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Quarterly Journal of  
Conchology

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THE  
QUARTERLY JOURNAL  
OF  
CONCHOLOGY.

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VOL I.

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## iii.

	PAGE.
Description of a new form of <i>Gladius</i> —F. P. Marrat ... ..	244
„ new species of <i>Achatina</i> —E. A. Smith ... ..	346
Distribution of <i>Crepidula aculeata</i> —J. S. Gibbons, M.B. ... ..	416
Genus <i>Eatonia</i> ... ..	97
Geographical distribution of the marine gastropoda on the South and East coasts of Africa—J. S. Gibbons, M.B. ... ..	233
Habits and habitat of <i>Helix revelata</i> —R. Rimmer ... ..	206
<i>Helix aspersa</i> monst. <i>sinistrorsa</i> , at Bristol—(Miss) F. M. Hele ... ..	248
„ <i>cantiana</i> —J. S. Gibbons, M.B. ... ..	369
„ <i>Dehnei</i> —J. W. Taylor ... ..	217
„ <i>hispida</i> var. <i>albida</i> —J. W. Taylor ... ..	216
„ <i>hortensis</i> monst. <i>sinistrorsa</i> , at Bristol—(Miss) F. M. Hele ... ..	248
„ <i>lamellata</i> —R. Rimmer ... ..	265
„ <i>lamellata</i> at Huddersfield—J. Whitwham ... ..	29
„ <i>obvoluta</i> —Theo Godlee ... ..	67
„ <i>Pisana</i> —R. Rimmer ... ..	266
„ <i>Pisana</i> —G. S. Tye ... ..	230—333
„ <i>rotundata</i> var. <i>alba</i> at Conisbro' Castle—Geo. Taylor ... ..	21
„ <i>virgata</i> monst. <i>sinistrorsa</i> in Yorkshire—L. Peace ... ..	174
Land shells of Capri—(Mrs.) J. Fitzgerald ... ..	249
„ the Isles of Scilly—W. H. Hatcher ... ..	138
Leeds Conchological Club ... ..	185
<i>Limax gagates</i> at Hastings—J. W. Taylor... ..	245
<i>Limnæa peregra</i> var. <i>albida</i> near Askern, Yorks.—Lister Peace ... ..	174
List of shells taken at Tenby, Pembrokeshire, at the end of September 1872,—G. S. Tye ... ..	30
List of land and freshwater shells of Banbury, Oxon—D. Pidgeon ... ..	54
„ the mollusca of the Birmingham District—G. S. Tye ... ..	57—68
„ marine shells of Hastings—A. W. Langdon ... ..	89
„ land and freshwater shells collected in the neighbourhood of Wakefield—J. Hebden ... ..	3
„ the shells taken at Guernsey, Sark, and Herm—A. H. Cooke and H. M. Gwatkin; M.A. ... ..	321
„ land and freshwater shells found in the neighbourhood of Ackworth, Yorkshire—C. Ashford ... ..	19
„ land and freshwater shells collected at Erith, Kent—Harry Leslie ... ..	33
„ the land and freshwater shells of Trinidad, showing the distribution—R. J. Lechmere Guppy, F.L.S., F.G.S., C.M.Z.S. ... ..	109

	PAGE.
List of shells from Heidelberg—J. E. Daniel	111
„ land shells collected on Fitzroy Island, with notes on their geographical range—John Brazier, C.M.Z.S., &c.	268
„ West African shells—F. P. Marratt	381
„ shells of Iowa—(Prof.) F. M. Witter	382
„ West African marine shells—F. P. Marratt	237
Local shells near Wakefield—George Taylor	92
Mollusca of Cooper's Hill—Edward Simpson	65
Mollusca of Santa Rosa Island, California, U.S.—L. G. Yates	182
Molluscan threads—G. S. Tye	401
Note on the habitat of <i>Neritina tristis</i> —C. P. Gloyne	37
„ <i>Helix pulchella</i> —H. Hemphill	128
„ <i>Limnæa stagnalis</i> —W. Nelson	216
„ <i>Bulimus Goodallii</i> —J. E. Daniels	246
„ <i>Clausilia biplicata</i> var. <i>albida</i> —J. E. Daniels	247
„ <i>Cylindrella Ravenii</i> —J. T. Marshall	380
„ the shells of Guernsey—J. T. Marshall	380
„ Geographical distribution of terrestrial mollusca—W. F. Petterd	394
Notes on the genus <i>Cylindrella</i> —C. P. Gloyne	51
„ genus <i>Bourciera</i> —T. Bland	128
„ genus <i>Partula</i> —C. P. Gloyne	337
Notes on the occurrence of rare and local shells in unrecorded localities—W. G. Blatch	129
Notes on the identity of various European <i>Helicidæ</i> —C. P. Gloyne	133
Occurrence of <i>Zonites glaber</i> at Folkestone—(Mrs.) J. Fitzgerald	29
„ <i>Limnæa glutinosa</i> , near Sandwich—(Mrs.) J. Fitzgerald	51
„ <i>Gadinia reticulata</i> in South Eastern Polynesia—A. Garrett	335
„ <i>Crepidula aculeata</i> in the Marquesas Islands—A. Garrett	335
On Varieties of <i>Paludina vivipara</i> and <i>Planorbis glaber</i> —R. M. Lloyd	6
On the occurrence of <i>Cochlicopa tridens</i> var. <i>crystallina</i> , in the neighbourhood of Birmingham—G. S. Tye	7
On the difficulties of recognising "named varieties" according to the accepted authorities—T. Rogers	17
On South Australian marine shells—G. F. Angas, F.L.S., C.M.Z.S.	178
On the habits of <i>Helix fusca</i> —C. Ashford	180
On certain species of <i>Littorina</i> —J. S. Gibbons, M.B.	339
<i>Pholas crispata</i> , L., boring in metamorphic rocks—J. S. Gibbons, M.B.	369
Remarks on the South Australian <i>Helices</i> , with a notice of all species known to present date—G. F. Angas, F.L.S., C.M.Z.S.	134



2



2



1



1



3



3

---

2. CIONELLA MORSEANA DOHERTY. 1. SOMATOGYRUS TROTHIS DOHERTY.  
3. PLANORBIS GIBBONSI NELSON.





	PAGE.
Remarks on the geographical distribution of the terrestrial mollusca —C. P. Gloyne ... ..	283
Remarks on a dentate variety of <i>Conulus fulvus</i> , Drap—W. Doherty ...	344
Reversed form of <i>Helix hortensis</i> at Bristol—(Miss) F. M. Hele ...	92
Review of the genus <i>Tulotoma</i> , with remarks on the geographical distribution of the North American <i>Viviparidæ</i> —(Prof.) A. G. Wetherby ... ..	207
Shells of Ceylon—A. W. Langdon ... ..	71
Simultaneous occurrence of five sinistral examples of <i>Helix aspersa</i> — J. E. Daniel ... ..	50
Species versus Varieties—J. T. Marshall ... ..	131
"  "  "  —G. S. Tye ... ..	171
"  "  "  —C. P. Gloyne ... ..	175
<i>Succinea oblonga</i> , Drap. near Cork—C. P. Gloyne ... ..	97
Synