at least two inches wide in the clear, at the top, which would much increase the expense. Besides, they must be fitted to the trunk of the tree with great accuracy, or they will leave a sort of *lubber's hole* through which the insects, who are no seamen, will not fail to crawl. Now to adjust them with such accuracy is a great labor, not to say that it is scarcely possible. But if these difficulties are all overcome, the expedient becomes more liable to the third objection, that of expense. As it is, I believe it is generally considered quite too costly to be applied to orchards containing hundreds of trees, however valuable it may be made for the protection of a few highly prized individuals.

The remedy most commonly adopted on a large scale is, to place a strip of canvass round the trunk of the tree, and cover it with a coat of tar. This is, perhaps, the cheapest expedient of any, but is certainly dangerous to the tree, as the tar is sure to drip down on the bark below. Besides, it is far from a thorough remedy: for a few hours of drying wind will completely harden the surface of the tar, or five minutes of drizzling rain will chill it, and in either case the grub will walk over it with perfect ease.

I do not know that I can name any expedient possessing the requisites laid down in the beginning. The best which I have seen is that described by Kollar in his book *On Insects*, and called by him a wooden boot. This is nothing but a box with four sides, but neither top nor bottom, made of a size to go round the tree in the same way in which a circle is circumscribed by a square. A coving projects all round, on the outside, like the eaves of a house, and this coving may be two inches or more in breadth. A good workman can make about sixteen of these boots per day. The quantity of stock, which need not be of the best lumber, will vary with the size of the tree. The height, however, need not be more than a foot. I am confident that a tree, of a foot in diameter, could be provided with a box for twenty cents; and such boxes could be made to last as many years, by tacking one side loosely, so

that they can be removed during the greater part of the year, and replaced at the dangerous seasons.

The tar is applied in the angle under the coving, and when the wood is once saturated, a very little need be applied at once. The advantages of this mode over the preceding, are, first, the tar is more protected from the action of wind and rain, and therefore is much less liable to be hardened; secondly, when renewed, it can be put on freely and rapidly, without the slightest injury to the tree.

I have said that the tar will not dry soon; but I still think it worth while to tar daily, during the dangerous seasons, where the worms attack in great force. If this be done, I am confident no orchard, thus guarded, can be seriously injured. It is true that there will be a little space between the box and tree at the corners, and if the tree is a growing one, it may be best to leave a little room all round. But these openings will be taken advantage of only by those insects who happen to rise from the earth, close to the body of the tree, under the vacant space, and these have been ascertained by Kollar to be very few. The grubs have no talent at undermining; their instinct to mount is not discriminating, and they seem to have no other mode of dealing with obstacles than to climb over them.

Still I may be asked, whether the few that go up will not do nearly as much harm as might have been done by the main body, who are caught in the tar. I answer, if this were so, then it would follow that all trees, which are attacked at all, would be equally injured. Now if any one will visit the orchards in our vicinity, he will find apple trees in every state of injury, from those which have only a few leaves injured to those which have not a leaf to show.

If any, however, are indisposed to try this expedient, there is another much cheaper, but less effectual, as it answers only in dry weather, but may then be of great use as a practical remedy. Let dry sand be heaped round the foot of the tree, at as sharp a pitch as it will lie. The grubs will strive to crawl up these heaps, but will fall down time after time, and may be found in one place, viz., within an inch or two of the base. As we know exactly where to look for them, we can gather them up as rapidly as we could pick strawberries. The idea of catching these insects by hand, may remind some of your readers of the fable of the traveller who alighted from his horse to kill the grasshoppers. I shall only state in reply one

or two facts. In November, 1840, I made a practice, during several successive mornings, of examining the heaps of sand at the foot of some apple and lime trees in my garden. On the morning of November 7th I collected thirty-two in three minutes, twenty of which were at the bottom of one tree. Professor Peck estimates that each grub produces one hundred eggs; and if we suppose nine tenths of these eggs to fail, I nevertheless prevented the ravages of three hundred canker worms by the labor of three minutes. Yet, in my garden, the worms have never been so numerous as in those of many of my neighbors, as is shown by the fact that, out of many trees, not one has ever been completely stripped, or so injured that it would be remarked at the distance of ten rods.

These grubs I found on the lower part of the sand, as the day and night before were dry. When rain fell, the sand became damp; but if the trunk of the tree is examined a few days after, the insects are generally found below the crotch. November 11th, 1840, after a rainy day and night, two men examined my apple trees for two hours, and collected a large quantity of grubs mostly below the crotch. This quantity I cannot state precisely, but the men were fully satisfied that it was nearly one thousand, which would be only at the rate of four or five in one minute to each man.

I am, therefore, satisfied that this plan of protecting the trees by sand heaps, and picking up the insects, is worth pursuing, it being understood that I recommend it as a palliative, and not as a complete remedy.

Boston, Aug., 1842.

ART. II. *Remarks on the cultivation of the Currant.*
By the EDITOR.

VERY few of our garden fruits are so much neglected as the currant. Its cultivation seems to be a matter of no consideration, and when the bushes are once planted, they are left to take their chance, and little attention is bestowed upon them afterwards. Pruning is entirely forgotten, and the

plants often become a prey to insects, which soon destroy them. A fruit so generally admired for its good qualities and its many excellent uses, and so universally cultivated that scarcely a garden exists in which it may not be found, should not be so entirely neglected; for, like all other fruits and plants, it is susceptible of improvement, and, had the same attention been given to it that has been lavished upon the gooseberry, we doubt not but that new varieties, far excelling any we now possess, would have been found in our gardens, as common as the new and improved sorts of that fruit.

In France the currant has long attracted attention, and, until lately, has been much more highly esteemed than the gooseberry. But the French horticulturists did not attempt any improvement in the varieties. The Dutch cultivators were the first who seem to have paid particular attention to it; they succeeded in giving a greater value to this fruit by the production of seedlings, and it is from this source that the very best varieties at present known have been spread over Europe and America.

The late Thomas Andrew Knight, Esq., President of the London Horticultural Society, called the attention of cultivators to the currant, and he attempted the production of new varieties from seed: a paper on the subject was read by him before the London Horticultural Society, and subsequently published in their *Transactions*. Three of Mr. Knight's seedlings are at the present time found in the English catalogues. Mr. Knight, in a letter written but a short period before his death, lamented that the improvers of the gooseberry did not, in preference, select the red currant. Reasoning from his extensive experience in the cultivation of fruits, he believed that fruits which, in their unimproved state, are acid, first become sweet and then insipid by improved cultivation, and through successive varieties. To this he attributes the excellence of the gooseberry, which he believed had been shown in nearly its greatest perfection in the climate of England. The currant, he thought, might eventually become a very sweet fruit.

It is well known that the accidental circumstances of soil, situation, &c. in which the currant has been grown, have been the means of so altering the appearance and character of the fruit, that new names have been given to such as have been found in a superior state of growth, and some of the sorts are known under at least half a dozen synonymous terms. We

have known individuals who have cultivated the currant many years, who, upon seeing those of superior growth, have inquired the name of the variety, under the impression that they might add a larger and better sort to their garden: yet how surprised have they been to learn that it was one and the same kind of which they had abundance already, only in an inferior and neglected state of growth. It is indeed a rare circumstance to find plants in any thing like the vigor they can be made to attain by proper cultivation, the application of manure, and above all, the proper mode of pruning.

Within a few years some attempts have been made to produce new seedlings, and we find in the English journals of last year two or three new varieties offered for sale. Among our own cultivators, very few have thought of bestowing so much care on this fruit; yet there are instances where it has been done, and with good success. Captain Lovett, of Beverly, presented some very beautiful fruit at a late meeting of the Massachusetts Horticultural Society, which would not suffer in comparison with the celebrated Red Dutch: the clusters of fruit were large, and the berries of great size and fine color; continued experiments, however, are requisite to arrive at important results, and effect decided improvements: by continually selecting the largest fruit, and producing successive generations, in a few years the whole character of the fruit would undoubtedly be much changed. If the gooseberry, from a small, sour, and almost uneatable fruit, has been increased to three times its original size, its flavor and sweetness improved, why may not the currant, by the same attention, be equally benefited, and rendered more worthy of extensive cultivation? We hope our amateur horticulturists, among whom are many who delight in the production of improved fruits, will not omit to give the currant a portion of their attention.

But it is to the cultivation of the well known and excellent varieties of the currant which we already possess, that we wish to call the attention of cultivators. If their mode of treatment be properly understood, it may be applied to any improved varieties, which may hereafter take the place of those that are now known. To give this in full, we shall commence with the Production of Seedlings, and add all the other particulars of their growth under the following heads:—Situation, Soil, Raising Young Plants, Planting Out, Pruning, (both summer and win-

ter,) Insects, and General Observations, concluding with Descriptions of the Different Varieties.

Raising the Currant from Seed.—To grow seedlings, it is important that the largest and best fruit should be selected. To do this, a strong and healthy plant should be selected, and if too full of fruit to prevent its attaining a good size, it should be thinned out, leaving only sufficient for the plant to bring to the utmost perfection; as soon as the fruit is ripe, it should be picked, and the seeds washed out from the pulp: this may be easily done by bruising the seeds in water, and passing the whole through a sieve, and afterwards spreading it out in a cool, shady, situation to dry, after which it may be placed in papers until the time of planting in the month of April. At that season a small piece of ground should be selected for the purpose, and be made fine by deep spading and raking the surface; the seed may then be planted in drills about a foot apart, scattering it thinly that the plants may not come up so crowded as to require thinning out to any extent. No other care is requisite than to keep the bed clear of weeds: they will produce fruit in the second or third year, when such as are worth preserving should be marked, and the remainder rooted up and thrown away.

Situation.—The currant is perfectly hardy, and will grow in any situation, whether exposed or not; but it produces the largest and best fruit in a sheltered garden, not exposed to high winds. In warm and sunny borders, the fruit is ripe earlier, and is sooner gone, than when growing in partially shady situations: against a north wall, the fruit will hang on the bushes until the middle or latter part of September. Even within the shade of trees we have had very fine fruit; but we would not select such a spot to raise the best. Besides a few bushes set out for the express purpose of having fine fruit, the currant may be distributed in any part of the garden where a bush will fill up a vacant spot; they may also be trained against fences, in which situations they bear good crops.

Soil.—The currant will grow in almost any good garden soil; but that in which they produce their fruit in the greatest perfection is a deep, rich, mellow loam, somewhat moist; very stiff clayey soils are the least adapted to this fruit. In sandy soils the fruit is earlier, but the crop is small, and soon gone. When it is the object to produce very superior fruit, the soil should be staked out, and then covered with three or four

inches of good old decomposed manure. It should then be trenched eighteen or twenty inches deep, placing the top spit and the manure at the bottom of the trench. When the bed is settled, a little manure may be dug into the surface, and it will then be ready for planting.

Raising Young Plants.—Cultivators who wish to make large plantations, and are desirous of raising their own plants, can easily do so. The cuttings should be planted out in April, just as the buds begin to push, selecting a shady border, and planting them five or six inches apart; the cuttings should be about a foot long, of the preceding year's wood, healthy and vigorous, and cut off directly below a joint. If the bushes are to be grown in the manner of small trees, with one main stem, all the eyes should be cut out but the two top ones. Planted out in this manner, they make pretty plants, which may be removed to the fruiting beds the following year.

Planting Out.—The period for planting out is any time after the fall of the leaf in autumn until severe frost, and early in spring before the buds have pushed so far as to show their flower buds. In dry situations, October is probably as favorable a season as can be selected, as the plants start into leaf very early in the spring, often before the cultivator thinks it time to plant out, and a season is lost; but if the ground is inclined to be wet in winter, the early part of April is the best season. The modes of planting are various, some preferring to place them on the borders of walks, and others in beds by themselves; we think the best plan is, when many plants are wanted, to set apart a small piece of ground for their exclusive growth; but whatever situation is chosen, prepare the soil as above directed. The proper distance at which plants should be planted, is six feet apart between the rows, and four feet from plant to plant: less distances than these will do, but the chances of procuring large fruit will be less. To plant neatly, a line should be stretched across the bed: at the proper distances put down a small stake, then commence taking out the earth: now place in the plant, setting it against the line; spread out the roots carefully, and cover them with fine earth, making it firm around the roots, and treading it lightly when finished; give each plant a pot of water, if dry weather at the time of planting. Keep the surface of the soil loose, and clear from weeds, by occasional hoeings during the summer.

Pruning.—Next to a good rich soil, pruning is the most important thing to be attended to; neglect in this respect will be sure to cause disappointment to the cultivator who expects large and fine fruit. The branches will shoot up thick and weakly, and, if not attended to, and the superfluous ones cut out, the bush will be so crowded as to produce only a quantity of half formed clusters, with a few small berries.

It is known to many cultivators, though perhaps not to all, that the currant bears its fruit both upon the young wood of last year's growth, upon that of the second and third year, and also upon the little spurs which spring from the older shoots; but it is only upon the young and vigorous wood of the preceding year that fruit of superior size and beauty is obtained. Knowing this fact, the cultivator may proceed with his pruning, which may be done at two seasons, both winter and summer, viz.:—

Winter Pruning.—The first object should be, after the plant is set out, to see that it is pruned so as to form a handsome head; and, first, we may premise that it is the intention to prune them in the best method, that is, with single stems, like trees in miniature, from which the branches fork out at the distance of a foot or more from the ground: this will prevent the continual growth of suckers, which not only injure the fruit, springing up as they do the whole season, but destroy the beauty and regularity of a whole plantation. Winter pruning may be performed late in the autumn, or early in the spring: as the currant has extremely brittle shoots, some think it is best to prune in the fall, and by thus shortening the branches, to lessen the danger of the heavy snows breaking them down. Commence by cutting clean out all the cross shoots, leaving only those which spring up regularly. The strongest branches of the old wood should be shortened to six or eight inches, and the weaker ones to very short spurs; the new wood made during the summer should be also shortened to four or five buds or joints. The principle ever to be kept in mind is, to have the head of the bush supplied in all parts with a good proportion of new wood every season; and this can only be done by cutting away the older branches after they have borne one or two crops, and encouraging the growth of young shoots from their base; at no time should the head of the bush be allowed to extend more than three feet in diameter, and three feet high.

Summer Pruning.—This consists only in looking over the plants, after the fruit is well formed, and nipping off new shoots which are growing up where they are not wanted another year: by so doing, an abundance of air will be admitted to the centre of the bush, without which the fruit would be inferior. Some cultivators recommend shortening the bearing branches to within a few eyes of the fruit, as soon as it turns color, but of the advantage to be derived from this practice we have some doubt. If any suckers spring from the root, they should be cut off clean to the stem.

Insects.—The currant has but few enemies in the insect tribe; the most injurious is the borer, (*Ægeria tipuliformis*,) which eats its way up the centre of the stems, causing great debility, and eventually nearly destroying the plants, or at least incapacitating them from producing any thing but very small and poor fruit: the bushes are also in danger of being broken by light winds or with heavy crops of fruit. The best preventive for this insect is to keep the plants in a vigorous state, and well supplied with strong young wood, as it is only in the older branches that the borer commences its ravages. When they once take possession of the bushes, cut out all the old shoots, especially such as are in any way decayed, and encourage only strong new wood: the *aphides*, or plant lice, occasionally infest the leaves, but these may be easily destroyed by one or two washings of whale oil soap.

General Observations.—The French cultivators recommend the forming of new plantations every five years, and maintain that, unless this is attended to, the fruit will be small. We have no doubt that the fruit would be somewhat improved by such new plantations, but still, if the old bushes are judiciously pruned, the soil kept well manured and tilled, there will be little necessity of planting out so often.

The fruit generally begins to ripen about the middle of July, and continues in perfection until the middle of August, and in some shady situations as late as October. If the bushes are exposed to birds, they may be protected by covering them with nets or with gauze.

We close this article with descriptions of the most esteemed varieties that are at present cultivated, following the arrangement in the London Horticultural Society's *Catalogue*. The Red Dutch, White Dutch, and Black Naples may be recommended for small gardens, where there is but little space.

DESCRIPTIONS OF THE DIFFERENT VARIETIES.

§ I. RED CURRANT.

1. *Common Red*.—Fruit medium size, clusters rather small, good flavored, and tolerable bearer.
2. *Red Dutch*.—*Synonymes*: Large Red Dutch, New Red Dutch, Large Red, Large-branched Red, Long-branched Red, Morgan's Red, and Red Grape.—Clusters long, berries large, growth of the plant strong and upright; exceedingly productive, and one of the very best sorts.
3. *Knight's Sweet Red*.—Said to be a very fine kind.
4. *Knight's Early Red*.—Rather early; clusters and berries medium size; color deep red; flavor rich and good. We fruited this variety the present year.
5. *Knight's large late red*.—With very large berries, of a deep red color; a superior kind.
6. *Champagne*.—Berries of a very pale red; clusters medium size; this fruit is rather acid, but makes a very good variety for the table, from its delicate color and the transparent appearance of the berries.

§ II. WHITE CURRANT.

7. *Common White*.—The old kind of our gardens; clusters and berries medium size.
8. *White Dutch*.—*Synonymes*: New White Dutch, Jeeves's White, Morgan's White, White Chrystal; White Leghorn; Pearl White.—This is the finest of the white currants: the clusters are very long, and the berries very large. The wood grows upright and strong; exceedingly productive and fine.

§ III. BLACK CURRANT.

9. *Black Naples*.—Also called the New Black: the fruit is very large, often two inches in circumference; clusters large, and abundantly produced; flavor good. This is the best of the black fruited ones. Leaves smooth.
10. *Common Black English*.—This is a very good variety, with large berries; it makes a fine jelly, which is highly esteemed for its medicinal qualities.
11. *American Black*.—Similar to the last, but is not quite so productive.

Besides these we have seen two kinds offered for sale, which are represented to be very fine: one is called the Victoria, and the other the new Cherry currant.

ART. III. *Some account of the Magnolia macrophylla, its discovery in a new locality, together with a notice of the Nursery of N. W. Hatch, Vicksburg, Miss.* By ALEXANDER GORDON.

DEAR SIR:—Well aware that every circumstance connected with horticulture or botany, which has a tendency to advance their interest, will readily find a place in your very useful and interesting periodical, I hasten to acquaint you that the only known locality of the justly admired *Magnolia macrophylla* is no longer confined to Lincoln county, N. C.; for within these few days past, I have seen it in this State, where I have every reason to think it prevails to a considerable extent, having seen it at two different places, nearly seventy miles apart.

I never had, until this time, seen this magnificent ornament of the American forest displaying its gigantic foliage in its native wilds, and I am free to confess it aroused feelings of admiration more easily conceived than described. Mr. Downing, in his very excellent work on *Landscape Gardening and Rural Architecture*, has given a most accurate description of this species, as I found it, with the exception of the size of the leaves, which in width is more than double the size Mr. Downing has allowed it; but I must confess this was only the case on the shoots of young very healthy plants.

Having frequently heard several nurserymen at the north express great anxiety to possess seeds or young plants of the *M. macrophylla*, it must be gratifying to them to know that they can most readily obtain either, as N. W. Hatch, Esq., Vicksburg, in this State, informs me he will collect both seeds and young plants this fall, to supply such orders as he may receive; so the fault must now rest with the northern nurserymen, if this splendid species does not soon become freely and widely disseminated. But I must not conclude without giving a passing notice in respect to Mr. Hatch's nursery.

Mr. Hatch has, for some years, been engaged in the nursery business, in the immediate vicinity of Vicksburg. The collection of choice exotics embraces many of the most desirable plants in cultivation. The *Geraniaceæ* is very select. The rosarium enumerates about one hundred and fifty varieties

of the very choicest which could be obtained. Camelliæ and Cactæ, of each all the most esteemed varieties. In this most favorable climate, the roses, camellias, erythrinæ, salpiglossides, verbenas (to admiration,) and a great variety of other plants, make the most astonishing growths, but geraniums, fuchsias, and several other genera, suffer to some extent, if not partially protected from the intense heat of the southern sun. *Vinca alba* and *V. rosea* are becoming weeds in the grounds. Mr. Hatch is now erecting a large range of green-houses, and a short period will only elapse when his establishment will not suffer in a comparison with the nurseries of the north. I understand neither expense nor exertion is spared—every desirable article is obtained as early as possible—and all this in a section of the country, where, twenty or thirty years ago, the untutored Indian roamed free and unmolested.

In conclusion, I shall simply state that, as respects forest trees and shrubs, for variety Mississippi is peculiarly rich, but very deficient in herbaceous plants, as far as my observations have, as yet, extended.

Yours, very respectfully,

ALEXANDER GORDON.

Vicksburg, August, 1842.

ART. IV. *Floricultural and Botanical Notices of new Plants figured in foreign periodicals; with Remarks on those recently introduced to, or originated in, American gardens; and additional information upon plants already in cultivation.*

Edwards's Botanical Register, or Ornamental Flower Garden and Shrubbery. Each number containing from six to eight plates, with additional miscellaneous information, relative to new Plants. In monthly numbers; 3s. plain, 3s. 6d. colored.

Paxton's Magazine of Botany, and Register of Flowering Plants. Each number containing four colored plates. Monthly. 2s. 6d. each. Edited by J. Paxton, gardener to the Duke of Devonshire.

The Gardener's Chronicle, a stamped newspaper of Rural Economy and General News. Edited by Prof. Lindley. Weekly. Price 6d. each.

Floricultural and Botanical Intelligence. *Agave Americana*.—Since our notice of the plant now about to bloom in the collection of Gen. Van Rensselaer, of Albany, we have learned that another plant has commenced flowering in the collection of Bernard Duke, of Philadelphia. It has already expanded many blossoms, and is said to be a striking object, well worth seeing by all who feel an interest in these singular productions of nature, flowering only once in the space of twenty or thirty years.

The fine agave in the collection of Mr. Perry, of Brooklyn, New York, was lately sold, with the other plants. It was purchased by Mr. Niblo, who will make an attempt to remove it, the present month, to his premises in Broadway: change of place may possibly bring it into flower, as it is already a large and vigorous plant. If he should succeed in doing so, it will be a valuable plant to him, as its flowering would undoubtedly attract thousands of visitors.

Rosa devoniensis.—This fine new rose has lately flowered in the collection of Messrs. Hovey & Co. It is a superb variety; the color pale yellow, with a deep reddish buff centre, the flower very double, and finely cupped; the foliage is handsome, and its habit of growth neat. In England, this variety has a high reputation, and is considered the finest yellow variety that has been raised.

New variety of the Cereus.—In our last, we mentioned the production of a new hybrid variety of the *Cereus*, by Mr. Wm. Chalmers, Jr., gardener to George Pepper, Esq., of Philadelphia. We then stated that it was raised between the *Cereus speciosissimus* and *Epiphyllum Ackermánii*, the communication of our correspondent having been mislaid. Since then, he has informed us that it was raised between the *C. speciosissimus* and the *C. Jenkinsónii*, and is "one of the finest of the whole family of hybrids."—*Yours, An Amateur.*

Mandevillea suavèolens.—A plant of this beautiful new runner is finely in flower in the collection of plants in the Public Garden. It has clusters of large, white, trumpet-shaped flowers, nearly the size of a convolvulus, and very sweet scented. It blooms freely, we believe, and is readily

increased by cuttings. It belongs to the *Jasminiaceæ*, and has been previously noticed by us, (Vol. VI., p. 299.)

Philadelphiceæ.

PHILADELPHUS

mexicanus *Schlecht.* Mexican Syringa. A half hardy shrub; growing three feet high; with white flowers; appearing in June; a native of Mexico; increased by cuttings. *Bot. Reg.*, 1842, t. 38.

A new and pretty species of this highly ornamental genus, with large white, pendulous, flowers. It forms a small bush, with pubescent pendulous branches, and ovate, acute, denticulate, and triple nerved leaves; the flowers solitary and terminal. It was introduced from Mexico by M. Hartweg, who found it near the city of Mexico, where it grows wild in the hedges: it is cultivated at Jalapa. It is very sweet scented, and from its flowers a delightful essence is said to be distilled. This species is the smallest yet known in cultivation. It is sub-evergreen, rather tender, and occasionally killed by the winter. It flowers freely at the end of June, and is readily increased by cuttings. It has the merit of being well adapted for forcing. (*Bot. Reg.*, July.)

Stylidiaceæ.

STYLIDIUM

pilosum *Labill.* Hairy Stylewort. A green-house perennial; growing a foot or more high; with white flowers; appearing in summer; a native of Swan River. *Bot. Reg.*, 1842, t. 41.

A pretty plant, with ensiform lanceolate leaves, throwing up a glandular pubescent scape, terminated with a branched panicle or cluster of white flowers. This species was raised from Swan River seeds, and the largest of any yet introduced, and when in a vigorous state forms rather a handsome appearance. The natural situation of such plants is said to be sandy plains, dry on the surface, but wet and springy underneath. This plant is grown as a green-house perennial, requiring a soil composed of sandy peat, mixed with a small portion of loam. It should be abundantly watered in summer, and be kept rather dry and cool in winter. It is readily increased by seeds. (*Bot. Reg.*, July.)

Gesneriaceæ.

GESNERA

longifolia *Lindl.* Long leaved Gesnera. A hot-house plant; growing two feet high; with red flowers; appearing in summer; a native of Guatamala; increased by cuttings. *Bot. Reg.*, 1842, t. 40.

A fine showy species, with leaves which grow in stems, and are sometimes eight or nine inches long, of a lanceolate

form, thick, petiolate, serrated towards the upper end. The flowers are brick red, about an inch long, and are produced in "long, close, cylindrical, terminal, whorled racemes, three or four growing together from the axils of short floral leaves." Its cultivation is the same as that of the gloxinias. It is increased by cuttings of the young shoots, which should be taken off and put into pots filled with sand, watered, and covered with a bell glass. The pots should then be placed on a warm flue, if in winter, or in summer on a warm shelf, and shaded from the sun by a piece of paper over the glass. As soon as rooted, they should be potted off into small pots, in a mixture of sandy peat and leaf mould. (*Bot. Reg.*, July.)

Iridaceæ.

HYDROTÆNIA. (from *water* and *band*, in allusion to a bar of shining water-like tissue on the petals.) *Lindl.*
melegris Lindl. Spotted Water-band. A green-house bulb; growing a foot high; with purplish flowers; appearing in summer. *Bot. Reg.*, 1842, t. 39.

A curious plant, with flowers which have somewhat the appearance of a fritillaria, though closely allied to the genus *Sisyrinchium*. The flowers are not very showy, but when examined, exhibit beauties of no common kind. "The curious watery band, which glitters as if covered with dew, or as if constructed of broken crystal, is one of the most curious objects. The stigmata, too, are extremely remarkable; each divides into two arms, which are rolled up as if forming a gutter, with a dense mass of bright papillæ at the end, and a single tooth in the inner edge." The habit of the plant is slender, throwing up stems a foot high, terminated with pendulous flowers. Its cultivation is simple, requiring to be kept dry, and out of danger of frost in winter; to be repotted in the spring, in loam, leaf mould, and sand, in equal parts, and freely watered when growing. Increased by offsets. (*Bot. Reg.*, July.)

Garden Memoranda. Salem, August 16, 1842.—During a short visit to this city, we visited several gardens, and noted down the following memoranda.

Flower Garden of Mr. F. Putnam.—The chief objects of interest in this garden, have been the cacti, of which Mr. Putnam possesses a good collection of fine plants, among which are six or eight plants of the splendid *Cereus grandiflorus*, in pots, which have expanded many flowers, no less

than thirteen having opened during one night. *Echinocactus Eyrièsi* has flowered once, and is again showing several buds. Mr. Putnam grows his plants successfully, and they have a very healthy appearance. He keeps them out doors, in an open situation, in summer, and waters freely in dry weather, using, at the same time, a good rich loamy soil. The collection of tender roses embraces some fine kinds. The cyclamen is cultivated in considerable numbers by Mr. Putnam, and he raises seedlings every year. This beautiful plant is sadly neglected: it is easy of cultivation, is a fine parlor plant, and should be found in every choice collection. The camellias and other plants were looking well, the former set with an abundance of flower buds. The dahlias were set out late, and had just begun to bloom.

Garden of J. S. Cabot, Esq.—We were unfortunate in not finding Mr. Cabot at home. His collection is celebrated for its great number of hardy herbaceous plants, which he has spared no pains to collect; but at this season of the year, we did not find only a limited number in bloom; of these, the phloxes were the principal objects. The garden is kept in the neatest order throughout.

The tulip bed was undergoing a change of soil; the old compost had been thrown out, and some old decomposed manure had been added. The collection made a fine show last spring, well worth visiting; the coming season, it will be, probably more beautiful than the last. The bed is upwards of one hundred feet long, and holds two thousand or more bulbs.

Mr. Cabot has a bed of our seedling strawberry, which produced a fine crop of fruit the past season.

Garden of J. F. Allen, Esq.—Mr. Allen's garden is mostly devoted to the cultivation of fruit, and we found a fine crop of peaches and grapes, the former in great perfection. Mr. Allen has three houses devoted to the growth of them, and succeeds in producing good crops of well flavored fruit. The grapes in the vinery had been cut, as also the peaches; but those in the cold house, with a span roof, were just beginning to color. The vines have only been planted four years, and they are now producing several clusters to each vine. The peaches, in the other house, were ripening off finely, and were highly colored: the kinds are the Gros Mignonne and the Royal George. Mr. Allen gives great

attention, and devotes all his leisure time, to the cultivation of this fruit.

Pomological Garden of Mr. Manning.—We were much gratified with a visit to this fine collection of fruit. We regret to state that Mr. Manning's health is exceedingly feeble; so much so that he is confined to the house, except in very pleasant weather. This must be a great privation to one so fond of gardening pursuits, and usually spending a larger portion of his time in his garden.

The crop of pears is abundant, and the variety of kinds in bearing much larger than heretofore; it was impossible for us to take down the names of all the new sorts, as the trees are so scattered that it would have occupied too much time, Mr. Manning not being able to accompany us. All that have not fruited in former years he will give us an account of, which will appear in the early part of our next volume. The whole of Mr. Manning's nursery is in very good order.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Foreign Notices.*

ENGLAND.

Exhibition of the London Horticultural Society for June, 1842.—In our last we gave an account of the May exhibition of this society. As splendid as it must have been, yet it was greatly eclipsed by the June show. The weather had been warm and oppressive in the extreme, and the roads from London to Turnham Green were filled with clouds of dust, notwithstanding they had been watered. The line of vehicles was five miles long, and the carriages in waiting choked the road from Hammersmith Broadway to Kew bridge, Cheswick, and stood on the Green. "Never before," says the *Gardener's Chronicle*, "did the good people of Turnham Green behold such a scene as was presented last Saturday to their astonished eyes. As early as four o'clock in the morning, the notes of preparation for the Horticultural Society's exhibition were sounded by the carpenters employed in erecting awnings, and completing the arrangements at the gates. Then succeeded great numbers of carts, waggon, vans, and other vehicles, bringing multitudes of the finest flowers in the world to the show: but by half past eight in the morning all had ceased, and it was only the early risers who knew that the

gardens were already filled with the beautiful objects that were afterwards to attract, within their sphere, an eager and mighty crowd.

“As the day drew on, however, water carts were seen plying at an unusually early hour; mounted and foot police began to gather; carriage after carriage slowly dropped into line; caravans of soldiers, with their musical instruments, passed within the garden gates; and by one o’clock there was a crowd. From that hour, until seven in the evening, the arrival of visitors was incessant. The three gates of admission were choked up; the greens, the lanes, the roads, and every field that had an authorized inlet, became crammed with horses and all sorts of carriages; and at last 13,582 visitors passed into the gardens, beneath a sun whose rays struck 100° upon even the least crowded spaces within the walls, and must, when there was much reflection, have beaten even more fiercely than that. By nine o’clock in the evening the whole had disappeared like a vision: flowers, visitors, carriages, horses, and servants innumerable, were gone; and it might have been doubted whether any thing unusual had occurred, if witness to the scene had not been borne by the publicans’ cellars, which were as dry as the high road: for as to ale, porter, ginger beer, soda water, or such other drinkables as coachmen and their friends delight in, it became useless to ask for them, and some persons doubted whether the pumps would continue to do their duty.”

As regards the exhibition, it is said the *Orchidaceæ* alone would have rewarded the visitor for the dust and fatigue and annoyance inseparable from the crowd in the hottest of hot weather. The number of exhibitors was large, and a hundred and twenty medals were awarded.

The heaths at the exhibition were the “cynosure of all eyes,” and from the account, must have been truly splendid. Next to these the cacti were the most admired group. The rose, too, though rather early for a full bloom, contributed not a little to the display; and last came the pelargonium, whose superb flowers found thousands of admirers in the new and greatly improved varieties which have been recently produced—the whole forming a display such as could nowhere else have been seen, and affording full evidence of the high state of excellence to which our transatlantic friends have attained in the art of gardening.

“Notwithstanding the oppressive heat of the atmosphere, and the continued drought which had been experienced for some time previously, robbing the lawns alike of their verdant tint and their luxurious coolness, there was an immense concourse of spectators to this, the most fashionable of the summer shows. And although the exhibition was not, on the whole, so striking and gorgeous as that of the 14th ult., owing to the absence of those rich and inimitable masses of azaleas which were then present, it was, considered in itself, extremely excellent, and, in some of its features, surpassing that just referred to. At the May fete, we were called to notice the dearth, as well as comparative inferiority, of the heaths. Now they may, beyond doubt, be assigned the chief place in our record. The beauty and vigor of the specimens, with the abundant manner in which they were blooming, called forth well merited commendations. Of praise, too much can hardly be given; while many, who find it hard

to keep their heaths healthy, after they have grown above nine inches or a foot in height, may wonder how such perfect plants have been obtained. It will not perhaps be foreign to the object of this report, to insert a hint or two concerning the practice of the most successful cultivators.

“The soil employed is not reduced to a fine state, or sifted, but is just roughly separated, and all the fibre retained. Indeed that kind of heath mould which contains a large quantity of fibre is preferred. By these means, that close coalescence and hardening of the earth which oppose the percolation of water, and are thus instrumental in killing the majority of heaths that are annually lost, can be nearly obviated; and, to realize more thoroughly the same end, small fragments of porous, broken stone are mixed with the soil. The use of such auxiliaries is to render the earth constantly open, while they also serve themselves as reservoirs of moisture, during periods of temporary drought. Through their introduction, likewise, the culturist is enabled to afford a larger pot than he otherwise would, thus allowing them an approximation, at least, to the benefits of being planted in an unlimited bed or border. The next great point is to make them bushy, and induce their branches to cover the whole surface of the pot, or even to hang down over its sides; and this not merely for appearance’ sake, but in order to shelter the soil and roots from the scorching rays of the sun. With most species, an early and oft repeated reduction of the shoots is the method by which bushiness is attained; though there are some kinds that will not bear this, or will endure but little of it. For the last named, it is necessary that the branches be spread out, and fastened to a wire frame, or to stakes, from the first, directing the lowermost ones, originally, into a horizontal or half pendent position. It is of the greatest moment, that both the stopping and training should be begun while the plant is very young and small, and be followed up as occasion may arise. Again, heaths in pots suffer much from aridity in summer, and this is materially aggravated by their being placed on an elevated stage in a light green-house. Hence, the best growers transfer them to pits or frames, which have apertures beneath for the admission of air from below, and in which a moist atmosphere is more easily preserved. From these frames the lights are often removed altogether in the day, and a canvass screen substituted for them. Shade and a freer current of air are thus produced. Sometimes, as was the case with one of the collections shown on Saturday last, the pot containing each specimen is put within another and larger pot, and the space between filled with sand, moss, or light earth, which, being kept always moist, has a cooling and invigorating effect on the roots of the plant. Where frames are made use of however, so troublesome a process is wholly needless. Besides the advantages of frames already mentioned, they tend, with little short of certainty, to prevent the occurrence of mildew—that strange and often unavoidable pest to cultivators, who have nothing but green-houses. Facts lead to a belief, if not to the positive assurance, that mildew on heaths is caused by a close and dry air; consequently, the more humid atmosphere of frames may be the means of preventing it. At any rate, it scarcely ever appears on plants grown in frames.

“What has been said, will indicate their general treatment, the results of which were witnessed on Saturday last. The reader will assuredly regard our observations with more interest, than could be excited by a bare mention of the particular species exhibited—which, however, we shall not entirely withhold. By far the most remarkable heath present was a plant of *E. depressa*, from Mr. Veitch, of Exeter. It was about 3 ft. in height, with a stem 9 inches or a foot long, and almost 2 inches thick—while the head, at least 2 ft. across, was a compact mass of luxuriant verdure and fine yellow flowers; and the branches depended around the stem so as nearly to conceal it. It was, in fact, a beautiful miniature tree, without any of the stuntedness or imperfection which usually attach to such objects. The same species was exhibited, from nine to eighteen inches high, by Mr. Falconer, gardener to A. Palmer, Esq., of Cheam; by Mr. Barnes, gr. to G. W. Norman, Esq., Bromley; and by W. H. Storey, Esq., of Isleworth. All the plants were singularly dense, of a peculiarly deep and rich green hue, and the flowers large, as well as numerous. *E. elegans*, a species admirably suited for growing in a dwarf and compact manner, yet frequently to be seen in a ragged and starved condition was shown, flourishing with unparalleled exuberance, by Mr. Jackson, of Kingston, whose specimen was 18 in. high, and a foot broad. The shoots and blossoms, were wonderfully close and large. Mr. Barnes, above spoken of, had, moreover, a plant of *E. elegans*, only 6 in. in height, and quite a picture of healthy beauty. The handsome *E. tricolor*, though appearing in several groups, was brought, as a single specimen, by Mr. Salter, gr. to J. Yelles, Esq., of Bath, by whom it had been cultivated to an amazing degree of perfection. Its height was about 3 ft., and its breadth fully as much, the branches being actually more profuse at the bottom than the top, and curving down very gracefully and abundantly 3 or 4 in. below the edge of the pot. When it is stated that this large mass was composed of branches, as closely arranged as they could well grow, and that every branch was terminated by a fine cluster of long, conspicuous, but delicately painted three colored blossoms, a tolerable notion will be gained of its loveliness. *E. splendens*, with its copious bunches of large, inflated scarlet flowers, was sent by many individuals; yet none, we think, had it so fine as Mr. Barnes and W. H. Storey, Esq.,. An extremely good plant of *E. odorata alba*, which is a variety alike meritorious for the elegant disposition and bell-like figure of its pretty, white, pendulous flowers, and their sweet fragrance, hardly inferior to that of the Lily of the Valley, was contributed by Mr. Green, gr. to Sir E. Antrobus, Bart. Cheam; the specimen—a foot high—bore an uncommon quantity of flower heads, the number of blossoms on each of which was equally noticeable. *E. denticulata*, a neat and graceful species, with flowers somewhat resembling those of an arbutus, but pale yellow, and tipped with a nearly black hue, appeared in a fine state from Mr. Green, Mr. Barnes, and others. Mr. Clarke, gr. to M. J. Smith, Esq., Shirley Park, produced a magnificent *E. ventricosa carnea*, which was 3 ft. high, and the same in breadth. The charming flush of its flesh colored blossoms was not more delightful than the liberality with which they were produced, and the size of their closely

packed heads. The old, but always pleasing, *E. Bowieana*, was never more appropriately grown than by Mr. Jackson, whose plant was 4 ft. high, yet displaying a bushiness and disposition to ramify which is uncommon in the species, and having enormous spikes of its pure white, partially pellucid flowers. *E. propendens*, one of the most interesting of the tribe, was shown by Mr. Barnes. It was 2 ft. or more in height, and well bloomed, but appearing as if it had blossomed too freely in the preceding season. Its delicate pinkish purple, bell shaped flowers are highly beautiful, and their drooping character is in unison with its slender foliage. The *E. Bergiana*, brought by Mr. Jackson, had reached the height of 2 ft. and was quite covered with small dark puce colored inflorescence; it is a desirable species. In the name of Mr. Pawley, White Hart, Bromley, there was a good specimen of *E. cylindrica*, with its long, upright, salmon colored blossoms, of which this species is very prodigal. *E. vestita carnea*, from the same individual, was likewise dwarf, and finely cultivated. From Mr. Kyle, gr. to D. Barclay, Esq., Leyton, Essex, there was a handsome plant of *E. suaveolens*, which had numberless large heads of thickly disposed, pale pink, and sweet scented blossoms. *E. vestita coccinea*, bearing bunches of brilliant red blooms, was plentifully exhibited; and there were other good varieties of the same species. Still, the varieties of *E. ventricosa* claimed and received universal admiration; and they are, perhaps, unrivalled, both in respect to foliage, habit, or the profusion, delicacy, and showiness of their flowers, or the facility with which they may be brought into and retained in a favorable condition. If, however, all were arrested by the specimens of old and familiar kinds, every one must have felt astonished on beholding no less than 23 new and apparently distinct varieties of *E. ventricosa*, from W. H. Storey, Esq. of Isleworth. We confess we were at a loss whether to be most surprised at the diversity of color and aspect, or the uniform dimensions and robustness of the plants. Each was as near as possible of the same height and diameter, and all were peculiarly verdant, as well as prolific of bloom. They might be taken as a convincing proof of what can be done in the hybridization of heaths. It should be stated that there were 45 plants, but that there were 3, 4, or more specimens of some of the sorts.

“The precedence which we have just given to the heaths would, if gorgeousness of inflorescence, without reference to variety, had been consulted, have been strongly contested by the Cacti. Of these there were some that were never before equalled, especially a specimen or two of *Cactus speciosus*. One in Mr. Green’s large collection reminded us of his noble azaleas at the last meeting. It was about 5 ft. high, and trained to a kind of crescent shaped trellis, between 2 and 3 ft. broad, the flowers being brought to the front, and there collected with such extreme density, that they were literally prevented from expanding properly. Where an extraordinary brilliancy of effect is required, this mode of training cannot be excelled. It was also adopted with some of the *Epiphylla*. When, however, the blossoms are wished to stand out distinctly, so as to invite and bear individual examination, the best system of training is to use a barrel shaped trellis, which opens out gradually and slightly towards the

top. A plant of *C. speciosus*, trained to a trellis of that description, 6 ft. in height, was brought by Mr. Upright, gr. to J. Ridge, Esq., of Morden, Surrey. It was grafted on *C. speciosissimus*, and was blooming most profusely. The same cultivator had another specimen of *C. speciosus*, scarcely 4 ft. high, very broad, and extremely rich in flowers; and there was a plant in all respects similar, from Mr. Bruce, gr. to B. Miller, Esq. Mr. Falconer, gr. to A. Palmer, Esq., of Cheam, had one supported by a trellis of a pointedly conical form, and this was exceedingly fine. From Mr. Bruce, there was also a particularly large blossomed variety of *C. speciosus*, which seems to be well deserving of attention. *C. speciosissimus* was shown in a state which one would hardly think could be surpassed, by not a few growers. Its stems were occasionally from two to three inches thick; which amazing luxuriance is obtained by allowing a sufficiency of pot room, mixing a large proportion of decaying manure with a rich loamy soil to pot it in, and afterwards applying manured water frequently while the plant is growing, or covering the earth with a mulching of manure, over which ordinary water is poured. It might be assumed that such great exuberance is incompatible with the free production of flowers; however, by exposing the plants to the sun in the open air for six weeks or two months in early autumn, a flowering propensity is excited, and the blossoms are larger and richer than those of specimens under common treatment. The plant which had the largest flowers was from Mr. Goode, gr. to Mrs. Lawrence, Ealing Park. Mr. Upright, Mr. Green, Mr. Barnes, and various other culturists, had some splendid specimens present. They were, for the most part, trained spirally round a cylindrical trellis, though some had their stems supported erectly on a similar frame. Of *C. Jenkinsoni*, Mr. Falconer, and Mr. Bruce, brought admirable specimens; that of the former was 4 ft. high, and richly clothed with flowers; that of the latter not quite so tall, yet extremely dense and splendid. *C. Mallisoni* was sent in a well grown state by Mr. Pawley; and Mr. Bruce also exhibited it on a conical trellis, 3 ft. high, trained in a densely spiral manner, and very thickly laden with bloom. There was, moreover, a new hybrid *Cereus*, from Mr. Pawley, which is scarcely distinguishable from *C. Jenkinsoni*, except that it has paler red flowers, and flatter stems, which are unusually strong and healthy. The *Epiphyllum Ackermannii*, among Mr. Green's plants, and this species or the *E. splendidum*, from Mr. Catlough, of Chelsea, were probably superior to any thing of the kind in point of culture. Being three feet in height, they formed one continuous pile of bloom from the base to the apex; and no person, who is aware of the expansive and flexible character of the blossoms of this plant need be further apprised, that the specimens in question were inconceivably grand.

“The roses, which were not so select as usual, were a few days too early; and but few varieties of moss roses were in bloom, or of the *Rosa Gallica*, *Alba*, or *Damask*. Those shown were principally Chinese roses, and their hybrids; established sorts, such as *Brennus*, *Fulgens*, *George the Fourth*, *Coup d'Amour*, *Daphne*, *General Allard*, and many others, that prove to be very early bloomers, and consequently on that account desirable. The hybrid perpetuals

were also in great perfection; among them, Prince Albert, one of the earliest; Madame Laffay, Aubernon, Fulgorie, Comte de Paris, and Clementine Duval, were conspicuous. This class of roses comprises some of the earliest bloomers, and yet they continue to flower till November; proving how valuable an addition they are to the garden. Some discrepancies appeared to exist among the growers as to classing their roses: Hybrid Perpetual and Hybrid Chinese were by some placed among "Garden Roses;" by others, among "Chinese and Hybrid Roses," in accordance with the directions issued by the Society. In Mr. Rivers's collection, the following particularly attracted our notice: *Hybrid Perpetuals*—Fulgorie, Aubernon, De Neuilly, Clementine Duval, Comte de Paris, General Merlin, Madame Laffay, Marshal Soult, Prince Albert, Prudence Ræser, Rivers, Ciceley. *Hybrid China*—Belle Marie, Blairii, No. 2; Beaute Vive, Comtesse de Lacepede, Charles Duval, De Candolle, General Allard, Great Western, Kleber, Le Meteore, Mrs. Rivers, Sylvain, Triomphe de Laqueue. *Rosa alba*—La Sequisaute, Sophie de Marsilly, Princess de Lamballe. *Damask*—Deesse Flore, La Fiancee, La Cherie, La Soyeuse, La Ville de Bruxelles, Madame Hardy. *Rosa Gallica*—Eclat des Roses, Sir Walter Scott, Pulchra marmorea, Woodpigeon, Royal marbled, &c. &c. *Austrian Briars*—Globe Yellow, and Rosa Harrisoni. *Bourbon*—Madame Nerard, Bouquet de Flore, Acidalie, Madame Margat, Ceres. *China*—Archduke Charles, Clara Sylvain, Etna, Mrs. Bosanquet, &c. *Tea scented*—Bougere, Eliza Sauvage, Goubault, Prince Esterhazy, Safrano, &c.

The beauty of the pelargoniums contributed more than an ordinary share to the splendor of the exhibition. Many persons were apprehensive, from the heat of the weather and the journey to the gardens, that the bloom would have been deficient; but owing to the good management of the growers but little difference was discernible. Mr. Bell, of Chelsea Hospital, in the amateur's class, exhibited a collection of well managed plants, for which the gold medal was awarded; Erectum, Coronation, Florence, Una, Bridesmaid, and Comte de Paris, were successfully grown. The collection that competed with this, was from Mr. Bromley, gr. to Miss Anderson, to which an inferior medal was given; a circumstance arising no doubt from the presence of some old and worthless kinds in the collection, for the Beauty of Ware, Lady Murray, and Diadematum rubescens, again made their appearance; such flowers must always prove detrimental to the success of an exhibitor—and this it is to be hoped will be their last appearance here; the plants in this collection were generally well grown. In small collections from amateurs, Mr. Bourne, gr. to Sir E. Paget, gained the first prize; Erectum, Chelsea Pensioner, Florence, and Climax, were conspicuous; the plants were compactly grown and in good condition. The other collection from Mr. Hart, gr. to Miss Trail, was too much drawn up; Leila looked admirably, and the flowers showy—but from their size, out of character. In the Nurseyman's Class, Mr. Catleugh gained the gold medal for his collection of twelve well grown varieties—Lord Mayor, Victory, Lumsden's Madeleine, Florence, Lifeguardsman, Priory Queen, Coronation, Hannah, Una, Prince Albert,

Orange Boven, and Selina; these plants were exhibited in great perfection; they were grown short, spread out, and uniform in size; and all carried a fine head of bloom. Lamsden's Madeleine, Priory Queen, and Orange Boven, excited admiration from their being literally covered with flowers. Mr. Gaines' collection was also exceedingly well bloomed; the plants were rather smaller than Mr. Catleugh's; Sylph was shown with a fine head of flowers. One or two white varieties would have improved the general effect of this collection, which consisted of Leila, Jones, Exquisite, Raphael, Grand Duke, Victory, Beatrice, Cerito, Erectum, Coronation, Sylph, Album perfectum, and Jenny. In collections of six varieties, Mr. Catleugh took the lead, for Lord Mayor, Madonna, Victory, Ophelia, Jewess, and Joan of Arc; these were six plants of very fine growth. Mr. Gaines among others exhibited Garth's Perfection in splendid condition, and Countess Cooper also; the rest were rather drawn and deficient in bloom, a circumstance that might arise from the weather and their journey to the Gardens.

"The seedling pelargoniums were numerous, and the desire to view them was in no degree abated; the tent in which they were exhibited was thronged with visitors, and pencils and memorandum books were in request, to note down the most striking varieties. Those selected by the judges, as flowers of superior merit, were the following: Foster's Sultana, a beautiful and brilliant flower, of a superior form; lower petals delicate salmon, the upper petals crimson, into which is infused a mixture of scarlet, which, with the dark spot, gives the flower a distinguished appearance: Foster's Sir R. Peel; this variety is an acquisition, as it supplies a great desideratum among the purples, a class in which we are very deficient; it is finely formed, the petals stiff, and the flower, when fully expanded, retaining a cupped form; the upper petals have a large rich spot, gradually softening to the edge of the petal, which is free from the mottled appearance usually seen: Foster's Nestor; delicate warm pink under petals, the upper petals have a large maroon spot, softening to the edge; the flower is very large, and finely formed: Foster's Sunshine; this is a most brilliant variety; the lower petals are of a bright scarlet salmon color, with a slight tinge of blue in the centre, the upper petals are of a deep brilliant scarlet, with a dark spot; this flower attracted great notice, from its extraordinary color: Beck's Leonora is a beautiful flower, surpassing all heretofore produced in the same style; the upper petals have a dark rich purple maroon spot, which terminates abruptly, leaving an edge of bright rose color surrounding them; the lower petals are delicate rose; the flower is finely formed; to each of these seedlings the silver Knightian medal was awarded. To a well formed flower of good properties, named the Duke of Devonshire, a silver Banksian medal was given: and certificates to the Model of Perfection, a flower of good form, rich spot, pink under petals, with white centre; and Meteor (Beck's), attractive from its great delicacy and richness, having a dark velvety maroon spot in the upper petals, contrasting with very delicate under petals. In many cases the flowers exhibited were not shown according to the rules laid down by the Society, and were consequently disqualified—it is expressly stated that 'seedling pelargoniums are to

be exhibited in single trusses, with a leaf; the truss to be elevated above the leaf. Where this rule was not complied with, the flowers were passed; and several fine flowers had to be put aside on this account. There were other seedlings meriting attention, which had not been caught exactly in perfection. It is difficult, in seedlings of the current year, to accomplish this, but as the show in July will afford another opportunity, it is to be hoped several of those, now unsuccessful, will again make their appearance under more favorable circumstances. From their being so numerous, those that did not receive prizes embraced flowers of various degrees of merit. It must have been a task of great difficulty, considering the state of the weather, for growers to produce their seedlings in good condition; in the case of those of the current season with one truss only, promising to be in time for the exhibition, the retarding its flowering or pushing it forward, to have it in perfection, must have caused great anxiety—and in many cases the greatest care and vigilance appear to have been baffled. A very fine seedling in Mr. Beck's stand, named the British Queen, was evidently past its prime; this was a large flower of good substance, novel in appearance, and one which promises to form a desirable addition to this class. Lucy also and the Morning Star, in the same stand, were both worthy attention. A high colored variety, named Count D'Orsay, exhibited by Mr. Pamplin, was much noticed; and among Mr. Foster's flowers, the Favorite, which had been exhibited on a former occasion, and Tasso, a specimen with remarkably fine upper petals, were much admired. (We cannot pass this stand without adverting to the admirable manner in which Mr Whomes, gr. to E. Foster, Esq., exhibited his flowers, an example worthy imitation; each truss stood clear above the leaf, requiring no examination by the judges to ascertain whether the regulations published by the society had been complied with.) A curious repetition of the Priory Queen was exhibited by Messrs. Lucombe and Pince, called Rosaline, but an evident improvement in form upon that showy variety, and the Beauty of Werslade, a large flower novel in color. In another stand, the Countess of Morley, a fine variety of good form and color, appeared, but was disqualified, from being exhibited with two trusses instead of one; a mistake which appears to have been committed in many cases. A plant of Mr. Gaines' Rising Sun, with its clear vermilion flowers, was much admired; and Garth's Queen of the Fairies, with its sparkling trusses of pure white and maroon, received its due share of notice.

"A stand of ranunculuses, from Mr. Lockhart, contained many fine specimens in perfect condition; these beautiful flowers have been greatly improved within a few years; and the size, beauty of color, and delicacy of the edging in many of the blooms excited much admiration. The pink is not at present so popular a favorite as it deserves; to those who admire the flower, Mr. Wilmer's stand of large and well-bloomed varieties, would prove acceptable. The weather has latterly been very unfavorable for blooming the hearts-ease in perfection, and therefore we were not surprised to find the display of these flowers less fine than usual.

"The climbers were also deserving of particular notice. We must repeat our regret that the exhibition of these plants is so lamentably disproportionate to the encouragement offered to the cultivators, and

hope that more attention is paid to them privately than was manifested by this show. The plant which gratified us most was one of *Passiflora Kermesina*, supported by a cylindrical trellis, not more than four feet high, and covered in at the apex. Round this trellis the plant was pretty closely twined, and was blooming in a very interesting manner. It was to us the more pleasing, as being one among the many evidences, that climbers of a spreading character may advantageously be kept in a pot, and confined within prescribed limits. The specimen was from Mr. Foy, gardener to R. Alston, Esq.; and it is a fact which ought to be more commonly known, and which we mention here with the view of accomplishing that end, that *P. Kermesina* often sheds its flowers when grown in a very hot stove, but opens them liberally and perfectly, when the temperature of the house is reduced to a little above that of the green-house. The most varied collection of climbers was contributed by Mr. Goode: it comprehended *Aristolochia ciliosa*, a species of rather dwarf habits, with small, by no means showy, but curious blossoms; *Manettia cordifolia*, on an upright barrel shaped trellis, four feet high, very healthy, and profusely decorated with flowers; two other specimens of the species, on globular trellises, distinguishable for the most perfect cultivation, which is apparently attained by the use of a pretty rich soil, and by gradual shiftings till they are brought into large pots; *Kennedyia monophylla*, five feet in height, closely twined round an erect cylindrical trellis, and particularly handsome; *Ipomœa Hardingii*, probably the same specimen as was at the last exhibition, on a low trellis, and well flowered; *Ipomœa Horsfalliæ*, evincing similar capabilities of being trained on a dwarf barrel trellis, yet with only the remains of its splendidly colored blossoms; *Tropœolum edule*, inclined to be sickly; *Thunbergia grandiflora*, in great luxuriance, sparingly studded with inflorescence; *Stephanotis floribunda*, a noble plant, flowering abundantly, and promising yet greater fertility; and *Æschynanthus maculatus*, growing over a large globe of moss, inclosed within a wire trellis; although it was blooming well, the moss had too artificial an outline, and did not enhance the appearance of the plant so much as a rustic and branched block of rough wood would have done. Mr. Green brought *Tropœolum edule* in the rudest health, and flowering very handsomely; from the rich orange hue of its blossoms, it bids fair to become a favorite companion to *T. tricolorum* and *brachyceas*; like these species, it is seen most favorably when fastened to a flat trellis, which can have any desired contour. *Gompholobium polymorphum* was shown by Mr. Barnes, in the direct reverse of its usually weak condition, being grown on a trellis four feet high, which extended partly down over the pot, and was very generally clothed with flowers; it is an elegant plant, and conjointly with the *Tropœolum*, to which allusion has just been made, requires a trellis with a flat surface, that its scanty branches and foliage may be atoned for by close training. *Clematis Sieboldi*, judiciously trained to a flat face, and elegantly bedecked with its showy two colored flowers, was from Mr. Pawley, of Bromley. A plant of *Russellia juncea*, six feet in height, and creeping prettily over the edges of the trellis, as well as from all parts of its sides, graced the collection of Mr. Green; although more a trailer than a climber, it may be ranged with the latter group. Mr. Pawley, of Bromley, brought a fine specimen (four feet

in height) of *Kennedya monophylla*, or what appeared to us to be such, under the name of *K. bimaculata*, possibly relating to the two spots existing in the white portion at the base of the floral standard. A new *Manettia*, which has received the title of *M. bicolor*, from its red flowers passing into yellow towards the summits, came from Mr. Veitch, of Exeter; its leaves are lanceolate and pubescent, while the flowers, which are small, have the two colors above named. *Hoya carnosa*, however old, is still to be admired for the beauty and durability of its wax-like blossoms, and for its fine, evergreen, shining leaves. It was shown by Mr. Joynes, gardener to Mr. Hall, Totteridge, Herts, to be well suited for growing on a low trellis, on which it produced an excellent effect. Mr. Hogan, gardener to H. Pownall, Esq., Spring Grove, contributed a good *Sollya heterophylla*, one of the best of climbers; and *Anagallis Monelli*, which is not a climbing species, but was affixed to a spherical trellis, two feet in height; the brilliant blue color of its blossoms, of which there was a prodigious quantity, fitted it to vie with almost any thing in the exhibition; it is made thus to assume a climbing habit, like verbenas, by plucking off the flowers as they appear, and stopping the shoots till they evolve a due proportion of laterals: the practice may be recommended, as we know of no other state of the plant at all comparable to this.

“We cannot say a great deal in commendation of the fruit. Among pine-apples, two large Providences, hardly ripe, from Mr. Fish, gr. to H. Oddie, Esq., Colney House, Barnet; some good Ripley Queens from the same gardens; and six Queens, of moderate quality, from Mr. Dodds, gr. to Sir G. Warrender, were the principal articles in that part of the exhibition. Grapes, of various sorts, were largely supplied; the black *Hamburgh* kind was sent, in fair condition, by Mr. Campbell, gr. to General O’Loghlin, Chalfont St. Peters; by Mr. Browne, gr. to Messrs. Clews and Co., Aston Green; by Mr. Henderson, Coleorton Hall; and Mr. Wortley, gr. to T. Maubert, Esq., Norwood. Superior fruit of the same variety was shown from Mr. E. Mitchell, of Brighton; and Mr. Dodds, gr. to Sir G. Warrender. Mr. Chapman’s black *Hamburgh* grapes were small but beautifully ripened, as were those of Mr. Atlee, gr. to R. Beaufoy, Esq. Those of Mr. Bell, nurseryman, Norwich, were ripened in a superior manner; and the berries of those brought by Mr. Davis, gr. to Sir S. Clarke, and Mr. Foy, gr. to E. Alston, Esq., were large, yet pale. Mr. Short, of Bawtry, sent some *Royal Muscadine* grapes, in tolerable perfection, and some *Grizzly Frontignacs* that were pretty good. The *White Muscat* of Alexandria was shown in excellent condition by Mr. Davis, gr. to Sir S. Clarke; the *White Sweetwater*, particularly handsome, by Mr. Shields, gr. to Lord Blantyre; and the *Cannon Hall Muscat*, with large berries and fine bunches, by Mr. Campbell, gr. to General O’Loghlin. The peaches from Mr. Fish, gr. to T. Sowerby, Esq., Putteridge Park, were respectable; the peaches and nectarines from Mr. Mitchell, gr. to the *Queen Dowager*, Sudbury Hall, were too much bruised in packing to allow any one to determine their merits; the *Elruge* and *Violet Hatve* nectarines, and *Royal George* peaches, from Mr. Henderson, Coleorton Hall, were admirable, as were the peaches from Mr. Dodds, gr. to Sir G. Warrender, and Mr. Shields, gr. to Lord Blantyre. The *May Duke* cherries from the last cultivator, and

from Mr. Leslie, gr. to J. Fleming, Esq., were as fine as possible; and so, likewise, were the Keen's Seedling strawberries of Mr. Leslie, and Mr. Elliot, gr., to J. B. Boothby, Esq. A collection of apples, preserved with wonderful plumpness, was contributed by Mr. Baldwin, of Turnham Green; among them was the Alfreton, which is an excellent and large Kitchen apple, and bears profusely, as well on small as on large trees. Three melons, of good quality, were forwarded by Mr. Loudon, gr. to S. Gurney, Esq., and a large cantaloupe melon, by Mr. Reid, gr. to Sir G. Wilson, Beaconsfield. From Mr. Joynes, there was a brace of fine cucumbers. A gigantic spike of the fruit of the *Dacca Musa*, with a dish of such as had fallen off from ripeness, was from Mr. Scott, gr. to Sir G. Staunton, Bart., and our notice of this may aptly finish the report. We cannot, however, avoid expressing our concern that so few exhibitors of flowers attach the names to their specimens. If they did but remember how much more attention would be attracted to them, were they correctly and legibly named, we are sure that the desire of distinction would alone be a sufficient stimulus to the adoption of this practice. Those who are inaccessible by such arguments, may probably concede as much to the convenience and comfort of visitors." (*Gard. Chron.*)

ART. II. Domestic Notices.

Fourteenth Exhibition of the Pennsylvania Horticultural Society.—The Pennsylvania Horticultural Society will hold its fourteenth exhibition in its new hall, the lower saloon of the Philadelphia Museum, at the corner of Ninth and George Streets, on Wednesday, Thursday, and Friday, the 21st, 22d, and 23d of September, to which contributions are solicited, in plants, flowers, fruits, and culinary vegetables. Specimens of a quality meriting distinction will be thankfully received, and publicly acknowledged. When transmitted from a distance, by public conveyance, the Society will cheerfully defray the cost of transportation. They may be addressed to D. Landreth & D. L. Means, at their seed store, No. 65 Chestnut street.

The premiums for the objects in competition will be awarded at 12 o'clock, noon, on the first day (21st,) of the exhibition.

The schedule, which is more extensive than on the last occasion, is not yet printed in circular form, or it would be forwarded; and, being desirous that you should be apprised of the time for holding the exhibition, before the next number of your Magazine is issued, we have taken the liberty of addressing you on the subject.—*By request of Committee of Arrangements of the Pennsylvania Horticultural Society.*

Horticultural Exhibition of the Burlington Lyceum.—The Burlington Lyceum will hold its exhibition of flowers and horticultural productions at its hall in Burlington, on Wednesday and Thursday,

the 15th and 16th inst. A fine show is expected.—*T. Hancock, Burlington, Aug. 8, 1842.*

Lard Oil.—The use of lard for lamps is daily becoming more general. In the country, where oil is not easily to be obtained, and where lard may be had in abundance, it will prove economical to the farmer or the gardener to make use of the latter. A newly invented lamp for the purpose of burning it, has been invented by Mr. Ellis S. Archer, No. 32 North Second street, Philadelphia. By Mr. Archer's method, the plain lard is taken and warmed sufficiently to run, and then put into the lamp, which is all the preparation required, and when lighted burns with a most beautiful brilliant light, and produces no offensive smoke, which is certainly a great advantage over many of the sperm oil lamps, and besides, there is a very great saving in the use of hogs' lard in place of sperm oil. I have no doubt the above discovery will prove very important to the agriculturist, at least.—*Yours, T. Hancock.*

Nursery of T. Allen, Winchester, Va.—We have received a catalogue of trees, plants, &c., from our correspondent, Mr. T. Allen, of Winchester, Va. The catalogue contains a small and good collection of fruit trees, and a greater number of fine roses, pelargoniums, dahlias, &c., than we had supposed was to be found in the interior of Virginia. To gentlemen residing in the western part of Virginia, and the adjoining States, Mr. Allen's nursery offers a good opportunity to purchase. Of the state of gardening in Virginia some account is given by Mr. Allen in another page.—*Ed.*

Bloodgood Nursery of Messrs. Wilcomb & Ring, Flushing, L. I.—We have also been favored with a neat catalogue of trees and shrubs for sale by Messrs. Wilcomb & Ring, of Flushing, L. I. The catalogue enumerates a great variety of fruits, all collected from the best sources. Upwards of forty acres are devoted to the cultivation of trees, and the personal inspection of the proprietors enables them to insure correctness in the propagation of the newer and choicer kinds of fruit.—*Ed.*

Horticulture in Virginia.—I expect you scarcely know that there is any thing like gardening in this section of country, for I see Washington is the furthest to the south your journey extended last year. It is true we are a great way behind the large cities, in almost every thing connected with the business, but we are improving, and the Valley of Virginia is perhaps as well adapted for the cultivation of all the varieties of fruits as any other part of America, and were your Magazine more circulated in this country, it would be a great stimulus to improvement. The taste for flowering plants is considerable, but a work that would suit best, is one of practical use; for information is very important in the growth of trees, plants, and even vegetables of a great many kinds. Should you let me know, through your columns, whether it be acceptable, I will make out a communication at some length, on the general state of gardening in the Valley of Virginia, with my views as to climate, &c.—*Yours, T. Allen, Winchester, Va., August, 1842.*

Cultivation of the Grape vine in Vineries, without Heat.—I have looked in vain for a compliance with the request of your correspondent, (Vol. VI., p. 384,) asking information relative to the best culture of the grape under glass, *without* artificial heat. Per-

haps Mr. Russell or Mr. Haggerston, to whom you refer, may find a leisure half hour to instruct tyro-amateurs as to watering (when the vines are planted inside or outside of the grapery,) syringing, airing, protecting against mildew, thinning of the vines, pinching or stopping the shoots, and pruning; describing the mode, whether long, spur, or fan method. A drawing of a full bearing vine, just before and after pruning, in the fall or winter, indicating all the superfluous branches which are to be cut off, would best illustrate the mode, but I am well aware that your subscribers cannot expect you to incur the expense of such a drawing. What would it cost? I also would beg leave to suggest, that the information sought for be conveyed in the form of a brief monthly calendarial register.—*Philo Vitis*, August 1, 1842.

[If this should meet the eye of either of the intelligent gardeners above named, we trust they will gratify our correspondent by sending us a paper containing the desired information. We intend to present such a paper in the course of the next volume, if we do not in the present one.—*Ed.*]

Large Currants.—A correspondent of the *Central New York Farmer* has sent the editor of that paper a basket of currants, which the editor pronounces the largest he ever saw. Astonishing as it may appear, he states that some of the berries measured *one and three quarters inches* in circumference, and several *one and a half*; the clusters were also large and fine. Mr. Berry, of Whitetone, who raised these currants, states, that he sent them to the editor, merely to show what a little cultivation will do towards improving this most common and most neglected of fruits. The bushes are made to grow in the form of trees: they are, in fact, small trees. In this shape they bear five or six years, and sometimes longer. The bushes are planted at least six feet apart, and every spring or fall, the new wood, which shoots out vigorously from the old branches, should be cut off, with the exception of three or four joints. Mr. Berry prefers fall pruning. By this method of pruning the fruit is produced in rich heavy clusters upon all parts of the tree, even to the extreme points of the branches, and does not dwindle away, as in the common mode of *no cultivation*, into little, puny, pigeon-shot berries, hanging upon solitary stems, in a wide waste of bush.—(*Cent. N. Y. Farmer.*) [We recommend this notice to our readers, in connection with our article on the currant, in a previous page.—*Ed.*]

Ross's Phoenix Strawberry.—This is the name given to the new strawberry which we noticed in a late number, (p. 270.) Mr. Wilson has thus named it on account of its having been twice nearly lost. Mr. Ross, in a note appended to a figure and description of the fruit in the *Cultivator*, states that it was raised from the Keen's seedling, in June, 1836, at which time the seeds were sown in a box, where the plants remained till the spring of 1837. At that time only *one* plant was alive, owing to the severe frost. This having a singular round leaf, Mr. Ross was induced to plant it out in the garden where it grew rapidly, and made a number of runners during the season. In 1839, it produced fruit, some of the berries of which measured five and a half inches, and one six and a half inches, in circumference. The variety is a strong grower, produces large

leaves, and spreads rapidly. We shall refer to it again when we have proved its qualities.—*Ed.*

Mr. Nuttall, the Botanist.—This eminent botanist, whose name has become identified with American plants, has lately come in possession of a large and splendid fortune, estimated at £100,000 sterling, and upward, by the decease of some of his ancestors in England. Mr. Nuttall sailed from New York or Philadelphia to take possession of the estates, and is probably, ere this, enjoying the comforts which such wealth can bestow. Though botanists may regret that he has been called from the broad field of the western continent, over which he has so frequently roamed, and where he has spent a larger portion of his life in enriching our flora by the discovery of new and splendid plants, they cannot but wish a happy life around the hearth of his ancestral home, devoting his leisure time to the pursuits of his favorite study. Mr. Nuttall's passion for botany is intense, and it would not astonish us were he to make such arrangements as to return to this country and continue his botanical researches. But whether he remains at home or comes again among us, we hope he may long live to enjoy his ample fortune.—*Ed.*

Mediterranean Wheat.—A new variety of wheat, under this name, has been distributed among editors of farming periodicals and gentlemen interested in agriculture, by the Commissioner of the Patent Office. According to letters of Dr. Smith, of Philadelphia, who has tried it for several years, it is *proof* against the *fly*, and *almost* proof against the *rust*. It is at least ten days earlier than any other sort, and on this account alone is well worth trial by the farmers of the New England States, where they have a cooler climate to contend with.

The Rev. H. Colman, late Commissioner of Agriculture of the State of Massachusetts, and now editor of the *New Genesee Farmer*, has been elected an honorary member of the Royal Agricultural Society of England. This is a well merited compliment, and in making Mr. Colman an honorary member, they have not only conferred an honor on him, but upon the Royal Society itself, which ranks among its members but few men, who have with more devoted zeal and singleness of purpose, directed their efforts to the promotion and advancement of the great cause of agriculture.—*Ed.*

ART. III. *Retrospective Criticism.*

Tuckermánia californica.—In one of your former numbers of the Magazine, you gave a description of a new plant exhibited at the Pennsylvania Horticultural Society, called *Tuckermánia californica*. The plant there alluded to is the *T. marítima*, found by Mr. Nuttall

upon the rocks at St. Diego, on the coast of California: he named it, as was stated, in honor of Mr. Tuckerman, of your city. It belongs to the Compositæ, is a showy plant, with bipinnately divided leaves, with linear entire segments nearly all borne towards the base of the stem, which terminates in a naked peduncle a foot long. Mr. Nuttall left me two plants, when he left the country, wishing me, if possible, to protect them and send him some seed. As I had no place for them, I sent them to Mr. Kilvington, who was so kind as to raise them, and gave me the seed. It will make a tolerably good border plant; the leaves very succulent, the flowers few but very yellow. When plentier, I will send you some seed. It may improve on cultivation.—*Yours, G. Watson, Philadelphia, Aug. 1842.*

Producing good crops of Strawberries, without regard to male and female blossoms, (p. 257.)—We have your seedling strawberry here, and it grows vigorous and very fast, although not quite so rapid as Mr. Buist represents. How it will turn out as regards the male and female blossoms, I am not able to determine as yet; but I do not altogether believe in the doctrine of your correspondent, Mr. Longworth, of Cincinnati, and the more especially when he asserts that none of the English gardeners know the true character of the strawberry. I have had the experience of five years in Scotland, and the same length of time in England, in the cultivation of the strawberry, in common with other things, and have never known the strawberry to fail of a good crop, unless from some reason obvious to every intelligent gardener, different from a want or profusion of male or female organs. A practical experience of nine years in America convinces me that a good crop of strawberries, no matter what variety, depends more on the cultivation than in looking for the right number of male and female blossoms, although I think in America there is a necessity for some attention being paid to that; but when the object is to raise twenty-five or thirty or more bushels of strawberries, with all the other press of business on hand, the matter would require to be despatched with more speed than by following all the niceties of Mr. Longworth's plan.—*I remain, with respect, yours, Thomas Allen, Winchester, Va., Aug. 1842.*

ART. IV. Massachusetts Horticultural Society.

Saturday, July 30, 1842.—Exhibited. Flowers: From the President of the Society, dahlias, viz:—President Von Litchenburg, a red one tipped with white, Cox's Rival Revenge, Constantia, and Andrew Hofer. From S. R. Johnson, Chinese and noisette roses, and carnations. From W. E. Carter, a variety of flowers, including dahlias, pinks, fine double hollyhocks, bouquets, &c. From J. F. Trull, a collection of dahlias, verbenas, phloxes, &c. From W. Meller, bouquets.

From Hovey & Co., several varieties of roses, among which were, *Tea*—Bougere, Triumph of Luxembourg, odoratissima, Philadelphia, and Princess Marie: *Bengal*—Cramoise superieure, Roi de Cramoise, Mrs. Bosanquet, Etna, Triumphant, and Eugene Perolle: *Bourbon*—Hermosa, and Marshal de Villars; also bouquets. From J. A. Kenrick, flowers and bouquets. From Dr. J. C. Howard, several bouquets, and a variety of dahlias. A. Bowditch exhibited several varieties of noisette and other roses. From J. Hovey, bouquets. From S. Dearborn, a large pink in a pot, with upwards of fifty flowers expanded. From J. L. L. F. Warren, bouquets.

Fruits:—The exhibition of fruit was very good for the season, and comprised some fine specimens of grapes. Mr. O. Johnson exhibited some superb black Hamburg grapes, the clusters weighing about a pound and a quarter each, the berries large and well colored, and covered with a fine bloom; these attracted much attention. From J. F. Allen, were fine black Hamburg and Muscat of Alexandria grapes, beautiful Grosse Mignonne peaches, and black figs. From J. A. Kenrick, several quarts of Belle Magnifique cherries, large and fine; also, red Bigarreau cherries. A few boxes of blackberries commanded great admiration; they were exceedingly large and fine, some of them measuring nearly an inch long; these were from Mr. E. Thayer, of Dorchester; he has had good success in their cultivation. From A. D. Williams, handsome white and red Dutch currants.

From J. F. Trull, early scarlet plums. From Dr. J. C. Howard, Sopsavine apples, and pears. From B. V. French, Heath's early Nonsuch apples, and handsome Belle Magnifique cherries. Wm. MacIntosh exhibited red and white Dutch currants, and Franconia raspberries. From J. Hovey, very beautiful Early Harvest apples, and black mulberries. From S. Glover, handsome gooseberries. From George Walsh, gooseberries, cherries, and pears. From J. L. L. F. Warren, handsome Royal George peaches, large black currants, fruit of the weeping cherry, and fine tomatoes.

Vegetables:—From Dr. J. C. Howard, large Chenango potatoes. From A. Bowditch, very large Chenango potatoes.

August 6.—An adjourned meeting was held to-day—the President in the chair. The journal of the last meeting having been read,

Mr. Walker, from the committee chosen to select some person to deliver an address, reported that they had procured Mr. J. E. Teschemacher to deliver the address on the occasion of the next anniversary.

It was then voted that the Exhibition take place on Wednesday, Thursday, and Friday, the 14th, 15th, and 16th of September.

It was also voted that the select committee of five, appointed at the last meeting, to carry out the arrangements for the collation, be increased to fifteen, and that the committee be empowered to augment that number if expedient. Ten more names were added, and the following gentlemen now compose the committee:—

M. P. Wilder, *chairman*; S. Walker, B. V. French, C. M. Hovey, D. Haggerston, H. W. Dutton, Jos. Breck, J. C. Howard, Eben. Wight, J. L. L. F. Warren, F. W. Macondry, P. B. Hovey, Jr., J. F. Allen, O. Johnson, and S. R. Johnson.

C. M. Hovey, Chairman of the Flower Committee, into whose hands were placed the flower seeds lately received from the Exploring Expedition, laid the same upon the table for distribution.

Rev. J. O. Choules, of New York, and Prof. J. W. Jackson, of Schenectady, were admitted corresponding members. Adjourned two weeks to August 20.

Exhibited.—Flowers: Hovey & Co. exhibited a variety of Bengal, Tea, Noisette, and Bourbon roses, among them a flower of the celebrated new one, *Rosa devoniensis*, lately introduced: the flower is of a delicate straw color, with a buff centre, and very sweet scented, petals cupped, and well arranged; it is a superb variety:—also bouquets. From J. Breck & Co., German asters and picotee poppies. From S. Walker, *Enothèra macrocarpa*, a fine specimen of Carter's seedling phlox, and bouquets.

From S. R. Johnson, tender roses, and six or eight varieties of handsome double balsams. From Dr. J. C. Howard, a variety of dahlias, and several large bouquets. From P. Barnes, a few new dahlias. From J. F. Trull, a variety of dahlias, some of the blooms very good. W. Kenrick exhibited variegated monkshood, blue Japan Day lily, Marseilles poppy, Noisette roses, double dahlias, and other flowers. From M. Tidd, fine specimens of Triumph of Luxembourg rose. From J. L. L. F. Warren, bouquets.

Fruits:—From J. C. Lee, Salem, specimens of white Frontignac, white Chasselas, Zinfindal, and black Hamburg grapes; these were exceedingly large and fine, particularly the Frontignac and the Zinfindal, the latter clusters being full a foot long, and weighing, we should judge, two and a half pounds each; the clusters of the Frontignac were also large, and the berries of a rich amber tint. From O. Johnson, specimens of black Hamburg grapes, equally fine with those at previous exhibitions. From A. D. Williams, large red and white Dutch currants.

From J. F. Allen, handsome specimens of black figs. From Dr. J. C. Howard, Sopsavine and Williams's Favorite apples. From J. Hovey, beautiful Early Harvest apples, and black mulberries. From J. F. Trull, early scarlet plums. From A. T. Lewis, Roxbury, large apricots, not quite ripe. From H. J. Oliver, Brookline, plums, and the early Bow and River apples. From Mr. Thomas, large apricots. From J. L. L. F. Warren, Sugar-top pears. Presented by George Walsh, Royal George peaches.

August 13.—The Flower Committee held a meeting to-day, and appointed Thursday and Friday, the 22d and 23d of September, the days for holding the third annual grand dahlia show of the Society.

The rules and regulations for the exhibition, as heretofore published in the Magazine (p. 76,) will be strictly adhered to. A printed circular, containing a list of the prizes to be awarded, and the regulations, will be ready for distribution at the Society's room, the first Saturday in September.

Exhibited.—Flowers: From H. W. Dutton, the following dahlias: Painted Lady (white tipped,) Charles XII., Haidee, Mrs. Rushton, Ringleader, Miss Johnson, Primrose, and Beauty of the Plain. From W. Meller, dahlias, comprising Morning Star, Countess of Liverpool, Coronation, Lady Sondes. From Jos. Breck & Co., fine double asters. From J. L. L. F. Warren, dahlias, among which were

Canute, Denissii, and Lord Liverpool; also bouquets. Bouquets from Miss Sumner.

From Dr. J. C. Howard, a variety of dahlias, and several bouquets. From E. Winslow, Pickwick, Vesta, Miss Johnson, and Mrs. Bucknall dahlias. From W. Kenrick, bouquets and poppies. O. Johnson exhibited a fine specimen of the *Erythrina Crista galli* in full bloom. From S. Walker, bouquets. A plant of the night-blooming cereus, with a bud, from A. Willard, Jr. From S. Sweetser, roses, verbenas, dahlias, *Salvia patens*, &c.

Fruits:—The exhibition of fruit comprised some beautiful red Astrachan and early Bow apples, and President peaches, from O. Johnson. Fine Bolmar Washington and Italian damask plums from W. Thomas. From J. F. Allen, black figs and fine Grosse Mignonne peaches. Beautiful Williams's Favorite apples from A. D. Williams. From S. Pond, green gage, Apricot, Italian damask, Royal de Tours, and Imperial gage plums. Apples from C. Newhall, without name. Cherry tomatoes, from Col. F. R. Bigelow.

From R. Manning, Bloodgood, green Sugar pear of Hoyerswerda, Sugar top, English Rousselet, and Muscat Robert pears; also, red Astrachan apples, and Morocco and early Orleans plums. From E. M. Richards, beautiful specimens of Sopsavine, early Harvest, and early Bow apples. From B. V. French, Jargonelle, Sugar top, Catharine, and other pears without name; also, Sopsavine and River apples. From Dr. J. C. Howard, Jargonelle and Summer Bergamot pears, and summer Pearmain apples.

August 20th.—An adjourned meeting was held to-day. The President in the chair.

J. F. Trull and S. A. Lawrence were admitted subscription members. Adjourned two weeks to Sept. 3d.

Exhibited—Flowers: From Hovey & Co. several small and fine bouquets. From F. W. Macondry, a variety of dahlias. Dr. J. C. Howard exhibited dahlias and several bouquets. Dahlias in variety, together with asters, phlox, verbenas, &c., from J. F. Trull. From H. W. Dutton, dahlias. A fine specimen of *Mandevillea suaveolens*, from the public garden. Beautiful roses and verbenas, from S. R. Johnson. From S. Sweetser, dahlias including Eva, Marshal Sault, Hope, Grace Darling, &c.; also, *Phlox Drummondii*; white and yellow Tea, Triumph of Luxembourg, and other roses; *Fuchsia globosa*, *gracilis*, *splendens*, &c., and a seedling raised by Mr. Tidd, between the splendens and globosa; also, seedling verbenas in great variety. Bouquets were exhibited by J. L. L. F. Warren, Misses Sumner, S. Walker, W. Kenrick, and others.

Fruit: Mr. R. Manning sent the following kinds of pears:—Rostizer (*fine*.) Bezi Blanc, Elizabeth, Passans du Portugal, sugar pear of Hoyerswerda, and Muscat of August; also, Dodge's early red apple. From S. R. Johnson, extra fine Washington plums. From W. Thomas, beautiful Italian, damask, and Washington plums. O. Johnson presented several extra fine specimens of sweet Bow and red Astrachan apples; also, President peaches. From Dr. Howard, summer Bon Chrétien pears, yellow crab apples, and tomatoes. From J. F. Allen, beautiful George IV. and Grosse Mignonne peaches, and black figs.

From George Browne, Beverly, *Bezi Blanc pears. Rareripe peaches from Col. F. R. Bigelow. From S. Pond, a variety of plums, viz., Bingham, Italian Damask, Apricot, Washington, Isabella, white Gage, Imperial Gage and Royal de Tours. From A. Bowditch, apples, Bartlett pears and white sweetwater grapes. From H. Vandine, two kinds of plums. From S. Walker, Summer Francreal pears. From J. Low, Chelsea, Imperial gage plums. From the public garden, fruit of the *Passiflora edulis*. Cucumbers from John White.

August 27th. Exhibited—Flowers: From the President of the Society, dahlias, among which were Andrew Hofer, Widnall's Queen, Argo, Pickwick, &c. Hovey & Co. exhibited dahlias, including Maid of Bath, Grand Tournament, Highgate Rival, Argo, Andrew Hofer, &c. From P. Barnes, Constantia, Regina, Grand Tournament, Rouge et Noir, Eclipse, Widnall's Queen, Pickwick, and Metella dahlias. From H. W. Dutton, dahlias, among which were Primrose, Bloomsbury, Eclipse, Andrew Hofer, Haidee, &c. A great variety of dahlias and cut flowers from J. F. Trull

Fine Balsams and other flowers from S. R. Johnson. From John White, Widnall's Queen, Argo, Pickwick, Ne plus Ultra, and other dahlias. From William E. Carter, dahlias, white lobelia and bouquets. Dr. Howard exhibited dahlias and bouquets. From W. Meller, pinks, verbenas, roses, dahlias, and other flowers. From the Public Garden, a variety of dahlias. W. Kenrick exhibited *Papaver Marseillii* althæas, *Gladiolus natalensis*, coreopsis varieties, Noisette roses, dahlias, &c. From A. H. Hovey, *Gladiolus floribundus*, and a bouquet. Misses Summer, J. A. Kenrick, and A. C. Hale sent bouquets. Dahlias and bouquets from J. L. L. F. Warren. From S. Sweetser, dahlias and seedling fuchsia.

Fruit: From Col. T. H. Perkins, very fine specimens of the President peach, and two varieties of melons. From J. F. Allen, Royal George and Grosse Mignonne peaches, both handsome; also, summer Bon Chrétien, summer Francreal and Julienne pears. William Oliver presented specimens of the Tyson pear, first introduced into the vicinity of Boston by B. V. French, who received the scions from Dr. Mease of Philadelphia. The specimens were premature, and its qualities could not be ascertained, but it promises to be a fine early variety. From George Walsh, green gage plums. From A. Bowditch, Bartlett pears.

From Hovey & Co., very fine specimens of Duane's purple plum. From E. E. Bradshaw, Charlestown, very fine specimens of the Duane's purple. From S. Pond, a rich display of plums, consisting of the Washington, green gage, white gage, Smith's Orleans and Duane's purple. From S. R. Johnson, beautiful Washington plums. Capt. Lovett presented some fine Bingham and Prince's Imperial plums and Bezi Blanc pears, and a fine melon. From A. D. Williams, handsome William's Favorite apple. From Dr. J. C. Howard, Bergamot Rouge pears. From S. Salisbury, East Cambridge, black Hamburgh and St. Peter's grapes. From L. Stone, Watertown, fine Washington plums.

Vegetables: Good celery from J. F. Trull. From Capt. Lovett, fine purple brocoli.

ART. V. Faneuil Hall Market.

From		To		From		To	
	cts.		cts.		cts.		cts.
<i>Roots, Tubers, &c.</i>				<i>Squashes and Pumpkins.</i>			
Potatoes, new:				Squashes:			
Chenangoes, } per barrel..	1 00	1 25		Bush summer, per dozen..	8	12½	
} per bushel,.	50	—		Summer Crookneck, doz..	8	12½	
Common, } per barrel,...	1 00	—		Autumnal Marrow, per lb.	2	3	
} per bushel,...	37½	—		Canada Crookneck, per lb.	4	5	
Sweet, per bushel,	1 50	—		<i>Fruits.</i>			
Turnips, per bushel,	50	75		Apples, dessert and cooking:			
Onions:				Porter, per bushel,	1 00	—	
Red, per bunch,	2½	3		Common, per bushel,	50	75	
White, per bunch,	2½	3		Sour Bow, per bushel,	75	1 00	
Yellow, per bushel,	62½	75		Sweet, per bushel,	1 50	—	
White, per bushel,	62½	75		Siberian Crab, per peck..	50	—	
Beets, per bushel,	50	75		Pears, per peck:			
Carrots, per bushel,	50	75		Bartlett,	75	1 00	
Horseradish, per pound,	8	12½		Cushing,	75	—	
Garlic, per pound,	12½	—		Andrews,	50	75	
<i>Cabbages, Salads, &c.</i>				King of Wirtenburg,	50	75	
Cabbages, per dozen:				Hannas,	1 00	—	
Early kinds,	37½	—		Baking,	50	—	
Drumheads,	50	—		Plums, per quart:			
Savoys,	37½	50		Green Gage,	25	—	
Brocolis, each,	8	12½		Washington,	25	37½	
Cauliflowers, each,	12	—		Common,	20	25	
Lettuce, per head,	2	3		Damson, per peck,	75	1 00	
Celery, per root,	8	12½		Peaches, per peck:			
Peppers, per pound,	3	—		Extra,	1 00	—	
Okra, per dozen,	6	10		Common,	50	—	
Sweet Corn, per dozen,	6	—		Water-melons, each,	12½	25	
Beans, string, per half peck:				Musk-melons, each:			
Cranberry,	10	12		Common,	12½	25	
Shelled, per quart,	8	10		Green Citron,	8	12½	
Common:	8	10		Cucumbers, per dozen	6	—	
Sievas,	12½	—		per hund. (for pickling)	17	—	
Limas,	17	—		American Citron, per pound,	2	3	
Cucumbers, (pickled) pr gal.	25	—		Egg Plants, each,	12½	—	
Peppers, (pickled,) per gallon	37½	—		Mangoes, per dozen,	17	—	
<i>Pot and Sweet Herbs.</i>				Tomatoes, per peck,	12½	17	
Parsley, per half peck,	20	—		Grapes per pound, (forced):			
Sage, per pound,	17	20		Black Hamburg,	50	75	
Marjoram, per bunch,	6	12½		White Sweetwater,	37½	50	
Savory, per bunch,	6	12½		Cranberries, per bushel,	—	—	
Spearmint, green, per bunch,	3	4		Pine-apples, each,	12	25	
				Lemons, per dozen,	25	37½	
				Oranges, per doz. (Sicily),	37½	50	

REMARKS.—The month of August has been a cool and rather unpleasant month: cloudy days, accompanied with a considerable quantity of rain, have prevailed, and though rain was greatly needed, the quantity of water which has fallen within the last few days has been very great. The ground is now completely saturated, and there will be no danger of the crops, from drought, for the remainder of the season.

Vegetables.—Potatoes have come in remarkably abundant for the season; this, with the present depressed state of trade generally, has caused a great fall in prices, and lots of good quality have been sold as low as five shillings the barrel, varying from that to our quotations, according to the quality and quantity to be disposed of: there is no doubt but the price of potatoes will be quite low the coming winter: sweet potatoes of the new crop have just made their appearance. Onions are abundant, but not of large size. Beets and Carrots are now supplied by the bushel or barrel, and our quotations are altered to that effect. Horseradish now comes to hand, principally for pickling. Cabbages are abundant, cheap, and good. Broccoliis are now brought in. There has been a very good supply of Sieva and Lima beans, as well as the common sorts. We have had, for the first time we believe, Okra for sale, but it is yet very little known. Peppers are tolerably abundant. Celery comes in now of fair size. Squashes are rather scarce, particularly autumnal marrows, of which the crop is quite light; the cold weather of early June nearly ruined the plants. Summer squashes have been abundant.

Fruit.—The fruit market is abundantly supplied with an unusual variety of new fruits, especially of pears, but, as in all seasons of plenty, the quality falls short of that in seasons less abundant. Apples are cheap, but a greater portion of those brought in are wormy; fine Porters command good prices. Pears are plenty, and prices low: good Bartletts and other sorts are now selling by the peck rather than by the dozen, as is usually the case. The crop of plums would have been exceedingly large and good, but for the late rains, which have cracked and rotted the fruit, so that only a small portion remains: there is seldom a season that they rot in such quantities upon the trees. Peaches are very plentiful, and before our next report, will have fallen in price as low as last season. Berries of all sorts are gone. Tomatoes are very abundant and well grown. Grapes of fine quality are scarcer than usual. Melons are plentiful and good. Cucumbers are nearly out of season, except for pickling. No new cranberries have yet come to hand. Lemons are higher.—*M. T., Boston, Aug. 27, 1842.*

HORTICULTURAL MEMORANDA

FOR SEPTEMBER.

FRUIT DEPARTMENT.

Grape vines will now be ripening off their fruit, and by the last of the month, probably a larger part of it will have been cut. Attend now to giving an abundance of air in all good weather, and close up early in the afternoon. The ripening of the wood will now be the principal object. Continue to disbud, and prune off any superfluous wood, and if the vines are trained in the spur system, do not let them

get entangled by neglect of pruning and tying up the shoots. Sprinkle the walks to create a moist atmosphere, but do not apply the syringe.

Strawberry beds may be set out during all the month, and they will form fine roots. Keep last year's beds free from weeds, and after selecting out the earliest and best runners, cut off all the straggling and weak ones. In setting out new sorts, deficient in *staminate* plants, see that the early Virginia, or some other kind with perfect flowers, are placed in parallel beds, or there will not be a full crop. Water freely if dry weather ensues after planting.

Raspberry vines should have the old wood which has borne fruit cut out, so as to give the new wood a good chance to ripen.

Budding may yet be performed, particularly on peach trees; such other trees as part with the bark freely may also be budded: be careful, in the selection of buds, that the wood is ripe.

FLOWER DEPARTMENT.

Dahlias will continue objects of care; they will need looking over at least once a week: such as require it should then be tied up to the stakes, so as to secure all the branches against danger of breaking by high winds, at the same time cutting away all superfluous shoots, and nipping off deformed buds and the remains of expanded flowers. Mulching the roots is also a good plan to guard against drought. Syringe occasionally with the whale oil soap, to keep down insects.

Chrysanthemums should be repotted again the latter part of the month, if it is desirable to produce a fine bloom.

Roses may yet be propagated by cuttings.

Geranium plants cut down last month, will now have pushed new shoots: they should be taken out of the pots, and the old roots and earth shook off, and the plants put into small sizes in good, rich prepared soil.

Cactuses may be increased by graftings or by cuttings.

Oxalises of all the winter flowering sorts may be potted this month.

Camellias will need liberal supplies of water at the root, and repeated syringings. Look out now and save the seeds of such as have been impregnated. Repotting the plants should commence this month before they are put into the house.

Primula sinensis.—Seedlings should now be pricked off into small pots.

Verbenas should yet be layered into small pots.

Tree pæonies in pots may be shifted into larger sizes, if crowded with roots.

Pansies may be propagated now more successfully than at any other season.

Cyclamens may be repotted this month.

Erythrina.—Roots of this fine plant should be taken up after they have done flowering.

Ten Week Stocks sown in August, should now be potted off into small pots.

Amaryllis and *Tiger flower* bulbs may be taken up the latter part of the month.

THE MAGAZINE
OF
HORTICULTURE.

OCTOBER, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *On a method of destroying the Canker Worm Grub.* By JOHN PORTER, Esq., Newburyport, Mass.

HAVING seen, in your valuable Magazine for this month, an article describing the best method for the destruction of the canker worm, I am induced to state the result of an experiment made by myself. The trees on which I tried the experiment, had been exposed for five or six years to the ravages of the grubs, without taking any steps to prevent them; and therefore it is fair to infer that the ground contained a bountiful supply for their future operations.

Around each tree I placed a square box, about twelve or fourteen inches high, made of rough boards, leaving a space of four or six inches between the box and the tree. A ledge of about two inches in width was nailed entirely round the top of the box, and the box was inserted two or three inches into the ground, for the purpose of keeping it steady. On the outside of the box, and under part of the ledge, I tarred frequently, and the grubs were thus prevented from ascending from the outside. I filled the inside of the box about two thirds full of cotton waste (which can be obtained at any cotton manufactory for a cent per pound, or less,) well pounded down, and this effectually prevented them from ascending from the inside. If, however, a few grubs should succeed in getting over the tar from the outside, they have to descend the inside of the box until they reach the cotton waste, and crawl over that until they reach the tree. This they cannot do, as they immediately become entangled by the cotton, and cannot proceed. I have tried this two years in succession, and I have not had a worm on trees, which, for several years

previous, had been entirely denuded by this enemy of the apple tree.

The expense is very trifling, as any common boards will answer, and any person who can use a fore-plane, a saw, and a hammer, can easily prepare the boxes.

No possible injury can result to the tree, for the tar does not touch it; and as soon as the season is over for the grubs to ascend, I remove the waste, and spread it to dry for another season, and in this way it will answer for use several years.

I feel entirely satisfied that the foregoing plan will effectually put an end to the ravages of the detestable grub-worm, and I hope that all those who have trees worth preserving, will try the experiment.

Yours, respectfully,

JOHN PORTER.

Newburyport, Sept., 1842.

ART. II. *Some account of the origin, cultivation, and fruit of the Ohio Ever-bearing Raspberry.* By A. H. ERNST, Nurseryman, Cincinnati, Ohio.

LAST spring I had an occasion to send a few things to some friends in your vicinity. I availed myself of the occasion to present you with one dozen of the Ohio Ever-bearing raspberry plants, which I hope you have received.* I feel some desire to aid in spreading this fruit over the country; less, however, to the *north* than to the *west* or *south*, because your region is more congenial with the growth of the raspberry, and abounds in fine high flavored fruit, of superior quality, which continues to fruit abundantly during the latter part of the summer, so that, to a great extent, the deficiency does not exist with you, which would make this raspberry particularly valuable to your section of country.

The Ohio Ever-bearing raspberry, as you are aware, is a native of Ohio. It was, I think, first found and brought into notice by a community of Shakers, residing some thirty miles

* We did, in excellent order, and Mr. Ernst will receive our thanks for his attention.—*Ed.*

north-east of this city, from whence, from the best evidence I can procure, it has been very slowly spread into this city and vicinity. To my mind, it is valuable as a constant bearer: it has none of those claims, however, for superior size and flavor, set up for it; with me, it commences bearing, and ripens its fruit, with most other varieties, in June, which is full and abundant, when it continues to send up a succession of strong and vigorous shoots from the roots of the old plant, which keep up a succession of bloom and maturing fruit the remainder of the summer, not however so profusely as the first fruiting, though of larger size, and, I am inclined to think, of better flavor. This circumstance is, perhaps, owing to the fact, that there is less rain and more sun in the latter part of summer than in June. The fruit is black, strongly resembling the black raspberry of our hills and mountains in size and flavor, and, like it, propagates itself from the ends of the new shoots, which branch just below the cluster of fruit, on the end of the same; those branches grow beyond the cluster of fruit, and bend themselves over to the ground, and again fork, near the end, into several parts; on the ends of these sub-branches roots are formed, which fasten themselves into the ground, and thus form new plants. The roots of the mother plant continue to increase in size and strength, throwing up a greater succession of fruit-bearing stems to occupy the place of the first bearers, which invariably dry up after they have performed the office of producing one crop of fruit.

When I say it has no claims to the high reputation for flavor set up for it by some of the writers who have noticed it, I do not mean to be understood as denying it all claim to the same; I only wish to correct what I believe, with due deference to the tastes and judgments of the respectable gentlemen who have written on this valuable fruit, to be an error; my desire is to do it justice, and I think this will be found to be ample, on trial, to recommend it to the favorable attention of the public, and to occupy a conspicuous place in the fruit department of every well selected collection. It cannot fail to prove a valuable kind in the vicinity of all large cities, as a market fruit. To give you some idea of the productiveness of this plant, I counted 105 berries in their various stages on the end of *one stem*, forming *one cluster*.

Considerable has already been written upon this valuable fruit; but if you think the above will tend to promote its dis-

semination, and be of interest to your readers, you are at liberty to publish it in your useful Magazine.

I remain, yours, with much respect, A. H. ERNST.

*Spring Garden, near Cincinnati, }
Ohio, August 31, 1842. }*

ART. III. *On the cultivation of the Raspberry.*

By the EDITOR.

IN our last number, we gave an article on the cultivation of the currant. It was the first of a series of papers we intend to offer upon the cultivation of all the fruits of the garden, which have not been previously written upon by ourselves. We now proceed to treat upon the growth of the raspberry.

The raspberry, like the strawberry and currant, and other small fruits, the gooseberry excepted, has been greatly neglected in its cultivation. Though common in every garden, and every where esteemed, next to the strawberry, for its rich and handsome fruit, yet few individuals have attempted improved methods of growth, by which the size, beauty, excellence, and productiveness of the berries may be increased to a much greater degree than they are generally seen in our gardens.

The raspberry is as susceptible of improvement as the strawberry: yet, while in the latter we have the beautiful Keen's seedling and our own variety, contrasting with such marked superiority over the small and inferior berries of the older sorts, the same varieties of the raspberry are now cultivated that were common twenty or thirty years ago, and they are still deemed the most desirable sorts. The same attention bestowed on this fruit, that has been devoted to the gooseberry, would undoubtedly have resulted in the production of varieties much superior to those at present grown.

The raspberry, like the strawberry, is a native of low and partially shady situations, growing in boggy or soft black soils, which allow its roots to strike deep, and throw up a free growth of its vigorous suckers. It is only in such situations, in their wild state, that the plants are found productive; on

light and thin soils, and in high and exposed situations, the growth of the suckers is limited, and the fruit scarcely ever attains any size. Nature thus teaches the proper mode which the cultivator should adopt in the growth of the plants; and it should be his object to follow her, rather than to divert and thwart her in the course she has pointed out for us to pursue.

But how different is the cultivation of the raspberry from what we should infer from nature to be most conducive to its healthy growth. The plants are frequently set out in light and poor soils, crowded together, left untrimmed, choked up with a profuse growth of weak stems, and what little fruit they produce nearly dried up, from the arid situation in which they are placed. On the contrary, in cool, deep, and moist soils, in a sheltered and partially shaded place, the plants throw up suckers to the height of six or eight feet, and produce a profusion of large, handsome, and well flavored berries. So well assured are the most eminent English cultivators of the raspberry, of its love of a cool and moist soil, that some writers have strenuously recommended the use of bog earth and rotten leaves, in the place of the richest loam. We are well assured that the many complaints which are made of the meagre produce of many raspberry plantations, may be attributed wholly to the light and droughty soils in which they are often planted.

We would not here omit to mention the production of seedlings for the purpose of securing new sorts. By hybridization of the kinds, and by selecting the finest and largest fruit, from which to save the seeds, we are certain new and superior varieties can be raised.

To induce cultivators to give more attention to the raspberry, is the object of this article; and, to render our information the more useful, we shall treat of its growth under the following heads:—Situation—Soil—Procuring Plants—Planting out—Winter Treatment—Summer Treatment—Autumnal Dressings—Pruning—General Remarks—and Descriptions of the different Varieties.

Situation.—A cool aspect is of material consequence; and to secure this, the north side of a fence or trellis, which will form a screen from the sun, is the most favorable: on the north side of a shrubbery, or row of fruit trees, is also a suitable place. If neither of these situations are to be had, an open spot in the garden may be chosen, always being careful to avoid the south or east side of a fence. A temporary

shade may be effected in the open garden, by planting a row of running beans on the south side. Having selected a proper place, proceed to prepare the soil.

Soil.—A good soil is the most important requisite. Having marked out the size of the bed, if the earth is not naturally very rich and deep, preparations should be made to trench it. First cover the surface with three or four inches of bog earth, if to be procured, or, in its place, leaf soil, and if these are not conveniently to be had, good old rotten hot-bed manure, which has laid at least six or eight months: that from hot-beds made in April will do for use in the following October, and if a portion of the bed was leaves, it is so much the more to be preferred. Having spread the manure upon the surface, it should then be trenched in two spades deep, or about eighteen inches, placing the manure at the bottom of the trench. Level the surface, and spade in an inch or two more of the same kind of manure, and after allowing a week for the bed to settle, it will be ready for planting.

Procuring Plants.—The success of planting out depends considerably upon a judicious selection of plants. Suckers of all sizes are generally thrown up, and many cultivators would naturally select the largest: such, however, are not the best; those of medium size, neither too large nor too small, have the finest roots, and spread more rapidly than the others. In selecting, reference should be had to the roots rather than the tops.

Planting out.—Having prepared the beds, and secured a sufficient number of plants, preparations may be made for setting out. A spade, a rake, and a garden hoe will be the proper implements to accomplish this. The bed being marked out, stretch the line across the bed, from east to west, at the distance of two feet from the walk: commence on either side of the line at one end, by taking out the earth the width and depth of the spade; place in the plant against the line, and throw the soil out of the second hole to fill up the first: in this way proceed until the whole bed is planted, treading the soil lightly around each plant; with the rake smooth and level the whole, and the work is finished. The rows should be three feet apart, and the plants three feet apart in the rows.

Winter treatment.—On the approach of cold weather it will be necessary to protect the plants for the winter. The best method of doing this is simply to bend the branches down to the ground, and cover them with four or five inches of the

soil. Some cultivators use leaves, and others coarse manure, but we believe nothing answers better than the common soil in which they grow.

Summer treatment.—As soon as danger of cold weather is over, which is generally the first of April, the plants should be uncovered, and a stake placed to each, to which the stems should be securely tied: the first summer very little must be expected from the plantation, and only a few suckers will be thrown up from each plant; but by the second year they will be more numerous, and produce considerable fruit. As soon as the plants are tied up, proceed to level the ground, and give it a neat finish with the rake: the only after culture is to keep down the weeds, and the surface loose, by occasional hoeings.

Autumnal dressings.—Enriching the bed at the time of planting is not sufficient to keep the plants in good condition. The beds should have a dressing of two or three inches of compost every autumn. This should be laid on in October and lightly forked in, bearing in mind that a mixture of bog earth, or leaf soil and manure, is better for the plants than all manure. This will encourage the growth of the roots, and in the spring, the suckers which are thrown up to form the bearing plants of the next season, will be much stronger.

Pruning.—The raspberry can hardly be said to need pruning in the common acceptation of that term. All that is required is to shorten the most vigorous bearing stems, and to cut away the old wood after it has produced its fruit. The second summer after planting, the plants will throw up a quantity of suckers: if numerous and small, four or five of the best should be left their entire length; if large and strong, they should be shortened to four or five feet, and the superfluous ones rooted up, unless wanted to form new plantations.

General Remarks.—As the raspberry is a rapid grower, after it once takes hold of the soil, quantities of suckers will spring up, which, in the course of four or five years, will weaken the plants. On this account new plantations should be made every fifth or sixth year, and the soil trenched and renewed by the application of the compost already mentioned.

The raspberry is rarely attacked by insects. We are not aware that we have ever been troubled with any during our cultivation of this fruit, for upwards of fifteen years. On this account, it requires very little care at the hands of the culti-

vator. As a market fruit it is particularly worthy of attention, requiring less care than the strawberry, easier picked, and the finer sorts commanding a good price.

The following is a list of the best kinds now cultivated. A few of them are new, and, as yet, not very extensively known. The kinds we would recommend for a small collection are the white and red Antwerp, and the Franconia; for larger gardens, all the others may be added, which will afford a great variety, and a succession of fruit. The names, with the exception of the three last, are according to the London Horticultural Society's *Catalogue*.

DESCRIPTIONS OF THE DIFFERENT VARIETIES.

Red Antwerp.—Of fine size, excellent flavor, and productive; one of the best.

Yellow Antwerp.—*Syn.* white Antwerp. Similar to the last, except in the color of the berries; a delicious fruit, but does not bear carriage well.

Barnet.—*Syn.* Cornwall's Prolific. A fine, large, red fruit, productive and excellent, but does not bear carriage well.

Common red.—*Syn.* Old red. The old kind of the garden. An indifferent bearer, and of inferior quality.

Double bearing.—*Syn.* Perpetual bearing. Said to be a good and productive kind, having the merit of producing one crop in July, and another in September.

Franconia.—*Syn.* Seedling Grape. One of the most productive and finest kinds cultivated around Boston. Fruit red, large, and handsome. The origin of this sort is unknown. It was originally received from Vilmorin, of Paris, by S. G. Perkins, Esq., of Brookline.

New red Antwerp.—A notice of this will be found at page 256. It promises to be, so far as we have tried it, a very fine variety.

Cretan red.—A fine variety, the fruit large and handsome, rather more tart than the Antwerp, and continues in bearing a long time, which renders it highly valuable.

Besides the above eight sorts, the *new Turkish Turban*, *Victoria*, *Brentford*, *Spring Grove*, and the *Ohio Ever-bearing*, are recommended as very fine kinds. To those who have room, we would advise a trial of them.

REVIEWS.

ART. I. *Chemistry in its application to Agriculture and Physiology.* By JUSTUS LIEBIG, M. D., Ph.D., F. R. S., M. R. I. A., Prof. of Chemistry in the University of Gessein, &c., &c. Edited from the manuscript of the author, by Lyon Playfair; with very numerous additions, and a new chapter on Soils. Third American, from the second English edition; with Notes and an Appendix, by John W. Webster, M. D., Erving Prof. of Chemistry in Harvard University.

It is but little more than a year since we reviewed the first edition of this celebrated work, and but a short time since we noticed the second. The third is now before us, with very numerous additions and corrections from the London publication, furnished by the editor, Dr. Playfair. The whole arrangement of the volume has been altered, and the more important subjects treated upon separately, and in a manner more lucid than in either of the preceding editions.

The rapid sale of this volume is an evidence of the increasing interest which is felt in the important subject of Agricultural Chemistry. We hail it as the commencement of a new era in practical agriculture, and destined to be the means of greatly increasing the fertility and the products of our farms.

ART. II. *Address delivered at Washington, Miss., before the Agricultural, Horticultural, and Botanical Society of Jefferson College.* By B. L. C. WAILES, President of the Society, on the 29th of April, 1842. Pamphlet, 8vo. 20 pages. Natchez: 1842.

AN interesting address, from which we extract the following, in relation to the origin of the Society:—

This Society was formed in April, 1839, and we now present you, at our eighth exhibition, some evidence that it has exercised a beneficial

influence, and been instrumental in effecting a decided improvement in the condition of the country. In the three years of its existence, occasion has been afforded for awarding the certificate of the Society to one hundred and thirty-four objects deserving this consideration, for their excellence and superiority over others exhibited, most of which were inferior only by comparison.

In this period, and chiefly within the last year, the extent to which valuable improved stock has been introduced into the State, bids fair to render us, in a short period, independent of foreign supply for those indispensable articles, provision and farming stock, to procure which has hitherto been so exhasting a drain upon our resources.

That the feeling of the community has been greatly excited in behalf of agricultural improvement—that a desire of information, touching this most vital of our interests, has taken a firm hold on the public mind, is becoming daily more obvious. It is apparent in the daily conversation of our planters, and is witnessed in their projected improvements and progressing enterprises.

It is manifested in the establishment and increased circulation of periodical publications devoted to agriculture, and in the tone of the newspaper press, in which space greater than usual has been allotted to its interests.

Articles calculated to enlighten and inform the planter, scientific essays and dissertations of practical utility, find admission into their columns, and are coming more frequently to take place of those bitter personal denunciations and angry recriminations of political warfare, in which only a depraved and vitiated taste, or an excited imagination, can take pleasure. The conductors of the public press, in *many* instances sharing in the general and growing disgust of political strife, have discarded the badge of party, and, adopting a course more congenial to the times, have espoused the cause, if they have not become wholly devoted to the interests, of agriculture.

Of this association, specially, little more need now be said. Its acts will best proclaim its merits, and claim for it that consideration and encouragement which it may be found to deserve.

The address closes with the following remarks upon the pursuits of horticulture:—

Akin to the profitable and pleasant pursuit of horticulture, the formation of pleasure grounds becomes almost identified with gardening. The gratification which these afford to all classes loses none of its zest from its easy attainment, and we prize them in the degree in which they are the productions of our own skill, and the results of our own industry.

From the humanizing and refining influence they exert, there is no expenditure of the surplus means of the affluent more rational, than in their creation; and there is no better evidence of cultivated taste and elegant enjoyment, than is presented in those fine horticultural establishments, those spacious pleasure grounds which embellish our country, and vie in richness with the princely establishments of other climes. Whether as the appendages of the imposing mansion, or of the rural cottage, they are alike attractive, and afford within their bounds a little world for contemplation and study.

Reposing in their refreshing shades, the weary and the care-worn yield to their tranquillizing influence and muse on the infinite beauties of nature, whilst the heart sends up its aspirations of gratitude to the Great Architect of the Universe, whose wisdom and goodness is shown in every plant, and revealed in every flower. In the quiet seclusion of the rural retreat, the social virtues expand—female influence is supreme, and domestic happiness enthroned.

Who does not then commend that taste, which, by such embellishments, tends to make home more attractive, and woman more lovely?

MISCELLANEOUS INTELLIGENCE.

ART. I. *Massachusetts Horticultural Society.*

Saturday, Sept. 3, 1842.—An adjourned meeting of the Society was held to-day—the President in the chair. No business of importance was transacted, and the meeting was adjourned one week to September 10th.

Exhibited.—Flowers: From the President of the Society, dahlias, including a variety of kinds. From Messrs. Winship, a flower of *Cereus triangularis*. From Hovey & Co., dahlias of several kinds, and bouquets. From W. E. Carter, dahlias, *Bigoniæ grandiflora*, *Magnolia glauca* var., red water lily, bouquets, and a fine specimen of a seedling phlox, white, with a delicate stripe running through the petals; it promises to be a valuable and novel variety. From Dr. J. C. Howard, dahlias and bouquets. From P. Barnes, a variety of dahlias and German asters. From S. R. Johnson, roses, fine balsams, and German asters. From W. Kenrick, roses and bouquets. Verbenas from T. Mason, East Boston.

From J. F. Trull, a variety of good dahlias, also German asters, verbenas, and other flowers. From H. W. Dutton, fine dahlias. J. Cadness, of the Public Garden, exhibited a variety of dahlias. From A. Bowditch, dahlias. From A. H. Hovey, a fine specimen of *Gladiolus floribundus*. From A. C. Hall, Roxbury, German asters. From J. L. L. F. Warren, a variety of dahlias and bouquets. Bouquets and cut flowers, dahlias, &c., from W. Meller. From S. Sweetser, dahlias, white, blush, and yellow tea roses, Triumph of Luxemburg and yellow noisette roses, seedling verbenas, *Phlox Drummondii*, *Gladiolus natalensis*, &c.

Fruit: From R. Manning, Ananas d'Été, Cabot, Hampden Bergamot, Dearborn's Seedling, Williams's Bon Chrétien, and Bourré d'Amanlis pears, the latter large and fine; also, early York, and Walter's early peaches, and Dominic Dull plum. From A. P. Heartt, Troy, N. Y., some fine specimens of plums, particularly the Washington, viz. white Magnum Bonum, purple Magnum Bonum, Washington, green Gage, and blue Gage: a letter accompanied the fruit, which was read

before the Society. From O. Johnson, summer Thorn, Williams's Bon Chrétien, Julienne, summer Franc Real, Dearborn's seedling pears, and a variety without name; also, fruit of the *Podophyllum peltatum* or May apple. From Wm. Oliver, Dorchester, specimens of the Tyson pear, a newly introduced native variety. From B. V. French, Devonshire Quarrendon, Garden Royal, and long red apples without name. White Gage and green Gage plums from Geo. Walsh. Black Hamburg grapes from J. Cummings, Jr., Woburn. From J. F. Allen, Bon Chrétien pears, black figs, and fine peaches.

From the President of the Society, Belle Lucrative and Beurré d'Amanlis pears, both fine specimens. From N. D. Chase, Lynn, beautiful early Crawford peaches, grown under glass. From Mrs. Bigelow, handsome peaches. From Dr. J. C. Howard, Belle de Vetry (?), and Grosse Mignonne peaches; also, Henri Van Mons pears, and Violet nectarines. From Capt. J. Lovett, large long blue plums of handsome appearance, and a musk-melon. From Rev. G. B. Perry, Bradford, early Bow, Gravenstein, and a seedling apple. From S. Pond, large long blue, Diamond, and Lombard plums; also, handsome Cushing' pears. From Dr. S. A. Shurtleff, Brookline, Surpasse Virgoulouse, and Van Mons Kenrick pears; also, Hawthorndean, and four other sorts of apples, without names. From W. Meller, Andrews, and Williams's Bon Chrétien pears. From A. Bowditch, Williams's Bon Chrétien and Chelmsford pears, and black Hamburg grapes. From J. F. Trull, Williams's Bon Chrétien pears, Siberian crab apples, and tomatoes. Beautiful tomatoes from S. Butterfield, West Cambridge. From J. L. L. F. Warren, handsome Porter apples, Julienne pears, plums, and Cornelian cherries.

Sept. 10.—An adjourned meeting of the Society—the President in the chair. No business of importance was transacted. Adjourned one week to Sept. 17th.

Exhibited.—Flowers: From the President of the Society, a few dahlias. From Hovey & Co., Pickwick, Maid of Bath, Victory, Metella, Unique, Marshal Soult, Striata formosissima, &c. From P. Barnes, Grand Tournament, Ne Plus Ultra, Miss Johnson, Maria, Andrew Hofer, &c. From J. F. Trull, a variety of blooms, some very fine. From H. W. Dutton, several blooms, including a fine Maid of Bath. From S. Sweetser, upwards of sixty blooms, including a superb specimen of Virgin Queen. From J. L. L. F. Warren, several dahlias, among which was a beautiful flower of Primrose. Dahlias were also shown by J. F. White, W. McClure, J. Stickney, J. Cadness, and others. Bouquets from J. Hovey, W. Kenrick, W. E. Carter, and Hovey & Co.

Fruit: From O. Johnson, fine Andrews and Julienne pears. From George Brown, Williams's early, Jalousie, and Seckel pears, and a variety from Paris, Me., without name; also, handsome peaches without name. From N. D. Chase, Lynn, very beautiful early Crawford peaches, raised under glass. From W. Thomas, Thomas, and Bleeker's gage plums. From E. Brown, Lynn, Harvard, Vallee Franche, and Williams's Bon Chrétien pears. From S. R. Johnson, fine Williams's Bon Chrétien pears. Beautiful Moore peaches from T. Hastings, East Cambridge. From A. Bowditch, black Hamburg grapes, and Williams's Bon Chrétien pears. Seed-

ling peaches, very handsome and large, called the Henry Clay, from F. W. Lincoln, Canton. From J. L. L. F. Warren, Porter apples, and Lemon clingstone, George IV., red Rareriipe, Teton de Venus, Grosse Mignonne, and two varieties of seedling peaches. From Dr. J. C. Howard, Smyrna, Napoleon, and green citron melons; also, Orange, common red, and Cuba tomatoes. Very fine specimens of peaches from J. H. White, gardener to Col. Perkins. Three varieties of seedling pears were presented by Prof. Russell, from Joshua Wilder, Hingham; they appeared to possess qualities which will render them worthy of cultivation.

Sept. 14th, 15th, and 16th.—The Fourteenth Annual Exhibition of the Society took place on Wednesday, Thursday, and Friday, the 14th, 15th, and 16th of September, at the Society's room, Tremont Row.

The arrangements for the exhibition were much the same as those of last season. It was suggested that a larger hall should be procured, as the Society's room is altogether too limited in its space to accommodate the increasing contributions of the members; but no suitable place could be obtained in season, and other arrangements prevented this being carried into effect. We trust, however, that another year, the exhibition will be held where the decorations will show to advantage, and where the public may be better accommodated.

The number of pot plants was greater than last year, and comprised a better and more select variety of kinds. Among the most conspicuous of these was a fine large *Lagerstrœmia indica*, belonging to the President, upwards of eight feet high, and proportionally broad; it was in full bloom, and was deservedly admired. Several fuchsias, from the Botanic Garden and S. Sweetser, were elegant objects, and added much to the display. The noble Fan Palm, (*Chamœrops humilis*,) from the collection of Mr. Cushing, was a most imposing object: a fine date palm (*Phœnix dactylifera*) contrasted well with the other plants. *Achimenes coccinea*, well grown, and in fine bloom, *Russellia júncea*, and a fine tall specimen of the elegant *Abùtilon striatum*, from the Public Garden, were each very showy. In addition to these, several plants were exhibited, grown in soil to which *guano* had been added: these were more particularly intended to illustrate the experiments of Mr. Teschemacher, who delivered the annual address, in which he referred to these plants.

The decorations of the room were in good taste, though in far less profusion than last season. A pyramidal bouquet from Messrs. Winship, was one of the showiest objects. A large bouquet of dahlias by Mr. Warren, and another by Dr. J. C. Howard, was much admired. The unfavorableness of the weather for several preceding days, had very much injured flowers of all kinds, and the difficulty with which good ones of any sort were to be obtained, tended to prevent so rich an exhibition as might otherwise have been expected.

The fruit was excellent, but not in so great variety, or in such profusion, as last year. Mr. Manning sent a large number of pears, apples, peaches, &c. The President exhibited a number of specimens, most of fine appearance and good size. Mr. O. Johnson's and Mr. Vose's fruits were exceedingly fine. But what was more

luscious than all, was a basket of nectarines and peaches, forming the base of a pyramid, which supported several clusters of grapes from Mr. Cushing's large and extensive collection: the Muscat of Alexandria were rich indeed, and berries of the black Hamburg were of monstrous size, many of them measuring three to four inches in circumference. An immense large cluster of the black Hamburg was sent by Joseph Grennell, Esq., of New Bedford. Very fine grapes and peaches from Col. Perkins's vineries. Apples from Mr. French. A most beautiful display of peaches was made by J. Hill; it consisted of several baskets of the Lemon rareripe, large, handsome, and very deeply colored. But these are only some of the more remarkable of the fruits exhibited. Every collection contained something worthy of notice; and the names of all the fruits exhibited will be given in our report.

Owing to the cold and inclement state of the weather during the two last days of the exhibition, there was not so large an attendance of visitors as usual. Had the weather been warm and favorable, owing to the great number of strangers in the city, the exhibition would have probably been better attended than any previous one.

On Friday, the 16th, at 12 o'clock, noon, an address was delivered before the Society, at the Swedenborgian Chapel, by J. E. Teschemacher, Corresponding Secretary of the Society. The address was replete with useful information, detailing some experiments with guano. At a future opportunity we shall refer to it again.

In the evening, the members, with their ladies and invited guests, sat down to a dinner at Concert Hall, of which we shall speak at the conclusion of our report.

The arrangements of the exhibition were executed under the direction of Mr. Walker, the Chairman, to whom the Society is indebted for the sacrifice of much time, and his exertions in completing the exhibition. To Messrs. Haggerston, Story, McLennan, and many others, is due great praise for their ready assistance in decorating the room, and carrying out the arrangements of the committee.

Our Report is as follows:—

PLANTS.—From the President of the Society, a large plant of *Lagerstrœmia indica*. From J. P. Cushing, Esq., *Chamærops humilis*, *Phœnix dactylifera*, *Amaryllis Belladonna*, *Ardisia crenulata*, *Poinciàna insignis*, diosmas, oleanders, roses, &c. From W. E. Carter, *Cereus senilis*, *Campânula pyramidâlis*, *Hakea gibbosa*, *Beaufortia decussata*, *Fuchsia globosa*, stricta, and grandiflora, *Nerium couraurium*, &c. From Messrs. Winship, orange trees in fruit, *Tecoma capensis*, *Agapanthus umbellatus*, *Cereus speciosissimus*, *Allöysia citriodora*, two large *Salvia splendens* and fulgens, *Begonia discolor*, &c. From W. Meller, *Oxalis Bowiei* in bloom, *Fuchsia globosa* and tenella, myrtle orange, *Gloxinia speciosa*, seedling calceolaria, yellow and white tea roses, heliotropes, salvias, &c. From J. L. L. F. Warren, a large plant of *Maurândya Barclayana*, *Begonia* sp., *Cycas revoluta*, *Tecoma capensis*, orange tree in fruit, *Salvia splendens*, &c. From the Public Garden, *Russellia juncæa*, *Stapelia ambigua*, *Achimenes coccinea*, *Salvia patens*, *Abutilon striatum*, *Fuchsia fulgens*, cockscomb, camellias, &c.; some of these were potted in common soil, others with common soil and guano, and others in charcoal. From S. Sweetser, camellias raised

from eyes in 1840, 1841, and 1842; *Fúchsia grácilis* and *globòsa*, *Lechenaúltia formòsa*, blush tea and Triumph of Luxembourg roses, budded on tall stems, *Euphòrbia Poinsettii*, &c.

BOUQUETS AND CUT FLOWERS.—From Hovey & Co., a great variety of superb double German asters; also roses, verbenas, *Didíscus cærúleus*, *Phlóx Drummóndii*, scarlet zinnia, &c. From Josiah Stickney, a fine display of German asters. From J. F. Trull, German asters, verbenas, and other flowers. From W. Meller, roses, flowers of various kinds, and handsome bouquets. From S. R. Johnson, fine German asters and verbenas. Bouquets from J. Hovey. From W. Kenrick, a large basket of flowers, prettily arranged, and an immense bouquet, four feet wide and five feet high. From J. Breck & Co., German asters and tiger flowers. From Dr. J. C. Howard, a very large bouquet of dahlias, and several small ones. From W. E. Carter, bouquets, verbenas, and other flowers. From Messrs. Winship, a large and beautiful pyramid bouquet, finely arranged; also, a large number of blooms of the *Passiflòra alàta*. From J. L. L. F. Warren, a great bouquet of dahlias, displaying the letter W in the centre. From J. A. Kenrick, several fine bouquets. From S. Sweetser, German asters, verbenas, roses, &c. From Miss Little, Cambridge, fine balsams, and a bouquet of dahlias. From the President, a fine lot of Chinese roses.

DAHLIAS.—From the President of the Society, Marshal Soult, Primrose, Rouge et Noir, Maid of Bath, Pickwick, Unique, Constantia, Mackenzie's Perfection, Mrs. Jones, Uxbridge Magnet, Andrew Hofer, Eva, Argo, &c. From J. Stickney, Argo, Pickwick, Marshal Soult, Miss Johnson, Ne Plus Ultra, Metella, &c. From J. H. Trowbridge, Dorchester, Contender, Mrs. Rushton, Sarah, Marshal Soult, Heroine, Reliance, Unique, Virgin Queen, &c. From J. F. Trull, Mrs. Jones, Fireball, Virgin Queen, Pickwick, Rienzi, Hero of Tippecanoe, Mrs. Rushton, Bree's Rosa, Glory, Hylas, Marshal Soult, Ne Plus Ultra, Duke of Bedford, &c.

From Hovey & Co., Widnall's Queen, Pickwick, Eva, Bridesmaid, Metella, Le Grand Baudine, Andrew Hofer, Argo, Bishop of Winchester, Maid of Bath, Regina, Jones's Francis, Marshal Soult, *Sulphurea elegans*, Exemplar, Widnall's Eclipse, Quilled Perfection, Henry Fletcher, Yellow Perfection, Unique, Premier, *Striata formosissima*, &c. From D. Haggerston, Rienzi, Pickwick, Virgin Queen, Unique, Suffolk Hero, Rosa, Argo, &c. From W. Meller, a variety of blooms, some very good. From J. G. Sprague, Reliance, Miss Johnson, Rosa, Pickwick, &c. From A. McLellan, a variety of blooms, including several kinds.

From H. W. Dutton, Charles XII., Metella, Majestic, Mrs. Jones, Pickwick, Maid of Bath, Primrose, *Striata formosissima*, Marshal Soult, Hero of Tippecanoe, Conqueror of the World, Le Grand Baudine, Famosa, Lady Rae Reed, Constantia, Premier, Rienzi, &c. From S. Sweetser, Virgin Queen, Juno, Advancer, Reliance, Heroine, Lady Bruce, Castanda, Miss Scroope, Unique, Mrs. Rushton, Fireball, Sylph, Hope, Grace Darling, &c. From J. Breck & Co., a variety of blooms. From J. H. White, Pickwick, Duchess of Portland, Maria, Le Grand Baudine, Unique, Duchess of Richmond, Beauty of the Plain, Virgin Queen, &c. From H. K. Oliver,

Salem, a stand of fine blooms. Blooms were also shown by P. Barnes, W. E. Carter, A. Bowditch, J. L. L. F. Warren, and others, of which we have no list of the names.

The most beautiful and perfect dahlia exhibited was Widnall's Queen, in the collection of Hovey & Co. The next best flower was the Uxbridge Magnet, in the collection of the President. Virgin Queen, in the collection of J. F. Trull, was the best specimen of this variety we have ever seen. There were excellent flowers in the collections of other exhibitors, but the above are only those particularly remarkable among the newer kinds of the season.

FRUITS.—From the President of the Society, the following pears, viz:—Andrews, Napoleon, Bonne Louise de Jersey, Beurré Diel, Beurré Bronze, Autumn Superb, Monsieur le Curé, Belmont, Capiaumont, Chaumontel, Dutchess d'Angouleme, Glout Morceau, brown Beurré, Belle et Bonne, Bartlett, Prince's St. Germain, pear from Van Mons, Whitfield, King Edward, Ne Plus Meuris, long green, Wilkinson, Beurré d'Amanlis, Echasserie, Lewis, Cushing, Easter Beurré, Fulton, Rouse Lench, Young's Baking or Pound, Belle Lucrative, Queen Caroline, Cumberland, Fondante des Bois, Columbian, Catillac, Beurré d'Arenburg, Iron or black pear of Worcester, Doyenne Blanc, St. Michael, Buffum, Bleeker's Meadow, Dix, Seckel, Alpha, Thompson's Pope, Colmar, late Wilbur, French pear (unknown,) green pear of Yair, Pope's Quaker, Bezi de la Motte, Héricart, Bon Chrétien Fondante, Verte Longue d'Autumn, Urbaniste, Cantelope of New Haven, Rousselet de Rheims, Garnons, Bergamot de Paques, and Heathcot; also, Coe's Golden Drop, blue Imperatrice, Lombard, and Queteche or Prune plums, yellow red Rare-ripe and seedling peaches; and fall Harvey, Minister, Adams's sweet-ting, and two varieties of seedling apples.

From Robert Manning, Salem, pears, viz:—Belle et Bonne, No. 668 Van Mons, Shenk's, Rousselette de Meester, Muscadine, Glout Morceau, Cumberland, Passe Colmar, Ronville, Easter Beurré, Bezi de la Motte, Harvard, winter Nelis, St. Michael, Beurré Bronze, Forme Urbaniste, Calabash, Bon Turk, Urbaniste, Huguenot, Bon Chrétien, Seckel, Heathcot, Iron, Jalousie, Wilkinson, Henry IV., King Edward, Golden Beurré of Bilboa, Lammas, Belle Lucrative, Prince's St. Germain, Naumkeag, Dearborn's seedling, Beurré Duval, Andrews, Beurré Bosc, Capiaumont, Bonne Louise Royal, summer Thorn, Commodore, Beurré Van Mons, Poire d'Amour, Hannas, Beurré Diel, Bocquia, Beauchamps, Jalousie of Vendée, Lewis, Rouse Lench, St. Ghislain, Gilogil, Dundas, Washington, long green of Autumn, Duchess of Mars, Dix, Echasserie, Beurre d'Arenberg, Johannot, Alpha, Hays, Belle of Flanders, Surpasse Virgoulouse, Bartlett, Pailleau, Poire Cellestin, Hacon's Incomparable, Althoupe Crassane, Fulton, Roi de Wurtemberg, Catillac, Pound, Héricart, Dumortier, Chaumontelle, Monsieur le Curé, Cabot, Queen of the Low Countries, Marie Louise, Amanda's double, brown Beurré, Dutchess d'Angouleme, Quillettette, Beurré Amandes, Bleeker's Meadow, Pope's russet, John Dean, green sugar, great Citron of Bohemia, Capsheaf, Dearborn's (Van Mons,) Bonne Louise de Jersey, Bal Armadi, Cantelope, Syrian, Monarch, Buffum, Nouvelle Bousouck, long green, brown St. Germain, Beurre d'Angleterre, Sullivan, Josephine, Wilhelmina, Phillips, Bezi Montigny, and Beurré

d'Amanlis; Peaches—Crawford's early, Apricot peach, Malta, red rareripe, Hogg's Melacaton, yellow Alberge, yellow rareripe, Cole's early, Kenrick's Heath, Grosse Mignonne, Brattle's white, Hastings's rareripe, New York rareripe, Cutter's yellow rareripe, Walter's early; Plums—green gage, Kirke's seedling, and Italian Prune; Apples—Dutch Codlin, Reinette Cœur de France, yellow Bellflower, President, Gravenstein, Boxford, Rhode Island greening, Danvers winter sweet, Baldwin, Lyscom, Sam Young, summer Rambour, Haskell sweet, Canadian Reinette, fall Harvey, Pennock's red, Minister, green sweet, Baltimore, Ribstone pippin, Fameuse, English sweet, Cambuthethan.

From B. V. French, Braintree, the following pears—Monsieur le Curé, Julienne, Belle et Bonne, Grosse Bruxelles, Beurré d'Amanlis, Passe Colmar, Beurré d'Argenson, Mouille Bouche, Angleterre d'Hiver, Coffin's Virgoulouse, Sargent, St. Lezain, Vert Longue Panache, Bleeker's Meadow, Messire Jean, Poire d'Ananas, Harvard, Phillips, long green, Beurré Knox, Beurré Romain, Napoleon, Spanish Bon Chrétien, Seckel, King's Bon Chrétien, and seven kinds names unknown; Apples—Newark King, Burrasoe, sweet russet, Ruggles's Queening, Garden Royal, Dutch Codlin, Pearmain, American Wine, Adams's sweet, Roxbury russet, Pomme d'Api, red winter, sweet greening, Snow, Baldwin, greening, Seaver's sweet, Sugar sweet, Seek-no-further, golden russet, Swaar, Blenheim pippin, Ribstone pippin, Jonathan, English Wine, Mela Carla, red everlasting, King of the Pippins, Bellflower, black apple, Blenheim orange, Canada Reinette, winter Spice, Prince's Seek-no-further, Gardner's sweet, Danvers winter sweet, Porter, Gloria Mundi, Garden striped, Hawthorndean, and three kinds unknown; also, Coe's Golden Drop, and blue Imperatrice plums.

From Josiah Lovett, 2d, Beverly, Bartlett, Seckel, St. Ghislain, and Harvard pears; long blue plums. From George Brown, Beverly, the following pears—Bartlett, Rousselet de Rheims, Prince's St. Germain, Epine d'Ete, Monsieur le Curé, Passe Colmar, Passans d'Hiver, Bleeker's Meadow, La Vanstalle, St. Michael, Compte de Michaud, Foxley, Jalousie, Héricart, Williams's early, Beauchamps, brown Beurré, Harvard, golden Beurré of Bilboa, Messire Jean, Seckel, Holland, French (unknown,) two varieties from Paris, Me., Easter Beurré, autumn Bergamot, and Pound pear; also, Drap d'Or, Pearmain, and Pomme d'Api apples, and a kind unknown. From Elijah Vose, Dorchester, Urbaniste, Napoleon, long green, Cushing, golden Beurré of Bilboa, Bartlett, winter Warden, Buffum, and Bezidi de la Motte pears; Gravenstein, Hawthorndean, old English Codlin, Mackay's sweeting, King of the Pippins (English,) and Roman Kryger apples. From Wm. B. Kingsbury, Roxbury, Bartlett pears. From Isaac Hager, Newton Lower Falls, Bartlett pears, and a new seedling peach. From Joseph Balch, Roxbury, the following pears—Louise Bonne d'Avanches, Bartlett, Pope's Quaker, Doyenne d'Hiver, Echasserie, Heathcot, summer Thorn, Franc Real, Bergamot de Soulers, winter Bergamot, Beurré d'Or, and Beurré d'Amanlis; Apples—English apple, Blenheim Orange, striped sweet russet, Garden sweeting, McCarty, Hop, Hawthorndean, Fair Maid, and a kind name unknown. From Azel Bowditch, Roxbury, Bartlett and

St. Michael pears, and black Hamburg grapes. From Samuel Pond, Cambridge Port, Dix, St. Ghislain, Wilkinson, Beurré Diel, Andrews, Maria Louise, Surpasse Virgoulouse, Napoleon, Belle Lucrative, and Cushing pears. From W. H. Sumner, Roxbury, Boughton Bergamot pears. From Richard D. Hill, Geneva, N. Y., Roxbury russett apples, growth of 1841. From Edward Flint, Leicester, Cloth of Gold plums, and Rhode Island greening apples.

From Otis Johnson, Lynn, the following pears—Bartlett, Buffum, Passe Colmar, St. Michael, striped long green, green sugar, Easter Beurré, Harvard, summer Thorn, Julienne, Calebash, Charles of Austria, Beurré Diel, Pound, Catillac, Swan's Egg, Washington, Cushing, Bonne Louise, Princess Orange, Monsieur le Curé, Duchess d'Angouleme, Bleeker's Meadow, Jalousie, long green of autumn, Napoleon, Seckel, Roi de Wurtemberg, and three kinds names unknown; also, Semiana, Huling's Snperb, and blue Imperatrice plums, George IV. peaches, and Porter, Greening, Baldwin, and fall Harvey apples. From A. D. Williams, Roxbury, Williams's seedling, summer Thorn, Buffum, Capiaumont, Heathcot, English Bergamot, and two kinds pears unknown; also, Porter, Lady apple, Ram's Horn, and yellow Nonsuch apples, and a kind unknown. From Hovey & Co., Boston, blue Imperatrice plums, and Scott's Mountain Sprout melons. From Mrs. Timothy Bigelow, Medford, Spanish Bon Chrétien and St. Michael pears; Heath, yellow rare-ripe, and Bigelow's seedling peaches; and Rambour de Franc, Monstrous pippin, and a large Lemon apple. From Mr. Dwight, Springfield, Dwight's seedling peaches. From John Clapp, Leicester, Coburg and Jaques peaches; white gage, blue gage, and blue Mogul plums, and Porter apples. From Richard Ward, Roxbury, Bartlett pears, and two kinds names unknown. From William Forbes, Lexington, black Hamburg, and Muscat of Alexandria grapes. From W. Meller, Roxbury, black Hamburg grapes; two kinds peaches, names unknown; pears, names unknown. From John A. Kenrick, Newton, red rareripe peaches, and St. Michael, Andrews, and Duchess d'Angouleme pears.

From J. P. Cushing, Watertown, by David Haggerston, black Hamburg, Muscat of Alexandria, Frankendale, black St. Peter, white Frontignac, Syrian, and white Chasselas grapes; Noblesse, Royal George, Nivette, Vanguard, Col. Ansley's, Mignonne, and Madeleine Rouge peaches; Violet Grosse, Newington, early Newington, Roman, Elruge, and new white or Mountain of Snow nectarines; and the following pears—Bartlett, Bon Chrétien d'Hiver, Sieulle, Colmar Epineaux, striped long green, Duchess d'Angouleme, Bezi Montigny, brown Beurré, Doyenne Santeléte, Vert Longue, Sucre Vert, Beurré de Ranz, Beurré Blanc, Epine d'Ete, Doyenne Blanc, Martin Sec, and striped St. Germain.

From J. F. Allen, Salem, black Hamburg and Chasselas grapes; Royal George clingstone peaches; Golden nectarines; and Seckel, Gansell's Bergamot, St. Michael, Bartlett, and Bonne Louise de Jersey pears. From N. D. Chase, Lynn, Crawford's early peaches. From William Osborn, Lynn, Bartlett pears. From J. H. White, gardener to Hon. T. H. Perkins, Brookline, black Hamburg, Muscat of Lunel, white Nice, white Frontignac, black Frontignac, and

St. Peters grapes, and Persian green flesh melons. From Joseph Grennell, New Bedford, by his gardener, Geo. Coleman, black Hamburg grapes. From George Newhall, Dorchester, Bartlett, Fulton, Passe Colmar, Louise Bonne de Jersey, Seckel, Broca's Bergamot, and Crassane pears, and Belle et Bonne, Bellflower, and Tippecanoe apples.

From John C. Howard, Brookline, black Hamburg and white Chasselas grapes; Beurré Diel, Duchess d'Angouleme, and two kinds pears, names unknown; yellow and red rareripe peaches, and Persian, Napoleon, Citron, green Minorca, and green Smyrna melons. From A. Fisher, Brookline, Andrews, Seckel, Fulton, Roi de Wurtemberg, Bartlett, and five kinds of pears, names unknown; also, Gravenstein apples. From Horace McFarland, Framingham, St. Michael pears. From S. R. Johnson, Charlestown, Sweetwater grapes, out-door culture; also, Beurré Diel pears. From Samuel Phipps, Dorchester, King's Bon Chrétien, Duchess d'Angouleme, Bartlett, two kinds names unknown, and long green pears; Hawthorndean, and Dutch Codlin apples, and a kind name unknown; also, Coe's Golden Drop plums.

From J. Breck & Co., Brighton, Harvard pears. From A. B. Muzzey, Cambridge Port, a branch containing thirty-eight peaches. From John Hovey, Roxbury, Sweetwater grapes, and Apple quinces. From George Walsh, Charlestown, white and green gage plums, and two seedlings, white and red; also, seedling peaches, St. Michael pears, and Lady apples. From A. McLennan, gardener to William Pratt, Esq., Watertown, black Hamburg, St. Peters, Sweetwater, Frontignac, and red Chasselas grapes; also, Bartlett pears. From J. C. Parkinson, Brighton, large red apples, name unknown. From Wm. Kenrick, Newton, Crawford's early, and Adams's clingstone peaches.

From Dr. Sparhawk, Walpole, N. H., by Aaron D. Capen, large striped apples (beautiful,) name unknown. From Ebenezer Brown, Lynn, Harvard pears. From John Hill, West Cambridge, Oldnixon, Lemon rareripe, Hill's Lemon rareripe, and variegated Wax peaches. From Madam Eustis, Roxbury, Bartlett pears. From Oliver Cook, Brighton, rareripe peaches. From J. L. L. F. Warren, Brighton, Siberian crab apples; President, seedling, Prince's yellow rareripe, Lemon clingstone, and red rareripe peaches; Bartlett, Duchess d'Angouleme, Napoleon, new French pear, Buffum, St. Marc, Easter Beurré pears; also, red Roman nectarines. From J. Owen, Cambridge, large red apples, name unknown; also, a kind of grape, name unknown.

From John T. Coffin, Meredith Bridge, N. H., Bolmar Washington plums. From Haskell Dutch, Chelsea, seedling peaches. From Lewis Glazier, Gardiner, Me., an apple grown in a glass globe. From William Sturgiss, Jr., New York, early Crawford peaches. From S. H. Colton, Worcester, early Crawford, yellow red rareripe, yellow rareripe, and red rareripe peaches; Seckel, Beurré Fortuné, Beurré Capiaumont, Bartlett, Napoleon, and Buffum pears; also, Minister apples. From J. P. and D. R. Palmer, Boston, a water-melon, weighing 6½ pounds, cultivated by N. S. Bright, Wattertown. From Edmund Smith, West Cambridge, Bartlett pears.

From William Thomas, Boston, Bartlett pears; and green gage and Thomas's seedling plums. From Levi Thaxter, Watertown, Porter apples, and a kind name unknown. From Salmon Lyman, Manchester, Ct., Eve, Gravenstein, Flint's sweet russet, and Colman apples. From Daniel Chaplin, Cambridge Port, Parkinson, Warden (?), De Toneau, and Poire d'Amour pears. From Samuel Walker, Dorchester, Bartlett, Monsieur le Curé, autumn Bergamot, English, and a kind of pears unknown.

VEGETABLES.—The exhibition of vegetables, though not near so numerous as in previous seasons, was nevertheless very good in respect to the quality and growth of the articles exhibited. The backward season has been unpropitious for the growth of squashes, and other vegetables which require warm weather, and but a few specimens were shown. The following is the Report:—

A great variety of fine vegetables were exhibited by Capt. Lovett, of Beverly, viz:—Five heads of purple brocoli; five heads of cauliflower, all large, well grown, and excellent specimens; French Sugar, early Blood Turnip, and Mangel Wurtzel beets; white Altringham carrots; white Dutch parsnips; white Portugal, yellow, and red, and the top or tree onions: among the potatoes, there were two seedlings, of the growth of 1841, and the Chenango, early Flat, white Dutch, Jackson or Snowball, two kinds of black, and the round red; Ruta Baga turnips; white bush, Horticultural, white cranberry, red cranberry, purple striped, Sieva, and new scarlet beans.

From F. W. Macondry, three varieties of celery, South Sea tomatoes, and Crookneck winter squashes. From Dr. J. C. Howard, Orange, common red, and Cuba tomatoes; also, red solid celery. From J. F. Trull, six roots Bailey's red Giant celery; six roots Bailey's white Giant celery, one basket Cuba tomatoes, six egg plants, and Crookneck winter squashes. From J. C. Parkinson, Brighton, four kinds Brazilian beet. From George Walsh, three ears of extra fine corn. From A. D. Weld, fine large Chenango potatoes. From George Newhall, Dorchester, yellow tomatoes. From Mrs. Bigelow, Medford, common red tomatoes, large and fine. From A. Bowditch, a basket of fine large Chenango potatoes.

Messrs. Hovey & Co. exhibited two very large handsome squashes, called the Italian; weight *fifty-two pounds* each, round, and of a deep orange color. From O. Johnson, sugar beets, early Blood Turnip beets, and Orange carrots, all large and good. From R. Ward, large and excellent Lima beans. From J. L. L. F. Warren, several varieties of the fruit of the egg plant.

HORTICULTURAL FESTIVAL.

The Festival took place on the 16th, at Concert Hall, and an account of it has already appeared in the newspapers of the day; but it was one of those epochs in the progress of the Society, which seem deserving of record in our pages. To give an account of the whole—the speeches, sentiments, songs, &c.—would occupy nearly, or quite, our entire number: yet, we are so well assured that a brief notice of it will not only be expected, but will be read with pleasure, especially by our friends at a distance, that we have excluded other matter to make room for this.

The Hall was beautifully decorated with flowers; at each end was placed an immense bouquet, composed of dahlias and other flowers, reaching nearly to the ceiling; above these were wreaths and festoons of flowers. Over the cornice at the end of the hall, at the head of the table, was placed a tablet, bearing the inscription—

“FOURTEENTH ANNIVERSARY OF THE MASSACHUSETTS HORTICULTURAL SOCIETY.”

Opposite to this, at the other end of the hall, was another, reading thus:—

“THE WORLD WAS SAD—THE GARDEN WAS A WILD,
AND MAN THE HERMIT SIGHED—TILL WOMAN SMILED.”

But if the hall was beautifully decorated, what shall we say of the tables? of the immense quantity of fruit under which they literally groaned?—The luscious peaches—the blooming nectarines—the delicious grapes—the melting pears—the apples, plums, melons, &c.—Such a splendid display of fruit was never before seen, except at the Society's exhibition. A larger part of it was contributed by the liberality of the members. Interspersed among the fruit, were elegant bouquets, intended for the ladies to take with them at the close of the feast: these added to the brilliancy and elegance of the hall.

But the crowning scene of the whole was yet to come. The company began to assemble at 5 o'clock, and, in a short time, the adjoining saloon was filled with ladies and gentlemen, mingling in pleasant and agreeable conversation upon the novel subject of the introduction of ladies to partake in the festivities of the anniversary. At 6 precisely, the doors of the supper room were opened; the invited guests were conducted to their seats, and, in a few moments, the whole company, composed of upwards of two hundred, were comfortably seated at the tables. The spectacle, at this moment, was of the most magnificent description, realizing even the extravagant imaginations of an eastern tale. The brilliancy of the hall, the music from the band, the flowers, the fruits, and, far above all, the presence of female beauty and grace, tended to complete an *ensemble*, unsurpassed as it was unique in its character.

During the evening, original songs, written for the occasion by T. Power and J. H. Warland, Esqrs., were sung by Mrs. Andrews and Mr. Barker, and the band played a variety of appropriate music between the sentiments. A blessing was invoked by the Rev. Mr. Winslow, upon the occasion, and after a short period passed in partaking of the refreshments which were so profusely offered, the President rose, and said—

“Gentlemen of the Massachusetts Horticultural Society:—Another period has in the course of time elapsed, and assembled us together to celebrate the Fourteenth Anniversary of this Society—to exchange mutual congratulations on the success of our past efforts, and to crown the year with rejoicing.

“At our last anniversary, I had the pleasure of briefly adverting to the flourishing condition of the Society, and to the progress of the science whose object it has been to promote. And I am now happy to state that there has been no diminution of the zeal and interest so universally felt in the cause of Horticulture.

“During the past year there has been a greater accession of members to the Society than in any former one since its disconnec-

tion with the Mount Auburn Cemetery. The increased number of contributors, the improved character of the productions exhibited, and the anxiety to possess trees and plants, give the most gratifying evidence of the rapid advancement of the art, and the high rank to which it has attained.

"The patronage of the community has also been so much augmented, that the Society feels itself straitened in its present location, and have in contemplation, at no distant day, to erect an edifice, suitable in elegance and convenience to the importance of the subject.

"The love of gardening, in which is comprised the science of Horticulture, seems to be an innate and natural principle of the mind, congenial to, and connected with, our ideas of happiness. From the earliest ages, it has, in all civilized nations, held an honorable and distinguished rank, and to which man has looked, not only as a source to which he might apply his industry, but for amusement and gratification.

"Solomon says, 'I made me gardens and orchards, and I planted in them trees of all kind of fruits;' and Cyrus, one of the Persian kings, we are informed, boasted that he had not only laid out and designed his own garden, but had planted many of the trees with his own hands.

"At the present time there is a spirit of enterprise hitherto unknown, pervading the world in the cause of Agriculture and Horticulture. Men of talents and influence are more than ever giving their attention to the subject, and enrolling their names as its patrons; and there are few, if any, pursuits, so generally held in high esteem, and no anniversaries or exhibitions so decidedly favorites with the public, as those of Agricultural and Horticultural Societies.

"That these have had a happy and powerful influence in disseminating a love for these objects, I think cannot be doubted. A writer, many years since, remarked that the London Horticultural Society had accomplished more since its formation, than China had done in a thousand years; and as an illustration of the popular favor, allow me to read you an extract from a journal giving some account of the patronage bestowed on this Society at their exhibition in May last.

[The President here read an extract from the *Gardener's Chronicle*, giving an account of the June exhibition of that Society, which we have already copied into our Magazine, at p. 338.]

"But I will not trespass further upon the time, which I am aware will be so much better occupied with remarks and sentiments from our friends present. Allow me, gentlemen, however, to observe, and to which I know your feelings respond, that it is a matter of the highest gratification that we are honored with the presence of the ladies on this occasion, and that woman, with her bright smiles and cheerful looks, has come up to participate with us, and to chasten and refine this Feast of Fruits and Flowers. She it was who was placed in the principal garden, to help dress and keep it, and who has ever been, from the most elevated ranks of society, to the humble cottage girl, that ornaments her window with a few favorite plants and flowers, the distinguished patroness of the science.

"Gentlemen of the Society—Permit me to congratulate you on the harmony and good feeling that exists among us, on the success which

has crowned your efforts thus far. Let this excite and encourage you to attain to a still greater degree of excellence, and let us rejoice that we are here assembled under such happy and auspicious circumstances, to promote a cause which conduces so much, not only to our own, but to the comfort and happiness of mankind.

“Ladies and gentlemen, allow me to propose for your consideration, the following sentiment:—

Horticultural Anniversaries.—Nature’s grand Festivals—at which she opens her storehouse of plenty, and crowns with rich profusion the labors of her sons.

The President then proposed the following sentiments:—

Our Country.—A favored spot of earth, where Liberty has taken root, and its fruits surpass in value the “Golden Apples” of antiquity.

The Orator of the Day.—whether in the Field—in the Laboratory—among the flowers of the Garden, or in the Academic grove,—he is equally at home.

Mr. Teschemacher gave in reply—

The liberal cultivation of reciprocal esteem and friendship among nations—it is sure to produce the blessed fruits of peace.

The President remarked that the next sentiment had been prepared in honor of a distinguished individual, a member of the Society, who feels a deep interest in agricultural and horticultural pursuits, but who, from the inclement state of the weather, was prevented from being present.

Daniel Webster.—His Laurels are not tinged with blood, the *Vine* entwines the pillar of his fame, the *Myrtle* springs up in the track of his footsteps, and his country delights to repose under the shade of the *Olive* he has planted.

Long and loud applause succeeded this sentiment:—

The Mayor of Boston—worthy to represent a city renowned for public spirit, intelligence and patriotism.

To this sentiment the Mayor replied in a neat and beautiful speech, touching the appearance of ladies at public festivals. He concluded with the following:—

The modern Garden of Eden—where woman shall still be a match for a man, and more than a match for any serpent.

The President then gave—

Harvard University.—A fountain opened by the Pilgrims. Many have drawn of its waters, and thousands are now dispensing them for the refreshment of the souls that thirst after knowledge.

President Quincy replied in an interesting speech, and after alluding to the scene and the reminiscences it awakened of times gone by, when improvements in flowers and fruits were unknown, and, to the degree before him, unanticipated, continued—

“It was in the year 1792 that the first attempt was made in this city and vicinity, to aid and encourage the cultivation of the soil, through the agency of an incorporated Society. At that time some of the greatest men of their age formed and obtained an incorporation of the Massachusetts Agricultural Society, the precursor and the parent of that most successful Society, whose anniversary we now

celebrate. I need only repeat the names of Lowell, Cabot, Ames, Adams, Lyman, and Strong, not to mention others, to awaken in every cotemporary mind, the recollection of their worth, their greatness, and their patriotism. These gentlemen, with their associates and successors, labored for twenty years in endeavors to improve the agriculture of the country. But do you think, Mr. President, that they sought to introduce, or even indulged in imagination the hope of the glorious results we at this time are witnessing? Did they dream of raising peaches under glass, and grapes in green-houses, for sale in the market, or for agricultural profit? They would have as soon thought of making a voyage across the Atlantic, as is now done, in twelve days, by the power of steam. How to improve the flesh and fleeces of sheep, how to raise the best breed of hogs, how best to manage pasture or grass lands, how to enlarge the quantity and improve the quality of manures and the like, were the labor of their thoughts, and the objects to which their useful and patriotic influences were directed. As to 'Horticulture,' it was a term not known, practically, in their nomenclature. The culture of fruit trees—peaches, apples, pears, and even grapes, in the open air, is, indeed, occasionally mentioned in their publications. But it was not, I think, until the year 1815, that any very active measures were taken to excite our farmers to a scientific and systematic attention to fruits and trees. The term 'horticulture' was still, in a manner, unknown to us, in a practical sense. Nor was it until the year 1821, that a regular and urgent notice was taken in their publications of '*the Science of Horticulture.*' And what did they then say on the subject? Why—that in this country 'we are yet infants in horticultural science'—that 'we have not yet brought into use all the common culinary vegetables'—that 'in the cultivation of fruits, and in the management of trees and grapes, we are, in point of skill, half a century behind Dutch and English gardeners.'

"This state of things continued, with some gradual improvements, until 1828, when the spirited, enterprising, and patriotic gentlemen who laid the foundation of this Horticultural Society, obtained that charter of incorporation, under whose influences, and by whose example, these noble results were effected, the fruits of which we now witness and enjoy.

"While rejoicing in the present, it was impossible for me to refrain from recollecting the past, the days of humble but honorable endeavors in the same field, now so happily improved. Nor could I refrain from doing honor to those great men, who, in times less happy, prosperous, and advanced, first set the example of exciting and directing our farmers in the cultivation of the soil, and were the remote, but among the efficient, causes of the noble improvements now made and advancing in both agriculture and horticulture.

"Lord Bacon says somewhere, that 'God Almighty first planted a garden;' from whence he deduces that there is something elevated in its labors, and something divine in its creations and results. He adds, that it is 'the purest of all pleasures, and the greatest refreshment to the spirits of man.'

"Borrowing the language of this great man, I propose the following sentiment:—

Horticulture—The purest of all pleasures, and the greatest refreshment of the spirits of man.

The next toast was—

The Clergy—They scatter broadcast that good seed which shall bring forth thirty, sixty, and an hundred fold.

The Rev. Mr. Winslow replied to this sentiment, and gave—

Paradise regained.—No more in danger of being lost by the presence of her Eve, since the “fruit of the tree” that is “good for food and pleasant to the eyes,” is no longer forbidden.

Several of the clergy being present, the President called upon them for sentiments.

The Rev. Mr. Pierpont made a few pertinent remarks, and concluded with the following sentiment—

The Gardener—The co-worker with the Creator of all that is beautiful and good.

By Rev. Mr. Croswell—

The Waters of Massachusetts—

“Though with those streams they no resemblance hold,
Whose foam is amber, and whose gravel gold,
Wouldst thou their genuine guiltless wealth explore,
Search not their bottom, but survey their shore.”

The next sentiment was as follows:—

Louisiana—Her sons know how to defend as well as cultivate her soil. Her products have proved her bulwarks, as they have her support.

The Hon. Mr. Conrad, Senator from Louisiana, made a brief reply, and gave—

The State of Massachusetts—Always the first in the arts of peace, and never behind any in war.

Maine and Massachusetts—Sister States, whose valuable interests in the *Disputed Boundary* have been so happily secured by their intelligent commissioners.

The Hon. Abbott Lawrence replied. He alluded to the manner in which the question had been adjusted, through the labors and exertions of Mr. Webster. He concluded as follows:—

“Sir, I will not consume more of your time, but pass from this subject to the agreeable occasion which has brought us together. I have seen it observed somewhere, that there is a great amount of sound morals in a flower. I subscribe to the remark. We cannot be unmindful of the increased taste for the cultivation of flowers among us in the last five and twenty years, especially since the formation of this Society fifteen years ago, and with it a corresponding improvement in the public morals. I am one of those persons who believe that mankind has improved—is improving, morally and physically—and by constant vigilance will continue to improve;—and to you, Mr. President and to your coadjutors, we are deeply indebted for the rapid improvements that have been made in horticulture and floriculture.

“When I see a hard laboring man carrying under his arm (which I often do,) a potted flower or plant instead of a bottle, I feel a conviction that that man has a virtuous and happy home.

“Ladies and gentlemen, the exhibition here to-night, altogether, is the best proof that can be presented of a high state of civilization and refinement, and, as a member of this Society, I confess I am proud of the scene before me. It is only by comparing one period with another that we mark the improvement in the production of fruits and flowers. I have never any where seen an exhibition of fruits to compare with the one just held, in richness and variety. Who would have ventured but ten years since, to have predicted that, at this time, we should have seen, in our good city, an exhibition like the one upon which we have feasted our eyes for the last three days, and this evening have a *realizing* sense of something better than sight?

“Mr. President—the cause of sound religion and pure morals is promoted by the cultivation of fruits and flowers; perhaps there is no occupation that tends more to *harmonize* and *humanize* the heart of man, and elevate it through nature up to Nature’s God.

“I shall say no more, but, with your leave, offer a sentiment:—

Rural Economy.—May the people of the United States become as distinguished for its cultivation and advancement, as they have been for the establishment of civil and religious liberty.

The next toast was—

Rail-roads.—Modern sources of travel, which lessen *space*—annihilate *time*—and develop the wealth of nations.

This sentiment called up the Hon. Josiah Quincy, Jr., who made some very apposite and beautiful remarks in relation to the festival. Mr. Quincy stated that this was not the first dinner party at which the ladies were present, and he would proceed to show that an entertainment of this kind was one of the oldest on record. To do this, he read extracts from Milton, which proved that the ornaments of the hall, the fare upon the table, the after dinner speeches, and, above all, the presence of the other sex, were precisely the same at the last as they had been at the first dinner party. He concluded with the following sentiment:—

The first and the last Dinner Party.—Fruits and flowers, graced by the presence of the fair. At such an entertainment, well might an angel exclaim—

“Though in heaven the trees
Of life, ambrosial fruitage bear, and vines
Yield nectar; though from off the boughs, each morn
We brush mellifluous dews; yet God hath here
Varied his bounty so with new delights,
As may compare with Heaven.”

The next sentiment from the Chair was—

Our Young Men.—“Just as the twig is bent the tree’s inclined.”

“If prone to earth, the infant stalk we train,
Nor height, nor glory, will it ere attain;
But if its tender years erect we guide,
’Twill be the Gardener’s or the Forest’s pride.”

Horace Mann, Esq., the Secretary of the Board of Education, addressed the Chair, and we regret we can only give a part of his remarks.

“Mr. President, the venerable gentleman at your left has told us, that twenty years ago, when the first attempts were made in this vicinity for horticultural improvement, there were but four or five kinds of cherries, about as many of pears, and so of other fruits—and he has contrasted the poverty of the orchards and the gardens at that

day, with their wealth and luxuriance at the present time. Sir, there are not less than one hundred thousand children in this Commonwealth under ten years of age, who would go half crazy at the beauty, the fragrance, and the deliciousness of the treasures you have brought together here. Just think of a company of fifty thousand little girls, and as many little boys, peeping between pickets, through cracks and key-holes, at such a sight; and longing to make bouquets from your flowers for their own bosoms, and to test the quality of your peaches and plums and grapes, by some *surer* sense than that of the eye. Now, sir, as your improvements increase the temptations of children to take what is not their own,—ought not something,—nay, ought not a great deal to be done, to improve their conscientiousness, that they may resist those temptations? We are told that in some places in Prussia, the children are trained up in such habits of honesty, that gooseberries, and plums, and cherries, and other fruits, may hang in luscious clusters within their reach the whole season, and ripen by the side-walks, within reach of every child, and yet never be touched by a purloining hand. Have we not a vast work to do, in this country, before we arrive at such a point of juvenile morality? Ought not your friends, then, and my friends, to make a compact, that while we applaud and patronize your efforts to improve the fruits and flowers of the earth, you shall aid us in renovating the moral character of the young, in improving the celestial fruits—the immortal amaranths of the youthful soul? I never pass by your gardens and orchards, and see those bristling pickets,—those high fences surmounted with iron spikes, without thinking how much better and safer it would be to have the security which honesty and conscience would give, rather than those uncertain barriers against plunder. This, I am persuaded, we shall have, when we devote an attention to the well-being of the soul, at all corresponding to that which we are accustomed to pay to the well-being of the body.

“Sir, your present exhibition has been the occasion of enforcing a great truth on my mind, and I thank you for it. We have been told here, to-night, that it is but forty years since the first Horticultural Society in the world—that of London—was established; and all those who are best acquainted with the subject, seem to want words to describe the extent of the improvements since effected in this beautiful art. What does this prove but nature’s susceptibility of amelioration under the cultivating hand of man? The whole vegetable world is one varied manifestation of this animating, encouraging truth. Under human culture, wild and bitter roots become wholesome and delicious esculents. Fruits, before acid and dwarfish, bend their branches with golden and nectarious clusters; and flowering trees, before stunted and feeble, put on an ampler and more diversified coronal of beauty.

“The same thing is true in regard to animals. The faithful and sagacious dog is only the great-grandson, or some later descendant, of the wolf; and the noble horse and ox have acquired their fleetness and draft under the improving, though so often ungenerous, hand of man. Are these capabilities, think you, confined to the inanimate world—or to the lower orders of animals? No; the same capacities abound through all the domains of nature. We see it in our own

race, when we make a comparison between periods of time sufficiently remote from each other. Look at our progenitors, the early inhabitants of Great Britain, and all those lawless, plundering hordes, which invaded that country from the North of Europe. Look at those boat-loads—for the ships of those days were only boats—of Saxons and Danes, who conquered England. Look at Hengist and Horsa, and their savage retinue, those red-haired, uncombed, shaggy pirates, clad in undressed skins, (as far as they were clad at all,) descending upon the coast, driving the natives before them, or destroying them on the spot—were these likely men, from whom to extract Lord Bacon, and Shakspeare, and Milton, and Wilberforce?

“Mr. President, I will detain you no longer than to give the following sentiment:—

Horticultural Improvements—which have exalted the useless into the useful, have adorned the inelegant with beauty, and purified the poisonous into the healthful: may they be the emblems and the augury of similar improvements in the intellectual and moral world.

The President then gave—

The Speaker of the House of Representatives—Commanding respect by his talents, and enforcing moderation by his urbanity.

To this sentiment Mr. Kinnicutt replied, and concluded by proposing—

The Ladies of the Members and of the Guests of the Massachusetts Horticultural Society—The richest fruits of a New England soil—The brightest flowers of our New England homes.

Hon. J. T. Austin, the Attorney General, being present, the Chair called upon him for a sentiment. Mr. Austin replied in a delightful speech, of which we can only present the more pleasing parts:—

“Mr. President,—If those only who could share your agreeable occupation, were permitted to take a part in this interesting festival, those of us who live by necessity on the crowded pavement—*strebilutque pulvere urbis*—in the noise and dust of the city, would be excluded from this fairy land, which Calypso might have envied, and which more than rivals in beauty the fabled garden of the Hesperides.

“But we can admire, sir, if we could not work. We can appreciate the novelty, the splendor, the fragrance of this scene of enchantment; and, as an humble individual, I come to thank you for having created from the dust of the earth, one of the fairest and richest and most innocent sources of human happiness, and given to the heart of every man and woman, who has taste and sensibility, a most grateful subject of satisfaction and delight.

“There is something in this occasion higher and nobler than the mere momentary pleasure of the eye or the taste. I cannot but think, sir, that it casts the spell of kindness, of brotherhood, of social affection, of good fellowship, over all classes of our agitated community. It diversifies our eternal discussion of banks, tariffs, and vetoes. It gives us to learn that there is something worth living for besides politics and party, and it may persuade us that men of all parties, and all politics, may have something in common for the good of the country and the race.

"Sir, the production of fruits and flowers, gorgeous to the eye, rich to the senses, their delicate juices, their elegant forms, their interminable coloring, raised from a little seed dropped into a patch of dirty earth, is among the most wonderful and inscrutable efforts of nature. But this effect of her power seems to be her amusement, her sport, her pastime. The great work-shop of nature is in the corn-fields, the wheat lands, the cotton grounds of the agriculturist and the planter. There she provides food and clothing for her human family. There is the necessary sustenance for man and beast.

"But in the orchard and the garden you find her in her laughing and frolic mood, amusing the imagination, cultivating the taste, dealing with the beautiful, the delicate, the fair, for recreation and fancy. To the astronomer, she speaks of architecture and builds the Universe. To the farmer, she is a political economist, and feeds the world. To the philosopher, she is full of deep science and abstruse learning, though she discourses with the music of the spheres. But to you, sir, to the florist and the horticulturalist, she comes *allegro*,

'With quips and cranks and wanton wiles,
And nods and winks and wreathed smiles.'

"She is the poet of his heart. My toast is

Fruits and Flowers—The poetry of nature.

The President then proposed—

Mount Auburn—The peaceful shades where repose the loved and lost of earth. When we tread its umbrageous paths, may we not forget to whom we are indebted for the conception of so interesting a spot.

General Dearborn, (the first President of the Society,) who was prevented from being present, sent a letter, which was read from the chair:—

"*Hawthorne Cottage, Roxbury, Sept. 16, 1842.*—My Dear Sir,—For the lamentable reasons which I stated to you, I am compelled to absent myself from the Annual Festival of the Horticultural Society; you may be assured, however, that the deep and zealous interest which I have ever taken in its meritorious efforts, to advance and extend a taste for useful and ornamental planting, has not only not abated, but that a long cherished passion for rural culture will be augmented by time and be commensurate with my existence.

"Horticulture, as a science and an art, was honored and cultivated by Solomon and Ulysses, Pliny and Cicero, Bacon and Milton, Washington and Madison; and, with the rapid march of intelligence, they are now deemed worthy of the admiration and attention of the most illustrious princes, nobles, philosophers, and warriors—of the most enlightened men and most accomplished women, throughout the earth; and is not this intellectual development in conformity to an established law of our creation?—for as the soul of man descended upon him in a garden, may it not be truly said, and allow me to offer as a sentiment—

"A Garden—'SIC ITUR AD ASTRA.' [This is the way to heaven.]

"With sincere esteem, I offer the most friendly salutations,

"H. A. S. DEARBORN.

"Col. M. P. Wilder, President Massachusetts Horticultural Society."

Next followed this sentiment:—

The Bunker Hill Monument—The corner-stone nobly speaks the praise of Man—the top-stone that of Woman. “Let the earliest light of morning gild it, and parting day linger and play upon its summit.”

J. T. Buckingham, President of the B. H. Monument Association, replied to this in a few brief remarks upon the completion of the Monument, and the part the Ladies performed in accomplishing so great an object; and concluded with this sentiment—

The Horticultural Exhibition of 1842—The peaceful triumph of those active and generous spirits who propagate the truest wealth and the most innocent luxuries of the people.

The Gentleman who first successfully advocated the admission of Ladies to public festivals.—In following his example, we acknowledge the good taste which suggested the source of so much enjoyment.

Hon. W. Sturgis, who was instrumental in first introducing the Ladies to the Centennial Celebration at Barnstable, replied to this, and gave—

The improvement of Flowers, Fruits, and Man—Evidence is before us that flowers and fruit may be improved and perfected by the care and industry of Man—He can be best improved and refined by the genial influence of WOMAN.

By Rev. J. L. Russell, Professor of Botany, &c. to the Society. *The Fourteenth Anniversary of the Massachusetts Horticultural Society*—Which has taught us to listen again to the voice of God in the stillness of evening, amid flowers and fruit.

By Hon. J. C. Gray, former Vice-President—*The Marshfield Cultivator and his American and British coadjutors in the Treaty of Washington*—Who have caused the olive to blossom and to ripen its fruits in the short space of six weeks.

By B. V. French, one of the Vice Presidents of the Society. *Van Mons, the enlightened Pomologist and Philosopher*—His name will be cherished while the earth continues to bear fruit.

By E. M. Richards, Vice President. *The Ladies who have honored us by their presence on this festive occasion*. If any are skeptical in regard to the permanent influence of WOMAN, let them turn their eyes towards the Monument on Bunker Hill.

The President then announced the following sentiment:—

Horticultural and Agricultural Periodicals—Birds which scatter the seeds of fair flowers and fine fruits, in gardens throughout the land.

Allen Putnam, Esq., editor of the *New England Farmer*, replied to this sentiment in a few brief remarks:—

“Mr. President:—It is too late in the evening to speak at length of the influences of the press in creating and fostering a spirit of improvement in Horticulture and Agriculture. Its influences have been great, but so gloriously indefinite, that it is vain for me to designate them.

“You call us *birds*, and *sowers of seeds*. In Nature’s garden the birds have some of this work to perform. The seeds of the grass,

raised upon an elastic and elongated stem, may be scattered by the winds; the down upon the willow seed serves as its ship in water, and its balloon in the air; the hooks of the burr attach that to roving animals; the elastic spring of the touch-me-not sends its seeds far from the parent stalk—and yet work is left for the birds. They are appointed to carry the seeds of many berries and flowers from valley to valley, from mountain to mountain, and from river to river. We of the periodical press have a work not unlike that of birds. We are willing to sow, if we can but get the seed: do not forget that we can sow only what we first *steal*, and we would like to steal, unmolested, the sweetest and best.

“Hoping to induce you and your associates to furnish us more freely with seed in future, I will name you in a toast, if I can remember it:—

Members of the Massachusetts Horticultural Society—The gardeners whose productions migratory birds are most pleased to carry to the distant fields which they visit.

The President also called upon Mr. C. M. Hovey, editor of the *Magazine of Horticulture*, who responded as follows:—

“Mr. President,—I came here with a sentiment prepared for the occasion, in honor of a distinguished association, similar to ours, abroad. I refer, sir, to the Horticultural Society of London. I was fearful we might forget our friends so far from us. You have, however, alluded to that Society in your remarks; and a distinguished gentleman, who has preceded me, has not only quite unexpectedly spoken of its establishment, and the good example it has set, but has done so in nearly the very words of my sentiment: nevertheless, sir, I shall offer it, and, as preliminary, a few further remarks in regard to that association.

“It was established, as has been stated, about forty years ago, I think in 1808, through the exertions of the late Thomas Andrew Knight, Sir Joseph Banks, Mr. Forsyth, and other amateurs and professional men of eminence. Mr. Knight succeeded Sir Joseph Banks, as President of the Society, and held the office until his death. The writings of this distinguished physiological and practical horticulturist are familiar to all cultivators—they have formed the basis upon which our present ideas of vegetable physiology are founded. The first object of the Society was the institution of exhibitions similar to our own. In connection with these exhibitions, papers and essays were read from members, upon the cultivation and growth of the specimens which were displayed for premium. These communications were collected together, and published as the transactions of the Society, which now number several volumes. It was in these volumes that Mr. Knight’s papers were first given to the public;—since his death, they have been collected in one volume, preceded by a biographical account of his life.

“The next act of the Society was the establishment of an experimental garden, where the great number of fruits under cultivation might be collected together and their qualities ascertained, their synonyms detected, and their nomenclature corrected—this, indeed, constituted one of the most beneficial acts of this association.

“Collectors were also sent out to all parts of the world, for the discovery of new plants, trees, and fruits. One of these collectors was

the late lamented Mr. Douglas, who explored the Columbia river, the California coast, and part of the Sandwich Islands, where he met with a cruel death. The additions which he made to the flora of this continent are some of the most splendid which ornament our gardens—to him, indeed, are we indebted for nearly one half of the showy *annuals* which enrich our parterres, the names of which are so familiar that it is unnecessary to mention them here. In honor of his indefatigable exertions, a noble monument has just been completed in Scotland, for the erection of which, nearly one thousand noblemen, amateurs, botanists, and gardeners of Europe, subscribed their names.

“But it is not to these, or to any other particular acts of the Society, that we are alone indebted. Its transactions have embraced every thing which would in any way promote the advancement of horticulture. It has freely and gratuitously disseminated seeds, plants, bulbs, scions, &c., to all parts of the world. There is scarcely a garden the whole length of the Atlantic shore, in which we cannot find some plant, the seeds of which originally came from the London Horticultural Society. Our tables, this evening, which are almost weighed down by the fruit, contain some which was plucked from the very scions transmitted to our skillful cultivators.

“To emulate its bright example, and to meet with equal success, is our only wish. I will therefore propose—

The London Horticultural Society—The great parent of all similar associations throughout the world—whose labors in the noble pursuits of science have strewed our gardens with beautiful flowers, and enriched our tables with the choicest fruits.

S. Walker, Chairman of the Committee of Arrangements, was called upon for a sentiment, and gave the following:—

Flora and Pomona—Twin sisters. “Their ways are ways of pleasantness, and all their paths are peace.”

By Dr. E. Wight, Recording Secretary. *Horticultural Societies*—May they spread like the vine, and harmonize like its tendrils.

By Parker Barnes. *Our Fair Guests*—All hail! “Thrice welcome!” Now have we obtained the priceless gem, to crown the many-colored lights of Nature’s diadem.

By John Owen. *The Memory of Thaddeus Mason Harris*—One of the corresponding members of this Society—A man who, for simplicity of manners, benevolence of character, and purity of life, as well as for his eminence in natural history, deserves our grateful recollection, on this our first anniversary since his decease. Well may we apply the lines of Thomson, on Lord William Russell, to our departed friend:—

“Bring every sweetest flower, and let us strew
The grave where Harris lies.”

By John H. Warland, (one of the poets of the evening.) *Flowers*—In their bloom, the sweetest symbols of innocence and purity in this world—in their decay, the loveliest emblems of a resurrection in the next.

By Dr. Z. B. Adams. *The union of scientific principles with the Horticultural Art*—A union which cannot but be auspicious, since within the last few days we have been introduced to such a multitude of its *cherry cheeked* and healthy offspring.

The President having retired, Mr. French took the chair, and announced the following sentiment:—

The President of the Massachusetts Horticultural Society—who to the intelligence of the merchant, and the skill of the horticulturist, adds the liberality of a prince, the manners of a gentleman, and the virtues of a Christian.

By Dr. Adams. *The Chief Marshal of the evening*—Who can display such skill in subduing the wild flowers of the forest, though he himself is *Wilder?*

By George Brown. *Daniel Webster*—A noble specimen of native growth and self culture. Equally flourishing on the granite hills of New England, or in the sunny climes of the South. He needs but one more transplanting to fill the place he deserves to occupy.

By Otis Johnson. *The cultivation of the earth*—The most noble employment of man; in its progress towards perfection, dispensing blessings upon the whole human race.

By J. Wentworth. *The needs of Idleness*—May they never be permitted to overshadow the fruits of industry, or impair the growth of enterprise.

By H. W. Dutton. *Our Buds and Blossoms, our Banquet and our Bairns!*—Proud of the one for producing our festivals; and proud of our fete for the presence of our children—let the day we celebrate be remembered. Let its memory live "*fragrans et perennis,*" even as the flowers continue from everlasting to everlasting.

By James L. L. F. Warren. *The Fair Trio of the Horticultural Fair in 1842*—Our *Flowers*, our *Fruits*, and our *Guests*. Our *Flowers are fair, sweet, good*—Our *Fruit, fairer, sweeter, better*—Our *Guests, fairest, sweetest, best*.

By a Member *The Bee among the Honeysuckles*—Illustrative of horticultural industry, and the pleasures of cultivation; *both* yielding the sweets of life.

By a Member. *Adam in the Garden of Eden*—Surrounded with flowers of every hue, and yet *one* flower was wanting. It was the fairest and most *tempting* flower in all creation.

A great number of toasts were announced from the chair, and many volunteers were offered during the evening, but we have no room for more than the following:—

The Landscape Garden.—The ideal of nature's gayest attire. The eye of the *painter*, the imagination of the *poet*, and the skill of the *gardener*, can only accomplish its creation.

Nature's Jewels: Flowers and the Fair—scattering sweet incense round the path of man, they refine and purify the heart. The one is worshipped in the *parterre* of the florist—the other, adored at the domestic altar.

Flora and Fancy—a Goddess and a Personification. We wear the flower crown of the one, and acknowledge the supremacy of the other. Under the influence of *both*, we are this day "making a worship of the beautiful."

By J. T. Buckingham. *Importers and Cultivators of Exotics*.—They labor to adapt our soil to the plants, and to make the plants delight in the soil.

The next sentiment from the Chair was—

Flora and Pomona.—To spread our tables this day, these tutelar guardians have emptied their "Horns of Plenty." "In grateful numbers let their names be sung."

Bachelors.—A *tribe* of plants which occupy much *garden room*, but add nothing to the ornament of the *parterre*.

The Bachelor's Button.—As a flower, simple; as an emblem, dangerous. "*Bachelor's Buttons*" can never be "*Lady's Delights*."

Queen Victoria and Brother Jonathan.—They each have large families, and land enough for all practical purposes. The Fence Viewers, having adjudicated on the lines of division, and made lawful record of the same, may they live in harmony till their leases expire.

The entertainment concluded by the singing of an ode, to the tune of Auld Lang Syne, written by the late T. G. Fessenden, for a previous anniversary, entitled the "Course of Culture."

Sept. 17th.—An adjourned meeting was held to-day—the President in the chair.

It was voted that the thanks of the Society be presented to the Corresponding Secretary, J. E. Teschemacher, Esq., for his able, eloquent, and instructive address, delivered before the Society on Friday, September 16th; and that a copy be respectfully requested for publication.

Messrs. Walker, French, and O. Johnson were appointed a committee to carry the same into effect.

M. Tidd, of Woburn, and J. H. White, of Brookline, were admitted subscription members.

Adjourned one week, to Sept. 24th.

Sept. 22d and 23d.—The third *Grand Dahlia Show* of the Society took place on Thursday and Friday, the 22d and 23d of September, at the Society's room, No. 23 Tremont Row, agreeably to notice.

The exhibition was much better than had been anticipated a few days previous. The cool weather, accompanied with very severe rains, had been favorable for the growth of the plants, but had prevented the formation of large and strong buds: a week or two of warm sunny weather would have brought out a splendid display of blossoms. The exhibition of the previous week had induced cultivators to take off all the flowers for the decoration of the hall, and the short time which had elapsed, had not been sufficient for fresh buds to open. But notwithstanding this, the exhibition was much more splendid than was expected. Upwards of one thousand blooms were exhibited, besides the stands entered for premiums. Comparing the exhibition with those of the two previous annual shows, and at the same time taking into consideration the greatly improved character and perfection of the new and rare sorts, by which the older varieties are now judged, the exhibition must be acknowledged to be one of the best ever made by the Society.

Agreeably to the rules and regulations for the government of the show, the entries were all duly made, and the flowers placed in the stands by 10 o'clock in the morning, on Thursday, the 22d. The judges then entered the room, and made their award, which was declared to the exhibitors at 1 o'clock. The judges, in divisions A. and B., were Messrs. J. Stickney, J. E. Teschemacher, and S. Walker, and in division C., Messrs. J. L. L. F. Warren, J. Cadness, and J. H. White.

The number of entries made for the different classes was, eight for division B.; seven for division C.; four for the Premier Prize, and eight for the Specimen Bloom.

The names of the dahlias which obtained the prizes are given in the following award:—

DIVISION A.

Open to all cultivators, (members.)

PREMIER PRIZE.

Best 12 dissimilar blooms:—A premium of \$18 00 to Hovey & Co., for Maid of Bath, Metella, Pickwick, Andrew Hofer, Sulphurea elegans, Princess Victoria, Quilled Perfection, Eva, Rienzi, Widnall's Queen, Le Grand Baudine, Miss Johnson.

SPECIMEN BLOOM.

Best bloom of any color:—A premium of \$7 00 to J. H. White, for Wheeler's Maria.

Second best bloom of any color:—A premium of \$4 00 to Hovey & Co., for Brown's Bridesmaid.

DIVISION B.

Open to all cultivators (members,) of more than two hundred plants.

CLASS I.

Best 24 dissimilar blooms:—A prize of \$12 00 to J. H. White, for Eva, Amato, Maria, Virgin Queen, Queen of Beauties, Lilac Perfection, Contender, Defiance (Squibb's,) Suffolk Hero, Beauty of the Plain, Le Grand Baudine, Bridesmaid, Bishop of Winchester, Rival Sussex, Bontisholl, Unique, Argo, Duchess of Richmond, Duchess of Portland, Grace Darling, Fireball, Rienzi, Pickwick, Sarah.

Second best 24 dissimilar blooms:—A premium of \$7 00 to Hovey & Co., for Ward's Mary, Lord Liverpool, Juliet, Bree's Rosa, Unique, Rienzi, Bishop of Winchester, Princess Victoria, Miss Johnson, Sulphurea elegans, Springfield Major, Striata formosissima, Le Grand Baudine, Maid of Bath, Marshal Soult, Hero of Tippecanoe, Exemplar, President of the West, Francis, Horticulturalist, Contender, Metella, Maria, Pickwick.

CLASS II.

Best 12 dissimilar blooms:—A premium of \$10 00 to J. L. L. F. Warren, for Constantia, Metella, Procurator, Rienzi, Mrs. Broadwood, Grace Darling, Lord Liverpool, Dennisii, Madonna, Virgin Queen, Ne Plus Ultra, Glory.

Second best 12 dissimilar blooms:—A premium of \$5 00 to S. Sweetser, for Fireball, Juno, Advancer, Maresfield Hero, Marshal Soult, Marchioness of Lansdowne, Grace Darling, Sylph, Lady Bathurst, King Bladud, Countess of Liverpool.

CLASS III.

Best 6 dissimilar blooms:—A premium of \$8 00 to J. L. L. F. Warren, for Lord Liverpool, Rienzi, Constancy, Canute, Sylph, Glory.

Second best 6 dissimilar blooms:—A premium of \$4 00 to S. Sweetser, for Fireball, Mrs. Rushton, Heroine, Marshal Soult, Grace Darling, Clark's Julia.

DIVISION C.

Open to all cultivators (members,) of less than two hundred plants.

CLASS I.

Best 24 dissimilar blooms:—A premium of \$12 00 to J. F. Trull, for Duke of Bedford, Mrs. Rushton, Countess of Liverpool, Mrs. Jones, Zeno, Princess Victoria, Rival Granta, Dennisii, Ne Plus Ultra, Countess of Torrington, Rienzi, Pickwick, Sunbury Hero, Marshal Soult, Glory, Hero of Tippecanoe, Hylas, Golden Sovereign, Beauty of West Riding, Lady of the Lake, Fireball, Duke of Sussex, Bree's Rosa, Duke of Buccleugh.

Second best 24 dissimilar blooms:—A premium of \$7 00, to J. Stickney, for Bree's Rosa, Queen of Beauties, Eva, Suffolk Hero, Nicholas Nickleby, Constantia, Defiance (Harwood's,) Queen Victoria, Egyptian Prince, Middlesex Rival, Unique, Argo, Francis, Andrew Hofer, Marshal Soult, Fireball, Ne Plus Ultra, Queen of Sarum, Julia, Striata formosissima, Mrs. Jones, Sir Henry Fletcher, Essex Rival, President of the West.

CLASS II.

Best 12 dissimilar blooms:—A premium of \$10 00 to J. Stickney, for Queen of Sarum, Le Grand Baudine, Constantia, Unique, Defiance (Harwood's,) Queen of Beauties, Eva, Ne Plus Ultra, Fireball, Rosetta, Middlesex Rival, Andrew Hofer.

Second best 12 dissimilar blooms:—A premium of \$5 00 to P. Barnes, for Andrew Hofer, Argo, Metella, Pickwick, Striata formosissima, Lady Middleton, Primrose, Sunbury Hero, Queen of Beauties, Constantia, Essex Rival, Grace Darling.

CLASS III.

Best 6 dissimilar blooms:—A premium of \$8 00 to P. Barnes, for Pickwick, Primrose, Rival Revenge, Andrew Hofer, King of Roses, and Striata formosissima.

Second best 6 dissimilar blooms:—A premium of \$4 00 to H. W. Dutton, for President Von Lichtenberg, Striata formosissima, Ansell's Unique, Pickwick, Constantia, Cattleigh's Eclipse.

The President of the Society exhibited upwards of fifty blooms, among which were Pickwick, Cattleigh's Eclipse, Buist's Juno, Andrew Hofer, &c., some very fine. Nearly fifty blooms from P. Barnes. Upwards of seventy-five blooms from J. F. Trull. One hundred blooms from Hovey & Co. From J. H. White, thirty blooms. Upwards of fifty blooms from H. W. Dutton, among which were several flowers of the showy Charles XII. Fifty blooms from J. L. L. F. Warren. Upwards of fifty blooms from W. Mel-ler. Thirty blooms from J. Hovey.

Sept. 24th.—An adjourned meeting of the Society was held to-day—the President in the chair.

Mr. Walker, from the Committee appointed for the purpose, at the last meeting, reported that they had procured a copy of the annual address, which had been placed in their hands. It was then voted that the address be placed in the hands of the same Committee for publication—and that the reports of flowers, fruits, and vegetables, exhibited at the annual exhibition, be appended to the same—and also an account of the Festival given by the Society at Concert

Hall, on the 16th of September; a sufficient number of copies to be published for the use of the Society.

The thanks of the Society were voted to Mr. S. Walker, chairman of the Committee of Arrangements, and to the several members of that Committee, for their duties in decorating the hall, arranging the tables, &c.

The thanks of the Society were also voted to the chairman of the Select Committee, and the individual members of that Committee, for their labors in providing the necessary arrangements for the Festival at Concert Hall.

A committee of five, consisting of Messrs. S. Walker, C. M. Hovey, H. W. Dutton, C. Newhall, and R. M. Copeland was appointed to nominate a list of officers for the ensuing year.

It was voted, on motion of Mr. Walker, that this committee be instructed to report a ticket which should not contain the name of any person on more than one of the Standing Committees, provided they found it practicable and expedient to do so.

A letter was read from the Corresponding Secretary of the American Institute of New York, inviting the Society to send delegates to its next annual exhibition, on the 11th of October.

A delegation was appointed, consisting of the President of the Society, B. V. French, S. Walker, E. Wight, C. M. Hovey, J. E. Teschemacher, J. Breck, R. T. Paine, and W. Kenrick.

The meeting was then dissolved.

Exhibited.—Flowers: The dahlia show of Thursday and Friday was continued to-day—and but few other flowers were brought in.

Fruit:—From J. Hooper, Jr., Marblehead, golden Beurré of Bilbon, Belle et Bonne, Beurré d'Isambert (syn. brown Beurré,) and two other kinds of pears without name, all fine specimens. From Capt. George Lee, fine large Ribstone pippin apples. Beautiful Lemon clingstone peaches from J. Hill. Large and handsome Williams's Bon Chrétien pears from O. Johnson. From R. M. Copeland, white Sweetwater grapes. From D. J. Godfrey, Milford, Mass., Clingstone peaches. From J. F. Trull, Iron or black pear of Worcester pears, Orange quinces, and Egg tomatoes. From James Munroe, Cambridge, large pears, known in some places as Tucker's Winter. S. R. Johnson exhibited white Sweetwater grapes, grown in the open air. From George Walsh, green and white gage plums. From E. Vose, handsome summer Pearmain and Lady Haley's Nonsuch apples. Fine specimens of Coe's Golden Drop plums from H. Vandine, Cambridgeport. From J. Lincoln, Hingham, Seek-no-further apples. From A. Hager, Lincoln, Orange quinces.

From J. L. L. F. Warren, Lemon clingstone peaches. From S. Woods, Saxonville, Gloria Mundi apples, very large, weighing 20½ ounces each. From Capt. W. Stone, Natick, Lemon clingstone peaches. From F. Low, Jamaica Plain, Gloria Mundi apples, weighing 20¾ ounces each. From A. D. Weld, Roxbury, Bartlett pears, and Porter apples. Fine specimens of Bartlett pears and Porter apples were sent by Z. Reed, of Westford. Large Bartlett pears from T. Dowse, Cambridgeport. From N. N. Dyer, Abington, Abington Cons (growth of 1841, have kept two seasons,) Rock, Niles's Sweeting, Bearn, and a kind of pearmain apples (very much resembling pears.) From Lemuel Dana, Dedham, Loll apples.

ART. II. Faneuil Hall Market.

<i>Roots, Tubers, &c.</i>	From		To		<i>Squashes and Pumpkins.</i>	From		To	
	\$	cts.	\$	cts.		\$	cts.	\$	cts.
Potatoes, new:					Squashes, per pound:				
Chenangoes, { per barrel..	1	00	1	25	Autumnal Marrow,.....	2		3	
{ per bushel, ..	50		—		Canada Crookneck,.....	2		3	
Common, { per barrel, ...	1	00	—		Winter Crookneck,.....	1½		2	
{ per bushel, ...	37½		—		Pumpkins, each,.....	10		12½	
Eastports, { per barrel, ...	1	25	1	50					
{ per bushel, ...	50		62½		<i>Fruits.</i>				
Sweet, per bushel,	1	00	—		Apples, dessert and cooking:				
Turnips, per bushel:					Baldwins, per barrel, ...	1	25	1	50
Common,.....	37½		50		Greenings, per barrel, ...	1	25	1	50
Ruta Baga,.....	50		—		Russets, per barrel, ...	1	25	1	50
Onions:					Spice, per barrel,.....	1	25	1	50
Red, per bunch,.....	2½		3		Common, per barrel, ...	75		1	00
White, per bunch,.....	2½		3		Porter, per bushel,.....	1	00	1	50
Yellow, per bushel,.....	62½		75		Sweet, per bushel,.....	1	50	—	
White, per bushel,.....	62½		75		Pears, per half peck or doz:	25		37½	
Beets, per bushel,.....	50		75		Broca's Bergamot, per doz:	25		37½	
Carrots, per bushel,.....	50		75		Urbaniste, per dozen, ..	50		—	
Horseradish, per pound, ...	8		12½		Long Green, per half peck	50		—	
Garlic, per pound,.....	12½		—		Seckel, per half peck, ...	37½		50	
<i>Cabbages, Salads, &c.</i>					Heathcot, per half peck, ..	50		—	
Cabbages, per dozen:					Bergamot, per half peck, ..	25		37½	
Drumheads,.....	50		—		Baking, per bushel,.....	1	50	—	
Savoys,.....	37½		50		Plums, per quart:				
Red Dutch,	50		—		Common,.....	12½		—	
Brocolis, each,.....	8		12½		Peaches, per peck:				
Cauliflowers, each,.....	12		—		Extra,.....	1	50	—	
Lettuce, per head,.....	2		3		Common,.....	50		75	
Celery, per root,.....	8		12½		Water-melons, each,.....	12½		25	
Peppers, per pound,.....	4		—		Musk-melons, each:				
Sweet Corn, per dozen, ...	6		8		Common,.....	12½		25	
Beans, shelled, per quart:					Green Citron,.....	8		12½	
Common:.....	6		8		Cucumbers, per dozen, ...	6		—	
Sievas,.....	10		12½		per hund. (for pickling) ..	25		—	
Limas,.....	12½		—		American Citron, per pound,	2		3	
Cucumbers, (pickled) pr gal.	25		—		Egg Plants, each,.....	12½		—	
Peppers, (pickled,) per gallon	37½		—		Mangoes, per dozen,.....	17		25	
<i>Pot and Sweet Herbs.</i>					Tomatoes, per peck,.....	25		—	
Parsley, per half peck,....	20		—		Grapes per pound:				
Sage, per pound,.....	17		20		Black Hamburg,.....	50		—	
Marjorum, per bunch,....	6		12½		White Sweetwater,.....	25		—	
Savory, per bunch,.....	6		12½		Isabellas,.....	8		10	
Spearmint, green, per bunch,	3		4		Na ive, per half peck, ...	12½		20	
					Cranberries, per bushel, ...	1	50	2	00
					Pine-apples, each,.....	12½		25	

REMARKS.—The month up to the 24th was cool, accompanied with frequent and, in several instances, very heavy showers; a large quantity of rain fell during the month. The morning of the 24th, the thermometer fell down to 32°; and, in many situations, particularly in valleys, there was a hoar frost which cut off all vines and tender plants. From that time up to this date the weather has been warm

and pleasant, and with the appearance of continuing so for some days.

Vegetables.—The crop of potatoes is exceedingly large, although we have understood that the rust in many localities, particularly in Vermont and New Hampshire, has very materially injured the crop; they come to hand freely, and sell at our prices: Eastports are now received, and are quite low: Sweet have fallen off in price, owing to the great quantity which has arrived. Ruta Bagas now come in of fair size. Of beets and carrots a full supply. Cabbages are plentiful and good: the crop of drumheads seems rather earlier than usual: red Dutch are now received. Peppers are about gone. String beans are all gone, but there has been a supply of shelled sorts, particularly of Sievas and Limas, the latter large and excellent—the frost was not quite severe enough to cut off the vines. Sweet corn is about gone. Squashes continue scarce, and first rate autumnal marrows command \$40 by the ton: winter crooknecks now come to hand, but the supply will be limited: summer squashes all gone.

Fruit.—The crop of apples is large, though not first rate: there are a great many windfalls and wormy ones. Good Baldwins only command our quotations: fine Porters command good prices, and are now rather scarce; of good sweet ones there is not a great supply. Of pears the quantity of fine dessert sorts is rather limited, and very choice ones are in considerable demand; baking are abundant and of good size. Plums are all gone, with the exception of a few common sorts. Peaches of extra fine quality are scarce: but there is a good supply of common ones. Watermelons have been abundant and good: but the cool weather has nearly destroyed the vines. Cucumbers for pickling are scarce and higher. Of foreign grapes there is a fair supply: Isabellas are scarce and of inferior quality. Cranberries have just come in: the prospect is now that the crop will be short, owing to late frosts in the spring.—*Yours, M. T., Boston, Sept. 28th.*

HORTICULTURAL MEMORANDA

FOR OCTOBER.

FRUIT DEPARTMENT.

Grape vines will now be ripening their wood, and will need some attention. Where the grapes are all cut, the house should be well aired in fine sunny weather, taking the advantage of early morning to admit air, and closing up early, especially if the nights are cool and damp. Pick up all fallen leaves, and prune off all superfluous green wood not wanted or likely to ripen.

Strawberry beds will continue to need attention: if the weather continues mild, the plants will grow during the month, and will get firmly rooted before cold weather. Keep all weeds hoed up.

Raspberry plants may be set out this month; it is a good season to make the new plantations.

Currant and gooseberry bushes may be set out this month with safety.

Peach, pear, apple, plum, and other fruit trees, may be set out in October after the fall of the leaves.

Cherry, plum and peach trees, budded in July and August, should have the binding loosened.

FLOWER DEPARTMENT.

The Dahlias will probably be cut off by the frost in the early part of the month, as they rarely escape in the vicinity of Boston beyond the 8th or 10th, and are frequently destroyed in September. When the tops are touched with frost, if early in the season, the roots had better remain in the ground as long as the weather is mild: but if late when cut off, they had better be taken up at once.

Oxalis Bowiei, cernua, rosea, &c., should be potted now.

Geranium cuttings, put in in August, should be potted off now into No. 1 pots. The old plants should be repotted now, if not done before.

Chrysanthemums, if not already repotted for the last time, should be attended to immediately.

Roses may yet be propagated from cuttings; old plants in the border should be taken up and potted, if wanted for blooming in the winter.

Chinese primroses should be repotted into the next size pots.

Camellias will now require attention previous to placing them in the house for the winter. Let the pots be washed clean, and the surface soil taken off, and fresh compost added in its place.

Verbenas, layered into pots, should be taken up and placed in a frame.

Mignonette, sown in August, should be carefully watered at this season.

Cactuses should now be removed to the house, where they will require less water. Grafting may be performed successfully at this season.

Tulips, hyacinths, and similar hardy spring flowering bulbs, may be planted the latter part of the month.

Schizanthuses, sown in September, should now be potted off singly in the smallest size pots.

Hardy perennial plants may be removed this month with safety.

Annual seeds, such as larkspurs, clarkias, coreopsis, &c., may be sown the latter part of the month.

Ixias, sparaxises, &c., may be repotted this month.

Petunias, wanted for flowering during winter, should be taken up immediately into small pots, selecting late sown plants.

Green-house plants, of all kinds, should be repotted, pruned and dressed, preparatory to being placed in the house.

Pæonies may be removed this month.

THE MAGAZINE
OF
HORTICULTURE.

NOVEMBER, 1842.

ORIGINAL COMMUNICATIONS.

ART. I. *New localities of the Magnòlia macrophylla, with the dimensions of a large tree of the M. grandiflòra; and a notice of a newly discovered species of Sarracènia.* By A. GORDON.

DEAR SIR:—In my last, I gave you to understand I had found the *Magnòlia macrophylla* in different parts of the State of Mississippi. This splendid specimen of the American forest having hitherto escaped the researches of botanists, determined me to prosecute the subject and trace its locality, as I had every reason, as mentioned in my former communication, to consider it was more extended than at the time had come under my observation.

Where I first observed the *Magnòlia macrophylla*, it was in Rankin County, some twenty or thirty miles from Jackson, the capital of the State, and about eight miles from Pearl River; then, within a few miles of Vicksburg, in Warren County; and in the greatest abundance on the plantation of Col. Heburn, nine miles from Vicksburg. I then traced it from Vicksburg to Natchez, in the utmost profusion. From the latter city, in a south-easterly course, wherever the soil or location was favorable, I found it as far as the Chicasahaw River, within a few yards of McInnes's Ferry, on the road from Mobile to Natchez; thus constituting its range, north and south, more than two hundred miles, and east and west, over one hundred. I may here remark, in the upper part of the State it is known by the name of *Parasol* tree, and in the lower, by that of *Cucumber* tree. Associated with the *Magnòlia macrophylla*, I found the *M. grandiflòra*, the splendid

Chionánthus virgínica, *Hòpea tinctòria*, *Illicium floridànum*, and a great variety of other very ornamental shrubs—of which, probably, more anon.

In my last, I omitted to state, that, although the height attributed to the tree is, in general, correct, still I have seen it frequently as high as seventy feet; but in Mississippi I found trees in general assume a magnitude surpassing what had ever previously come under my observation. The *Magnòlia grandiflòra*, in many places in Mississippi, ranges over one hundred feet; and on the 16th inst., during my travels, I was passing a grove of this most magnificent forest ornament, and through this identical grove there were people at work forming a road. The whole grove was gigantic, but one specimen was splendid, and this was doomed to fall a victim before the axe, it being in the direct line of the road. I rested until it was felled to the ground. It was the noblest specimen of the *Magnòlia* I had ever seen; so symmetrically formed, in all its parts so perfect, there was not a blemish. Every blow from the axe thrilled through my veins, but its doom was inevitable, and I could not avert it. The following are its dimensions, accurately taken:—

Diameter of butt, three feet from the ground, five feet seven inches.

Length of butt, to the lower branches, eleven feet nine inches.

Extreme height when standing, *one hundred and forty-seven feet*.

To witness the downfall of such a noble tree, of such a noble species, created sensations which I will not attempt to define.

Thirty miles from Mobile, while traversing a swamp, I discovered an entirely new species of *Sarracènia*. This species has in some degree the *habit* of *S. purpùrea*, but not near so large, and the leaf is a beautiful yellow, and regularly spotted with a pure white from the base of the leaf. It is very distinct from *S. variolàris*, and I have named it *S. maculàta*. In fact, this specific character was so distinctly obvious, that, to have given any other name, unless commemorative, would have been utterly at variance with the rules which regulate specific distinctions.

Yesterday, (23d,) while sauntering along a sandy ridge, something vivid attracted my eye. I went to examine it, and

this proved to be my favorite *Gardoquia Hookeri*, in full bloom. Although I was the first to introduce this plant to Europe, I never had, until yesterday, seen it in flower. Then to see more than an acre of it, covering the surface with its scarlet blossoms, afforded me so rich a repast, some idea of which may be formed by those who have admired this little gem with only a single plant in the collection.

I have thrown these observations hastily together, under the impression that they might gratify some of your readers. I have lost no time since I left the woods, for I am now surrounded by that fearful and destructive scourge of all southern cities, the yellow fever; and probably its mortal effects may now be circulating in the blood of the hand which guides the pen, and may soon render it motionless forever. If so, adieu!

Yours, very respectfully,

ALEXANDER GORDON.

Mobile, Sept. 24, 1842.

ART. II. *Notice of a large Pear tree in Indiana.* By the
Rev. H. W. BEECHER, Indianopolis, Indiana.

WE have, in our State, a pear tree so remarkable, that, if you have seen no notice of it, the following may be thought of some value. We heard of it from various gentlemen, and saw some notices in country papers, which interested us in gaining better information. One of our nurserymen being in that part of the State, we requested him to visit and gain exact information. He is an accurate man, and his account may be depended upon.

This tree, one foot above the ground, measures *ten feet* in circumference, and *six and a half feet* at nine feet above the ground. The space covered by the branches, from outside to outside, is sixty-nine feet; that is, the circle formed by a line described around the ends of the branches, would be sixty-nine feet in diameter.

In the year 1834 it yielded one hundred and thirty-four

bushels of pears; in the year 1839 it produced eighty bushels; and in the year 1840 it produced one hundred and forty bushels. In one other year (but which year the account before me does not state,) it produced one hundred and thirty-eight bushels.

This tree grows about ten miles north of Vincennes, Knox Co., Indiana, and is said to have sprung from a seed planted some thirty-five or forty years ago, by a Mrs. Ockletree. The tree is a very rapid grower.

It is perfectly hardy, a constant bearer, and, I need not say, an enormously productive kind. The fruit is about the size of a turkey's egg; rating, as to quality, with about the third grade of dessert pears. It is a fall—early fall, pear. The accounts of the time between the planting of the seed and the bearing of this tree, vary from nine to fifteen years. The original owners are dead. We have the fruit growing in our nurseries, near town, and grafts may be sent, should any gentleman in your neighborhood desire it. I regret that the young man did not ascertain the height of the tree.

I am, respectfully, yours,

H. W. BEECHER.

Sept. 29, 1842.

ART. III. *Additional Remarks on the fertile and sterile character of several varieties of Strawberries; with a Notice of a new native species of the Strawberry, from the Prairies of Iowa.* By N. LONGWORTH, Esq., Cincinnati, Ohio.

SIR:—In the publication of my letter in the July number of your Magazine, I am made to say, “the *small* Virginia scarlet produces about half a crop of delicious fruit:” it should read, “the *male** Virginia scarlet.” This variety has the female plant, and when in a situation to be impregnated, is an abundant bearer of good sized, well flavored, fruit. The male organs are wholly defective in the female plant. Let me

* We read it *male* in the manuscript, but in the proof we inadvertently omitted to make the correction.—*Ed.*

know the result with your seedling plants, that are perfect in both stamens and pistils. You will not find them worthy of cultivation, unless it be to impregnate your female plants. In a thousand years, they will not produce a female plant, nor will your bearing ones produce stamens by running. My sketch of the flowers of the male and female Hudson blossoms, though sketched from memory, was correct. As a general rule, the male blossom of each variety is much larger than the female of the same variety. Your drawings will be of great value to all cultivators of the strawberry who do not *know too much* to benefit by your article.

David T. Dismy, Esq., informed me he had seen larger and finer strawberries growing in the prairies of Iowa, than he had ever seen in our market. Though incredulous, I requested him to obtain me some plants, which he did in the spring of 1841. I planted them on a north border, and, when in blossom, found there were two varieties of them, and of each, both male and female plants. They grew badly, and bore but little fruit, and that of small size. In March last, having, as usual, none but female plants in my beds, I directed some male plants, wholly defective in the female organs, to be planted in the paths between the beds. When these plants were in blossom, I discovered there were two varieties, both males, but one of them producing fine fruit, and different from any variety in my garden. Some plants had scarcely a defective blossom; others produced from four to six strawberries: the fruit was the largest in my garden. On inquiry, I found that a part had been taken from the bed of the Iowa strawberry, and were those producing fruit.

This strawberry grows in the prairies of Iowa, fully exposed to the sun and air. On my north border, they had not the full advantage of either, and to this cause, I doubt not, their failure is to be attributed. On the border I found female plants, and I have now given them a location where they will have the full benefit of sun and air. Every blossom will bear a fruit, and, I anticipate, of large size. The male plant, should it sustain present promises, I consider invaluable for the impregnation of your seedling, Keen's, Hudson, &c.: invaluable, for it can, even when out of blossom, be distinguished from all other kinds, and kept from overrunning the beds; and from its large size, good quality of the fruit, and certainty of producing a fair crop, well deserving of cultivation by itself.

I will, in the spring, send you a few of these plants, and some other varieties of seedlings that will be new to you. I can also send you one that is, I believe, of the pine family, producing the largest fruit of any variety that has come under my observation, that is perfect in both the male and female organs.

Yours, N. LONGWORTH.

Cincinnati, Ohio, Aug. 15, 1842.

We shall be pleased to receive the different kinds of strawberries kindly offered us by our correspondent, should he find a good opportunity to send them. The Prairie strawberry may yet prove the parent of larger varieties than any we now possess.—*Ed.*

ART. IV. *Remarks on the Sterility of several kinds of Strawberries; and a Query respecting the best method of insuring the fertility of old plantations.* By D. W. COIT, Esq., Norwich, Conn.

AN article in the last number of the *Cultivator*, on the culture of the strawberry, and particularly of your "Hovey's Seedling," has attracted my attention, and at the same time been very acceptable, having under cultivation myself several kinds of the strawberry referred to, which have hitherto proved barren and useless, but which, by the new light thrown on the subject, in the article referred to, I hope may now be rendered valuable.

As you appear to be immediately interested in the subject, and moreover, as (I believe) you write for the benefit of the public, I have thought that the observations of another, differing in some particulars from your own, might be not uninteresting to you.

About two years ago, my neighbor, Mr. Benjamin Huntington, procured from some garden in your vicinity, the following kinds of strawberry, viz:—Methven Castle, Warren's seedling Methven, and Hautbois, and, at the same time, from yourself, your Hovey's seedling. These were set out in parallel

rows, near together; but although well attended to, neither kind has produced fruit, unless, indeed, a very little, and that imperfect. I examined myself the plants, when in blossom last spring, and found that all had the female organs; but not in a single instance did I discover the male organs in any of the kinds. Now the remedy for these unfruitful plants would appear to be plain, it being, as you say, only necessary to know "that our seedling, the Methven, Downton, &c., should be set out in beds near to a bed of early Virginia, or some other staminate plants, to make them produce as great a crop as may be wished." My observation has been, that there may be exceptions to this rule, and it is to this that I would particularly call your attention.

In a part of Mr. Huntington's garden, somewhat remote from the vines I have referred to, was a large bed of the white Wood strawberry, and parallel to these, and almost intermingled with them, another bed of the Methven Castle, which for two seasons have not produced a single perfect fruit: again, an experiment was made last spring, by setting out in the midst of the bed of Warren's seedling Methven, and also of the Hautbois, several of the native wild strawberry plants, but without any difference being perceived in the barren plants in consequence. How can you explain this? The Wood, as well as the wild strawberry, are both, if I mistake not, staminate plants, and yet neither has served to impregnate either the seedling Methven or Methven, in the cases referred to.

I observe that the Hautbois is stated by Mr. Longworth, to be of a "different species," and, as such, not capable of being impregnated, either by the Hudson, Virginia, scarlet, or our native strawberry; is it then that it can only be rendered productive by a mixture of male plants with the female of the same kind? If so, I would ask if any male plants of this description can be procured. I have a superabundance of female plants, but not a single male, nor am I aware that I have the means here of making the former of any value.

I have in my own grounds six kinds of strawberries, which I have cultivated successfully for several years; in addition to these, I have added, on a new plot of ground, the four varieties named as in the garden of Mr. Huntington, and it is, as you will readily perceive, desirable to set about the means of making these productive with the least possible delay. It will

be inconvenient for me to set out new beds of staminate plants, as you recommend, in season to affect my barren ones the next spring. I propose, instead of this, to take male plants of a variety I have at command, and which I can designate, and to set them out through my rows of barren plants: do you approve of this course?

Your very obedient servant, DANIEL W. COIT.
 Norwich, Conn., Oct. 9, 1842.

We are exceedingly pleased to learn that Mr. Longworth's article upon the strawberry, together with our remarks upon the same, which appeared in a late number, have attracted the attention of cultivators of this fine fruit. In a preceding page, will be found some additional hints from Mr. Longworth, on the same subject, and the paper above, though detailing some new facts in relation to the strawberry, will aid in determining the best methods of cultivation suited to the different varieties. The subject is important, and it is gratifying to receive the assistance of amateurs, that the doubts respecting the *di-æcious* character of certain kinds, if not founded in truth, may be entirely removed in the minds of all, and a proper course of culture ascertained, which will result in the production of an abundance of fruit.

It will be seen, by Mr. Coit's communication, that he has had four kinds of strawberries in cultivation, neither of which have produced any fruit—and undoubtedly from the cause already stated, viz:—want of staminate or male plants; neither of the sorts above named, though two of them we believe to be alike, having male plants. The cause of their barrenness is thus easily explained.

But in regard to the plants in his neighbor's garden, set out in parallel beds with the *white* Wood, how can their want of productiveness be explained? Can there be exceptions to the general rule, as stated by Mr. Longworth? It is to this particular question that the article of Mr. Coit is worthy of attention. We do not feel prepared to answer it to our own satisfaction at this time; but, in want of facts which we trust to be able to obtain another spring, we will name some causes which might have tended to produce the result stated by Mr. Coit.

First,—the white or red Wood strawberry we have not cultivated, only for procuring good plants, for several years, ow-

ing to the small size of the berries, and, in consequence, have not taken any particular note of their flowering or fruiting—but we have the impression, whether or not correct we cannot now say, that it is so much later in blooming than the Methven that it would not be certain to impregnate the latter variety. If such should not be fact, we can only infer,

Second,—that the small size of the flowers, and their being generally hidden by the foliage, might prevent them from impregnating beds near at hand, particularly in some seasons, when there are repeated showers, and dull weather, at the time of blooming.

Thirdly,—Though we have cultivated the Methven scarlet for upwards of ten years, yet we never examined the blossoms till the past spring, and then only those on a very small number of plants. May not the Methven, like some of the kinds Mr. Longworth mentions, have both male and female blossoms? and may not the former, being the most vigorous, overrun the latter, and Mr. Huntington's plants be nothing but *staminate* ones? Though this may not, perhaps, be the case, yet there is a probability of it.

Neither of these hypotheses may be correct, and the want of productiveness may arise from some unknown, and, at present, inexplicable cause. Yet we trust, by the return of another spring, that a satisfactory reason may be discovered for the unproductiveness of the kinds growing parallel with the white Wood. We would remark, that the wild strawberries of the pastures do not all have perfect flowers: in a dozen or two plants which we examined last spring, some were perfect, having both stamens and pistils—others only pistils—and others only stamens; thus showing, that the defect mentioned by Mr. Longworth, exists in the original species.

We trust the subject will continue to engage the minds of cultivators, and that, by the return of another year, a correct observation will set the disputed question at rest.

The method of setting out staminate plants in rows between the beds, in the spring, will have the effect of securing a crop of fruit; and the kind we would suggest for this purpose, is the early Virginia, the flowers of which are large, and filled with an abundance of stamens. This variety is also a rapid grower, perfectly hardy, and produces an abundance of excellent fruit, the earliest in the market.—*Ed.*

ART. V. *On the cultivation of the Amaryllis Belladonna.*
By the EDITOR.

FEW of the Amaryllideæ possess more beauty than the old and well known *A. Belladonna*. It is one of the oldest species grown in our gardens, and in many collections the only amaryllis that is cultivated. Blooming at a season when few of the other species flower, and when the beauty of the garden is passing away, the Belladonna lily is worthy of a place in the collection of every amateur of plants.

There are upwards of a hundred species and varieties of the amaryllis, which are well deserving cultivation in every good collection of plants. When properly treated, few plants add more to the splendor of the green-house than these. Their flowers, it is true, are not so lasting as some others, neither are they produced successively during the year, as with many plants. But their beauty is of that dazzling kind, which rivets our attention and admiration for the time, and too gorgeous to be constantly before us. We only regret that the amaryllises are so little cultivated and appreciated among cultivators generally.

The *A. Belladonna* is of the easiest growth. It generally blooms in the months of September and October, and with its clusters of beautiful pink flowers adds much to the beauty of the green-house or the parlor. The soil best suited to the bulb is composed of one half sandy loam, one quarter leaf mould, and one quarter old hot-bed manure, with sand in the proportion of nearly one third of the whole. The bulbs should be potted in August or September, and those with flower buds will soon throw up a spike of elegant flowers. The proper sized pots for blooming roots is No. 4's, and for the smaller bulbs No. 3's. Give a good drainage with broken potsherds, coarse at the bottom and finer above, and fill the pots with the compost; place in the bulb, setting it down so as to leave about one third of the top above the surface; finish with a good watering through a fine rose or with the syringe; and place the pots in a frame or in the green-house, where the bulbs will speedily take root, and produce their flowers.

But it is after this that the bulbs require the most attention to make them bloom well another year; for upon the growth of the leaves, and the great quantity of sap stored up in the bulb,

depends entirely its future excellence. As soon as the flowers have faded, the stem may be cut off just above the bulb; good supplies of water should be administered, and leaves will begin to put forth; in the course of two or three months they will have acquired their full size, and watering should then be gradually diminished until the foliage is completely dried up. During the period of their growth the plants should be placed in a sunny situation, and as near the glass as convenient.

When the bulbs have completed their growth, which will probably be in the month of February or March, they should be placed away on a dry shelf, turning the pots upon their sides, but not shaking out the bulbs. Here they may remain until the month of August or September, when the operation of repotting should commence again.

Grown in the manner here recommended, the beautiful *Beladonna* lily may be seen rearing its head of pale rosy flowers among the few plants, which at that season of the year, when the lively tints of summer are changing to the sombre hues of autumn, are so desirable in every choice collection.

ART. VI. *Observations on the Autumn treatment of Green-house Plants.* By A. SAUL, Foreman in the Botanic Garden and Nurseries of A. J. Downing & Co., Newburgh, N. Y.

SIR,—Having observed (what appears to me,) a very bad practice in the autumn management of the green-house, prevailing to a considerable extent, among amateur cultivators, and in places under the care of persons not professional gardeners, I wish, through the medium of your Magazine, to draw the attention of those to the subject, whom it more immediately concerns.

In the first place, persons generally (I mean the class of persons above referred to,) are in too great a hurry, on the first appearance of a cold night in the early part of September, to house all their plants indiscriminately.

In the next place, they keep their houses too close imme-

diately after getting in their plants, and during the early part of the autumn, without paying due attention to out-door temperature.

And, finally, fires are applied before they are absolutely required, (which ought not to be,) and kept on constantly, without reference to moderate changes in the latter part of fall, and early winter.

The result of the above course of treatment is, the plants have the appearance of early spring, at the setting in of winter, from premature excitement; and are in a much worse state for getting through the winter, than they would be under a different mode of management. The young and tender shoots, and foliage, are much quicker and easier affected by a sudden fall of temperature. Consequently, it will be necessary to keep up, at all times, a higher temperature, to guard against such sudden changes, and, by so doing, it will be making bad worse, by exciting the already too much excited and drawn up plants into an exhausted and feeble state, totally unfit for the production of flowers during winter, &c.

Some reason by saying they pursue the above course, to have flowers in winter; but the very reverse is the case. It is true they may have a few flowers the latter part of the fall and early in December: but about New Year's, and during the months of January and February, flowers are out of the question, from the very fact, that the plants are in a too weak and drawn up state to develop their flowers, in the confined atmosphere that they necessarily will have to endure, during the extreme cold of these months.

To obviate the above results, I would with great confidence recommend the following simple directions.

In place of huddling all the plants indiscriminately into the green-house, on the first appearance of a cold night, in September, select out the more tender plants to be taken in doors or under cover somewhere. For small plants, a cold frame is the best place when the lights can be taken off by day, and night too, when moderate; and so keep selecting out from time to time, as the season advances, the most tender among those that remain, until finally the time arrives for the final arrangement of the green-house, when every thing must be in its place. I have found, for the last four years, the middle of October soon enough for this *neighborhood*, for the most hardy inmates of the green-house, such as roses, myrtles, lauristinus, &c.; of

course, proper allowance must be made for latitude, as well as other local circumstances.

After the plants are all housed, it will be necessary to admit all the air that possibly can be admitted by day at first, and some at night when moderate, and at all times, when the weather is favorable, to be free as practicable with air. For this reason it is obvious to all that the plants being out all summer, and most of them up to the first of October, and all the season's growth has been made out doors, being subject to the same changes of temperature, &c., as the most hardy shrub, that the weather must be very cold indeed, when plants in this state, at this period, can suffer from too much air; and the object of being so free with air, at this season, is to keep the plants as late as possible in the autumn from making fresh growth in doors; for as soon as this takes place, it will then be necessary to be very cautious how air is to be admitted. The advantage of retarding the fall growth of green-house plants, is to enable them to winter better; it being obvious, as I have already stated, that this firm short jointed wood, that has been made out doors, is better calculated to get through the winter, as well as to produce flowers, during the winter and early spring, (which they will necessarily be forced into by the artificial atmosphere requisite at this season,) than plants excited and enfeebled by fall growth will be at the setting in of winter.

It will be borne in mind that the above remarks have no reference to establishments that have separate forcing departments, where flowers may be had at all seasons, but simply to the miscellaneous collection of green-house plants, among which are frequently to be found plants requiring temperature varying from the hot-house down to the half hardy plant.

One error among amateurs is, they suppose when they have all those different plants in their collection, they should have them all in perfection, without considering for a moment the different and opposite treatment they require; whereas here, in this case, they are all subject to the same temperature, &c., indiscriminately, and being so, the object must be to suit the whole with the least possible injury to any: in doing so, admit air freely in the fall, when the plants are in a state not to suffer from it; and be very cautious how air is admitted when the plants are in a growing tender state in cold weather.

A. SAUL.

Horticultural Nurseries, Newburgh, }
N. Y., Oct. 21, 1842. }

REVIEWS.

ART. I. *Cottage Residences; or a series of Designs for Rural Cottages and Cottage Villas, and their gardens and grounds: adapted to North America.* By A. J. DOWNING, author of a treatise on Landscape Gardening. Illustrated by numerous engravings. 1 vol., 8vo., 187 pp. New York: 1842.

WE some time since announced the appearance of this volume, and we congratulate the author upon the very excellent manner in which the work is executed.

The cottage and villa architecture of this country is full of defects, and needs the aid of a reforming hand, before the examples of bad taste shall become so general that such aid will be of little avail in correcting them. It is in the infancy of the art that works like Mr. Downing's are needed, to form and mould a true architectural taste among the people, that they may be able to appreciate that which is beautiful and perfect, in preference to that which is common, and without form.

We need not, however, enter into any argument to show how acceptable, at this time, is such a work as the one at the head of this article: an extract from the preface will show with what spirit the author takes up the subject, and the motive which induced him to prepare the volume.

A hearty desire to contribute something to the improvement of the domestic architecture and the rural taste of our country, has been the motive which has influenced me in preparing this little volume. With us, almost every man either builds, or looks forward to building, a house for himself, at some period of life; it may be only a log hut, or, at most, a rustic cottage, but perhaps also a villa, or a mansion. As yet, however, they are mostly of the plainest and most meagre description, or, if of a more ambitious, they are frequently of a more objectionable character—shingle palaces of very questionable convenience, and not in the least adapted, by their domestic and rural beauty, to harmonize with our lively natural landscape.

Now I am desirous that every one who lives in the country, and in a country house, should be in some degree conversant with domestic architecture, not only because it will be likely to improve the comfort of his own house, and hence all the houses of the country, but that it will enlarge his mind, and give him new sources of enjoyment.

It is not my especial object, at this moment, to dwell upon the superior convenience which may be realized in our houses by a more

familiar acquaintance with architecture. The advantages of an ingeniously arranged and nicely adapted plan, over one carelessly and ill contrived, are so obvious to the reason of every one, that they are self-evident. This is the groundwork of domestic architecture, recognized as all-important by all mankind, and some ingenuity and familiarity with practical details are only necessary to give us compact, convenient and comfortable houses, with the same means and in the same space as the most awkward and unpleasing forms.

But I am still more anxious to inspire in the minds of my readers and countrymen, more lively perceptions of the Beautiful, in every thing that relates to our houses and grounds. I wish to awaken a quicker sense of the grace, the elegance, or the picturesqueness of fine forms that are capable of being produced in them by Rural Architecture and Landscape Gardening—a sense which will not only refine and elevate the mind, but pour into it new and infinite sources of delight. There are perhaps a few, upon whose souls nearly all emanations of beauty fall impressively, but there are also many who see the Beautiful in nature and art only feebly and dimly, either from the want of proper media, through which to view her, or a little direction as to where she is to be found. How many, too, are there who even discover the Beautiful in a picture or a statue, who yet fail to admire her rounding with lines of grace, and touching with shades of harmony all common nature, and pervading silently all material forms. “Men,” says Goethe, “are so inclined to content themselves with what is commonest: so easily do the spirit and the sense grow dead to the impression of the Beautiful and the Perfect, that every person should strive to nourish in his mind the faculty of feeling these things by every thing in his power; for no man can bear to be wholly deprived of such enjoyment. It is only because they are not used to taste of what is excellent, that the generality of the people take delight in silly and insipid things, provided they be new. For this reason every day one ought to see a fine picture, read a good poem, hear a little song, and, if it were possible, to speak a few reasonable words.”

Coming to the task with such feelings, with a mind imbued with the subject, and prompted more with a view to introduce correct principles of taste, rather than the simple purpose of making a book, Mr. Downing has presented us with a volume which will tend much to induce those who are building, or ever intend to build, a villa or cottage residence, to reflect and think, before they decide upon the style and the arrangements of a building which is to constitute their home: for in proportion as that home is graceful, pleasing, and convenient, so will its possessor become more and more attached to it, and derive more intense satisfaction from the beauty and utility which prevails in every part.

It is only by placing before the public correct specimens of architectural taste, that improvement can be effected. Almost

every man looks forward to that period when he shall possess a house; and when that time arrives, in the haste which is characteristic of our people, and without scarcely any previous thought or study, the house is to be at once erected. A common carpenter is consulted; the prevalent style of building in the immediate neighborhood, whatever that style may be, is decided upon; and, in a short time, the whole is completed and ready for occupation. The owner is satisfied with it, for the simple reason, that he has never seen examples which please him better; or, if he may have seen a few, he has not courage to depart from the usual style, for fear of the ridicule and sneers of his neighbors and friends, and the risk of being denominated odd. If he who intends to build has no knowledge of architecture, and does not feel competent to superintend the erection of his building, persuade him to apply to a professional architect—describe to the architect the conveniences and comforts which are required; and, after giving him some idea of what is wanted, leave to his good taste and judgment the style and the details of the building—directing him to superintend, and see that the work is properly executed. Such a house will not only be a source of domestic comfort, but a source from whence will spring a more just appreciation of the Beautiful, and a higher and more comprehensive idea of that harmony which is the fundamental principle of all material forms.

The leading chapter, headed “Architectural Suggestions,” contains some excellent remarks on the *color* of buildings; and our author quotes the following, from Sir Uvedale Price, in his *Essays on the Picturesque*, which we copy, with the hope the good advice may be borne in mind by all who intend to build.

One of the most charming effects of sunshine, is its giving to objects not merely light, but that mellow golden hue so beautiful in itself, and which, when diffused as in a fine evening, over the whole landscape, creates that rich union and harmony so enchanting in nature and Claude. In any scene, whether real or painted, when such harmony prevails, the least discordancy in color would disturb the eye; but if we suppose a single object of a glaring white to be introduced, the whole attention, in spite of all our efforts to the contrary, will be drawn to that one point; if many such objects be scattered about, the eye will be distributed among them. Again, (to consider it in another view,) when the sun breaks out in gleams, there is something that delights and surprises, in seeing an object, before only visible, lighted up in splendor, and then gradually sinking into shade:

but a whitened object is already lighted up; it remains so when every thing else has returned into obscurity; it still forces itself into notice, still impudently stares you in the face. An object of a sober tint unexpectedly gilded by the sun, is like a serious countenance suddenly lighted up by a smile; a whitened object, like the eternal grin of a fool.

The designs are ten in number, and include several styles, among which are the English or rural Gothic, the pointed or Tudor, the bracketed villa, the Italian villa, the Tuscan cottage, and the Gothic villa—each accompanied with practical details for carrying the same into execution. Designs II. and VIII. are pretty specimens, much to our taste.

But it is not the good examples of architecture alone, which give the value to this volume: they are only a portion of its contents. A larger part is devoted to the laying out of the grounds, plans of which accompany each of the designs, including places from half an acre to fifty acres in extent. These plans are accompanied with details for forming the pleasure ground, flower garden, kitchen garden, orchard, &c.; making fountains, erecting rustic arbors, &c., with a list of the most desirable ornamental trees and shrubs, the most beautiful and showy plants, and the choicest fruit trees to be obtained, accompanied by all the information in regard to height, time of blooming, season of ripening, &c.

In the appendix may be found many useful hints upon the composition of cements, for the exterior of buildings—on building contracts—and on the employment of professional men.

The only objection we can make to the volume is, the expensive character of the designs, several of them exceeding seven or eight thousand dollars in the cost of their erection. Very few villa residences cost near that sum, and we think, if Mr. Downing had brought his estimates between \$2000 and \$5000, they would have served a better purpose, and have furnished more examples from which dwellings would have been erected.

The work is a beautiful specimen of typography, and the designs are in the best style of wood engraving. We bespeak for the volume an attentive perusal, persuaded that those who wish to cultivate an acquaintance with architecture and ornamental planting, will find it a valuable assistant.

ART. II. *An Address delivered before the Massachusetts Horticultural Society, at their Fourteenth Anniversary, September 16th, 1842.* By J. E. TESCHEMACHER, Corresponding Secretary of the Society. Pamphlet, 8vo., 22 pages. Boston: 1842.

WE have received from the author, Mr. Teschemacher, a copy of his address, delivered before the Society at its late anniversary, and published by their request, for distribution among the members. We were present to hear its delivery, but so highly pleased were we with it, that we were anxious to have a deliberate perusal of its contents. Having been highly gratified in the performance of this task, we are desirous that those of our readers who were not present to hear it, and particularly our friends at a distance, should become participators in the pleasure afforded us; and in giving them the means of so doing, we trust we shall be excused for the length of our extracts.

Mr. Teschemacher has not made his address a mere mass of words, touching the general subject of horticulture, but has detailed practical experiments, and advanced some new views concerning the action of phosphates upon the growth of plants. The experiments which were made at the Public Garden, under the author's care, are given with a minuteness which will enable any cultivator to repeat them to his own satisfaction. The action of *guano*, the newly introduced manure from South America, is particularly noticed, and its importance as a fertilizer detailed at length.

We congratulate the Society upon its having restored the old and excellent custom commenced at its first formation, of an annual address. Though they have generally been delivered to small audiences, and those mostly members of the Society, yet we think that the custom is a good one, and, in the course of time, will attract a concourse of hearers as large, as the science on which it treats, is important, to the welfare of mankind. If practical men are selected to perform the duty, the addresses will undoubtedly be replete with information, which writers, without any other acquaintance with the subject than that gleaned from books or foreign travel, will be unable to obtain.

Mr. Teschemacher opens his address with a view of the numerous benefits conferred upon society by the spread of the science of horticulture, and contrasts the present state of South America with what it would have been, had Pizarro, and the ministers of religion who accompanied him, "associated the cross which they bore in one hand, with the spade, the rake, and the pruning knife, instead of the lance the sword, and the gun, in the other."

The author proceeds with his address, and alludes to the rapid strides which horticulture has made, as a science.

It is the rank to which Horticulture has recently attained as a science. It is no longer a mere crude mass of gardeners' secrets for propagating or growing certain plants, of nostrums and recipes for destroying insects and cleansing trees; it has become the constantly improving art of applying scientific, rational, and well digested principles, to perfect the cultivation of the vegetable kingdom; it has suddenly almost become a subject of delightful and interesting investigation for scientific men of the most refined attainments.

I am far, however, from despising these secrets, these nostrums; they have frequently resulted from the close observation of men of most excellent judgment, men who will be the first to accept the aid of science to strengthen their reasoning powers and guide their judgment. I only rejoice that neither the facts themselves, nor the principles on which they are founded, will any longer remain secret; they will henceforward be made known and commented on by those accustomed to study and to trace carefully the minute operations of nature, to reason and reflect on each new appearance, and to exert all their acuteness in tracing its cause to the utmost verge of human knowledge. And these clear and simple principles, on which all improvements are grounded, must henceforward be described in such plain and intelligible language as will guide those, who, without these habits of study and observation, pursue the cultivation of the soil either as an occupation or a pleasure. Horticulture is now capable of becoming to the agriculturist what the chemical laboratory is to the dyer and the manufacturer. It is in the garden and the green-house that useful experiments may be made on the value of different manures when mixed with different soils, their effects accurately tested on various kinds of plants, their modes of operation carefully and repeatedly observed, and the economy of their application practically ascertained. And these experiments are more necessary at the present day, when we are inundated with artificial and natural manures and composts of all descriptions, whose virtues and efficacy are boasted of and lauded for the purpose of sale, with more than a pedlar's energy.

The following are the experiments with *guano*, alluded to in our remarks above:—

The most recent, and probably most correct analysis of *guano*, that by Voelckel, shows that it contains many of the ingredients fa-

avorable to vegetation, such as several salts of ammonia, phosphate of lime or the chief component part of bonedust in abundance, potash, soda, and as much as one third of organic matter, which would furnish humus with a little clay and sand.

Immediately on receiving this guano, about the 17th June of this year, I commenced my experiments, which I will now explain in order, and as briefly as possible.

First observing that all those plants which were treated with guano were potted in a mixture, consisting of plain earth without any manure, sand, and a little leaf mould and peat, with which the guano was mixed—that those plants which compare with them have been grown in our richest compost—and that both have had the same attention, and been grown otherwise under the same circumstances.

Fúchsia fulgens—one year seedling, potted 17th June, two and a half inches high, with one teaspoonful not piled up, of guano—repotted 9th August, then twelve inches high, with another spoonful of guano—is now one and a half foot high.

The contrast between this and the two years' old plant is very striking, both as to luxuriance of growth and color of the foliage, the plant with guano being vastly superior. I think also that the color of the flower is improved; it is well known among gardeners that it is rather difficult to grow this plant well.

Pelargòonium—two seedlings grown with guano, and one of the same sowing without: on the 17th June these two were potted with one teaspoonful of guano, and repotted on the 9th August with another teaspoonful; here also the difference in favor of guano is very great.

China Roses—two cuttings with guano, potted 17th June, with one teaspoonful guano—one was then seven inches high, the other four and a half; they are now thirty-four inches and twenty-eight inches respectively, with large healthy foliage and stem; these have not received a second application of guano.

Celòsia cristàta or Cockscomb—one seedling, with one teaspoonful and one of the same sowing without—the size of the stem, foliage, and head of that with guano is more than double that of the other, and the difference in the green color of the leaves remarkable.

Sálvia pàtens with one teaspoonful of guano—the effect here has been to lengthen the joints, and the flower appears a trifle smaller than usual.

Acàcia Farnesiàna—a seedling showing the size of the foliage and length of the joints, previous to the application of a teaspoonful of guano, and the remarkable growth of both afterwards.

Camellia with two teaspoonsful, 17th June, and none since. This specimen which was quite small and unhealthy before the addition of guano, as may be seen by the lower leaves, exhibits in a most marked manner, by its beautiful large deep green leaves and healthy bud, the action of this manure.

I have also exhibited a *Camellia* grown with a large proportion of fine wood charcoal; the foliage and bud is extremely fine and luxuriant, and of a very healthy green color, but, as may be seen, not at all equal to that worked with guano.

One *Balsam*, 17th June, two teaspoonsful, repotted 9th August with two more, to which a little lime was added.

This is an ugly specimen, being nearly past flowering; but I sent it to confirm an observation in the London Gardener's Chronicle, which states that the balsams worked there with guano came with smaller flowers. It is evidently the case here, but I have watched it carefully, and found that not a single flower missed bearing its seed vessel, and that every seed vessel I have opened is quite full of perfect seeds, containing from fourteen to twenty in each. I wish this point to be carefully remembered, as I shall find some farther remarks upon it.

From what I have seen of guano, it is quite clear that its action is rapid and powerful on the stem and foliage, increasing their size and deepening their green color: of this fact there can be no doubt. I think it probable that it diminishes the size of the flower in some cases, and that it improves the seed, both in quantity and quality—of this, however, much more experiment is required to prove the certainty. I have one more remark to make: when those plants were repotted, which received a second application, the roots were very numerous, and appeared in the most vigorous health—thick, succulent, pure white, the tips with that hairy appearance, so well known by cultivators as a sign of strong growth.

In Peru it is customary, when using guano to raise pepper, to manure three times, first on appearance of the roots, then on the appearance of the leaves, and lastly on the formation of the fruit.

I think the experiment of its action on all fruits, particularly the larger fruit trees, as apples, pears, peaches, &c., will be extremely interesting, as well as on the vine, which is well known to be excessively greedy for rich food, particularly for bone manure, the chief ingredient of which, phosphate of lime, guano contains in considerable quantity.

The English have been the first, we believe, to make use of *guano*, except the natives of South America, where it is obtained; but it seems some of our amateur cultivators were aware of its value long since. A writer in the *New England Farmer*, as long ago as 1832 or '33, called the attention of cultivators to this article, as an important manure; but we are not aware that any experiments have been tried with it, except those detailed in this address.

The author thus pleasantly alludes to the prejudice existing among many botanists, against those transformations in flowers, generally termed by them "monstrosities:"—

A remnant of the ignorance of, and want of interest in, vegetable physiology, of the older botanists, I think is found in the aversion many of them still entertain towards the transformations in flowers, effected by the art of the horticulturist, either by hybridization or by the multiplication of parts, causing what is called double flowers. To me this aversion appears to arise from a contracted view of the subject—all these transformations are operations of nature, all take place in accordance with her laws; therefore all are deserving of study and of systematic arrangement, and, when well understood,

they must throw much light on the functions of different parts, as well as on the relations these parts bear to each other. Every deviation from regular structure, called by the man of science abnormal, must afford insight into the laws of that structure; and I am convinced that the more these changes are studied by the scientific botanist, the more enlightened will become the views on those portions of the vegetable kingdom which are now comparatively obscure.

Mr. Teschemacher next offers some views upon the nectariferous organs of flowers, and their importance in the economy of vegetation, relating an experiment, which has a direct bearing upon the subject of guano.

The nectariferous juices, or, as it is commonly called, the honey in flowers, is usually separated or secreted by glandular bodies called nectaries, and this honey has by many been supposed to be of indispensable service in the fecundation of the seed; but there are also glands on the leaves and leaf stalks, (petioles) of many plants, which perform the same office of secreting honey; here, of course, it cannot be of use for this purpose. Such glands exist on the petioles, or leaf stalks, of most of the acacia tribe, on the tips of three or four of the lower serratures on the leaves of *Grewia*, on various parts of the leaves or stems of the balsam, on *passiflora*, and many other plants. These glands only secrete honey during the youth and growth of the leaf; it is then only that their operation and beautiful structure can be properly observed; when the leaf has attained its full growth and perfection, the active part of these glands dries up, the time for observing their powers is past, and the leaf then proceeds in its own important function of elaborating the sap. It has been lately surmised, and it appears to me with every probability of truth, that this honey is an excretion thrown off, of the superabundant and useless part of the juices, after the leaf or flower has selected all that is necessary, precisely analogous to the excretions of the animal frame. I will attempt, very briefly, to show that this view, if correct, is of some importance, both to agriculture and horticulture. Mr. A. A. Hayes, of Roxbury, in a beautiful, simple, and I believe original experiment, exhibited before the Chemical Society of Boston this spring, proved the existence of phosphoric acid (probably combined in several seeds,) by immersing sections of them in weak solutions of sulphate or acetate of copper; in whatever part of the seed phosphoric acid existed, on that part was deposited a precipitate of phosphate of copper;—this was particularly evident in the seeds of Indian corn.

A certain quantity of phosphoric acid, or phosphates, is therefore necessary to the existence of these seeds; and that part of the plant, (probably the flower,) destined to perform the function of preparing the juices for these seeds, must go on exerting its utmost powers in selecting and rejecting until the requisite quantity of phosphates and other ingredients for the seed are obtained. Now the phosphates in most soils exist in extremely minute quantities; therefore, those plants and flowers whose seeds require any quantity, must extract large portions of food from the soil before they can select the amount

of phosphates necessary for the perfection of their seeds; and probably only as many seeds arrive at maturity as the plant can procure phosphates to complete; the remainder, embryos of which are always formed in abundance, are abortive,—that is, never come to perfection.

The same line of reasoning of course applies to the other necessary ingredients of seeds. If, therefore, we present to a plant food containing an abundant supply of these ingredients, it seems reasonable to suppose that we shall produce more seeds, or rather that more of the embryo seeds will be perfected. Now I have before stated that the chemical analysis of guano shows that it contains, in abundance, most of the necessary ingredients of plants and seeds, the nitrogen of its ammonia being absolutely requisite for the cellular, vascular and other parts of the stem and leaves, and its phosphoric acid, as well as its nitrogen, for the seeds; and if future experience should confirm what I have to-day stated as an opinion, that the flowers of plants manured with guano become smaller, it may be accounted for on the assumption that as there is presented to the plant these ingredients in abundance, particularly those necessary for the seed, the flower and its glands, whose office it is to prepare the latter, have less work to perform, less food to analyze, less to select and less to reject; hence there is no necessity to have them of so large a size as where much exertion of these functions is required. The seed will also be larger and in greater quantity.

I offer this train of reasoning on an abstruse and little understood subject with the utmost diffidence, and certainly under the impression that we have not yet sufficient evidence or experience on this most interesting manure to offer a solid and well grounded opinion; but it is at all events a sufficient foundation on which to lay the superstructure of experiment.

“Horticulture,” continues the author, “is probably still in its infancy in this country; but if so, it is the infancy of the giant.”

* * * * * How few have hitherto devoted their whole attention to raising new varieties of fruits, flowers or vegetables from seed, and yet we have already, among flowers, the almost unsurpassed *Camellia Wilderi*, raised by our indefatigable President, with several others of great beauty. The seedling *Pelargoniums*, exhibited this spring in the rooms of this Society, are not far from some of the best imported from Europe. In fruits, we may with pride refer to the Strawberry, raised by an active member of this Society,* which has deservedly acquired so much celebrity,—to many of our native apples and pears, to Mr. Manning’s cherries, to several new plums which have been exhibited. * * * *

Nature has been lavish in her gifts to this climate. The glorious beauties of our sunsets amply attest the purity of our atmosphere, and the almost tropical sun which rides over our heads during the summer months, perfectly matures the wood, the juices, the pollen, and the seeds of our plants. For the grateful shade of other lands,

* Hoveys’ Seedling.

the ingenuity of the horticulturist here can easily find a substitute; but to produce or to imitate our glorious sunlight, is beyond the art of those of many other countries.

The important subject of ornamental gardening has not escaped notice; and it must be regretted, that the author did not extend his views on this subject, so interesting to all: we could have wished that he had devoted a considerable portion of the address to an attempt to impress upon the minds of gentlemen who possess country residences, and owners of estates, the great value which might be given to their property by a liberal planting, and judicious selection, of ornamental trees and shrubs. It is this particular feature which gives the cottages and villas of England that picturesque appearance so universally admired. But, beyond the beauty of such plantations, how necessary are they in another point of view—as affording shelter from the bleak winds which sweep across some portions of the country, and shade from the burning sun of our clear and unclouded skies. Every individual who possesses a spot of ground, should not neglect to plant trees, whether it is improved or unimproved—if improved, it will be rendered so much the more ornamental, and if unimproved, it will add more than double the expense of planting to the value of the ground.

I trust, also, that in a few years attention will be more directed to the exhibition of true taste, whether in laying out the small garden plot around the house, or in more extensive ornamental grounds. For the cost is the same, whether the labor of planting and making walks be expended in a manner consonant to true taste or otherwise; and the principles of this true taste are extremely simple and easy of application. Had time permitted, I should like to have laid down a few of these principles, and also to have said a few words on the subject so essential to landscape gardening, of harmony, which should be studied with an artist's eye, both in the plantation of masses and lines of trees, with regard to their mode of growth and foliage, as well as in the arrangement of the colors of the flower garden. I must also leave untouched another subject of great importance; I mean the scientific arrangement of trees and plants in gardens, an object which, when attained, not only increases immeasurably the interest of a garden, but leads even those unscientific minds, which are strongly imbued with a love of order and arrangement, to enjoy and delight in the beautiful domain of the vegetable kingdom.

The importance of horticultural publications, which have undoubtedly tended more to the spread of a taste for gardening than all other means combined, does not escape the notice

of the author, and he pays the following tribute to their usefulness:—

But if horticultural societies have done much to advance this pursuit, horticultural publications have perhaps done more. I was an original subscriber to London's Gardener's Magazine, the first of these publications, and I have watched with much interest the progress and effects of that and the other publications which have sprung from its example. I do not hesitate to state my conviction that, without such publications, many of these societies would not now be in existence; and that thousands of individuals, who have found innocent and delightful resources and excitement in horticulture, would have been ruined at the tavern or the gambling-house,—finally, that it is impossible to calculate the advantages bestowed on mankind by the vast diffusion of a taste for horticulture, which these publications have mainly contributed to produce. I cannot now enter more into detail of these advantages; besides a very brief instance will elucidate them with more force.

Mr. Teschemacher concludes by congratulating the Society upon their resolution to admit the ladies to take a part in the pleasures of their meetings, and pays a just tribute to their virtues, and the part which woman has always taken in the promotion of horticulture.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Domestic Notices.*

Notes on the climate of Ohio, and the state of Gardening in Cincinnati.—My Dear Sir: When I left the East, I expected to leave behind me the cool, too cool, summers to which I had been accustomed, and to come into a region of long, dry, summer heat. I was asked by almost every person whom I knew, if I had ever spent a season here; and then came pictures of drought and bilious fever:—the former, I supposed, would kill my trees—the latter, me. As it is, I have hardly ever known so pleasant a season, or one which has been more generally favorable to horticultural operations. We have had but one check (in May) since its opening, and timely showers have come to temper the heat of the long sunshine of the summer's day.

Two crops of strawberries and raspberries have been sold in our market; a fact which I have never before known to occur, and one, which I think, deserves to be chronicled. Apples, pears, and plums, I have seen in blossom a second time; raspberries have cast their

leaves, and shot out anew, (some of mine;) and, in all things which came under my observation, a vigorous and large growth has been evident.

Fruits, mostly apples and peaches, have been very abundant and fine;—the peach trees set their fruit successfully, and were beyond the reach of danger when an unfavorable week in May came upon them. The greatest difficulty here, with those fruits that are susceptible to the early warmth, has been, to protect them against the later frosts, which, I am told, are very commonly destructive. I have recommended to plant on northern exposures; but advice which costs little, is of course little valued or regarded.

The trees (peach) have been overloaded with fruit; many of them have broken down under it, and are spoiled for a time, if not forever: the probability is, that all fruits, next year, will be scarce. Notwithstanding the great crop, good fruit has sold well, as it always does, for that matter. One yellow Spanish cherry tree brought to its owner, (as he told me,) twenty dollars; peaches have sold at from one to five dollars the bushel; pears from two to five; and good apples now, with a market full of them, sell at forty to fifty cents. Good fruits have of course been, and are still, rare; but the new and improved sorts are now coming in here fast. Nurseries are starting up on every side, and should they all succeed, we shall rival Flushing. Such, however, is unlikely. Many now are turning every way to keep the way of the tree of *life*:—they have the impression that they shall live pleasantly, do little, and sell much; all they have to do is to sit still, and let the trees grow;—these will, after a few years of disappointment and vexation, go to something which requires less labor, less close attention and perseverance:—perhaps I shall be among them.

I expected, too, to leave behind me most of that gardening taste which now so distinguishes Boston, and has contributed to make its environs the most beautiful and interesting of any in the country;—I find more here than I expected. Mr. Buchanan, Mr. Brigham, Mr. Neff, and perhaps others, (beside Mr. Longworth,) are well known as liberal and successful amateur horticulturists.

Mr. Ernst's is perhaps the oldest nursery and garden in this vicinity. Without paying great attention to floriculture, he has a good collection of bulbs, and this season had a beautiful bed of carnations in bloom; beside these, a great variety of hardy flowering shrubs and plants.

Mr. Jackson is known as a florist: he has a large catalogue of roses, which I have not seen in bloom; but I have seen at his place a show of dahlias which would have done honor to Boston's exhibitions, and I think finer blooms among them than any I saw there last fall.

Mr. Sayre is hardly established yet, and I have not had time to visit him: I hear him well spoken of. Of my own garden I have nothing now to say. Give me time.

I hope, next year, that we may be able to get up a fruit and flower exhibition. This year we had material enough for it, and could have made a very creditable one. We want a few more such men as I have named, to take the thing in hand;—men of taste, leisure, and means—men who have weight and character to make the start.

These gatherings do more to develop the propensity for cultivation, than any other one thing. There is love enough here for it, already, in a small way, (as the neat gardens and few window plants, so often seen, evidence,) which would at once become a strong interest, and perhaps enthusiasm, if it could be brought together. Every man's and every woman's love for a rose tree would be increased twenty times, if there were twenty others to love it with him. I have to wish success to all horticultural efforts, and to conclude, from the brilliant reports of your festival, that the bantling is well fledged.—*Very truly yours, Ch. W. Elliott, Cincinnati, Oct. 1842.*

The Century plant, or American Aloe.—The great aloe lately in flower in the garden of S. Van Rensselaer, Esq., of Albany, has been removed to New York, to the store of Mr. G. C. Thorburn, John Street, where it will be exhibited for the benefit of the Orphan Asylum of Albany. It is now in full bloom, and will remain so for some time. The task of removing the plant without damage, was no easy one; but in New York, where it will be accessible to strangers from all parts of the country, the sum which will probably be taken while it is on exhibition, will be of great assistance to the Asylum. The plant will show to great advantage in Mr. Thorburn's store; the flower stem will rise up through the opening to the saloon, on the second floor, and from its great height, a better opportunity will be offered to examine it, than in any other situation. Those who are desirous of seeing this curious plant will do well to call, as it may be many years before another will bloom.—*Ed.*

Crop of grapes in Ohio.—My promise of grapes was flattering. I have not been at all the vineyards, but learn all have suffered more or less by the rot. I expected to make five hundred barrels of wine; I shall be certain to make between three and four hundred, as the grapes are now beginning to ripen, and the rot has ceased its ravages. But in these temperance times my tenants will be compelled to turn their attention to other culture, unless they can meet a sale for it east for sacramental purposes; their wine being the pure juice of the grape, without the addition of alcohol. One of my German tenants, last spring, made some of the best champagne wine I have ever tasted. It was the pure juice of an American grape. If equally successful next season, I will send you a sample. I will this fall send you a few varieties of native wine, for trial at your horticultural fair. Let me know its time of meeting. Among them will be a sample of dry wine, of the hock character, from the same cask from which the champagne was made. I believe it will bear a comparison with the best dry hock in Boston, of last year's vintage.—*Yours, N. Longworth, Cincinnati, Ohio.*

Agricultural and Horticultural Exhibition in King's Co., N. Y.—Our horticultural friends in Brooklyn, N. Y., and vicinity, held an exhibition on the 20th of October, at Flatbush. There was quite a display of dahlias and other flowers, and several premiums were awarded for the best specimens. The Society, we believe, has been recently organized, and this was the first exhibition. All the agricultural and horticultural products for premiums must be raised in the county. An address was delivered on the occasion, by Prof. C. S. Henry, of the New York University.

Our correspondent at Brooklyn has promised us a report of the exhibition, which will appear in our December number.—*Ed.*

The Ohio grape.—An opportunity offering by Dr. Bates, I send you two bunches of my Ohio grape. They are not more than two thirds their usual size; and as they have already been four days off the vine, and not calculated for long keeping, do not expect them to reach you in eating order. The vine is very vigorous, hardy, a fine bearer, free from mildew, without the hard pulp common to all other native grapes, and equal, for the table, to the Muesinier, or Miller's Burgundy. I will next season send you a fairer sample.—*Yours, N. Longworth, Cincinnati, Ohio, Sept. 1842.*

[The grapes came to hand in tolerably good order. The variety appears to be a good one, but it has much the appearance of Herbeumont's Madeira. Does Mr. Longworth know its origin? for we are inclined to think it identical with the latter.—*Ed.*]

Gardening in Indiana.—Much spirit has been shown within one or two years past, in this State, in cultivating fruits and flowers. We have formed a State Horticultural Society, whose exhibitions are attracting, and *beginning* to deserve, much attention. At our meeting in October, we shall exhibit a large number of new varieties of apples. Considerable attention is directed to originating new kinds, and our premiums have tended chiefly to that point. We suppose our soil and climate to be admirably adapted to the fruits belonging to the middle States, and doubtless Indiana will, in a few years, be one of the largest fruit-growing States in the Union. The apple and the pear are the especial objects of cultivation, and in every direction, as farms are opening, large and thrifty young orchards will be found.

It will give me pleasure, if any thing worthy of note is presented at our October exhibition, to give you descriptions of it; and I may be able to send, by private hands, some specimens of new winter apples.—*H. W. Beecher, Indianapolis, Ia., Sept. 29, 1842.*

Irideæ. Gladiolus natalensis.—Roots of this fine exotic, planted out so late as July 16th, are now blooming finely in the open air, notwithstanding several severe frosts have occurred; they causing the foliage only to turn a little yellowish, although of sufficient power to completely destroy the foliage of the dahlia.—*R., Oct. 12, 1842.*

Fair of the American Institute.—The fourteenth Annual Fair of this Institute was held in New York, from the 11th to the 26th of October, at Niblo's Garden, Broadway. We were present at the exhibition, at the close of the second week, and were much pleased with that part of the Fair devoted to agricultural implements, and garden productions of flowers, fruits, and vegetables. Nearly an entire room was devoted to the three latter, and a very fine display was made. Around the two sides of the hall were arranged large stands, on which the dahlias were placed; between these stands, (which occupied only the space against the wall,) in front of the several windows, were vegetables of various kinds: at the end was placed the exhibition of fruits, consisting of a very good assortment of kinds, the largest collection of which was from our correspondents, Messrs. A. J. Downing & Co., of Newburgh, N. Y. Other fine collections were sent by Messrs. Reid, of the Murray Hill Nur-

sery, and Mr. Mantel, on the Bloomingdale Road, each of which contained some large and fine specimens.

The greatest exhibitors of dahlias were Messrs. Dunlap, Thornburn, Reid, Kent, Van Buren, and Hogg, and among them were some very superb specimens of flowers, such as Dowager Lady Cooper, Widnall's Queen, Alba purpurea, Duchess of Richmond, Cattleigh's Eclipse, Phenomenon, Maria, Le Grand Baudine, &c.

The exhibition of vegetables was excellent. The squashes, cabbages, onions, turnips, beets, &c., were there in profusion, of large size, and well grown.

Had we not been promised the reports of the several committees awarding the premiums, we should have extended our present report, and made mention of all the prominent articles exhibited; but as these reports will appear in our next number, we shall refer our readers to them for a full account of the exhibition of the horticultural department.

We should not omit here to mention the exertions of Mr. Bridgman, in the arrangement of the articles exhibited, or of his endeavors to serve the interests of the Institute, in drawing up the awards of premiums, and promoting the interests of horticulture generally.—*Ed.*

ART. II. *Retrospective Criticism.*

Errata.—In our September number, page 350, lines 26th and 28th from the top, for "*Wilcomb & Ring*," read "*Wilcomb & King*;" an error which escaped our notice until too late for correction.—*Ed.*

Glout Morceau Pear.—Mr. Editor: The subscriber would remark, in reply to the communication of "A Fruit Grower," p. 312, that at least one of his statements is not in accordance with the facts in the case. We stated, in our former note, that we had no *intention*, (not *instruction*, as it appears by a typographical error,) to go behind the authority of the London Horticultural Society, and that the error "rests with the printer or the writer, no matter which;" your correspondent has defined our position, by stating that it "could not have been an error of the printer." In this he labors under a mistake. We had hoped that our former statement, coupled as it was with our frank acknowledgment of the mistake, would have been sufficient on this point; but we now feel constrained to say that the printer did make the alteration on his own responsibility.

We fully agree with your correspondent, that the French and Flemish pears, in many instances, have local names attached to them, for which it would be almost impossible to give a proper and correct signification. Nothing probably can be satisfactory, on this head, without knowing the intention of the original namer of the fruit; it is probable that Glout, the abbreviation of Glouton, will be found wide of the mark; and as our only aim is to gain information,

we submit the following, from a French provincial dictionary:—**Glout**—*greedy, passionate, to love to excess.* We will venture to suggest the signification of *Glout morceau* to be—*A morsel loved to excess,* in preference to “*A greedy mouthful.*”

We are under the impression that the term *greedy* would be more applicable to the *person* eating, than to the *thing* eaten; however, we may be *all* in the wrong, and therefore again respectfully ask further information from “*A Fruit Grower.*”—*Yours, truly, Samuel Walker, Roxbury, Sept. 28th, 1842.*

ART. III. *New York Horticultural and Floricultural Society.*

[We have been favored with the following report of the first exhibition held by this newly organized Society in the city of New York; and on a recent visit to that city, one of the members presented us with a copy of the constitution and bye-laws of the institution. From it we learn, that the Society was instituted last March, and has been in existence little over six months.

The officers of the Society consist of a President, two Vice Presidents, a Treasurer, and a Secretary. The annual election takes place on the second Tuesday in March: meetings are held once a month throughout the year, and other exhibitions on such days as the Society may direct.

It is some time since the old New York Horticultural Society ceased its operations. A year or two ago, a new society, called the Horticultural Association of the Valley of the Hudson, was organized, and one or two exhibitions were held in New York and Albany—but it seems also to have met the same fate as its predecessor: no meetings, we believe, have been held for upwards of a year; and, though we hope it has not been abandoned, yet we fear that the members are too scattered to effect any really important results. New York, however, should not be without a Horticultural Society, and we see no reason why an association, properly conducted, cannot be established upon a foundation which shall be lasting, and be the means of increasing and disseminating a taste for flowers and fruits. It cannot be that there is a want of able amateurs and gardeners around New York city, to compose such a society: a hearty *co-operation* is all that is needed, to create the same interest, and awaken the same zeal, which has sustained associations of the same kind in Boston and Philadelphia. We hope our friends will take hold of the matter in good earnest, and not allow any feelings of a personal consideration to deter them from pursuing an onward course. Let their motto, like that of the late Mr. Knight, be—“We have persevered; we will persevere.”

We hope some of our friends will furnish us with a list of officers for the current year.—*Ed.*]

The first annual Exhibition of the Society was held on the 21st, 22d, 23d, and 24th days of September, at Constitution Hall, a spacious saloon in Broadway.

The weather, during the whole time, was rather unfavorable, especially the first two days, and the air was exceedingly keen, which, together with a very high wind, prevented many from seeing the exhibition who probably would have done so, had the weather been fine. The saloon was arranged and decorated in a very tasteful manner, and was very much admired by all who witnessed it. In the centre was a large circular table, decorated with plants, arranged in the form of a pyramid; the most conspicuous among them was a plant of *Manettia cordifolia*, about six feet high; also, *Ardisia solanacea*, *Euphorbia splendens*, &c., from Mr. Thomas Hogg. *Cròton pictum*, *Araucària braziliensis*, *Abitilon striatum*, fuchsias, roses, &c., from Mr. J. Buchanan. A large specimen of *Magnòlia Exmoùthii*, *Pittòsporun tobira*, fol. variegata, acacias and other fine plants, from Mr. William Reid. A lovely specimen of *Erica gràcilis*, completely covered with its bright pink flowers, *Gardoquia Hookèrii* in fine bloom, &c., from Mr. Francis Briell. *Gesnèria fauciòthii*, *Gardoquia Hookèrii*, *Erica persolùta álba*, and *Fúchsia fúlgens*, all displaying their beautiful flowers, from Mr. John Briell. *Petunias*, roses, fuchsias, &c., from Mr. Joseph Monk. From two sides of the centre table, extending through the middle of the saloon, were placed two tables, one for fruit, and the other fitted up for dahlias, both ornamented with rare and beautiful plants. On the fruit table were two splendid specimens of *Araucària braziliensis*, each about five feet high, from Mr. John B. Mantel, who also exhibited a very large plant of *Magnòlia exoniensis præcox*, and a fine hybrid *Rhododéndron*. *Yucca gloriòsa fol. variegata*, three and a half feet high, from Mr. Thomas Hogg, looked exceedingly fine; as also beautiful specimens of *Cycas revolùta*, and *Zamia hòrrida*, from Messrs. Niblo & Dunlap. *Bonapàrtia júncea*, from Mr. Alexander Smith. *Rhododéndron Russelliàna*, *Fúchsia fúlgens*, *Jasminum Sámbar*, *verbenas*, &c., from Mr. William White.

The display of fruit was most excellent, but the Isabella grapes were not generally well ripened, on account of the backwardness of the season. The pears and apples from Mr. Mantel, and from Mr. William Reid, were most beautiful fruit, and probably could not be surpassed for size and flavor. Mr. Mantel exhibited two Duchess d'Angouleme pears, weighing 2 lbs. 4 oz., Comte de Lamy, Belle Henriette, Beurré doré, Pear Ladec, Bergamotte d'Automme, Belle de Martigny, one fruit weighing 9 oz., Beurré tanné, Bonne Louise d'Avranches, Ah! Mon Dieu, Beurré Gris, St. Michael, Epine Dumas, Bonne Louise, Beurré d'Arenberg, Pear Dumortier, Chaumontel, Vrai Doyenne d'hiver, Verte longue panaché, Pear Cuvillier, Pear Delphin, Gilogil, one fruit weighing 8 oz., Mouille-bouche, Royale d'hiver, Lansac Dauphine, Bonne de Malines, Francreal, Wilhelmine, and Virgonlouse; Apples—Princesse Noble, one weighing 12 oz., Reinette de Caux, Late pippin, Calville Royale, Reinette d'Angleterre, Reinette de Holland, Reinette de Bretagne, and Canterbury pippin; also, Portugal and apple quinces, and German Medlars. Mr. William Reid exhibited Pears—Catillac, one fruit weighing 12 oz.,

Duchess d'Angouleme, three fruit weighing 2 lbs., Doyenne Gris, Gilogil, two fruit weighing 18 oz., Flemish Beauty, Chaumontel, Francreal, Winter Virgoulouse, Mouille-bouche, Rushmore Bon Chrétien, Marie Louise, Martin Sec, Uvedales St. Germain, Rousselet de Rheims, Napoleon, and Glout Morceau. Mr. William White exhibited fine white Chasselas grapes, raised in the open air, and Isabel-las. Mr. John Johnson exhibited Royal russet apples. Mr. N. Hickok exhibited pear quinces, weighing 1 lb. each. Mr. Samuel Cox pear quinces, weighing 1 lb. each, and Isabella grapes. Mr. Andrew Hislop exhibited fine white Magnum Bonum plums, five fruit, weighing 1 lb., and Seckel pears. There were also exhibited fine Moustrons pippin apples, some weighing 17 oz., Roxbury russet apples, Maiden Blush apples, St. Michael pears, &c.

The dahlia table was very showy, and contained many fine flowers, but there was not that quantity of superior specimens that there would have been had the weather been more favorable. Mr. George C. Thorburn exhibited a fine stand, containing Bridesmaid, Pickwick, Alba purpurea, Andrew Hofer, Dowager Lady Cooper, Coudrey's Scarlet Defiance, Beauty of England, Grand Tournament, Conqueror of the World, Alexander, Poole's White, Constancy, Lady Jermyn, Frances, Maid of Bath, Metella, Charles XII., Widnall's Queen, Scarlet Eclipse, Will Watch, Orange Boven, &c. Mr. William Russell, of Brooklyn, exhibited Argo, Widnall's Queen, Andrew Hofer, Pickwick, Ne Plus Ultra, Maid of Bath, Unique, Phenomenon, Scarlet le Grand, Striata formosissima, Squibb's Advancer, President of the West, Reliance, Miss Johnson, Fair Maid of Clifton, Lewisham Rival, Ruby Superb, Grand Tournament, Virgin Queen, Grace Darling, and a very fine seedling named Lady Ashburton—the flower is white, delicately laced with a bright pink, a good petal, and well up in the centre, being altogether distinct from any other variety. Mr. Dunlap exhibited a fine stand of the newest and best varieties, as also Messrs. Briell, Mr. A. A. Leggett, Mr. William Reid, Mr. E. E. Dean, Mr. Daniel Boll, Mr. William White, Mr. William Brownlee, Mr. Alexander Smith; Mr. Thomas Hogg exhibited Andrew Hofer, Metella, Charles XII., Striata formosissima, President of the West, Rouge et Noir, Argo, Suffolk Hero, Ne Plus Ultra, Calliope, Miss Percival, Frances, Grace Darling, Pickwick, Unique, Mary of Burgundy, Poole's White, Conservative, Glory of the West, &c. &c.

A stand of roses by Mr. Daniel Boll, and seedling pansies from Mr. Briell, attracted much attention. Among the most conspicuous plants on this table were a fine *Ardisia crenulata* from Mr. William White; *Passiflora Kermesina* from Mr. Joseph Monk; fine coxcombs in pots from Mr. Briell; an elegant *Russellia juncea* in fine flower from Mr. Alexander Smith; and *Dracæna australis* from Mr. Hogg.

The vegetable table was filled with a fine assortment of vegetables. Mr. Ruth, gardener to John Beekman, Esq., exhibited egg plants, four fruits from one plant, weighing 22 lbs., club squash, 20 lbs. each, and 3½ feet long, Turnip cabbage, one weighing 17 lbs., parsnips and beets, 4 lbs. each, mangel wurtzel, 8½ lbs. each, white Virginia corn, sixteen feet high, fine peppers, &c. Mr. John Briell exhibited sugar beet, weighing 8½ lbs. each, three egg plants, 5 lbs. each, six

onions, 2 lbs. each, fine celery, carrots, beets, &c. Mr. Francis Briell exhibited fine blood beet, turnip beet, long white beet, Victoria and Mammoth rhubarb, five stalks of the latter weighing 6 lbs. A brace of fine cucumbers, measuring seventeen inches, from Mr. Thomas Galvin, gardener to William B. Cozzens, Esq. Tomatoes, from Mr. E. E. Dean. Large Bull-nose peppers, four weighing 1 lb. from Dr. Doane, Staten Island. Onions, six weighing 2 lbs., from Mr. Edward Hobbs. Victoria rhubarb, from Mr. Livingston, &c.

A large table, filled with cacti and other curious plants, presented a singular appearance, and were justly admired. Mr. J. Buchanan exhibited *Cereus senilis*, *C. multangularis*, *Echinocactus Eyrièsi*, and other species, *Mesembryanthemum tigrinum*, *M. truncabillum*, *M. monânthe*, *Euphòbia eneagòna*, *E. splendens*, &c. Mr. Thomas Hogg exhibited *Cereus senilis*, *C. chiliènsis*, *C. peruvianus*, *Melocactus amœna*, *Opuntia microdysas*, *O. lactea spina*, *O. cochinillifera*, *Mamillària chrysacantha*, *M. Schmànnii*, *M. longimamma*, *M. uncinata*, *M. cerifera*, *Echinocactus latispina*, *E. Eyrièsi*, &c. Mr. Alexander Smith exhibited *Mamillària Schmànnii*, *M. uncinata*, *Cereus senilis*, and several new species not named.

The saloon was most profusely decorated with bouquets, festoons, and cut flowers. Mr. Joseph Meister, of Harlaem, exhibited a very large and beautiful bouquet. Mr. John B. Mantel exhibited a large pyramid of flowers, arranged with great taste. Mrs. Bulow exhibited a splendid bouquet, consisting of tuberose, tiger flowers, and other choice flowers; also a basket of fine dahlias. Although the contributors were not very many, yet the exhibition was managed with great spirit, and showed the increasing taste for such displays.

ART. IV. *Massachusetts Horticultural Society.*

Saturday, October 1, 1842.—The annual meeting of the Society for choice of officers for the ensuing year, was held to-day—the President in the chair. The Committee appointed at the last meeting, to nominate a list of officers, reported the same upon a printed ticket, agreeably to the vote of the Society, requesting them, that if they found it expedient, the name of no member should appear on more than one committee: the report was accepted, and laid upon the table for distribution.

The meeting then proceeded to ballot: Messrs French and Macon-dry were appointed a committee to sort and count the votes: the polls remained open five minutes, after which the whole number of votes was reported as thirty-seven—and the following gentlemen were elected for the ensuing year—the term of office commencing with the first Saturday in April, 1843, and ending the first Saturday in April, 1844.

President.—Marshall P. Wilder.

Vice Presidents.—B. V. French, Jona. Winship, Cheever Newhall, E. M. Richards.

Treasurer.—Samuel Walker.

Corresponding Secretary.—J. E. Teschemacher.

Recording Secretary.—Ebenezer Wight.

Professor of Botany and Vegetable Physiology.—John Lewis Russell, A. M.

Professor of Entomology.—T. W. Harris, M. D.

Professor of Horticultural Chemistry.—S. L. Dana, M. D.

STANDING COMMITTEES.

Committee on Fruits.—B. V. French, Chairman; P. B. Hovey, Jr., O. Johnson, S. Pond, J. Lovett, 2d, L. P. Grosvenor, J. Breck, Jona. Winship, D. Haggerston, J. L. L. F. Warren, J. F. Allen.

Committee on Flowers.—Samuel Walker, Chairman; H. W. Dutton, S. Sweetser, S. R. Johnson, J. Stickney, W. E. Carter, P. Barnes.

Committee on Vegetables.—J. A. Kenrick, Chairman; W. B. Kingsbury, John Hovey, A. D. Williams, J. C. Howard, A. Bowditch, John Hill.

Committee on the Library.—C. M. Hovey, Chairman; R. T. Paine, C. K. Dillaway, J. E. Teschemacher, E. Wight, R. M. Copeland.

Committee on Synonyms of Fruits.—R. Manning, Chairman; S. Downer, W. Kenrick, J. Prince.

Executive Committee.—M. P. Wilder, Chairman; Enoch Bartlett, A. Aspinwall, F. W. Macondry, J. J. Low.

Finance Committee.—E. Vose, Chairman; Cheever Newhall, E. M. Richards.

It was voted, that the sum of fifty dollars be presented to R. Manning, Esq., for his valuable and successful efforts in pomology, and for the varied and beautiful collection of fruits which he contributed at the annual exhibition.

The thanks of the Society were presented to Mr. C. Downing, of Newburgh, N. Y., for the donation of a copy of the *Treatise on Landscape Gardening and Cottage Residences*, by A. J. Downing.

Mr. C. W. Hartwell, of Andover, and Rev. F. Parkman, of Boston, were admitted subscription members.

Adjourned four weeks, to October 29th.

DAHLIA EXHIBITION.

A Subscription Dahlia Show took place to-day. The weather having been very favorable, several amateur cultivators were desirous of making another exhibition of this beautiful flower, as the last occurred at a time when the weather had been unpropitious, and the flowers less perfect than might be expected from the fine weather since that show took place. A subscription list was drawn up, containing the following schedule of prizes—the entrance fees being the amount to be distributed in premiums.

CLASS I.

For the best twenty-four dissimilar blooms.
For the second best twenty-four dissimilar blooms.

CLASS II.

For the best twelve dissimilar blooms.
For the second best twelve dissimilar blooms.

CLASS III.

For the best six dissimilar blooms.
For the second best six dissimilar blooms.

CLASS IV.

For the best specimen bloom.
For the second best specimen bloom.

Some of the cultivators out of town could not compete for the prizes, owing to the destruction of their plants by frost; and, in consequence, the number of entries was considerably less than had been expected. The blooms that were shown were remarkably fine, and the stands of six, as well as the single blooms, were superior to any ever seen in the Society's room.

The judges for awarding the premiums were Messrs. S. Walker, J. H. White, and S. Sweetser. Their award was as follows:—

CLASS I.

Best twenty-four blooms—To Messrs. Hovey & Co., for Le Grand Baudine, Mary, Eva, Bridesmaid, Ne Plus Ultra, Quilled Perfection, Grand Tournament, Andrew Hofer, Annot Lyle, Constantia, Hero of Tippecanoe, Lady Bathurst, Sylph, Marshal Sout, Princess Victoria, Highgate Rival, Unique, Sulphurea elegans, Pickwick, Rienzi, Queen Victoria, Mrs. Cox, Maid of Bath, Bishop of Winchester.

Second best twenty-four blooms—To P. Barnes, for Advancer, Fire Ball, Metella, Victory, Essex Rival, Regina, Unique, Marshal Sout, Mrs. Jones, President of the West, Pickwick, Primrose, Rosa, Queen of Beauties, Dennisii, Andrew Hofer, Striata formosissima, Sunbury Hero, King of Roses, Parson's Rival, Blandina, Grand Tournament, Bloomsbury, Eva.

CLASS II.

Best twelve blooms—To J. Stickney, for Ne Plus Ultra, Le Grand Baudine, Pickwick, Julia, Andrew Hofer, Uxbridge Magnet, Quilled Perfection, Middlesex Rival, Queen of Sarum, Constantia, Unique, Rosa.

Second best twelve blooms—To Hovey & Co. for Quilled Perfection, Sulphurea elegans, Maid of Bath, Metella, Pickwick, Lady Bathurst, Le Grand Baudine, Rienzi, Princess Victoria, Unique, Bishop of Winchester, Marshal Sout.

CLASS III.

Best six blooms—To Hovey & Co., for Pickwick, Le Grand Baudine, Unique, Mrs. Cox, Widnall's Queen, Marshal Sout.

Second best six blooms—To J. Cadness, for Unique, Constantia, Pickwick, Marshal Sout, Margaret, Rouge et Noir.

CLASS IV.

Best specimen bloom—To Hovey & Co., for Widnall's Queen.

Second best specimen bloom—To F. Putnam, Salem, for Marshal Soult.

Among the blooms which were particularly remarkable, may be noticed, Widnall's Queen, which stands pre-eminent as *the* finest flower of the season—of splendid form, lovely color, and withal of constant habit. Pickwick, exhibited in most of the stands, was another superior variety, well deserving a place in any collection. Besides these, there were fine flowers of Marshal Soult, Le Grand Baudine, Andrew Hofer, Uxbridge Magnet, and Bridesmaid, all desirable show dahlias. The show was particularly interesting to amateur cultivators, giving them, as it did, an opportunity of seeing many varieties in greater perfection than they had ever before been exhibited.

In addition to the stands exhibited for premiums, there was a fine display of flowers from the President of the Society, Hovey & Co., J. L. L. F. Warren, J. H. White, A. H. Hovey, J. F. Trull, S. Walker, F. Putnam, and J. Downing, of Salem, W. McClure, J. Hovey, W. Meller, J. Stickney, H. W. Dutton, and others.

J. Cabot, Esq., of Salem, exhibited fine specimens of *Aconitum sinense*, and *Sieboldii*, the latter very beautiful. From S. Sweetser, white and yellow tea, Lamarque, Triumph of Luxembourg, Madame Desprez, and other roses. Carnations, pinks, and bouquets, from S. Walker. Bouquets and other flowers from W. Meller.

Fruit: From F. Tudor, specimens of pears grown at Nahant, and remarkable for their size and beauty, viz:—Duchess d'Angouleme, brown Beurré, Belle et Bonne, Napoleon, Louise Bonne of Jersey, St. Michael Archangel, Beurré Diel, Fortuneé, Grosse de Brussels (?), and Beurré Bronze; also Brabant Bellflower, and Calville apples. From R. Manning, Belle Lucrative, Belle et Bonne, Capiaumont, Jalousie de Fontenay Vendeé, Styrian, Frederick de Wurtemberg, and Alpha pears; also, Catharine, and Robinson Crusoe peaches; all very fine specimens. From Capt. Lovett, brown Beurré, Cabot, St. Michael, and Bezi de la Motte pears; also, Endicott seedling apples, from the original tree, some of which had a dull russet appearance, and others more or less striped with red, so as to appear like an entirely different fruit; Capt. Lovett also exhibited red rareripe, and Royal George peaches.

From J. Hooper, Jr., Marblehead, Bergamotte de Pacques, golden Beurré of Bilboa, and Beurré d'Isambert (syn. of the brown Beurré) pears; also, a few specimens of the Imperial water-melon. From H. Vandine, beautiful and large specimens of Coe's golden Drop plums. From J. A. Kenrick, large orange quinces. From W. Meller, Heath peaches. From C. Newhall, Beurré Diel and St. Germain pears; peaches, and Gravenstein apples. From A. Putnam, Danvers, Aunt Hannah apples, and President peaches. From J. Lincoln, Hingham, Seek-no-further apples. From C. W. Hartwell, Andover, fine specimens of Kilham Hill, and Phillips's red winter sweet apples, the latter a variety of recent introduction to notice. From J. F. Trull, orange quinces, and Catillac pears. From Dr. S. A. Shurtleff, seedling grapes. From H. J. Oliver,

large red apples without name, and Dutch codlins. From S. Walker, Williams's Bon Chrétien pears. From D. L. Giddings, Wayland, handsome Seckel pears. From J. L. L. F. Warren, lemon clingstone peaches. From W. Lawrence, Groton, a variety of apples, without names. From G. B. Perry, Bradford, Bellflower, fall Harvey, Gravenstein, Kilham Hill, and long russett apples. From Mrs. T. Bigelow, Heath peaches. From F. Walker, Newton, large Chelmsford pears.

October 8th.—Exhibited. Flowers: The exhibition to-day was nearly confined to dahlias. Messrs. Hovey & Co., H. W. Dutton, Jos. Stickney, P. Barnes, and R. M. Copeland, were the principal contributors. Bouquets were also shown by Messrs. S. Walker, and W. Kenrick.

Fruits: From R. Manning, good specimens of Beurré Bosc, Bezi de la Motte, Beurré Bronze, brown Beurré, Jalousie, Urbaniste, Pope's russet, and Fulton pears. From W. Kenrick, Louise Bonne de Jersey, and Capiaumont pears. From J. Hovey, Catawba, and Sweetwater grapes, and quinces. From S. Pond, Heathcot pears. From J. M. Ives, Boxford stump, Swaar, Rambo, Quince, Michael Harvey pippin, and Piper apples; also, Cataline (?) Columbian Virgoulouse, Belle Lucrative, Beurré Bosc, Beurré Romain, Buffum, and Capiaumont pears; red cheek Melacaton, and seedling peaches; and Coe's late red plum.

From the President of the Society, fine Portugal and common quinces. From E. Marsh, Quincy, Heathcot and Lewis pears. From S. W. Jackson, Orange quinces. From H. Vandine, Cambridgeport, beautiful specimens of Coe's Golden Drop plums, and quinces. From Rev. G. B. Perry, apples without names. From E. Tufts, Cambridgeport, very superior specimens of Baldwin and Roxbury russett apples. From George Walsh, Sweetwater grapes.

October 15th.—Exhibited. Flowers: A very splendid exhibition of the dahlia was made to-day by the cultivators of this flower in the city, whose plants had not been injured by the frosts. Mr. Jos. Stickney exhibited upwards of three hundred blooms, many of them extremely beautiful and perfect flowers. Messrs Dutton, P. Barnes, R. M. Copeland, Hovey & Co., and others, also exhibited a great number of excellent blooms.

Fruit: From E. Vose, Columbian Virgoulouse, and Prince's St. Germain pears; Pickman's pippin, and King of the Pippins apples; and white Chasselas grapes. From S. Pond, very fine Dix pears. From Dr. Robert Underhill, Croton Point, N. Y., handsome Catawba grapes. From James Arnold, New Bedford, twenty-six varieties of pears, numbered, but without the names; the committee recognized the following:—No. 2, Beurré Diel; 4 and 14, Louise Bonne de Jersey; 5, Marie Louise; 6 and 13, identical, but name uncertain; 7, Bezi de la Motte; 8, Pope's Quaker; 9, Monsieur le Curé; 10, Napoleon; 12, Glout Morceau. From T. Dowse, Cambridgeport, beautiful Seckel and Broca's Bergamot pears. From J. L. L. F. Warren, Isabella grapes, seedling peaches, and apples. From M. P. Sawyer, Boston, Belle of Flanders pear. From C. Kingsly, Northampton, Mammoth pippin, weighing 1 lb. 2 oz. From A. Bowditch, russett apples.

ART. V. Faneuil Hall Market.

	From		To			From		To	
	¢	cts.	¢	cts.		¢	cts.	¢	cts.
<i>'Roots, Tubers, &c.</i>					<i>Squashes and Pumpkins.</i>				
Potatoes, new:					Squashes, per pound:				
Chenangoes, } per barrel..	75	1 00			Autumnal Marrow,.....	2		2½	
} per bushel, ..	30	—			Canada Crookneck,.....	2		3	
Common, } per barrel,...	75	—			Winter Crookneck,.....	1½		2	
} per bushel,...	30	—			Pumpkins, each,.....	10		12½	
Eastports, } per barrel,...	1 25	1 50			<i>Fruits.</i>				
} per bushel,...	50	62½			Apples, dessert and cooking:				
Nova Scotia, } per barrel, ..	75	1 00			Baldwins, per barrel,...	1 25		1 50	
} per bushel. .	30	—			Greenings, per barrel,...	1 25		1 50	
Sweet, per bushel,	75	—			Russetts, per barrel,...	1 25		1 50	
Turnips, per bushel:					Spice, per barrel,	1 25		1 50	
Common,.....	17	20			Common, per barrel,....	75		1 00	
Ruta Baga,.....	25	37½			Blue Pearmain, per barrel	1 25		1 50	
Onions:					Seck-no-further, per barrel	2 50		—	
Red, per bunch,.....	2½	3			Lady apple, per half peck.	25		—	
White, per bunch,.....	2½	3			Porter apple, per dozen. .	25		37½	
Yellow, per bushel,.....	62½	75			Dried apples, per pound, ..	4		4½	
White, per bushel,.....	62½	75			Sweet, per bushel,.....	1 00		1 25	
Beets, per bushel,.....	50	75			Pears, per half peck or doz:				
Carrots, per bushel,.....	50	75			Dix, per dozen,.....	37½		50	
Parsnips, per bushel,.....	75	—			Beurré Diez, per dozen,...	50		—	
Salsify, per dozen roots,...	12½	—			Winter Doyenne, per doz:	25		37½	
Horseradish, per pound,...	8	12½			Duchess d'Angouleme, "	75		1 00	
Garlic, per pound,.....	12½	—			Messire Jean, per half p'k	50		—	
					Chaumontel, per half p'k,	50		—	
<i>Cabbages, Salads, &c.</i>					St. Michael, per dozen,...	50		—	
Cabbages, per dozen:					Baking, per bushel,.....	1 50		—	
Drumheads,.....	37½	50			American Citron, per pound,	2		3	
Savoy,.....	37½	50			Quinces, per bushel,.....	2 00		—	
Red Dutch,.....	50	—			Berberries, per bushel,...	1 00		1 25	
Brocolis, each,.....	8	12½			Cranberries, per bushel,...	2 50		2 75	
Cauliflowers, each,.....	12½	—			Tomatoes, per dozen,	12½		—	
Lettuce, per head,.....	4	6			Grapes per pound:				
Celery, per root,.....	6	8			Black Hamburg,.....	37½		—	
Cucumbers, (pickled) pr gal.	25	—			White Sweetwater,.....	20		25	
Peppers, (pickled,) per gallon	37½	—			Isabella,.....	8		10	
					Catawba,.....	8		10	
<i>Pot and Sweet Herbs.</i>					Malaga, white,.....	25		—	
Parsley, per half peck,....	20	—			Malaga, purple,.....	25		—	
Sage, per pound,.....	17	20			Pine-apples, each,.....	25		50	
Marjorum, per bunch,....	6	12½			Lemons, per dozen,.....	—		—	
Savory, per bunch,.....	6	12½			Oranges, per dozen,.....	—		—	
Spearmint, green, per bunch,	3	4			Chestnuts, per bushel,.....	3 00		3 50	
					Walnuts, per bushel,.....	1 50		1 75	

REMARKS.—Never was there a more glorious October witnessed than the present. There has been scarcely a single cloudy day—rain has fallen only two or three times, and then in small quantities; and the temperature has been extremely moderate, no severe frosts having occurred up to this date. In the gardens of the city, the

dahlias are still flowering in great beauty. A more favorable time for harvesting the bountiful crop, was never experienced by the New England farmer. Prices, for produce of all kinds, are extremely low; yet the great abundance will, in part, make up for this deficiency between the present, and the usual high rates.

Vegetables.—Potatoes now come in from the eastward, and from the Provinces, in great abundance, and prices have fallen down exceedingly low: great quantities have been taken for shipping, but, notwithstanding this, there is a constantly accumulating stock: Nova Scotias are abundant, although the duty is ten cents per bushel; prime Eastports command our prices, and are in tolerable request: Sweet are very plentiful, and of good quality. Turnips now come in abundant, and of fine appearance and size. Onions remain the same. Parsnips now come to hand. Salsify is brought in, and is taken in small quantities. Horseradish is plentiful, and of good size. Cabbages are remarkably plentiful: Drumheads are generally too large, from the favorable weather; prices have fallen off since our last. Brocolis and cauliflowers are tolerably abundant, and of fine growth. Lettuce is scarcer, but comes to hand of excellent quality. Celery is plentiful and cheap; the autumn has been highly favorable for the winter crop. In Squashes, there is not much alteration: fruit is so abundant, the demand has been rather limited.

Fruit.—Apples continue plentiful, and prices low: considerable quantities have been shipped; a few fine Porters remain, which sell freely at our prices. Pears are scarce, with the exception of one or two sorts: some superb Duchess d'Angoulemes have been received: the winter Doyenne is a very valuable variety. Quinces are plenty, and of good size. Berberries are rather scarce. Late arrivals of Malaga grapes have stocked the market, and prices have been reduced for all kinds. Cranberries are very scarce, and in good demand at our quotations. Lemons are tolerably plenty; but of good oranges, there are but few in market. Chestnuts, of the new crop, now come in, but the supply is exceedingly limited. Walnuts are plenty, and of good quality.—*M. T., Boston, October 28, 1842.*

ART. VI. Obituary Notice.

Death of Robert Manning, Esq.—It becomes our painful duty to record the death of our estimable correspondent and friend, Mr. Manning, of Salem. He died at his residence, on Thursday, the 27th of October. We had intended to have prepared a few remarks upon Mr. Manning's connection with horticulture, and his valuable assistance in cultivating and proving fruits, to which he has devoted the latter years of his life; but want of room has compelled us to postpone this till our next.—*Ed.*

HORTICULTURAL MEMORANDA

FOR NOVEMBER.

FRUIT DEPARTMENT.

Grape Vines, by this time, will probably have the fruit nearly or quite all cut. The leaves will now begin to fall, and the wood will ripen very fast. Give an abundance of air in fine weather, but continue to close up the house early on cold nights. Neither syringing nor watering will be required now.

Strawberry beds will need some care. If the weeds continue to grow, they should be destroyed.

Raspberry plantations may be made this month, with good success.

Currant and Gooseberry bushes may be set out in November, and they will do well next season.

Fruit trees, of all sorts, may be planted this month with safety. In some situations we think the autumn the most favorable time.

FLOWER DEPARTMENT.

The Dahlias should all be taken up immediately, if not already done, and placed away in the cellar; or, if there is a green-house, under the stage. See that each root is carefully marked, and the label secured by copper wire.

Tulips and Hyacinths should be planted as soon in the month as may be convenient, though they will do well any time, as long as the ground continues open.

Roses, in the open ground, should be taken up and potted, and placed in a frame or green-house.

Calla aethiopica should now be potted.

Pæonies may be successfully removed this month.

Oxalis cernua, rosea, and versicolor, may be potted this month.

Verbenas should be protected in a frame, or in the green-house.

Camellias will now begin to be objects of more attention, as they commence swelling their buds. See that they are duly watered. The seeds may be planted now.

Azaleas will need attention. They will not require much water at this season.

Ixias and Sparaxises should all be repotted this month.

Ericas.—Any cuttings, now rooted, should be potted off.

Erythrina crista galli roots should be placed in the cellar.

Ten week stocks should now be removed to a frame or the green-house.

Hardy perennial plants may yet be transplanted with safety.

Carnations should be protected by a frame.

Beds of Pansies should be protected by a thin covering of leaves.

Cactuses may be grafted at this season.

Annual flower seeds, such as coreopsis, double larkspur, clarkias, godetias, candytuffs, *Silene compacta*, &c., should be sown this month, for early spring flowering.

Mignonette should be carefully watered this month.

THE MAGAZINE OF HORTICULTURE.

DECEMBER, 1842.

MISCELLANEOUS INTELLIGENCE.

ART. I. *Foreign Notices.*

ENGLAND.

English Dahlia Exhibitions for 1842.—The season for the dahlia having now passed, and our papers containing the reports of the principal exhibitions in England having come to hand, we doubt not but that an abstract of the several shows will be particularly interesting to our readers, especially those who are cultivators of the dahlia.

The cultivation of this favorite and popular flower has been carried to such a degree of perfection, and the standard of a good bloom has been set so high, that few seedlings among the thousands and tens of thousands which are annually raised, can be found, which will come near to the requisite qualities of a first rate flower. The consequence of this nice discrimination by the English florists has had a good tendency: it has prevented the palming off a new variety upon the public, merely because it has a new name, or has obtained one or two prizes at exhibitions, where probably the selection of the flowers was made from a hundred plants of the same kind.

The London Floricultural Society, a society which has sprung up out of the old Metropolitan, has instituted regular exhibitions of the dahlia during the flowering season, when new seedlings may be exhibited, under certain restrictions, for premium. One of these restrictions was, that at least six blooms of any one sort should be shown to be entitled to a prize.

The Society, in their attempt to produce a systematic judgment, have proposed that the form for the dahlia should be drawn up as follows:—

DAHLIA.		
CLASS —.		
NAME ———.		EXHIBITOR ———.
PETAL,	{	Shape, Substance, Arrangement.
Color,		————.
Eye,		————.
Depth,		————.
Size,		————.
Form,		————.
		Class of quality, ———.

Under this standard all the awards for seedlings will be made.

The season in England appears to have been a favorable one, and the character of the exhibitions more beautiful than heretofore—not perhaps so much in the profusion of the flowers, as in their superior and improved quality—far more splendid than those of previous years.

Our synopsis of the exhibitions will be the same as heretofore; that is, giving the names of the flowers which took the premium, or the highest prize, at the different societies which will be named—and, lastly, an account of the several new seedlings which are deemed worthy of cultivation.

Royal South London Floricultural Society.—This exhibition was very superior, being held in the immediate vicinity of some of the most celebrated growers. Meeting Sept. 13.

AMATEUR CLASS. Best twenty-four blooms.—Maria, Lady Middleton, Duchess of Richmond, Regina, Beauty of the Plain, Great Western, Le Grand Baudine, President of the West, Bridesmaid, Springfield Rival, Unique, Marquis of Lansdowne, Penelope, Bedford Surprise, Phenomenon, Springfield Purple, Beauty of Wakefield, Andrew Hofer, Argo, Metella, Maid of Bath, Indispensable, Widnall's Queen, and Burnham Hero.—*Gold medal* to Mr. Bragg.

NURSERYMEN'S CLASS. Best fifty blooms.—Candidate, Phenomenon, Hylas, Chef d'Ouvre, Duchess of Richmond, Indispensable, Springfield Rival, Nicholas Nickleby, Argo, Metella, Lady Ann Murray, Conductor, Vitruvius, Optima, North Star, Ne Plus Ultra, Duke of Cornwall, Beauty of the Plain, Cattleigh's Eclipse, Unique, Maid of Bath, Bedford Surprise, Constancy, Springfield purple, Marquis of Lansdowne, Eva, Majestic, Cattleigh's Tournament, Lady Middleton, Bridesmaid, Widnall's Eclipse, Will Watts, Prince of Wales, Grace Darling, Pickwick, Climax, Rienzi, Le Grand Baudine, Penelope, Emperor of China, Amato, Maria, President of the West, Widnall's Queen, Admirable, Union Tournament, Conservative, Hero of Nottingham, and Andrew Hofer.—*Gold medal* to Mr. Brown, of Slough.

Leamington Grand Dahlia Show.—A splendid exhibition, held on the 5th and 6th of September.

PREMIER PRIZE. Twenty-four blooms.—Lord of the Isles (seedling of 1842,) Warwickshire Champion (seedling,) Bedford Rival, Sir Robert Throgmorton, Arethusa (union,) Count Stalberg (union,) President of the West, Charles XII., Pickwick, Springfield Rival, Rouge et Noir, Highgate Rival, Danecroft Rival, Lee's Bloomsbury, Phenomenon, Beauty of the Plain, Tournament (union,) yellow Defiance, Argo, Unique, Indispensable, Andrew Hofer, Climax, and Hope.—An elegant *silver cup* to Messrs. Mayle & Co.

Wisbeach Horticultural Society.—The exhibition took place on Wednesday, September 7th.

FIRST PRIZE. Twenty-four blooms.—Widnall's Conductor, Eclipse, Majestic, and Queen, Hudson's Princess Royal, Dodd's Prince of Wales, Maria, Regina, Phenomenon, Pamplin's Charles XII., Unique, Cattleigh's Eclipse, Suffolk Hero, Tournament, Andrew Hofer, Metella, Egyptian Prince, Duchess of Richmond, Royal Standard, Bridesmaid, Sir Frederick Johnstone, Indispensable, Lady Cooper.—The *silver cup*, value £5, to Mr. Widnall.

Floricultural Society.—This, together with the South London exhibition, may be considered as the two best shows of the dahlia in England.

PROFESSIONAL CULTIVATORS. Best thirty-six blooms.—Cattleugh's Eclipse, Bedford Surprise, Lady Cooper, Rienzi, Royal Standard, Penelope, Indispensable, Unique, Tournament, Hope, Nicholas Nickleby, Pickwick, Burnham Hero, Phenomenon, Climax, Fanny Keynes, Maid of Bath, Suffolk Hero, Metella, Hylas, Optima, Beauty of the Plain, Lady Ann Murray, Marquis of Lansdowne, Duchess of Richmond, Prince of Wales, Amato, Widnall's Eclipse, Hudson's Princess Royal, Springfield purple, Rival Sussex, Widnall's Queen, Andrew Hofer, Ne Plus Ultra, Lady Middleton.—Mr. Brown, of Slough.

Nottingham Floral and Horticultural Society.—Last show of the season Sept. 21, 1842.

AMATEUR CLASS. Best twenty-four blooms.—Bloomsbury, Lewisham Rival, Defiance, Optima, Springfield Rival, Beauty of the Plain, Nicholas Nickleby, Le Grand Baudine, Countess of Pembroke, Charles XII., Grace Darling, Pickwick, Metella, Haidee, Maria, Rouge et Noir, Amato, Bloomsbury (Pamplin's,) Rienzi, Constancy, Lady Middleton, Conservative, Regina, President of the West.—To Mr. J. Neville.

Thanet Floricultural and Horticultural Society.—A splendid exhibition which took place on the 8th of September.

PREMIER PRIZE. (Open to all England.) Best twenty-four blooms.—Burnham Hero, Egyptian Prince, Perpetual Grand, Prince of Wales, Andrew Hofer, Marquis of Lansdowne, Maid of Bath, Widnall's Queen, Le Grand Baudine, Hope, Climax, Bedford Surprise, Duchess of Richmond, Bridesmaid, Pickwick, Unique, Maria, Seedling, Fanny Keynes, Metella, Phenomenon, Indispensable, and Penelope.—To M. Brown, of Slough, the prize of £10.

Warwick Horticultural Society.—This show was very splendid, and several prizes were awarded.—Sept. 14.

NURSEYMEN'S CLASS. (Open to all England.)—Bishop of Winchester, Lee's Bloomsbury, Countess of Pembroke, Cattleugh's Eclipse, Maid of Bath, Maria, Le Grand Baudine, Andrew Hofer, Duchess of Richmond, Admirable, yellow Defiance, Lewisham Rival, Squibb's Defender, Eva, Metella, Phenomenon, President of the West, Conductor, Unique, Grace Darling, Nicholas Nickleby, Pickwick, Rouge et Noir.

Cambridgeshire Horticultural Society.—A Society which has always held beautiful dahlia shows:—

PREMIER PRIZE. Best twelve blooms.—Widnall's Conductor and Eclipse, Marchioness of Exeter, Widnall's Queen, Cattleugh's Eclipse, Tournament, Prince of Wales, Osgar, Stella, Duchess of Richmond, Nicholas Nickleby, Princess Royal.—Mr. Widnall.

A greater number of the reports than usual do not give the names of the winning flowers; only the individuals who gained the prizes are mentioned. We have, however, in the above list, given the names of the dahlias which took the prizes at the two greatest shows in England, viz. the South London and the Floricultural Society. The dahlias grown by the competitors at these shows are probably the very newest and best in the kingdom, and afford a much better test of the character of the kinds than the provincial exhibitions.

The dahlias which appear to have been the most successful in the several classes, are the following:—Bridesmaid, Widnall's Queen, Prince of Wales, Princess Royal, Le Grand Baudine, Burnham Hero, Lady Cooper, Pickwick, Indispensable, Andrew Hofer, Duchess of Richmond, Maid of Bath, Cattleigh's Eclipse, &c.; the four first, new ones of the present year; and the others older and well known sorts. Widnall's Queen has taken nearly all the prizes as the best *rose*—Prince of Wales as the best *yellow*—Bridesmaid as the best *edged*—Essex Triumphant as the best *dark flower*—Lewis-ham Rival as the best *white*—Bloomsbury as the best *scarlet*.

Many of the old favorites yet continue to contest the palm with the new ones. Ne Plus Ultra, Grace Darling, Regina, Rienzi, Hope, Unique, Conservative, Virgin Queen, and Duchess of Richmond, appear in a great number of stands.

In the whole of the successful flowers, there are not more than six or eight kinds which have not been shown at the exhibitions of the Massachusetts Horticultural Society the past fall. A great portion of the new seedlings advertised last spring have proved unworthy of cultivation, and far inferior to the older sorts. This should be an additional inducement to amateurs to purchase sparingly of those varieties of which they have no knowledge but such as is contained in an advertisement. It will also induce them to cultivate a greater number of those standard kinds which are always sure to produce good show flowers, rather than a great number of indifferent sorts, merely to swell out a long list of names.

Mr. Brown, of Slough, has been a remarkably successful exhibitor, and has taken the *first prize* at ten or more of the greatest exhibitions in the kingdom.

SEEDLINGS.—The principal seedlings of this year were shown at the meetings of the Floricultural Society, and at the Salt Hill Grand Dahlia Show: the greatest number at the latter. Without attempting to condense the accounts of these exhibitions, which would require much labor, we give that of the Salt Hill entire, and extracts from the other; and, after reading them, amateur cultivators will at once see the relative merits of each of the seedlings exhibited.

Salt Hill Show.—Seedlings of 1841. Four blooms required to be exhibited of each variety. Those selected for prizes were placed in the following order:—1. Bragg's Antagonist, white; this is a full sized and finely formed flower, with good petals, and great purity of color. In consequence of its being placed first by the judges, Mr. Wildman's prize of five guineas, for the best seedling white of 1841, was decided in its favor; and, as it obtained the first prize at the last evening meeting of the Floricultural Society, the point by the decision at Salt Hill is now settled. 2. Essex Triumphant (Turvill),—this noble flower is quite a model of perfection, fine in form and deep in petals, with a centre high and finely developed; the color is a very deep rich maroon, the petals are finely cupped, of good substance, and well arranged. 3. Virgil (Mountjoy's),—deep crimson, a flower possessing a very fine form, with a good centre, and full depth of petals. 4. Beauty of Sussex (Mitchell's)—this is a desirable flower, and very striking from the peculiarity of its tints; the ground color of the petals is a delicate rose, with a deep edging of mottled cherry color; it is a good sized flower. 5. Empress of the Whites (Smith, of Hornsey),—better blooms than we had previously seen of this flow-

er; with well formed petals of good substance; the white is good, and the centre better developed than at previous exhibitions. 6. Sir R. Sale (Smith, of Hackney,)—deep crimson; this combines good general form, with a firm and well shaped petal; the eye is well up, with good depth of petals. 7. Hero of Stonehenge (Whale,)—crimson; a flower of good general form, but the arrangement of the petals is rather confused. 8. Miranda (Brown,)—a full sized flower; color light, mottled with crimson. These eight flowers were selected by the judges for the prizes, and two others were recommended. 9. Perpetual Grand (Brown's)—fine crimson; a large and very useful flower; centre finely formed. 10. Swindon Rival (Compton's)—rosy crimson; this flower has a well formed petal, but it did not appear to be any improvement upon flowers already out in the same way. There were many other seedlings exhibited, amounting, in all, to twenty-one kinds. Of the seedlings of 1841, Stein's Sir R. Chester appears to promise well: there were three seedlings from Mr. Bragg, a dark with good proportions; an orange, novel in color; and a curious colored purple, with a fine petal.

Floricultural Society—and last exhibition of the season. This Society divides the seedlings into two classes, as follows—six blooms required:—

Seedlings of 1841.—First Class: 1. Essex Triumphant; at this exhibition it was placed first; thirty-six blooms were shown as a test of its constancy, and all uniformly good. 2. Virgil. Second Class: 1. Beauty of Sussex. 2. Hero of Stonehenge. 3. Great Mogul (Brown & Atwill,) a full sized flower, of a dull shaded red; the petals are good, but rather flat; the substance and arrangement are both good; the eye is a little sunk, and the flower rather flat. 4. Empress of the Whites. 5. Sir R. Sale.

Seedlings of 1842.—The following received second class prizes: 1. Queen of Roses (Hale,)—a bright and desirable color. 2. Aurantia (Spang,)—a dull orange. 3. Cheltenham Queen (Hodge's,)—white. 4. Washington (Smith,)—purple. The following seedlings were also exhibited, but did not receive prizes:—1841, Venus (Gaines's;) Beeswing (Brown;) Aurantia, Orb, Sphere, Victor (Widnall's;) Twyford Rival (Headland;) Branca (Smith's;) Pet Rival (Bushell;) Prime Minister (Lawrence;) Venus (Brown & Atwill;) Rotherham North Midland (Eran's;) six blooms of a new seedling, called Mrs. James Richardson, were sent for the opinion of the Society by Mr. Edwards, of York. It was decided to be well formed, eye good, depth full, color white tipped, and quality first rate.

From this it appears that only ten seedlings of 1841 are really worth cultivating, viz: Essex Triumphant, Virgil, Beauty of Sussex, Hero of Stonehenge, Empress of the Whites, Sir R. Sale, Great Mogul, Antagonist, Miranda, and Perpetual Grand.

Such judgment as the above will have a tendency to dampen the enthusiasm of those who advertise every new seedling as possessing remarkable properties and beauties, when, in truth, they are often inferior to the older sorts: so common has this practice become, and the public have been so deceived in their purchases, that it was necessary some check should be put upon it. The Floricultural Society, in attempting this, have performed a good service, and one which will command the thanks of all who are interested in the cultivation of the dahlia.—*Ed.*

ART. II. Exhibitions of Horticultural Societies.

The exhibitions for the year having all taken place, we present our readers with the reports of such societies as we have received. It gives us pleasure to state that these reports are longer than usual, and embrace among the flowers and fruits, particularly the latter, many varieties of very recent introduction, thus showing how rapidly the newest fruits are disseminated over the country.

The season has been propitious for both fruits and vegetables, and the specimens have been large and of fine appearance: it will be seen that vegetables are attracting more attention by our horticultural societies, and we feel gratified that this is the case—for if we are deficient in any one thing, it is in adhering to the cultivation of many of the older kinds of vegetables when far superior ones can be produced, if cultivators will only procure the proper seed. A careful notice of the reports below will convince all that greater efforts have been made to get up the exhibitions than in any previous year.

ESSEX COUNTY NATURAL HISTORY SOCIETY.—The horticultural exhibitions at the Society's hall, during the present season, have been well sustained. They are gradually diffusing a more general taste for the cultivation of beautiful flowers and delicious fruit throughout our community; every revolving season bears testimony to this fact, in the greater variety of fruits and flowers exhibited, and the larger number of contributors. Fourteen weekly exhibitions have been held on Wednesday of the respective weeks, and the annual exhibition on Wednesday, Thursday, and Friday, Sept. 21, 22, and 23. Flowers exhibited about nine hundred species or varieties—one hundred and sixty natives of the fields and meadows—the others, the product of the green-house or garden. Of these last, two hundred were dahlias, one hundred and forty roses, sixty geraniums, fifteen pæonies, &c. Of three hundred and ten varieties of fruit, one hundred and twelve were pears—seventy-two apples—thirty peaches—twenty-five cherries—twenty plums—twelve strawberries—twelve gooseberries—ten grapes—six melons—three currants—two raspberries; nectarines, apricots, figs, oranges, almonds, mulberries, one each. This variety of fruits and flowers were contributed by one hundred and forty-eight individuals—of whom one hundred and twenty-nine were residents of this city, and the remaining nineteen of the adjacent towns, with the exception of two or three from more distant parts of the State.

We subjoin a list of the exhibitions, contributors, &c.

Wednesday, June 8, 1842.—Flowers: From Mrs. J. D. Treadwell, bouquets of pæonies, iris, tulips, &c. J. C. Lee, *Glycine sinensis*, *Cytisus Laburnum*, *Aristolochia siphon*, *Sedum*, carnations, &c. J. S. Cabot, pæonies, nine varieties, viz: *Banksia*, *papaveracea*, *rosea*, *rosea odorata*, *carnea*, (*Moutan*,) *rosea*, *paradoxa* *fimbriata*, &c.; roses—Harrison and William IV.; *Hemerocallis*, pansies, lupinus, &c. W. F. Gardner, *Pæonia carnea*, &c., dwarf rocket larkspur, stocks, geraniums, &c. W. P. Richardson, bouquets of pæonies, roses, geraniums, &c. F. Putnam, *Alstræmeria tricolor*, *Pæonia*, *Banksia*, *papaveracea*, *rosea odorata*; geraniums, Hill's Champion,

Speculum mundi, &c. F. Lamson, bouquets and geraniums, roses, heliotropes, pansies, &c.; also several species of native plants. G. A. Perkins and H. Wheatland, native plants, viz: *Gëum nivåle*, *E'rigeron bellidifölium*, &c.

June 15.—Flowers: From Mrs. J. D. Treadwell, Miss M. B. Ives, M. B. Mansfield, and W. P. Richardson, bouquets of pæonies, roses, hemerocallis, tradescantia, geraniums, &c. J. Bowker, dahlias, several varieties, first exhibited this season; also geraniums, stocks, &c. F. Putnam, roses,—General Harrison, William IV.; *Cëreus Jenkinsöni* and *speciosus*; also geraniums and pæonies. J. C. Lee, and H. Wheatland, Native Plants,—*Cörnus ålba*, *Cypripëdium acaule*, *Melampyrum americanum*, &c.

Fruit:—From C. F. Putnam, early Virginia strawberries, (six boxes.)

June 22.—Flowers: From Mrs. J. D. Treadwell, Miss M. B. Ives, N. B. Mansfield, T. Perkins, John Lewis Russell, bouquets of roses, pæonies, digitalis, lychnis, &c. Mrs. W. Deau, *Pæönia Hùmei*, and *Whittlëji*. J. S. Cabot, roses, thirty-three varieties, viz: *Cerisette*, *Victor Tracy*, *St. Brunnes*, *Rivers's George IV.*, *Wellington*, *Watt's Celestial*, *white Globe*, *Mount Vesuvius*, &c.; Pæonies—*Whittlëji*, *Hùmei*, *frågrans*, *Reèvesii*, and *Pötszi*; *Dracocëphalum Ruyschiånnum*, *Clématis integrifölia*, *Betönicå cærdëa*, &c. J. C. Lee, *Sempervivum globiferum*, *Ænothëra Frazëri*, *verbenas*, *carnations*, &c. W. F. Gardner, *Hemerocallis*, *stocks*, *verbenas*, *roses*, &c. James Upton, *Pæönia Whittlëji*, *pinks*, *roses*, &c. G. D. Phippen, W. P. Richardson, H. Wheatland, bouquets of *lysismachia*, *pinks*, *hemerocallis*, *roses*, &c. J. F. Allen, *Pæönia Hùmei* and *Whittlëji*, (large clusters.) F. Putnam, roses—*Negro Panache*, *Grand Pompadour*, *Somers's Superb*, *new beautiful Provence*, *pink Boursault*, *Gloriosa Superba Nova*, *Rivers's George IV.*, &c.; Pæonies *Reèvesii*, *Hùmei*, &c.; *Cactus speciosissimus*. F. Lamson, *Calceolåria corymbösa*, in pot. H. Cross, beautiful specimens of *Kålmia latifölia*, from the woods in Beverly.

Fruit:—From T. Cruickshank, fine specimens of several varieties of strawberries, viz., *Keen's seedling*, *Virginia scarlet*, *Milne's seedling*, a variety recently received from Aberdeen, in Scotland, &c. W. F. Gardner, *Pine*, and other varieties of strawberries. W. C. Barton, *cherries*. J. C. Lee, *Royal scarlet* and *Mulberry strawberries*; also *cherries*.

June 29.—Flowers: From Mrs. J. D. Treadwell, Miss M. B. Ives, Miss H. Rogers, G. D. Phippen, and W. P. Richardson, bouquets of *campanula*, *digitalis*, *roses*, *honeysuckles*, *pinks*, &c. E. H. Derby, *Nymphæa odoråta*, *Liriodëndron tulipifera*, *passiflora*, *agapånthus*, *cactus*, &c. J. S. Cabot, roses—*Lee's crimson Perpetual*, *Queen of Perpetuals*, *Pulchra*, *La Mienne*, *Village Maid*, *Duchess d'Orleans*, *Belle African*, *Duchess de Berri*, *European Maiden's Blush*, *Adonis*, *Belle Lilloise*, *Jerusalem*, *Crick's rose*, *Leonore*, *Waterloo Real*, *Lady Alciford*, *King of Reds*, *La Tourtuelle*, &c. R. Manning, *Pæönia Whittlëji* and *frågrans*. C. A. Andrew, *Pæönia Hùmei*, *roses*, &c. J. C. Lee, *Kålmia latifölia*, *Cråssula*, *carnations*, &c. F. Lamson, roses—*Madame Desprez*, *Agrippina*, *yellow Tea*, &c.; also bouquets. J. Bowker, J. M. Ives, T. Ropes,

Jr., J. Upton, and W. F. Gardner, bouquets of pæonies, roses, tradescantia, honeysuckles, digitalis, &c. F. Putnam, roses—Mary Stuart, Irene, Delicatesse, Gloria Mundi, Imperial Blush, &c.; pæonies—Whittlèji, fràgrans, &c.; also, cactus. H. Wheatland, and Andrew Nichols, of Danvers, native plants.

Fruit:—From J. S. Cabot, Hovey's seedling strawberry. R. Manning, cherries—early, black heart, Holman's Duke, Madison's Bigarreau, Bowyer's early heart, Jeffrey's Royal Duke. J. M. Ives, Warren's seedling strawberries; white heart cherries, (natural fruit.) W. F. Gardner, wood, and pine strawberries. J. F. Allen, Royal George clingstone peaches. E. H. Derby, cherries. C. F. Putnam, Hovey's seedling, Bishop's orange, and Royal scarlet strawberries.

July 6.—Flowers: From Mrs. J. D. Treadwell, dahlia, first this season, in open culture; also, bouquets. Mrs. W. Dean, lilies, larkspurs, &c. H. F. King, lilies. N. B. Mansfield, Celestial, and Jerusalem roses; pæonies, lilies, &c. Miss M. B. Ives, Miss Nichols, W. P. Richardson, G. A. Perkins, H. Wheatland, bouquets of pyrethrum, lilies, larkspur, roses, &c. Miss Very, *Kálmia latifolia*, and bouquets. Miss H. Rogers, basket of cut flowers, beautifully arranged. Mrs. W. D. Waters, *Arethusa bulbosa*. S. P. Fowler, of Danvers, *Antirrhinum linaria*. C. Ratford, dahlia (*Dennisii*) in pot with several flowers. J. C. Lee, *Pentstemon ovatum*, *leptandra*, carnations, &c. G. D. Phippen, *Campánula persicæflora* fl. pl. J. M. Ives, Fanny Parard, crinson moss, Tuscany, and other roses. W. F. Gardner, stocks, roses, lilies, larkspurs, &c. F. Putnam, Belle Aurora, Belle Hebe, perpetual white moss, Snowball, Glory of France, Eryphilla, and other roses. F. Lamson, Triumph of Luxembourg, and blush Tea roses; Naunkeag, *Diadematum superbum*, geraniums; also, carnations, verbenas, pansies, &c. J. Upton, larkspurs, and pinks. J. S. Cabot, roses, viz: Charles II., Duchess d'Orleans, Empress of France, Clifford, Leopoldine de Napoleon, L'Obscurité; also, *Pentstemon digitalis*, *Wahlenbergia grandiflora*, *Delphinium Húlnii*, *Campánula grácilis*, &c. H. Cross, several species of native or introduced plants, as *Pyròla umbellata*, *Echinum vulgare*, &c.

Fruit:—From Mrs. N. Silsbee, black Tartarian cherries. Mrs. J. D. Treadwell, cherries. J. F. Allen, Royal George clingstone peaches; monthly strawberries. J. S. Cabot, cherries; Hovey's seedling strawberries. J. C. Lee, Sweetwater grapes. G. A. Perkins, seedling cherries. R. Manning, common white Bigarreau, black heart, black Eagle, Waterloo, Holman's Duke, and Elton cherries. W. F. Gardner, Wood strawberries; Royal George free-stone peaches; and black Tartarian cherries. J. M. Ives, mottled Bigarreau (seedling,) Manning's fine red, and Honey heart cherries; also, Warren's seedling strawberries. E. Emmerton, white Bigarreau cherries. W. Ives, cherries. W. P. Richardson, black mulberries; also, cherries.

July 13.—Flowers: From Mrs. J. D. Treadwell, Mrs. Moody, W. P. Richardson, T. Perkins, J. Upton, J. C. Lee, and T. Ropes, Jr., bouquets of dahlias, lilies, poppies, carnations, spiræa, verbenas, &c. Mrs. W. Dean, *Lychnis floscùculi plèna*. Miss M. A. Ward, beautiful plant (in pot) of the *Cántua coronopifolia*. Miss M. J.

Howard, native plants, viz: *Azàlea viscòsa*, *Epilòbium angustifòlium*. F. Lamson, bouquets of roses, dahlias, lilies, &c.; also native plants. J. S. Cabot, roses—*Attelaine de Bourbon*, *Fair Maid* of Perth, *Proserpine*, *Pulchra perpetual*, *Unique*, &c.; also, *Lychnis chalcedónica fl. pl.*, *Clématis Siebòldii*, *Betónica grandiflòra*, &c. A. Bosson, *Calceolària bicolor*, dahlias, and verbenas; also, *Azàlea viscòsa*, *Epilòbium angustifòlium*. C. Ratford, *Orobánche uniflòra*, *Pyròla rotundifòlia*, &c. J. W. Downing, dahlias, *Quilled Perfection*; also, bouquets. F. Putnam, a plant of the *Echinocactus Eyrièzii*, containing three beautiful flowers. W. F. Gardner, a fine spike of the *Yúcca filamentòsa*. G. Driver and E. Buswell, dahlias—*Marshall Soult*, *Ne Plus Ultra*; also, bouquets. G. A. Perkins and H. Wheatland, native plants, viz: *Pogònia ophioglossoides*, *Medicàgo lupulinus*, &c.

Fruit: From B. H. Silsbee, Ox heart cherries. R. S. Rogers, seedling mazard cherries. John Clark, a branch containing numerous almonds (unripe.) Andrew Nichols, of Danvers, cherries. W. P. Richardson, cherries and mulberries. J. M. Ives, Cowan's seedling [?] raspberries; Napoleon Bigarreau cherries; English black, and Morgan's red cherries; Scotch early red Warrington gooseberries. J. Cross, curious growth of the stalk, containing the seed vessels of the beet. W. F. Gardner, Wood strawberries; Royal George Free-stone peaches.

Vegetables: From J. M. Ives, large specimens of short top radishes.

July 20.—Flowers: From Mrs. J. D. Treadwell, *Catálpa cordifòlia*, *Azàlea viscòsa*; also, bouquets. Mrs. Moody, *Centaurèa suavèolens*, *Hemerocállis*, lilies, &c. A. L. Pierson, F. Lamson, G. D. Phippen, C. A. Andrew, N. B. Mansfield, J. C. Lee, and H. Wheatland, bouquets of dahlias, lilies, petunias, verbenas, *digitalis*, &c. T. Ropes, Jr., dahlias—*Striata formosissima*, *Sussex*, *Countess of Pembroke*, &c.; also, bouquets. Mrs. Day, O. Thayer, A. Bosson, dahlias and bouquets. G. Driver and E. Buswell, dahlias—*Unique*, *Suffolk Hero*, *Lady Arabella*, &c. J. F. Allen, *Amie Vibert* roses. S. P. Fowler, of Danvers, *Lilium japonicum*; also, native plants, as *Lobèlia cardinàlis*, *Orchis psychodes*, &c. Andrew Nichols, of Danvers, *Brachystemum virginicum*.

Fruit: From E. Emmerton, Scotch gooseberries, four varieties; Early Harvest apples. W. P. Richardson, red and white currants. C. A. Andrew, Scotch gooseberries. J. F. Allen, black figs, from St. Michaels; sweet Montmorency seedling cherries. J. M. Ives, currants and gooseberries. B. H. Silsbee, cherries and white currants. R. Manning, cherries—*Gridley*, *Cerise du Nord*, Manning's white mazard, *Belle Magnifique*, *May Duke* (second crop.) N. B. Mansfield, Scotch gooseberries, and red and white currants. J. S. Cabot, *Beauty of Summer* pears. R. S. Rogers, cherries. S. P. Fowler, of Danvers, seedling gooseberries, a hybrid produced by cross fertilization between the Scotch and native gooseberries, not liable to mildew. J. C. Lee, *Franconia* raspberries.

July 27.—Flowers: From Mrs. J. D. Treadwell, J. Upton, C. A. Andrew, Miss C. Lee, J. C. Lee, and H. Wheatland, bouquets of *hemerocallis*, dahlias, *gladiolus*, verbenas, geraniums, &c. A. L.

Pierson, *Centaurea moschata* var. *alba*, dahlias, &c. G. Driver and E. Buswell, nineteen varieties of dahlias, viz: Miss Johnstone, Lady Sondes, Anne Augusta Broadwood, Red Rover, &c. F. Lamson, *Bartonia aurea*, *Collinsia tricolor*, &c. J. B. Ferguson, dahlia—Helen. L. Upton, dahlia—*Striata formosissima*. T. Ropes, jr., dahlias—Quilled Perfection, Mackenzie's Perfection, &c. J. A. Goldthwaite, dahlias—Lady Powlett, Lady Dartmouth, &c. N. B. Mansfield, *Asclepias tuberosa*; also, bouquets. W. Mack, *Maurandya Barclayana*. H. Cross, *Girardia flava*, *Spiræa*, &c. A. Bosson, *Lobelia cardinalis*, *L. inflata*, *Spiræa*, &c. Andrew Nichols, of Danvers, *Gratiola aurea*, *Neottia cernua*, &c. H. Wheatland, *Orechis blephariglottis*, *Eupatorium purpureum*, &c.

Fruit: From B. H. Silsbee, Madeleine pears. J. Upton, Early Harvest apples. R. Manning, Plumstone Morello cherries. A. L. Pierson, red Dutch currants. J. C. Lee, several large clusters of the Sweetwater and white Frontignac grapes.

Vegetables: From C. A. Andrew, a variety of bean, well adapted for culinary purposes; seed received from the Patent Office, Washington, D. C.

Aug. 3.—Flowers: From Mrs. J. D. Treadwell, T. Perkins, B. W. Stone, F. Lamson, J. C. Lee, A. L. Pierson, and J. B. Black, of Danvers, bouquets of dahlias, lilies, coreopsis, phlox, carnations, &c. Miss Warden, an interesting plant, in pot, of *Melocactus* sp. from Montevideo, S. America. Mrs. Day, dahlias. J. Upton, dahlias—Canute, Fireball, Argo, &c. F. Putnam, roses—yellow Noisette, Noisette de Bourbon, Musk cluster, Julie de Loynes; also, *Passiflora Loudoni*, verbenas, and carnations. S. P. Fowler, of Danvers, native plants, viz: *Hibiscus palustris*, *Lobelia cardinalis*, &c. A. Bosson, *Sagittaria sagittifolia*, lobelia, and spiræa. H. Wheatland, and G. A. Perkins, native plants, viz: *Cuscuta americana*, *Lobelia cardinalis*, *Gnaphalium*, *Epilobium*, *Eupatorium*. G. D. Phippen, dahlias, viz: Premier, Lady Arabella, *Striata formosissima*, &c. G. Driver, and E. Buswell, the following dahlias,—Eva, Fanny, Coronation, Argo, &c.

Fruit:—From J. M. Ives, Madeleine pears; also, gooseberries and currants. W. Ives, early Harvest apples; and Sugartop, Madeleine, and Petit Muscat pears. W. Stearns, red Juneating apples, and Madeleine pears. F. R. Vincent, early Harvest apples. G. Driver, green citron melons. A. W. Dodge, of Hamilton, early sweet apples. J. C. Lee, black Hamburg, Sweetwater, and white Frontignac grapes. E. Emmerton, early Harvest, and Summer pearmain apples; also, Sugartop pears.

August 10.—Flowers: From Mrs. J. D. Treadwell, *Clêthra alnifolia*, *Phytolacca decandra*, *Gladiolus*, and petunias. Mrs. Moody, *Centaurea suaveolens*, and bouquets. Miss H. Rogers, H. F. King, C. A. Andrew, W. P. Richardson, N. B. Mansfield, bouquets. J. Upton, Globe, and Bride of Abydos dahlias. E. Emmerton, *Nymphaea odorata*. J. Buffington, *Striata*, and Golden Sovereign dahlias; also, fine balsamines. J. C. Lee, Sarah, and Golden Sovereign dahlias; also, *Ipomœa Quamoclit*, *Achillea plenifolia*. F. Lamson, *Hoya carnosa*, dahlias, hibiscus. G. Driver, and E. Buswell, Gem, Fireball, and Duchess of Richmond dahlias. C. M. Richardson,

Striata, and Sulphurea elegans dahlias. T. Ropes, Jr., Grace Darling, and Striata dahlias. A. Bosson and J. W. Downing, fine balsamines. F. Putnam, yellow Tea, and Flageolet roses. H. Wheatland, native plants.

Fruit:—From B. P. Chamberlain, a branch containing large clusters of Bergamot pears. C. A. Andrew, Jargonelle pears. J. Upton, early Harvest, and red Astrachan apples. J. W. Cheever, Sugar-top pears, and early Harvest apples. E. Emmerton, Sopsavine apples. R. Manning, Charlonoski, Tetoffsky, red Margaret, and red Astrachan apples; also, Peach apricot; and Morocco plums. N. B. Mansfield, early Harvest apples, and Madeleine pears. W. F. Gardner, Royal George freestone peaches. J. C. Lee, Williams's Favorite apples; white Frontignac, Zinfindal, and Sweetwater grapes. W. Dean, black Hamburg, and black and red Frontignac grapes. G. Driver, apples and melons. H. Wheatland, Catharine pears. J. S. Cabot, Bloodgood, Madeleine, and Fondante d'Ete pears. S. Cook, Roxbury russet apples (growth of 1841.) J. M. Ives, Beauty of Summer pears; Monsieur Hatif plums; and early Bough apples, a variety from Stratham, N. H.

August 17.—Flowers: From Mrs. J. D. Treadwell, Mrs. L. Saltonstall, Mrs. L. Bowditch, Mrs. Day, Miss M. B. Ives, J. C. Lee, C. A. Andrew, W. P. Richardson, and F. Lamson, bouquets of dahlias, zinnias, peonias, gladiolus, &c. G. Driver, and E. Buswell, fifty-one varieties of dahlias, viz: Rainbow, Corinne, Fanny, Argo, &c. T. Ropes, Jr., dahlias, viz: Premier, Metella, Defiance, Beauty of Kingscote, &c. J. Upton, dahlias—Argo, Rienzi, Mrs. Rushton, &c. J. A. Goldthwaite, dahlias—Pickwick, Marshal Soult, Countess of Mansfield, &c. H. K. Oliver, dahlias, viz: Horticulturist, Eva, Bontisholl, Canute, &c.; also, balsamines. J. W. Downing, dahlias, viz: Sulphurea elegans, Conqueror, &c. C. H. Saunders, dahlias, viz: Striata formosissima, Red Rover, &c. F. Putnam, dahlias, viz: Pickwick, Unique, Sulphurea elegans, &c.; also, roses. W. Very, *Actæa alba*, *Andrómæda paniculata*. A. Nichols, and H. Wheatland, native plants.

Fruit:—From Mrs. L. Saltonstall, English red cheek pears; and early Harvest apples. J. S. Cabot, E. Putnam, and N. B. Mansfield, Jargonelle pears. B. H. Silsbee, early Bough apples. Wm. Ives, several varieties of pears. G. Driver, New York Pine-apple green flesh melons. R. S. Rogers, summer Rose apples. J. W. Rogers, Summer Rose, and Alexander apples. T. Honeycomb, Bloodgood pears. E. Emmerton, English red cheek, and Bloodgood pears. J. M. Ives, Skinless, Empress of Summer, and Bloodgood pears; also, apples, plums, and strawberries. W. Stearns, summer Franc Real, Jargonelle, and Empress of Summer pears. R. Manning, early Rousselet, green summer sugar, and Blanquet pears; also, early Bough apples. J. C. Lee, Skinless, and Jargonelle pears. F. Watson, cherry plum, Myrobalan.

[Owing to the great length to which the report extends, we have been obliged to omit the reports of the weekly meetings between this and the annual exhibition: they are the least interesting of the season.—Ed.]

ANNUAL EXHIBITION.

The annual exhibition of fruits and flowers took place on Wednesday, Thursday, and Friday, September 21st, 22d, and 23d.

The Hall was decorated with festoons, wreaths, &c. of evergreens, which, in contrast with the varied colors of the gorgeous dahlia, and other autumnal flowers, presented a beautiful appearance. Over the entrance was inscribed the name of *Pomona*; and on both sides, the tables were loaded profusely with the choicest of her various and bounteous gifts. Of these there were five hundred and fifty plates, containing ninety-eight varieties of pears, sixty of apples, twenty-five of peaches, besides plums, grapes, melons, nectarines, figs, and oranges, both gathered and growing on the trees. To these may be added, a liberal display from the vegetable kingdom, including mammoth squashes, huge beets, large carrots, &c. Over the tables of fruit, were placed the names of *Lowell* and *Manning*, alike distinguished in the annals of horticultural science, and whose memories will long be endeared to us, as successful introducers and cultivators of many of our choicest varieties of fruit.

Over another part of the Hall, the name of *Flora* was inscribed; beneath and around were the gorgeous and showy flowers of her kingdom. Of these, the dahlia was the most conspicuous; more than twelve hundred blooms of this favorite flower of autumn were placed in the stands, and a legion of others mingled in the bouquets, with other flowers.

On the eastern side, and opposite to the entrance, was constructed a rustic arbor, filled with a group of native plants culled from the woods, fields, and meadows, and over were inscribed the names of *Linnaeus* and *Jussieu*, the founders of our present systems of botany.

We ought not to pass over in silence the great assistance rendered in decorating the Hall, by several ladies, who generously volunteered their services; and it is, in a great measure, owing to their suggestions and handywork, that the decorations won such universal admiration, for the neatness, simplicity, and beauty, therein displayed.

The interest was kept up throughout, and the Hall was filled with admiring visitors.

The following is a list of the contributors, and a sketch of the numerous articles exhibited:—

Cut Flowers:—From Mrs. J. D. Treadwell, *Camellia japonica* álba plèno, dahlias, autumnal crocus; also, bouquets of asters, zinnias, gladiolus, &c. Mrs. S. C. Phillips, *Sálvia spléndens*, dahlias, asters, and petunia. Mrs. J. W. Treadwell, dahlias, spiræa, asters, &c. Mrs. E. Austin, bouquets of dahlias, stocks, coreopsis, &c. Misses Lawrence, *Sálvia spléndens*, autumnal crocus, pansies, dahlias, pinks, &c. T. Cruickshank, a large bouquet of asters and dahlias. J. Kimball, dahlias, viz: *Corinne*, *Marshal Sout*, *Reliance*, &c. F. Lamson, bouquets of dahlias, roses, asters, heliotropes, &c. N. B. Mansfield, dahlias, viz: *Striata*, *Bride of Abydos*, &c.; also, *Boutsault* roses (second bloom,) *rudbeckia*, *phlox*. G. Masury, of Beverly, dahlias—*Maid of Bath*, *Pickwick*, *Eva*, and *Argo*; *Erythrina crista gál*li, *verbenas*, roses. E. H. Derby, many large bouquets of *hemerocallis*, stocks, dahlias, *digitalis*, *salvia*, &c. W. Mack, bouquets of dahlias, *maurandya*, asters, &c. N. Cleaves,

dahlias—Ne Plus Ultra, Calliope, Grandis, Mrs. Broadwood; also, asters. W. Weeks, bouquet of dahlias, rudbeckia, marigolds, &c. J. A. Goldthwaite, dahlias—Pickwick, Argo, Francis, Eva, and Castanda. J. W. Downing, dahlias—Fireball, Premier, Miss Johnstone, Le Grand Baudine, and Eva. J. H. & G. D. Phippen, dahlias—Rainbow, Unique, Blandina, Clio, Sarah, and Napoleon. G. Driver and E. Buswell, dahlias—Grace Darling, Coronation, Argo, Calliope, and Daphne. T. Ropes, Jr., dahlias—Corinne, Marshal Soult, Pickwick, and Eva. C. Hoffman, *Sálvia grandiflora*, *Manéttia cordifolia*; roses—Bougere, Phoenix, Noisette, and Lamarque.

From F. Putnam, dahlias—Pickwick, Fireball, Fanny, Eva, &c.; roses, asters, passion flowers, &c. H. K. Oliver, dahlias—Argo, Eva, Conservative, Crichton, Fireball, Miss Percival, &c. Mrs. D. Cook, dahlias, amarantus, malope, &c. J. Upton, dahlias—Canute, Argo, Rienzi, Suffolk Hero, &c. W. F. Gardner, dahlias—Fireball, Rienzi, Mrs. Rushton, &c. J. Buffington, dahlias—Premier, Hon. Mrs. Harris, Henry Fletcher, &c.; asters. C. H. Saunders, dahlias—Countess of Torrington, Striata, Conqueror of Europe, &c. O. Carlton, dahlias—Bride of Abydos and Mrs. Rushton. A. L. Pier-son, bouquets of dahlias, asters, marigolds, zinnias, &c. Miss H. Rogers, bouquets of dahlias, phlox, asters, &c. H. F. King, dahlias—Marquis of Tavistock, Red Rover, &c.; also asters. J. Farnum, cinnamon roses, second bloom. J. F. Allen, roses—Triumph of Luxembourg, Silene, London Superb, and Flageolet. J. C. Harvey, dahlias—Beauty of Kingscote, Blandina, and Helen of Troy. H. Wheatland, dahlias, asters, stocks, verbenas, and gladiolus. W. P. Richardson, dahlias, larkspurs, asters, &c. J. C. Lee, dahlias—Rienzi, Napoleon, and Rising Sun; also, amarantus, asters, gladiolus, &c.

Pot Plants:—From Mrs. S. C. Phillips, *Araucária excelsa*, *Begônia*, English holley, acacia, roses, &c. H. K. Oliver, tuberose. F. Putnam, *Nerine curvislora*; *Cactus Ackermánni*. F. Lamson, acacia. Mrs. W. Dean, orange tree, lemon, and myrtle orange. J. Howard, Jr., *Dioscòrea alata*, from Sumatra; *Glycine*, sp. from Africa. C. Lawrence, of Danvers, black Hamburg grapes. T. Ropes, Jr., dahlia—Marshal Soult. Josiah Hayward, orange tree in fruit.

Native Plants:—From Mrs. J. D. Treadwell, fruit of *Arum triphyllum*; also, asters, solidago, &c. J. C. Lee, asters and solidago. H. Cross, *Gentiàna crínita*. J. Safford, gnaphalium, cœno-thera, solidago, &c. Miss Nichols, asters and solidago. S. P. Fowler, of Danvers, *Gentiàna crínita*. Miss Very, fruit of *Arum triphyllum* and *Actæa álba*. A. Nichols, of Danvers, *Gentiàna crínita*, *Gnaphalium uliginosum*. H. S. Saunders, *Neóttia cernua*, *Gentiàna crínita*. R. Wheatland, *Eupatòrium*, asters, &c. F. Lamson, *Gentiàna crínita*, and *Heliánthus*. W. P. Richardson, fruit of *Arum triphyllum*, and *Convallària racemosa*. Mrs. J. W. Treadwell, *Gentiàna saponària*. H. Wheatland, asters, solidago, and lobelia.

Fruit:—From Andrew Dodge, of Wenham, apples—Kilham Hill, Baldwin, red pearmain, Phinchas, Dodge's Summer sweet, Dodge's sweeting, early Winter sweeting, honey pink, golden russet, Winter sweet, Ribstone pippin, Danvers sweet; pears—Seckel, Chelmsford, autumn Vert, Parkinson's Warden; peaches. H. F.

King, Seckel pears; orange quinces. G. Barker, of Marblehead, Hooper's Bilboa pears. W. F. Gardner, pears—Rousselet de Rheims, Bezi Montigny, Gore's Heathcot, Messire Jean, Johannot, Bartlett; seedling peaches. Daniel Adams, 3d, of Newbury, Nonsuch apples; St. Michael, Capiaumont, Bartlett, and seedling pears; Adams's seedling peaches. J. Upton, apples—Cathead, Fall Harvey, Pomme de Pasteara; pears—Messire Jean, Urbaniste, Josephine, &c.; orange and pear quinces. W. P. Richardson, Ribstone pippin apples; Washington, Easter Beurré, Rousselet de Rheims, Gansel's Bergamot, and Seckel pears; orange quinces. W. Stearns, apples—Siberian crab, Drap d'Or, Baldwin, Hodge's early red Juneating, Rhode Island greening, Kilham Hill, Bloodgood's sweet, Monstrous pippin, Jarvis; pears—winter Nelis, orange, Bishop's Thunb, Easter Beurré, Chaumontelle, Rousselet de Rheims, Summer Thorn, Napoleon, Chelmsford, St. Germain, St. Michael, Franc Real d'Ete, brown Beurré, Endicott, Josephine, Seckel, Bartlett, Ronville; orange quinces; Isabella and native grapes.

From J. C. Lee, apples—Baldwin, Kilham Hill, Wormsley pippin, Glory of the West, &c.; pears—brown Beurré, Henry IV., Beurré Bronze, Dix, Josephine, Chaumontelle, Bezi Vaet, St. Michael, Johannot, Bon Chrétien, Fondante de Vilmorin, Napoleon, Seckel, Passe Colmar, Fulton, Delices, Hardenpont, Harvard, Easter Beurré, Urbaniste, Winter Nelis, Rousselet de Rheims, Parkinson's Warden, Lewis, Bleeker's Meadow, Glout Morceau, Gilogil, Gore's Heathcot, Winter orange, Lodge, Bonne Louise d'Avranche, long green, Buffum, Messire Jean, Duchess d'Angouleme; grapes—black Hamburg, sweetwater, variegated Chasselas, rose Chasselas; Mountain Sprout water-melons; Defiance, pine-apple, and common green musk-melons; clingstone peaches. N. B. Mansfield, apples—Marquis, Rhode Island pippin, Tolman's sweet, Cloth of Gold, red Calville, Danvers winter sweet, golden russet, Basketfull; pears, Belle et Bonne, Buffum, Sugar, Seckel, Gore's Heathcot, Chelmsford, Wilkinson, Surpasse Virgoulose, Beurré Diel, Cushing, Messire Jean, brown Beurré, Pope's Quaker, Raymond, and Queen of the Low Countries; peaches—Morris's white, yellow Melacaton, Williamson's Diana, Howes, Lafayette clingstone. A. L. Pierson, St. Ghislain pears; seedling peaches. Mrs. S. C. Phillips, Harvard pears, &c.

From R. Manning, apples—fall Harvey, Ribstone pippin, Snow, Sam. Young, Murphy, Cambuthnethan; pears—Cabot, Queen of the Low Countries, Capiaumont, Duchess d'Angouleme, Belle et Bonne, Roi de Wurtemberg, Belle of Flanders, Beurré d'Amanlis, Jalousie, Pope's russet, King Edward, Washington, Bezi de la Motte, Beurré Bronze, Beurré Van Mons, Beurré Bosc, Alpha, golden Beurré, long green, Monsieur le Curé, French autumn Bergamot, Bartlett (second crop); peaches—Cole's early, Cutter's yellow rareripe, Jersey rareripe, golden rareripe, Heath, yellow-rareripe, New York rareripe, Nivette, Robinson Crusoe, Bonaparte; plums—Coe's Golden Drop, Field Marshal, Styrian. Mercy Upton, Orange pears.

From J. M. Ives, apples—Swaar, Brownite, Diana, Michael Hen-

ry pippin, Reinette of Canada, Rambo, Cann, Danvers winter sweet, golden Reinette, Superb sweet, Killham Hill, Melacarla, Piper, Hubbardston Nonsuch, Boxford Stump, Carthouse, Catline, Quince; pears—Princess of Orange, Hunt's winter, Wilkinson, Napoleon, Josephine, Cumberland, Bleeker's Meadow, Beurré Bosc, Roi de Wurtemberg, Capiaumont, long green, green sugar, Bartlett, brown Beurré, Michaux, Brugnansbirne, Columbian. Virgoulouse, Beurré Romain, Buffum, Harvard, Bezi Montigny, Belle Lucrative, Gilogil, Fulton, St. Michael, Duchesse d'Angouleme, Bergamot du Pacques, autumn Bergamot, Burgomestre (?), Olive, Easter Beurré, Andrews, winter Nelis, Passe Colmar, d'Avranches; peaches—Washington, Noblesse, yellow Melacaton, seedling, Jacques's yellow, Beauty of Vitry, red and yellow rareripe; plums—Roe's yellow gage, blue Imperatrice, Coe's Golden Drop, Coe's late red, Frost gage.

From J. S. Cabot, pears—Duchesse d'Angouleme, Fig Extra of Van Mons, Coffin's Virgoulouse, Capiaumont, Lewis, Seckel, Cumberland, Princess of Orange, brown Beurré, Chaumontelle, winter Nelis, Washington, Maria Louise Nova, Surpasse Virgoulouse, Andrews, St. Ghislain, golden Beurré, Belle et Bonne, Gendesim, Bartlett, Alpha, Beurré Bronze, Roi de Wurtemberg, Jalousie, autumn Bergamot, Bon Chrétien Fondante, Belle Lucrative, Columbian, Passe Colmar, Surpasse St. Germain, Poire d'Amour, Hericart, Smith's Pennsylvania, long green, Napoleon, St. Michael, Muscadine, Bonne Louise d'Avranches, Wilkinson, Passans du Portugal, Urbaniste, Capsheaf, Pope's Quaker, Wilbur, Fulton, Cabot, Beurré Diel, seedling, &c. E. Emmerton, pears—Muscadine, Bonne Louise d'Avranches, Capsheaf, Glout Morceau, St. Michael, Duchesse d'Angouleme, Surpasse Virgoulouse, Prince's St. Germain, Maria Louise, golden Beurré, Beurré Diel, Bishop's Thumb, Napoleon, Henry IV., Broca's Bergamot, Urbaniste, Seckel, Princess of Orange, Washington, Roi de Wurtemberg; also, Baldwin apples, Orange quinces, and blue Imperatrice plums.

From N. L. Rogers, Killham Hill apples; Bartlett, and Broca's Bergamot pears; and Orange quinces. Wm. Osborn, of Lynn, Bartlett pears, and several varieties peaches. J. Winchester, pear quinces. B. H. Silsbee, Bishop's Thumb, brown Beurré, Messire Jean, Harvard, and Rousselet de Rheims pears. A. Thorndike, of Beverly, brown Beurré, and St. Michael pears. Andrew Nichols, of Danvers, fall Harvey, and Danvers sweet apples; Oshorn's seedling pears; seedling peaches, and native grapes. J. B. Osgood, Osgood's favorite apples; Bartlett, Seckel, Napoleon, and Wilkinson pears. Mrs. H. M. Johnson, seedling peaches. A. Kimball, orange quinces. S. Cook, Osgood's favorite, and Roxbury russet (growth of 1841,) apples; St. Ghislain, and Poire d'Amour pears. J. Bufington, seedling peaches. W. Dean, Andrews, Urbaniste, Seckel, Orange, and Bartlett pears; white and black Hamburg grapes. J. W. Rogers, Alexander apples; Fulton, Colville, Blanc, Harvard, Surpasse Virgoulouse, and long green pears. S. C. Phillips, pears—St. Michael, long green, Messire Jean, Broca's Bergamot, Andrews, brown Beurré, striped long green, &c.; also, peaches.

From D. W. Lincoln, of Worcester, apples. J. Bryant, of Beverly, seedling peaches. John Wilkins, Fall Harvey apples; St. Mi-

chael pears. Joel Bowker, Baldwin apples; Bartlett and Chelmsford pears; peaches; Isabella and sweetwater grapes. C. B. Lander, of Danvers, apples—Kilham Hill, and Eppes's sweeting; pears—brown Beurré, and Broca's Bergamot. W. D. Pickman, pears—Gore's Heathcot, Harvard, St. Michael, Andrews, Broca's Bergamot; orange quinces. M. Pitman, russet pearmain apples; St. Michael pears. Geo. Lee, of West Cambridge, Ribstone pippin apples; peaches. S. B. Ives, Baldwin and Gilliflower apples; long green, pound, Broca's Bergamot, and St. Michael pears. W. Ives, Ronville and Seckel pears; peaches. John Gardner, of Danvers, Roi de Wurtemberg pears. J. Farnum, St. Michael pears. John Pickering, pearmain apples. W. Sargent, Buffum pears. B. W. Stone, Stone's seedling pears. R. Wheatland, apples. Mrs. J. D. Treadwell, pear quinces; peaches. J. G. Sprague, Bartlett pears; orange quinces. James Barr, St. Michael pears. Joseph Dalton, native Isabella grapes.

From N. Silsbee, Jr., apples; pears—Napoleon, Josephine, Seckel, Capiaumont, Rousselet de Rheims, Heathcot, Easter Beurré, Bezi Montigny, Bartlett, Harvard, and bleeker's Meadow; grapes—white Chasselas, black Hamburg, and Zinfindal. B. P. Chamberlain, pears—Washington, Seckel, St. Michael, orange, Broca's Bergamot, and Bartlett. J. B. Goodhue, apples—Baldwin, Roxbury russet, Minister, golden russet, Eppes's sweeting, Kilham Hill, and New York greening. E. Buswell, Ribstone pippin apples. J. Bertram, Rousselet de Rheims and Glout Morceau pears. E. Burley, of Beverly, Bartlett pears; early red rareripe, President, and Royal George peaches. W. Hunt, Bartlett pears. Daniel Millet, Glory apples. C. Hoffman, St. Michael and St. Ghislain pears; black Hamburg grapes. G. Masury, of Beverly, orange quinces, first and second crop. J. A. Goldthwaite, rock cantaloupe melons. R. S. Rogers, Bartlett pears; black Hamburg, Tokay, and Chasselas grapes. D. Harris, apples. Edward Putnam, Bartlett pears. A. Lackey, Isabella grapes. J. W. Shannon, Lafayette peaches. J. F. Allen, pears—Bartlett, Bonne Louise de Jersey, St. Michael, Broca's Bergamot, Seckel; peaches—seedling clingstone, Noblesse, Royal George clingstone; grapes—Black Hamburg, Black Prince, sweetwater, Muscat of Alexandria, nectarine, golden; also, figs.

Vegetables:—From J. A. Goldthwaite, white sugar beets; Canada crookneck squash. C. B. Lander, of Danvers, white sugar beets. J. C. Lee, pumpkins; Harrison squash; sugar beets; carrots; tomatoes. C. F. Putnam, Harrison squash; sugar beets; Silesian and orange carrots. T. Cruickshank, Chenango potatoes.

The hall adjoining, which contains the Society's collection of Natural History, was also opened: here many visitors were seen to pause for a while, to behold the varied forms of animated nature. A living specimen of the *Chelonia imbricata* (shell tortoise of commerce,) attracted considerable notice. It was brought into this port from the Feejee Islands, and was swimming about in a large tub, nearly filled with sea water, its native element; also, several living specimens of a curious and interesting species of toad (*Scaphiopus solitarius*.) A location for the habitat of this species has recently been discovered in Danvers: its habits are subterraneous; it digs for

itself caverns in the earth, where it hibernates during the winter season, and resides during the day in the mild weather of summer, only leaving its retreat by night, in search of food.

This is the closing exhibition this season, and again we take admonition from surrounding nature, to withdraw ourselves into winter quarters; where, after a period of rest, we trust that, at the approach of the ensuing spring, to break the chrysalis state, and again emerge into life, with increased and renewed efforts to sustain the cause of horticulture, and to diffuse more widely the taste for the cultivation of the treasures of Flora and Pomona.—*W.*, Salem, Nov., 1842.

MIDDLESEX COUNTY HORTICULTURAL SOCIETY.—This Society held its annual exhibition at the Mechanics' Hall in Lowell, on Wednesday, the 21st October. The following report we condense from the *Lowell Courier*:—

The Exhibition opened on Wednesday, and continued until Thursday evening, when it concluded with a delightful social party, consisting of ladies and gentlemen of this city, and also friends from the neighboring towns. We visited the Hall on Wednesday, when every thing was in its place for exhibition. The first object which met the eye on entering, was the table in the centre, on which was placed a rare and beautiful datura, which bears a large and delicate flower, and emits a very pleasing odor. This is the property of Mr. Nath'l Wright, Jr. The table was of a cone-like form, and around it were placed a great variety of splendid dahlias, contributed by Mr. Gardner Parker of Billerica, A. Hackett, N. Wright, Jr., J. B. Francis, E. Sheldon, P. W. Warren, C. M. Marvell, Mr. Rolfe, Tilton Clark, and P. P. Spalding, of this city. Large and beautiful bouquets were also tastefully arranged.—They were contributed by Mr. Kenrick of Newton, A. H. Hovey, Cambridgeport, George D. Hodges, Mrs C. M. Marvell, Tilton Clark, Asa Clements, Mr. Parker of Billerica, and the Messrs Winships of Brighton. There were several other plants with long hard names, which we do not find it convenient just now to remember. The egg plant was a curiosity. It was the best imitation of an egg we have ever seen. The following schedule of fruits was noted down on Wednesday:—

By P. P. Coburn of Dracut, nine varieties of peaches, twelve varieties of apples, native grapes and pears. This was the first table on entering the Hall, at the right hand, and its fine exhibition of fruits attracted much attention. By Amos Carleton of Chelmsford, native grapes, highly cultivated; Spanish watermelons, a fine high colored variety; muskmelons; six varieties of pears, among which were the "Bartlett," from a scion of one year's growth; and nine handsome varieties of apples, among which were two very handsome specimens of russets. This also was one of the best tables. By Asa Clement, Jr., of Dracut, the native grape, Pine Apple melon, and several fine specimens of apples. Mr. Parker of Billerica, exhibited his usual well loaded table of fruit, consisting of very fine apples, large and handsome pears, Isabella and native grapes, and quinces of remarkable size. The Society is always obliged to this gentleman for his essential aid in their exhibitions, and not less so this year than usual.

By Stephen Carleton, of Lowell, the Royal Blush and Royal seedling peaches, very large and handsome. Fine peaches were also exhibited by our townsmen, Charles C. Nichols, from his own garden, the largest measuring nine and a half inches in circumference; and also large and fine clingstone peaches, raised by Robert Bradford, from a tree set out last year in the small yard in the rear of his shop on Merrimack street. Also, seedling peaches, four years old from the stone, by Master George W. Carleton. Peaches by James B. Francis. Grapes, by Joshua Merrill. Pears and crab apples, by G. A. Hodges. Peaches, by Benjamin Cutter, of Pelham. Very fair and handsome apples and plums, by John Avery. Plums, by Miss J. Wright. By Daniel P. Coburn, of Tyngsboro', large water-melons and apples. The most attractive part of the exhibition, so far as the fruit is concerned, is acknowledged to have been the very rich show of peaches, raised by Mr. Benj. F. Hodges, on his farm in Chelmsford. There were but three varieties, the orange clingstone, a large red rareripe, and the golden rareripe. But the beautiful color and form, and the uniform large size of these specimens exceeded any thing of the kind we have had the good fortune to witness. There can have been no doubt in the minds of the committee, as to whom the peach premium should be awarded, notwithstanding the formidable competitor.

By Dr. Bartlett, of Chelmsford, six specimens of apples. By Noah Spaulding, of Chelmsford, three varieties of handsome apples. By P. P. Spaulding, of Chelmsford, peaches, apples, and very fine pears, especially the Bartlett, which appeared to excel all others exhibited. By John P. Cutter, of Dracut, apples, water-melons, seedling peaches, and native grapes. Mr. Kenrick, of Newton, also favored the show by an exhibition of fourteen varieties of pears and several of apples; and we should by no means forget in our enumeration the beautiful foreign grapes, of which there were exhibited no less than thirteen varieties, from the green-house of our worthy Mayor, Nathaniel Wright, Esq.

In the evening a party of ladies and gentlemen sat down to an entertainment, and passed a social hour; songs were sung and sentiments were offered, and the company separated, delighted with the exhibition, and the occasion which had been the source of much pleasure.

WORCESTER COUNTY HORTICULTURAL SOCIETY.—This Society held its third annual exhibition in Worcester, on Wednesday, October 11, 1842.

From the reports of this exhibition, as given by the several committees, it appears that there was a fine display of fruits, especially of apples; but of flowers, owing to the lateness of the season, there were but a few exhibited.

The Committee remark that "it is in the exhibition of apples, mainly, that Worcester County can, at present, modestly challenge competition with her sisters. She may be equal to them in the cultivation of other fruits, as *open standards*; she can hardly imitate the cities and their suburbs in the growth of fruit *sheltered by art*; but regarding the substantial excellencies of the most generally useful fruit of New England, she stands *upon her own ground*. Of this, no one who visited the Hall, could doubt.

"It may be questionable, whether future exhibitions should not be held earlier in the season. But the lateness of the period, this year, has been attended with the advantage of bringing out our resources in the desideratum of good late seedling peaches, more fully than could otherwise have been done."

Fruits:—There were from Walter Bigelow, Jr., of Worcester, fine apples—Pomme Water, and Gilliflower. Col. P. Merrick's apples, in beauty, soundness, and size, were hardly excelled. Some of the names do not appear upon the book of entries, but among them were Roxbury russets, Rhode Island greenings, Nonsuch, and golden russets. His peaches were of superior beauty, but the Committee only feasted the sense of sight. From Col. Cushing, of Lunenburg, good specimens of Gloria Mundi, Baldwin, and nameless apples. From George Flagg, of Holden, good specimens of sour and sweet seedling apples. John Pratt exhibited good Roxbury russets, Baldwins, Rhode Island greenings; three varieties of fine peaches, one a clingstone; and some pears. From Clarendon Harris, excellent Sweetwater grapes, raised in the open air; Mr. Harris having only one competitor; also, two beautiful varieties of peaches; St. Michael, Bergamot, Passe Colmar, and Monsieur Jean pears; Lady apples, Lyscom, sweet russets, Baldwin, and Nonsuch. The President of the Society, Dr. John Green, brought specimens, such as St. Michael, Duchess d'Angouleme, Dix (fine examples,) Seckel, Passe Colmar, Bleeker's Meadow, and Burnet pears, a winter pear for baking, time-honored among the Doctor's ancestors, from whom it has probably been disseminated, commonly called the Iron pear of Worcester, being probably an English pear of the same name; and two nameless pears; also, clingstone, and yellow flesh violet peaches, (fine;) apples—Rhode Island greenings, Peck's pleasant, Roxbury russet, russet pearmain, Baldwin, beautiful Hamburgs, and a winter sweetening of high merit. John M. Earle, who has a taste for all material good things, brought Blood, late red rareripe, and late Melacaton peaches; seven varieties of late specimens of a white pear, Rushmore's Bon Chrétien, Duchess d'Angouleme, Louise Bonne de Jersey, Beurré d'Arenberg, two French pears, golden Beurré of Bilboa, minute pears named after Tom Thumb; Nonsuch, and Roxbury russet apples.

From Hon. Judge Barton, two baskets brown Beurré pears, remarkably large, sound, and fair, and unquestionably the finest specimens of this excellent fruit in the exhibition. B. F. Thomas, Esq., exhibited pears—Napoleon (fine specimens,) Easter Beurré, and two good looking varieties without names attached; also, Baldwin apples, and orange quinces. Abiel Jacques, Esq. produced a fine looking winter pear, of aristocratic origin, from an ancient tree upon the "Chandler farm," which is *not* the Iron pear of Worcester, though of equal size, and superior beauty; it was imported from England in a by-gone century: he also sent black pear of Worcester, beautiful Queening apples (rare and fine,) large Hubbardston Nonsuch, a nameless apple afterwards found to be the Pound sweetening, and the gray Reinette apple. Booth Bottomly, of Leicester, sent some pears, and two baskets of fine Isabella grapes. L. Brummett, of Leicester, exhibited handsome examples of Lady apples, and a fine looking

apple under the name of Hubbardston Nonsuch, of which the identity with that fruit was queried, but which appeared to deserve a name as good.

Our old friend George W. White, now laudably engaged in circulating and disseminating valuable fruits in the neighborhood of Lowell, did not forget to favor us with his representation of Sudbury sweetings, Hubbardston Nonsuch, Gardner sweeting, and golden russet. A welcome and honored curiosity was brought by Abner Harlow, of Shrewsbury, which he called the Peregrine White apple; it being the product of a tree planted by the first man born in New England. William B. Fox, Esq., sent Brewster apples, (sweet and described as valuable,) orange quinces and good late white peaches. From Col. Isaac Davis were some valuable late peaches. From G. W. Rugg, R. I. greenings, and two varieties of apples unknown. From Loring Young, of Leicester, Harvey apples, and very large native grapes, from a vine found in the forest and subjected to cultivation; the fine quality of the fruit makes it worthy of propagation. From Francis T. Merrick, fine pippins. From Elbridge G. Daniels, of South Mendon, very large cranberries. From Waldo Flint, Esq., of Leicester, baking pears. From Elizabeth Jackson, of Leicester, an unknown variety of pears. From Dr. Edward Flint, of Leicester, Rhode Island greenings. Calvin W. Furbush, Esq., of Grafton, sent from his excellent orchard a fine seedling apple, the scions obtained from a tree found in the woods, rare Dutch codlins, Pound sweetings, Rhode Island greenings. Anthony Chase, three plates of late freestone peaches, winter sweetings. From Mr. Weiss, a nameless white sweet apple, of extraordinary size and fairness, described by him as of merit. By J. R. Peirce, excellent Seckel and St. Michael pears.

By John F. Clark, fine Rhode Island greenings, black Gilliflower, Baldwin, Boxford, Nonsuch, Pumpkin sweeting, Soden sweeting, russet sweeting, John Quinn, Gardner sweeting, red sweeting, and two nameless apples. Wm. N. Greene, Esq. sent Gros Rateau Gris or French Iron pear, common Iron pear, Passe Colmar, winter Warden, Louise Bonne de Jersey, Easter Beurré, Glout Morceau, St. Ghislain, Wurtemberg, Seckel, Doyenne Gris, Napoleon, one seedling, and two unknown; also, Swaar, golden pippin, French pippin, and very fair Worcester sweet russet apples; apple and pear quinces. From Charles P. Chapin, a beautiful dish of clingstone peaches, and some sweet russet apples. From Jonathan Nichols, of Shrewsbury, fine orange sweeting, Porter, and Baldwin apples. Asa T. Johnson's large and beautiful late Crawford Melacaton, and orange freestone peaches, and Seckel pears, were objects of admiring gaze; he also exhibited Easter Beurré, Prince's St. Germain, and a nameless pear; Pommewater, winter sweeting, Harvest, green russet, Marlboro', Nonsuch, Walker, and sweet greening apples. Silas Allen, of Shrewsbury, produced clingstone rareripes (very large and beautiful,) and clingstone Blood peaches, equally remarkable; Seckel, St. Michael, and Woodbury pears; monstrous orange quinces; blue pearmain, Detroit, Friar or Balk apple, red pearmain, golden russet, russet sweeting, Roxbury russet, Baldwin, Spice apple, greenings, Hapgood, and Porter apples. Gen.

Thomas Chamberlain sent Nonsuch, Baldwin, La Fayette's favorite, russet pearmain, and greening apples.

From Stephen Salisbury, Esq., clingstone peaches; a nameless pear; Roxbury russet, Baldwin, Nonsuch, greenings, and a nameless apple; also, a beautiful kind of small yellow gourd, which looked so much like pears as justly to maintain a place among the plates of that fruit. From N. C. Moore, sweet russets, fine Lyscom apples, Marlboro', beautiful quince apple, Rhode Island greening, Roxbury russet, and Nonsuch apples. From Capt. Southgate, of Leicester, Roxbury russet apples, growth of 1841, in good preservation; and excellent brown Beurré pears. From Taft Foster, good Isabella grapes; sweet russet, Rhode Island greening and Roxbury russet apples, and a large pippin and mammoth apple, both from Albany. From John D. Goddard, of Shrewsbury, Isabella grapes; fine late rareripe peaches; a large cluster of orange quinces, and some apple quinces. From Col. Nymphias Pratt, of Shrewsbury, greening, nameless sweeting, Nonpareil, Baldwin, and Roxbury russet apples. From Nathan Howe, of Shrewsbury, a fruit called Conie's apple. Asaph Andrews, of the same excellent fruit growing town, exhibited a Josephine pear, which it was gratifying to find, as it is one of the new Flemish pears, valuable for winter eating. The orchard and garden of Henry Snow, Esq., of Shrewsbury, who pays much and well rewarded attention to the production of fruits, sent fine examples of orange quince; very large red cheeked Melacaton peaches; Lyscom, pearmain, Nonpareil, spice, Pomme water, Baldwin, and Nonsuch apples. Daniel Tenney, Esq., of Sutton, exhibited fine Harvey apples, a fine looking russet without a name, but which appeared to be the same with the nameless apple of Hon. Daniel Waldo, though considered by Major Tenney a seedling; also, another unnamed apple. Shrewsbury again appeared by Charles E. Miles, and brought in large orange quinces; Rhode Island greening, spice (entered as Lyscom,) Hapgood, and Baldwin apples. By Ephraim Hapgood, Hapgood, Lyscom, and Baldwin apples.

Cyrus Daniels, of Leicester, sent some quinces; if the season has not been favorable for the abundant production of this fruit, it certainly has matured wonderful specimens, and among those found on the Society's tables, were some of every known variety, and probably never surpassed in size and beauty. From Horatio Slocumb, of Sutton, seven plates of apples, all of merit; Roxbury russets raised in 1841, with a fresh and sound look, Porter, pearmain, Roxbury russet, black Gilliflower, Rhode Island greenings, and Baldwins. Paine Aldrich, Esq. exhibited two plates of splendid apples, fresh from the banks of Niagara river, Upper Canada, just above the Falls; their beauty was not impaired by the long journey they had made, and they were fresh as if still washed by the spray of the tumbling floods; one of the apples was identified as the Fameuse or Canada Snow, originally a seedling of that Province, and of which those who read the description in Kenrick's *Orchardist*, will wish to know more. S. M. Burnside, Esq. sent plates of very large greening apples. A good looking seedling apple, by Silas Flagg. From William Barbour, some handsome native fruit, sweeting, and Pomme water apples.

From Noah Allen, of Shrewsbury, were some sweet greenings, Friar or Balk apple, spice apple; and, in dimensions the lion of the exhibition, in the form of a pear, the first and only product of a tree, weighing forty-two ounces good by the scales, measuring $20\frac{1}{2}$ inches round, and whose longest circumference, excluding the stem, was $27\frac{1}{2}$ inches; whether this fruit has particular merits the committee were not informed, but it had the appearance of a respectable baking pear, (Catillac.) John H. Richardson, Esq., of Watertown, sent fine Roxbury russets, and a Bond apple. From Oliver Green, Crow's Egg, red Gilliflower, and two seedling apples. Col. Asa H. Waters, of Millbury, from his excellent fruitery, contributed large clusters of black Hamburg and Sweetwater grapes, whose elegant festoons, suspended in the hall, were sore temptations, and not sour in any respect, save that they could not be reached; Col. Waters also sent a pomegranate. From John McLellan, Esq., of Woodstock, Ct., were sound russets, the product of 1841. The fruit of Oliver Johnson, of Sterling, was equal to any in the Hall, and the specimens all in remarkably good condition; he produced Seckel pears, St. Michael, and a variety which he entered as unknown, but which is proved to be the Princess of Orange; also, Morse's sweeting apple, Porter, Nonsuch, striped, Father sweeting, russet pearmain, and another sweeting.

Edmund F. Dixie, whose skill is adequate to the production of almost all good fruits, and whose contribution of valuable services and fruits, at former exhibitions, has been so essential to the success of an infant society, was determined on this occasion not to be outdone by his anterior self. He exhibited apples—Iron, fall orange, brown Beurré, St. Michael, Passe Colmar, Pound Pear, Winter orange, Easter Beurré, and three nameless; also, red clingstone peaches, and two varieties of white ditto; Lyscom apples, and some curious looking Pine potatoes, which were christened "Rohan turtles." Thomas H. Kinnicutt was an exhibitor of some good specimens of Bellflower apples, Rhode Island greenings, and russets. Dr. William Workman's Isabella grapes were of high excellence, the bloom scarcely nipped; he also exhibited some well looking late peaches, greenings, blue pearmain, beautiful examples of Bellflower apples, and Roxbury russets. Charles Paine sent good specimens of Hamburg pippins and Nonsuch apples, and a fine looking apple without a name, of which the scion was obtained from Washington.

S. H. Colton exhibited Lemon clingstone, red-cheeked Melacaton, Burnett's seedling, Parie Admirable peaches; apples—greening's, Pommewater, Baldwin, blue pearmain, Tolman's sweet, Nonsuch, Peck's pleasant, Honey greenings; pears—Beurré, Capiaumont, Buffum (fine,) Seckel (large specimens,) Frederic of Wurtemberg, St. Michael, brown Beurré, Easter Beurré, Beurré Fortune, Passe Colmar; also, the Japan quince, being sound and well matured fruit of the beautiful and favorite flowering shrub, *Pyrus japonica*. This, as a curiosity, is worthy of notice, and, so far as the committee are acquainted, is the first mature product of our vicinity. Ichabod Washburn, Esq. brought two large baskets of Isabella grapes, well ripened and of excellent flavor, and Passe Colmar, Buffum, and Bleeker's Meadow pears; also, fine Portugal quinces, Pear quince, and an ap-

ple named Autumn sweeting. Samuel Perry exhibited Winter russet sweetings. It was matter of surprise that this fine variety has been so little disseminated. No particular name appears to be claimed for it. Dr. B. F. Heywood's Isabella grapes were not distanced by those previously mentioned; his two varieties of seedling apples were worthy of names. He also exhibited Lyscom apples, Peck's pleasants, and a basket of Burgundy pears, (being the only contributor of this variety,) whose tempting richness of color was found to be equalled by the fine quality of the fruit. Mrs. Conant, of Sterling, sent a dish of fine autumn dessert apples, which were identified as the "Connecticut River Seek-no-further," and were the only examples of that variety in the Hall. From Alfred D. Foster, Esq. were remarkably good blue pears, autumn Bergamot, and a pear recorded nameless, but identified by a cultivator as the Tillington.

Dr. John Park contributed some fine seedling peaches, named, from their texture and color, "Alabaster clingstone;" a splendid dish of Porter apples attracting all eyes, Baldwins, and Golden russets. Fine varieties of apples were sent by Isaac Flagg, Esq., viz: Golden russet, Hubbardston Nonsuch, Gloria Mundi, black Gilliflower, Rhode Island greenings, Porter, russet pearmain, Spitzemberg Bellden, some nameless, and a remarkable cluster of Baldwins. Maj. S. Burt's fruit is a subject of commendation for its excellence; the varieties were blue pearmain, Leicester winter sweetings (a rare and valuable fruit;) brown Beurré, St. Michael and Seckel pears. Henry K. Newcomb, sent good brown Beurré, and Dix pears, and two varieties without names. D. W. Lincoln produced superior Napoleon pears, Duchess d'Angouleme, Iron, St. Germain, Seckel, Easter Beurré, Passe Colmar, large specimens of brown Beurré, Colmar Sovereign, and two nameless; apples—Rhode Island greenings, Roxbury russets, sweet russets, russet pearmain, blue pearmain, Gloria Mundi, Baldwin, Tolman sweetings, Spice apples, Bellflower, Sleepy russet, Sweet greening. From Dr. O. H. Blood, there was a basket of pears without a name, but they were ascertained to be the St. Germain.

Rev. Joseph Allen, of Northborough, contributed pumpkin sweetings, and large and very beautiful specimens of Lyscom and Porter apples. From George T. Rice, good brown Beurré and Easter Beurré pears. From David T. Brigham, Esq., a large and fine looking apple, from St. Louis, which it is proposed to call the Great Western. From Col. Warner Hinds, Orange quinces of extraordinary size and beauty. From Elisha Harkness, good specimens of Golden russets, Roxbury, Baldwin, Rhode Island greenings, russet pearmain, Nonsuch, russet sweetings, pumpkin ditto, and fine Isabella grapes. From Hon. Daniel Waldo, Nonsuch, Rhode Island greenings, and a fine looking russet apple, supposed by the exhibitor to be a seedling, and some beautiful quinces. From Dr. H. G. Davis, large, choice, and beautiful apples, from Rochester, N. Y.; Long John, Michigan pippin, two nameless, and twenty ounce apple, which seemed appropriately named, was much admired, and of which Dr. Davis expects to be furnished with some scions in the spring, for distribution. Dr. Davis also brought pearmain, Lyscom,

sweet russet, Baldwin, russet pearmain, and Wine apples. F. W. Paine, Esq. contributed a fine seedling apple, good specimens of Iron pear, brown Beurré, and two nameless pears. From Levi A. Dowley, Five-quartered Gilliflower, ribbed, having five external divisions, not a handsome, but reputed a very valuable fruit. From Gardner Paine, Fall russet. From Harvey Bancroft, of Leicester, Rhode Island greening, Winter greening, and Roxbury russet. Edward Earle exhibited three varieties of late peaches, Iron pear, St. Michael (superior,) Gloria Mundi, July sweeting (an apple reputed of much merit, ripening early, and continuing long in eating,) Sweet pearmain, Rhode Island greening, Tolman sweeting, russet pearmain, Baldwin, Pommewater, Ribstone pippin, Nonsuch, Peck's pleasant, Roxbury russet, Early sweeting, and a nameless apple.

William H. Weaver generously bore to us fine examples from orchards in the Granite State; long fall russets, Clyde, and an imported fruit, sometimes not poetically called Big Gal apple, but of surpassing beauty, and thought by some visitors to outshine all other apples in the hall. Its merits were reported as accordant with its exterior. It is expected that a few scions will be brought into the county in the spring. These fruits were raised by Mr. J. H. Sparhawk, of Walpole. There were also fine Lyscom apples, Hubbardston pippins, and Golden sweetings, raised by Mr. Fish, of Gilsom.

Worcester county cultivators surely need feel no discouragement, if, in this generous competition, they were all distanced in the matter of pears, by the splendid array of those fruits, munificently contributed by five gentlemen of Salem, at the instance of F. W. Paine, Esq., of the committee of arrangements. Scarcely in any other district of the country could so fine a collection have been made. There were from E. Emmerton, Esq., fourteen varieties; from John C. Lee, Esq., thirteen varieties; from J. M. Ives, Esq., seven varieties; from J. S. Cabot, Esq., fifty-nine varieties of pears!

[As the varieties contributed by Messrs. Emmerton, Lee, Ives and Cabot were nearly the same as those exhibited by the same gentlemen at the exhibition of the Essex County Natural History Society, we have omitted the names.—*Ed.*]

Vegetables:—The Committee on Vegetables report, that the vegetable productions sent in for exhibition were all of very fine quality, and afforded good proof that the growing of such articles, as well as of fruits and flowers, is not retrograding; and the interest manifested by the numerous and delighted visitors, evinces an increasing and praiseworthy attention, on the part of this community, to the cultivation of vegetables, fruits and flowers. Charles Paine exhibited fine samples of the Early white, Pollard's seedling, Cowhorn, and Bartlett potatoes, the particular merits of which are unknown to the committee. Large and handsome specimens of the good old fashioned crookneck winter squash were sent in by Gov. Davis, D. S. Messinger, and S. H. Colton. Very large and fine marrow squashes, from Dr. Green and Anthony Chase; this is decidedly the best squash for autumn use known to the committee, but is reputed a poor bearer. S. H. Colton sent in good specimens of the Coconut squash—a variety not generally cultivated, but is an excellent sort for winter use. Dr. Smith exhibited two or three handsome squash-

es, of a new variety. A Seven years' pumpkin, from Elisha Harkness. But one solitary specimen of the common pumpkin was sent in for exhibition, and that was a good one by Hall Barton. Bela Carpenter, of Woodstock, Ct., exhibited a crookneck squash, raised in 1841, which appeared in good order, and looked as if it might be kept another year. From D. S. Messinger, two dishes of that excellent, and now very generally used article, the red and yellow tomato. Handsome silver skinned Chenango potatoes, from C. W. Rockwell, Esq., Norwich. Several varieties of field corn, (all of which was good,) from Levi A. Dowley, Hall Barton, and John Clapp. Egg plant and gourds, from Taft Foster. Fine specimens of the Sugar beet, mangel wurtzel, yellow carrot, silver skinned onion, early red onion, and Dutton corn, grown on the grounds of the State Lunatic Hospital. (*Worcester Spy.*)

HORTICULTURAL EXHIBITION OF THE NEW YORK STATE AGRICULTURAL SOCIETY.—This exhibition was held at Albany, in the last week in September, and from the reports of the judges awarding premiums, there appears to have been a fine display of flowers, fruits, &c. Owing to want of room, we are compelled to condense these reports as much as possible. The dahlias were cut off by the early frosts.

Flowers.—The second floral show of the Society was held on the 23th and 29th days of September, in the spacious building erected expressly for the exhibition of the products of the garden and the farm, on the Show ground.

The committee could scarcely have been furnished with a more suitable or better located building, to accommodate the immense multitude in constant attendance.

On entering the Hall, the rich groups of native and exotic plants, tastefully arranged and decorated, afforded a pleasing *coup d'œil*; an appropriate and beautiful garnish to the fruit and vegetable inmates of this vast arena.

Among the most striking of the green-house plants, were some fine specimens of *Acacia pubescens*, *A. decurrens*, *Aster argophyllus*, *Azalea lateritia*, *Mamillaria acanthrophlegma*, *Camellia japonica* var. *philadelphica*, *C. Bealii*, *Chorozema vègium*, *Chironia decussata*, *Citrus mèdica* six inches high, in fruit, *C. nobilis* or Mandarin orange, *Diósma rubra*, *D. ericoïdes*, *Erica polytrichifolia* from the green-house of Mr. L. Menard, who also contributed some thirty plants, of which we would notice *Mamillaria Chemáuzii*, *M. discolor*, *M. scôpa*, *M. cerifera*, *Echinocactus cornigera*, *E. glaucus*, *Cereus Déppii*, *C. Russellianus*, *Opuntia pulvinata*, *Calothamnus villôsa*, *Camellia japonica* var. *fimbriata*, *C. sombricata*, *C. nobilissima* *nôva*, *C. Albértus*, *Gladiolus ramôsus*, *Melaleuca fulgens*, *Metrosideros crassifolia*, *Polygala cordata*, *Buddlèa madagascariensis*, *Erythrina crista galli*, *Hoirzia coccinea*, *Æschynánthus grandiflora*, *Fuchsia corymbiflora*, *F. Youélli*, *F. globosa*, *F. grandiflora*, *F. Standishii*, *Calceolaria rugosa* var. *meteor*, *Manettia cordifolia*, *Heliotropium intermedium*, *Pinelèa decussata*. These, placed on the extensive central table, surrounded by numberless bouquets of choice cut flowers, redolent with the most pleasing odors, from the grounds of Messrs Jackson, Heartt, Downing, Van Rensselaer, Warren, Burden, Wilson, Buel, Thorburn, Walsh, &c.

The following are the awards of the committee:—

On the greatest quantity and variety of flowers:—1st. To L. Mer-
nard, Watervliet. 2d. To Prof. J. W. Jackson, Schenectady. 3d.
To A. P. Heartt, Troy.

For the best floral ornament:—1st. To Alexander Walsh, Lan-
singburgh. 2d. To S. E. Warren, Troy.

For the best twenty-five varieties of dahlias:—1st. To A. J. Down-
ing, Newburgh. 2d. To S. E. Warren, Troy. 3d. To Prof. J. W.
Jackson, Schenectady.

To E. Whitfield, Albany, for several beautiful floral paintings, in
water colors and pencillings—a discretionary premium.

George C. Thorburn, New York, contributed twenty-five varieties
of superb dahlias, too late to compete for premium.

E. Holbrook, Hyde Park, contributed some pretty seedling dah-
lias. Owing to an error in labelling, they were not inspected by the
committee.

All which is respectfully submitted.

Fruit.—Of apples, several fine collections were exhibited. A part
only were correctly and distinctly labelled; confusion and repetition
in names sometimes occurred, and in one instance, a fine and exten-
sive collection contained the same fruit under three distinct names.
The committee particularly observed the following:—

An extensive collection of apples, from Elwanger & Barry, nur-
serymen, Mt. Hope, near Rochester, containing some excellent and
desirable varieties; a large collection from Hall Colby, of Greece,
Monroe county, presented by M. B. Bateham, some of them fine and
but little known, of which the committee regret they are unable to
furnish a list; and a fine collection from Gen. R. Harmon, of Wheat-
land, Monroe county. There were also presented by A. P. Heartt,
of Troy, the following varieties:—fall pippin, Pound sweeting, Eso-
pus Spitzemburg, Rhode Island greening, King sweeting, American
golden pippin, Baldwin, sweet russet, Jersey sweet, Lady sweet, and
several others. By A. J. Downing & Co., Newburgh, the following
varieties:—Beauty of Kent, Blenheim pippin, Bedfordshire Found-
ling, Baldwin, Benoni, Cornish Aromatic, Canfield, De St. Julian,
Domine, Downton pippin, English golden pippin, English Nonpareil,
English russet, Federal pearmain, Flushing Spitzemburg, Grand
Sachem, Greenwich, Holland pippin, Kirk's Lord Nelson, Lemon
pippin, Lucombe's seedling, Porter, Roe's sweet, Ross's Nonpareil,
Ribstone pippin, red Bellflower, scarlet pearmain, summer sweet
Paradise, Schoonmaker, Watson's Dumpling, winter spice, Worms-
ley pippin, Wine, Royal Calville, yellow Bellflower, Zank, Adams's
pearmain, Williams's favorite, with several other well known and
excellent varieties. By Wm. P. Buel, Albany:—Duchess of Olden-
burg, striped pippin, Astrachan, Hoary Morning, Kerry pippin,
Pumpkin sweeting, Drap d'Or, fall pippin, Cheeseboro' russet, Ger-
man black, Harrison, black apple, Jonathan, Swan's Egg, Winesap,
golden pippin, Surprise, Newark pippin, Newtown pippin, Newtown
Spitzemburg, Esopus Spitzemburg, Baldwin, Downton pippin, and
many others. By E. Holbrook, Hyde Park, handsome seedling ap-
ples. Several varieties by B. Pollock, Watervliet. Very large spec-
imens of mammoth pippin, by Isaac Lovejoy, Greenbush. Several
varieties from A. T. Van Slyck, Coxsackie. Six varieties from Har-

mon Bussing; and a number of varieties from Peter G. Vandenburg, Watervliet.

Of pears, but a very few collections were offered. The best, decidedly, was an extensive one from A. J. Downing & Co., Newburgh, consisting of the following varieties:—Althorp Crassane, Belmont, Angleterre, brown Beurré, Beurré Easter, Beurré Rose, Belle et Bonne, Beurré Van Marum, Buffum, Bezi de la Motte, Bergamotte Suisse, Easter Bergamot, Bleeker's Meadow, Colmar d'Autonne, Crassane, Comte de Lamy, Fulton, Capiaumont, Frederic de Wurtemberg, Gilogil, Henry IV., Leon le Clerc, Louise Bonne, Passe Colmar, Princess of Orange, Swan's Egg, Seckel, Urbaniste, Virgoulouse, Wilkinson, winter Nelis, Beverly, Steven's winter, Flemish Beauty, Beurré Knox, Beurré Rans, &c. Wm. P. Buel, of Albany, presented specimens of Marie Louise, Bartlett, Virgoulouse, gray Doyenne, Gansel's Bergamot, Beurré Rans, and winter Nelis. A. P. Heartt, of Troy, fine specimens of Bartlett (or Williams's Bon Chrétien) and Virgoulouse. G. M. Stevens, of Albany, Bartlett and Bay pears. A. Ross, of Hudson, very fine specimens of Virgoulouse.

Only three collections of quinces were noticed by the committee—one from E. Holbrook, Hyde Park; one from A. Blake, Albany; and one from A. Ross, Hudson;—all of which were decidedly fine.

Very few peaches were presented, only one collection being large enough for the State premium, which, from the inferior quality of some, the committee did not feel authorized to award. They would, however, notice some unnamed specimens from A. P. Heartt, Troy; from S. Van Rensselaer, Albany; several single specimens from Elwanger & Barry, Rochester; and a very large and fine one of a new variety, which measured eleven and a quarter inches in circumference, from S. Comstock, Lansingburgh.

There were several fine specimens of plums—among which were, Coe's Golden Drop, yellow Egg, green Gage, St. Catharine and some others, from A. P. Heartt, Troy; yellow Egg, from J. McDonald McIntyre, and from A. Van Voast, Albany; and unnamed varieties from A. Ross, and — Benson, Hudson; and John Bull, New Lebanon.

Only one collection of native grapes appeared in quantities large enough for the premium, and only one of exotics. The committee, however, noticed four very fine specimens of unlabelled exotic grapes from S. Van Rensselaer, Albany; fine specimens of white Chasselas, Sweetwater, Isabella, and red Bland, from Elwanger & Barry, Rochester; and of Sweetwater and Spafford grapes, from A. Walsh, Lansingburgh.

The committee made the following awards:—

For the greatest collection of table apples, A. J. Downing & Co., Newburgh. For the second greatest collection of table apples, William P. Buel, Albany. For the third greatest collection of table apples, A. P. Heartt, Troy. For the best twelve sorts of table apples, A. J. Downing & Co., Newburgh.

For the greatest variety of table pears, A. J. Downing & Co., Newburgh. For the second greatest variety of table pears, William P. Buel, Albany. For the greatest variety of winter pears, A. J. Downing & Co., Newburgh.

For the best twelve quinces, E. Holbrook, Hyde Park.

For the best twenty-four plums, A. P. Heartt, Troy.

For the best six bunches native grapes, (Isabella,) Alexander Ross, Hudson. For the best six bunches of foreign grapes, (black Hamburg,) A. T. Van Slyck, Coxsackie.

The committee recommend a discretionary premium of a diploma, to S. Comstock, of Lansingburgh, for his fine seedling peach; and also a discretionary premium to S. Van Rensselaer, for his fine specimens of exotic grapes.

Vegetables:—The display of garden productions was very fine. The quantity, variety and excellence of the vegetables exhibited, reflected much credit on those who raised them, and afforded gratifying evidence of the onward progress of horticulture. Notwithstanding the very limited number and amount of the premiums offered on the occasion, the number of competitors was quite large, and the Society are much indebted to several gentlemen for their pains in sending articles a considerable distance, to enrich this department of the exhibition.

The following is the list of premiums awarded:—

For six best stalks celery, V. P. Douw, Albany, \$2. For two best heads brocoli, James Wilson, Albany, \$2. For twelve best carrots, William P. Buel, Albany, \$1. For twelve best beets, E. Holbrook, Hyde Park, \$1. For twelve best parsnips, J. B. Nott, Guilderland, \$1. For twelve best onions, J. H. Cole, Hudson, \$1. For three best cabbages, James Wilson, Albany, \$1. For twelve best tomatoes, Solomon Leonard, Albany, \$1. For two best egg plants, E. Holbrook, Hyde Park, \$1. For half peck Lima beans, E. Holbrook, Hyde Park, \$1. For the best bunch curled parsley, J. B. Hudson, Albany, \$1. Three best squashes, Dr. Wendell, Albany, \$1. Largest pumpkin, ninety-three pounds, E. Chesebro, Guilderland, \$1. Best twelve ears of seed corn, (Dutton,) J. Townsend, Albany, \$1. Best half peck of potatoes, Jesse Buel, Albany, \$2. Second best half peck of potatoes, D. Payne, Bethlehem, \$1. (*Cultivator*.)

FIFTEENTH ANNUAL FAIR OF THE AMERICAN INSTITUTE.—HORTICULTURAL EXHIBITION. The following are the reports of the committees awarding premiums:—

Flowers.—Isaac Buchanan, corner of Twenty-ninth Street and Third Avenue, for superior specimens of green and hot-house plants, together with a pyramid of dahlias—*Silver medal*. Samuel M. Cox, Bloomingdale Road, for superior varieties cut flowers from hot-house plants—*Downing's Rural Architecture*. Mrs. J. Brown, Brooklyn, for a beautiful bouquet, containing rare flowers—*Hovey's Magazine of Horticulture, Botany, &c.* Thomas Hogg, Jr., Twenty-third St., near Broadway, for superior bouquets of flowers—*American Flower Garden Directory*. Richard F. Carman, Fort Washington, N. Y., for superior bouquets of choice flowers—*Bridgeman's Gardener's Assistant*. Miss Maria A. Pitcher, Harlem, for superior bouquet of flowers in variety—*Bridgeman's Florist's Guide*. George C. Thorburn, 15 John Street, for a rich display of dahlias for two weeks, including an ornamental figure—*Silver Cup*. William Kent, Brooklyn, for superior specimens dahlias and other flowers—*Silver Medal*. Thomas Hogg, Twenty-Third St., near Broadway, for a rich display of dahlias for two weeks—*Silver medal*. John Briell, Jersey City,

(J. Ettringham, gardener,) for superior varieties of dahlias and other flowers—*Downing's Cottage Architecture*. D. Bolls, Bloomingdale, for superior varieties dahlias and other flowers—*Downing's Rural Architecture*. A. Bridgeman, corner of Eighteenth St. and Broadway, for superior varieties of dahlias, including an ornamental framework Fleur de Len—*Am. Flower Gard. Direct.* T. Dunlap, Niblo's Garden, for an ornamental Gothic temple, decorated with flowers—*Hovey's Mag. of Hort. &c.* D. & W. Phelan, corner of Stanton and Forsyth Str's., for superior varieties dahlias—*Buel's Farmer's Comp.* W. Russell, Brooklyn, for superior specimens American seedling dahlias—*Downing's Cot. Arch.* Moses Van Beuren, Brooklyn, for superior varieties of dahlias—*Bridg. Gard. Ass.* Wm. Reed, corner of Thirty-fourth st. and Third Avenue, for superior specimens dahlias—*Manning's Book of Fruits*. Henry Brown, Fifteenth St., near Fifth Avenue, for superior specimens flowers—*Bridg. Flor. Guide.* W. H. Aspinwall, Staten Island, J. Kelly, gardener, for superior specimens flowers—*Bridg. Flor. Guide.* T. Sprunt, Astoria, for a kite frame of dahlias—*Bridg. Flor. Guide.* H. Bruen, Perth Amboy, for superior specimens dahlias—*Bridg. Flor. Guide.* Geo. Nixon, Staten Island, for superior specimens dahlias—*Bridg. Flor. Guide.* T. Manning, Flushing, L. I., W. H. King, gardener, for two bouquets flowers—*Bridg. Flor. Guide.* T. Clemmins, gardener to Thomas Addis Emmett, Seventy-ninth St., for superior varieties dahlias and other flowers—*Bridg. Flor. Guide.* E. Eastmond, 93 Eleventh St., for two bouquets dahlias—*Bridg. Flor. Guide.* Miss Catharine C. Wakeman, Bergen, N. J., for a bouquet of dahlias—*Bridg. Flor. Guide.* Oscar V. Dayton, Forty-second St., for bouquet of flowers—*Bridg. Flor. Guide.* Grant Thorburn, Jr., 15 John St., for bouquet of flowers—*Bridg. Flor. Guide.* Ja's Le Roy, 41 Ann St., for superior varieties dahlias—*Bridg. Flor. Guide.* G. Johnson, N. York, for two bottles blackberry wine—*Flor. Guide.* W. Kent, Brooklyn, E. White, gardener, for regular supplies of dahlias—*Bridg. Gar. As.*

Fruit.—Wm. P. Buel, Albany, N. Y., for sixty-two varieties apples—*Silver medal.* Richard A. Cornwall, 49 Dey St., for superior specimens table apples—*Copy of Kenrick's American Orchardist.* Maurice Cunningham, gardener to Robert L. Pell, Pelham, Ulster Co., N. Y., for superior specimens winter apples—*Bridg. Gard. Ass't.* Peter A. Ross, 225 Thompson St., for superior specimens apples—*United States Farmer.* S. G. Carpenter, 479 Bowery, for superior specimens apples—*Cultivator.* Dr. R. T. Underhill, Croton Point, for superior specimens of pippin apples—*Bridg. Gard. Ass.* A. J. Downing & Co., for thirty varieties pears, and fifty of apples—*Silver medal.* J. P. Mantel, for sixty-two varieties pears, and ten of apples—*Silver medal.* Wm. Reed, corner of Thirty-fourth St. and Fourth Avenue, for superior specimens table and winter pears—*Ken. Am. Or.* W. Mosely, New Haven, Ct., for superior specimens winter pears—*Bridg. Gard. Ass.* Judge T. Dickerson, Patterson, N. J., for superior specimens of Seckel pears—*Ken. Am. Or.* Maurice Cunningham, gardener to Rt. L. Pell, Pelham, Ulster Co. N. Y., for superior specimens quinces—*Ken. Am. Or.* Dr. R. T. Underhill, Croton Point, for superior specimens of quinces—*Gray's Practical Agriculture.* Hon. Thomas H. Perkins, Boston, for eleven superb varieties foreign grapes—*Silver medal.* Dr. R. T. Underhill, Cro-

ton Point, for superior specimens of Isabella and Catawba grapes—*Johnson's Agricultural Chemistry*. Matthew Antanides, Brooklyn, for superior specimens Isabella grapes—*Gray's Pract. Ag.* John P. Haff, Fort Lee, N. J., for superior specimens of field grapes—*U. S. Farmer*. Edward Classen, 219 Delancey Street, for superior specimens of Sweetwater grapes—*Manning's Book of Fruits*. James W. Burtis, Brooklyn, L. I., for superior specimens of grapes—*Manning's Book of Fruits*. M. Floy, Harlem, for superior specimens of gooseberries—*Ken. Am. Or.* Barnum Blake, Franklin, Mass., for superior specimens of cultivated cranberries—*Am. Ag.*

Vegetables.—John Beekman, Sixty-first St. (S. Ruth, gardener,) for the best and greatest variety of culinary vegetables—*Silver medal*. J. Jonas, Hurlgate, for the best and greatest variety of vegetables, as a field crop—*Silver medal*. Richard F. Carinan, Fort Washington, N. Y., (J. Ronset, gardener,) for superior specimens sugar beets—*U. S. Farmer*. M. Hughes, Gowanus, L. I., for superior specimens mangel wurtzel—*Gray's Pract. Ag.* J. C. Thompson, Tompkinsville, Staten Island, for superior specimens of Cape brocoli, &c.—*Bridg. Gard. Ass.* Daniel C. Folk, Newtown, L. I., for superior specimens of drumhead cabbage—*Downing's Rural Architecture*. John E. Ross, 225 Thompson St., for superior specimens drumhead cabbage—*Diploma*. Samuel A. Willoughby, Brooklyn, (P. Patterson, gardener,) for superior specimens celery, &c.—*Johnson's Ag. Chem.* T. Clemmins, gardener to Thomas Addis Emmett, Seventy-ninth St., for superior specimens of egg plants, &c.—*Bridg. Gard. Ass.* Corporation Garden, Blackwell's Island, (James Wiggins, gardener,) for superior specimens white and silver skinned onions—*Buel's Far. Comp.* W. Van Wyck, Fishkill, N. Y., for superior red and silver skin onions—*Am. Ag.* J. Briell, Jersey City, (J. Ettringham, gardener,) for superior species and varieties culinary vegetables—*Gray's Pract. Ag.* S. B. Wakeman, Bergen, N. J., for superior specimens table potatoes—*Manning's Book of Fruits*. H. W. Tibbits, Yonkers, for superior specimens potatoes—*Johnson's Ag. Chem.* N. B. Smith, Woodbury, Ct., for superior specimens potatoes—*Cultivator*. W. J. Townsend, Astoria, L. I., for superior specimens potatoes and turnips—*Gray's Pract. Ag.* N. N. Wyckoff, Bushwick, L. I., for superior specimens of garden products—*Bridg. Gard. Ass.* N. Wyckoff, Bushwick, L. I., for superior specimens culinary vegetables—*Buel's Far. Comp.* E. Lord, Staten Island, (J. Boyce, gardener,) for superior specimens squashes and pumpkins—*Bridg. Gard. Ass.* A. Flock, 616 Broadway, for a superior pumpkin—*Am. Ag.* J. Foulk, Hurlgate, (S. Johnson, gardener,) for an extra large pumpkin—*Dana's Muck Manual*. H. Townsend, Hyde Park, for a superior pumpkin—*U. S. Farmer*. W. Hughes, Gowanus, L. I., for superior specimens cocoanut squashes, &c.—*Am. Ag.* W. Covert, L. I., for superior specimens of garden products—*U. S. Farmer*. E. S. Swords, Bloomingdale, for superior specimens of Smyrna squashes—*Johnson's Ag. Chem.* Maurice Cunningham, gardener to R. L. Pell, Pelham, Ulster Co., N. Y., for superior specimens culinary vegetables—*Dana's Muck Man.* J. P. Haff, Fort Lee, N. J., for numerous varieties garden products—*Am. Ag.* H. Delafield, W. Armstrong, gardener, for superior specimens culinary vegetables—*Bridg. Gard. Ass.* D. M. Demarest, N. J., for two Smyrna squashes, and a case of eggs—*Da-*

HORTICULTURAL MEMORANDA

FOR DECEMBER.

FRUIT DEPARTMENT.

Little can be done in this department at this season of the year; out-door work, of most all kinds, is brought to a close by the setting in of cold weather; and where there are vineries or hot-beds in operation, the active gardener will find sufficient to employ himself about.

Grape vines should now be put in preparation for next year's bearing. First, give the vines a proper pruning; second, let the wood be washed with a solution of lime, sulphur, and cow dung, or with whale oil soap. After this the branches may be tied together, and laid in lengthwise of the house, near the front of the glass, unless they are intended to break early, when they may remain up.

Raspberry bushes should be protected, if not already done.

Scions of fruit trees may be now cut for grafting in spring; place them in the cellar, with the lower ends in the earth.

FLOWER DEPARTMENT.

Camellias will now be swelling their buds rapidly, and will soon be in full bloom: see that they are properly watered: if the plants are dusty, let the foliage be washed with a sponge, and when done tie up the plants to small stakes, to give them a neat appearance. Seeds may be planted now. Cuttings put in in June may now be potted off.

Cactuses should be sparingly watered; grafting may be done now.

Roses taken from the ground, should now be pruned for flowering in March. Small plants may be shifted, and young cuttings potted off.

Calceolarias should be potted off now.

Chrysanthemums should have their tops cut off as soon as they have done flowering, and the pots placed in a frame for the winter.

Chinese primroses should now be repotted.

Geraniums, in small pots, may now be repotted.

Schizanthuses may be shifted now into larger sized pots.

Amaryllises may be potted this month.

Verbenas should be placed in a light, airy situation, and sparingly watered.

Hyacinths may yet be potted with success.

Cyclamens will now require more water, as the flower buds appear. Shift into larger pots, if they require it.

Azaleas should be sparingly watered this month. Cuttings put in in June, should now be potted off.

Oxalises should all be planted this month, if not yet done.

Heliotropes should be shifted into larger pots, if they require it.

Callas should now have liberal supplies of water.

Tree peonies may be brought into the house this month, for flowering in March.

Plants in frames should be aired in fine weather.

INDEX

TO

PLANTS ENUMERATED IN VOL. VIII.

In the body of the Magazine, a few errors occur in the spelling of the botanical names, the capitalizing of generic and specific names, their derivation and accentuation: these are all corrected in the following list of plants. The synonyms, in several instances, have also been given, where plants have been incorrectly indicated.

List of new and beautiful annuals . . . 142 List of new Pelargoniums . . . 274. 299. 309. 310. 344 List of Roses 341	List of new Dahlias 107. 265 List of the various species of <i>Oxalis</i> in cultivation 131
---	--

<i>Abies cephalonica</i> 190 <i>luscombeana</i> 190 <i>Menziësi</i> 190 <i>Smithii</i> 190 <i>Abutilon striatum</i> 373 <i>Acacia</i> , 8 sp. 191 <i>Cunninghamea</i> 191 <i>decurrens</i> 455 <i>Farnesiana</i> 420 <i>Julibrissin</i> 65 <i>pubescens</i> 465 <i>Acer discoloratum</i> 228 <i>Achillea plenifolia</i> 450 <i>Achillea coccinea</i> 141. 298 <i>longiflora</i> 141. 226. 297 <i>pedunculata</i> 298 <i>rosea</i> 141 <i>Acropora Loddigësi</i> 192 <i>Actea alba</i> 453 <i>Æschynanthus grandiflorus</i> 102 <i>aculeatus</i> 71. 347 <i>Ædonum cruciatum</i> 100 <i>Agapanthus umbellatus</i> 374 <i>Agave cœlestis</i> 272 <i>americana</i> 292. 334 <i>Agnostus sinuata</i> 193 <i>Ailanthus</i> 97 <i>Alyssum maritima</i> 232 <i>Aloe pentagona</i> 272 <i>verrucosa</i> 272 <i>Alôysia citriodora</i> 374 <i>Alstromëria Flos Martii</i> 275 <i>Pelegrina</i> 275 <i>tricolor</i> 446 <i>Amaryllis</i> 26. 94 <i>ambilis</i> 272 <i>Banksiana</i> 179 <i>Bellaïonna</i> 374. 410 <i>formosissima</i> 17. 102. 275 <i>grandiflora</i> var. <i>Banksiana</i> 179	<i>Amaryllis pratensis</i> 298 a syn. of <i>Habránthus pratensis</i> . <i>Anagallis Monelli</i> 348 <i>Andrómëda paniculata</i> 451 <i>Anemone pennsylvanica</i> 175 <i>rivularis</i> 175 <i>Antholyza æthiôpica</i> 25. 94 <i>Antirrhinum linaria</i> 448 <i>Arabis patens</i> 66 <i>Arabis spinosa</i> 191 <i>Araucaria braziliensis</i> 190. 431 <i>excelsa</i> 84. 453 <i>Ardisia crenulata</i> 374. 432 <i>solanacea</i> 431 <i>Arethusa bulbosa</i> 448 <i>Aristolochia ciliata</i> 347 <i>sipho</i> 274. 446 <i>trilobata</i> 308 <i>Arméria fasciculâris</i> 68 <i>Artocarpus integrifolius</i> 273 <i>Arum triphyllum</i> 453 <i>Asclëpias tuberosa</i> 450 <i>Aster argophyllus</i> 273. 465 <i>Astrantia major</i> 313 <i>Æcuba japonica</i> 191 <i>Azalea indica alba</i> 272 var. <i>Côpei</i> 41 <i>Daniëlsiana</i> 72. 175. 233. <i>Gledstanësi</i> 306 <i>Grëni</i> 305 <i>Gillinghâmi</i> 272 <i>lateritia</i> 72. 175. 233. 305. 465 <i>phœnicea</i> 72. 157 <i>alba</i> 275. 305 <i>purpurea</i> 273 <i>rûbro plëna</i> 272 <i>Smithii coccinea</i> 272 <i>speciosa</i> 72 <i>speciosissima</i> 72 <i>splëndens</i> 305	<i>Azalea</i> i. seedlings 272 <i>variegata</i> 72. 175. 272. 305 <i>ledifolia</i> 157 <i>nudiflorum coccineum</i> 227 <i>pontica</i> 190. 227 <i>tubescens major</i> 296 <i>sinënsis</i> 272. 296 <i>viscosa</i> 296. 449 hybrid <i>alta clërensë</i> 295 <i>Babiana</i> 94 <i>Babingtonia camphorosma</i> 176 <i>Bacckia</i> 176 <i>Bartonia aurea</i> 195. 450 <i>Basella tuberosa</i> 85 <i>Beaufortia decussata</i> 374 <i>Begonia discolor</i> 374 <i>Berberis</i> sp. 236. 293 <i>Betonica cœrulea</i> 447 <i>grandiflora</i> 449 <i>Bétula fasciniata</i> var. <i>péndula</i> 190 <i>Bignonia grandiflora</i> 371 <i>Bonapartea juncea</i> 43. 431 <i>Boronia triphylla</i> var. <i>latifolia</i> 99 <i>Bossia disticha</i> 98 <i>Brachycome iberidiflora</i> 15 <i>Brachyctenium virginianum</i> 449 <i>Brôwnea grandiceps</i> 67 <i>Brunsvigia Josephina</i> 86 <i>Bryophyllum calycinum</i> 53 <i>Buddlea madagascariënsis</i> 465 <i>Burchëlla capënsis</i> 190 <i>Cacti</i> 42 <i>Cactus speciosissimus</i> 447 see <i>Cereus</i> . <i>Calanthie fuscata</i> 192 <i>Calceolaria corymbosa</i> 447 <i>rugosa</i> var. <i>metëor</i> 465
---	---	---

Calliopsis tinctoria	232	Camellia Sasangua rosea	171	Clêthra arborea	295
Cállitris	190	a syn. of <i>C. maliflora</i> .		mexicana	295
Calothamnus villôsa	465	Campânula grâcilis	448	quercifolia	295
Camellia	13. 103	persicifolia	275. 448	trifolia	295
japonica	245	pyramidalis	374	Clîanthus carneus	98
j. âlba plêno	452	Cântua coronopifolia	448	panicus	98. 180. 194
j. Albértus	465	Cássia sp.	272	Clintônia pulchella	232
j. amabile	41	Casuarina	190	Cobea scandens	70. 181
j. aneioneiflora	191	Catalpa	97	stipularis	79
j. Bealii	465	cordifolia	449	Colea floribunda	70
j. Binneyi	7. 13. 42. 156	syringifolia	190	Collinsia bicolor	272
j. britannia	223	Catasetum bicornatum	192	grandiflora	233
j. caelestina	44. 72	luridum	192	tricolor	450
j. carnea	224	tricolor	192	Colutea frutescens	273
j. Chalmèrii	137. 156	Cavendishia	293	Combretum purpurum	84.
j. ——— perfecta	174	Cedrus Deodâra	190		178
j. Chândleri	104	péndula	190	Conostylis jancea	191
j. clâritas	72	intermedia	190	Convallaria racemosa	453
j. coccinea	223	Celastris scandens	24	Convolvulus minor	142
j. Colvillii	104	Celosiâ cristata	4 0	Corchorus japonica	236
j. corallina	104	Centauræa moschata alba	450	Coreopsis Drummondii	316
j. Covingtonii	123. 196	suaveolens	449	lanceolata	313
j. delicatissima	44. 72	Ceratonia siliqua	273	Cornus alba	447
j. Donckelaèrii	44. 72	Cereus cæruleus	225	florida	235
j. elata	44. 72. 196	cærulescens	225	paniculata	227
j. E'stherii	41	chilensis	433	Coronilla glauca	273
j. fimbriata	272. 465	Déppeii	465	Correa speciosa	191
j. Flôyi	152	flagelliformis	83. 272	Crinum amabile	22
j. Fôrdii	137	grandiflorus	225. 236	Crôton pictum	431
j. gardeniaeflora	72	Jenkinsonii	236. 309	Crysëis crocea	142
j. Gen. Nelson	123	Mallasoni	343	Cunninghamia excelsa	190
j. George Mason	123	multangularis	433	imbricata	190
j. Gilesii	72	Napoleonis	312	sinensis	190
j. Grunelli	72	peruvianus	433	Cuscuta americana	450
j. Gussonei	191	Russellianus	465	Cycas revoluta	374
j. Hempsteadii	7. 136.	senilis	42. 374. 433	Cynodes Loddigesii	192
j. Henri Favre	72	serpentinus	83	Cynoglossum anchusoides	
j. Hume's blush	173	speciosus	309. 343	glochidiatum	16
j. Judge Washington	123.	spectosissimus	188. 275.	Cyprinidium acutum	447
	196			barbatum	179
j. Juliana	44	triangularis	83. 312	insigne	179. 267
j. King	44	new varieties	293. 334	spectabilis	277. 313
j. Landrethi	136. 156. 196	Chamaerops humilis	190. 373	Cytisus Laburnum	446
j. Milleri	44	Chironia decussata	465	racemosus	181
j. Montgomery	224	Chionanthus virginica	227.	ramosus	272
j. Mrs. Gunnell	123		402	rhodaphne	272
j. Mrs. Madison	123	Chorozema cordatum	110	Dacrydium elatum	190
j. myrtifolia	136	varium	37. 272. 465	Dahlia repens	227. 255
j. nobilissima	44	Cineraria cruenta	272	Dammara australis	190. 194
j. ——— nova	465	Hendersoni	272	orientalis	190
j. ochroleuca	41	insignis	272	Delphinium Barlowii	316
j. Palmer's Perfection	44	King	272	Hulmi	448
j. Peter Francisco	123	lanata	272	Deutzia scabra	275
j. philadelphica	41. 465	versicolor	272	Dictamnus albus	275
j. Pierceii	174	Some of these are hybrids.		Dioclea glycinoides	192
j. ranunculiflora striata	72	Citrus medica	465	Diomsa alata	453
j. rosea plêno	191	nobilis	465	ericoides	273. 465
j. seneca	224	Clarkia elegans	142	rubra	465
j. Sherwoodii	72	rosea	233	Diospyrus lotus	191
j. spectabilis maculata	72	pulchella alba	235	Diplopæna Dampieri	100
j. tucolor	44	Clématis alpina	277	Dodecatheon Meadia	236
j. Triphosa	72	cærulea	308	integrifolia	236
j. Vauxii	41	integrifolia	447	Doryanthes excelsa	43. 292
j. Welbankiana	72	Sieboldii	308. 347. 449	Dracaena australis	191
j. Wilderi	7. 156. 423	viorna	313	Draco	432
j. var. not named	174	viticella	313	Dracocephalum attenuatum	
maliflora	42. 171	Cleome aurea	137		193
reticulata	192	lutea	137	canariense	272
Sasangua	42. 191	Clerodendrum flor. rub.		Ruysschianum	447
		simplici	191	Echeveria acutifolia	295
		splendens	178	gibbosa	155
		Clêthra oñifolia	450		

<i>Maclura aurántia</i>	83	<i>Nereum coronarium</i>	374	<i>Picea Webbiana</i>	190
new sp. or var.	83	<i>Nigella hispánica</i>	195	<i>Pimelea decussata</i>	465
<i>Magnolia acuminata</i>	191	<i>Niphe'a oblonga</i>	141	<i>hispidula</i>	67
<i>auriculata</i>	274	<i>Nymphaea cerulea</i>	447	<i>hypericifolia</i>	273
<i>conspicua</i>	84	<i>Oenothera Fraseri</i>	275. 313.	<i>spectabilis</i>	67
<i>cordifolia</i>	227			<i>Pinus altissima</i>	190
<i>glauca</i>	85. 227. 313	<i>fructifera</i>	447	<i>Banksiana</i>	190
var.	313	var. <i>judica</i>	13	<i>Coulteri</i>	190
<i>eximiothii</i>	341	<i>macrocarpa</i>	301	<i>Gerardiána</i>	190
<i>exoniensis præcox</i>	431	<i>Oncidium Bauèrii</i>	192	<i>halapensis</i>	190
<i>fuscata</i>	85	<i>Opuntia braziliensis</i>	83	<i>Lambertia</i>	190
<i>grandiflora</i>	173. 401	<i>cochinillifera</i>	433	<i>monticolor</i>	190
<i>exoniensis</i>	82	<i>lactea spina</i>	433	<i>spectabilis</i>	190
<i>macrophylla</i>	275. 332.	<i>microdysas</i>	433	<i>Pittosporum Tobira</i>	272
	401	<i>pulvinata</i>	452	<i>undulatum</i>	272
<i>purpurea</i>	235	<i>vulgaris</i>	83	<i>Placca ornata</i>	102
<i>Soulangéana</i>	191	<i>Orchis psychodes</i>	449	<i>Platanus occidentalis</i>	227
<i>tripetala</i>	191. 227	<i>Ori.ithogalum aureum</i>	272	<i>Plectranthus fructicosus</i>	273
<i>Mahérnia pinnata</i>	var.	<i>divaricatum</i>	299	<i>Plumbago rosea</i>	272
<i>coccinea</i>	233	<i>Orobánche uniflora</i>	447	<i>Podocarpus latifolius</i>	190
<i>Mahonia</i>	191	<i>Orobobus niger</i>	275	<i>longifolius</i>	190
<i>Máxiss paludosa</i>	23	<i>Oxalis Bowiei</i>	374	<i>nucifera</i>	190
<i>Málus baccata</i>	287	<i>Oxylóbium ellipticum</i>	191	<i>Pogonia ophioglossoides</i>	449
<i>hybrida</i>	287	<i>Pæonia albiflora</i>		<i>Poinciana insignis</i>	374
<i>macrocarpa</i>	286	var. <i>erubescens</i>	274	<i>Poinsettia pulcherrima</i>	84
<i>prunifolia</i>	287	<i>fragrans</i>	275. 447	var.	
<i>Málva sínensis</i>	313	<i>Humei</i>	275. 447	<i>Poirrea coccinea</i>	308
<i>Mammillária acanthro-</i>		<i>Pottsii</i>	275. 447	<i>Polygala attenuata</i>	
<i>phlegma</i>	465	<i>Reevesii</i>	275. 447	<i>cordata</i>	465
<i>cerifera</i>	465	<i>Whittleji</i>	275. 447	<i>Posoqueria versicolor</i>	69
<i>Chemánii</i>	465	<i>cárnea</i>	446	<i>Potentilla nepalensis</i>	24
<i>chrysacantha</i>	433	var. <i>rosea</i>	274. 446	<i>Prunus virginiana</i>	37
<i>discolor</i>	465	<i>rúbra</i>	236	<i>Pyrola rotundifolia</i>	448
<i>longimamma</i>	433	<i>Moutan</i>	190	<i>umbellata</i>	448
<i>Schammii</i>	433	<i>Banksia</i>	137. 236. 446	<i>Quádría heterophylla</i>	194
<i>scopa</i>	465	<i>papaveracea</i>	236. 446	<i>Rafflesia</i>	135
<i>uncinata</i>	433	<i>rosea</i>	446	<i>Arnoldii</i>	136
<i>Mandevilla suavólens</i>	334.	<i>rosea odorata</i>	446	<i>Horsfieldii</i>	136
	356	<i>rúbra pleno</i>	137	<i>maniliana</i>	135
<i>Manettia bicolor</i>	348	<i>officinalis albicans</i>		<i>pátma</i>	136
<i>cordifolia</i>	308. 347. 453	<i>pleno</i>	274	<i>Raphiölepis indica</i>	272
<i>Martynia fragrans</i>	16	<i>paradoxica fimbriata</i>	446	<i>Rhododéndron álta cle-</i>	
<i>Maurándya Barclayána</i>	374.	<i>tenuiflora</i>	274	<i>rénsé</i>	295
	450	<i>Pandanus humilis</i>	191	<i>arboresum</i>	227
<i>pulchella</i>	307	<i>Papáver Marsellii</i>	357	<i>maximum</i>	273
<i>semperflórens</i>	275	<i>Passiflora álata</i>	272	<i>Russellianum</i>	431
<i>Medicágo lupulíus</i>	419	<i>bracteata</i>	275	<i>Ribes aureum</i>	266
<i>Melaleuca fulgens</i>	465	<i>Kermésina</i>	347. 432	<i>sanguineum</i>	236. 239.
<i>Melanpyrum americanum</i>	447	<i>Loudonii</i>	450	new var.	266
<i>Melocactus amæna</i>	433	<i>Paulownia imperialis</i>	97	<i>Richardia æthiópica</i>	273
<i>Meliánthus májor</i>	273	<i>Pelargónium, varieties</i>	272	<i>Rigidelia flámmea</i>	180
<i>Mesembryáthemum</i>	22	<i>Pentstémón digitális</i>	448	<i>immaculata</i>	180
<i>monánthe</i>	433	<i>gentianoides</i>	232. 317	<i>Robinia viscosa</i>	84
<i>tigrynum</i>	433	<i>coccineum</i>	232	<i>Rosa devoniensis</i>	195. 334
<i>truncubillum</i>	433	<i>ovatum</i>	448	<i>multiflora</i>	
<i>Metrosidros crassifolia</i>	465	<i>Phænix</i>	190	<i>rubriflora</i>	134
<i>floribunda</i>	272	<i>dactylifera</i>	373	new var.	134
<i>Mimosa Julibrissin</i>	65	<i>Pharbatís Leárii</i>	101	<i>semperflórens var.</i>	
<i>uruguensis</i>	294	<i>Philadélfus grandifló-</i>		<i>capreolata</i>	135
<i>Mimulus cardinalis</i>	274	<i>rus</i>	274	<i>Russelia jancea</i>	347. 373.
<i>Mina lobata</i>	296	<i>mexicanus</i>	335	<i>Sagittaria sagittifolia</i>	450
<i>Mirbètia speciosa</i>	99	<i>pubescens</i>	274	<i>Salvia coccinea</i>	17. 35.
<i>Moræa fimbriata</i>	272	<i>Philibertia grandiflórus</i>	307	<i>fulgens</i>	229
<i>variegata</i>	272	<i>Phlób Cleopatra</i>	316	<i>grandiflora</i>	453
<i>Musa Cavendishii</i>	6	<i>Drummondii</i>	15. 47. 356	<i>patens</i>	85. 263. 301. 356.
<i>Nandina doméstica</i>	273	<i>Listoniana</i>	275		420
<i>Nemophila insignis</i>	15. 232	<i>omniflora</i>	232	<i>réglá</i>	17
<i>Néottia écrnea</i>	450	<i>paniculata</i>	232	<i>spléndens</i>	17. 35. 374.
<i>Nepenthes distillatória</i>	192.	<i>suavólens</i>	277		452
	300	<i>Thompsoniana</i>	316	<i>Salisburya adiantifolia</i>	4
<i>Nerene curviflora</i>	453	<i>Phorinium tenax</i>	190	<i>Sanservéria guineensis</i>	272
		<i>Phytolacca decandra</i>	450		

<i>Sapium beberidifolium</i>	194	<i>Stephanodus floribundus</i>	308	<i>Tropæolum tuberosum</i>	308
<i>Sarracenia maculata</i>	402	<i>Streblorhiza speciosa</i>	98	<i>Tuckermânia californica</i>	225.
<i>purpurea</i>	402	<i>Strobilanthes scabra</i>	70	<i>maritima</i>	272. 352
<i>variolaris</i>	402	<i>Stylidium Brunonianum</i>	176	<i>pilosum</i>	352
<i>Saussurea pulchella</i>	177	<i>pilosum</i>	335	<i>Tweedia cærulea</i>	307
<i>Schizanthus diffusus</i>	233	<i>Tabernaemontana dichot-</i>		<i>Ulmus alata</i>	4
<i>pinnatus</i>	273	<i>oma</i>	191	<i>Uvularia grandiflora</i>	235
<i>Scotia dentata</i>	189	<i>Tecoma capensis</i>	374	<i>Vaccinium resinosum</i>	248
<i>trapezoides</i>	189	<i>Téliina grandiflora</i>	23	<i>Verbena Eyreana</i>	232
<i>Sempervivum arboreum</i>	100	<i>Thuja filiformis</i>	298	<i>Tweediana</i>	235
<i>globiferum</i>	447	<i>péndula</i>	298	<i>Veltheimia grandiflora</i>	272
<i>Seyos edulis</i>	51. 109	<i>Thunbergia alata</i>	125	<i>Véronica agræstis</i>	272
<i>Sieversia montana</i>	23	<i>álba</i>	125	<i>australis</i>	313
<i>Solanum macrantherum</i>	16	<i>aurantiaca</i>	8. 125	<i>cærnea</i>	313
<i>Sóllya heterophylla</i>	307	<i>grandiflora</i>	317	<i>Vinca álba</i>	332
<i>Sparmannia africana</i>	273	<i>Hawtayneana</i>	308	<i>rosea</i>	332
<i>Sparaxis</i>	95	<i>Tigridium pavonia</i>	189	<i>Virgilia lutea</i>	191
<i>Spiræa japonica</i>	275	<i>Tillandsia</i>	171	<i>Wahlenbergia grandiflora</i>	448
<i>kamschatica var. hi-</i>		<i>Tórrya taxifolia</i>	97	<i>Röylei</i>	139
<i>malensis</i>	14	<i>Tragopozon porrifolius</i>	129	<i>Watsonia</i>	95
<i>sorbifolia</i>	313	<i>Trevirana coccinea</i>		<i>Wistaria Consequana</i>	236
<i>stipulacea</i>	275	<i>Trifolium incarnatum</i>	274	<i>sinensis</i>	297. 304
<i>triloba</i>	313	<i>reens</i>	23	<i>Yucca aloifolia</i>	22
<i>ulmaria</i>	14. 275	<i>Triptilion spinosum</i>	69	<i>filamentosa</i>	301. 449
<i>variegata</i>	316	<i>Troëllius europæus</i>	236	<i>gloriosa</i>	316
<i>ulmifolia</i>	313	<i>Tropæolum</i>	293	<i>fol. variegata</i>	431
<i>Sprekëlia glauca</i>	17	<i>brachyseras</i>	347	<i>Zamia hórrida</i>	431
<i>Stadmannia australis</i>	194	<i>edule</i>	308	<i>Zichya coccinea</i>	307
<i>Stapelia ambigua</i>	374	<i>pentaphyllum</i>	181	<i>glabrata</i>	307
<i>Státice arborea</i>	100	<i>polyphyllum</i>	308	<i>pannosa</i>	308
<i>monopétala</i>	100	<i>tricolorum</i>	308		



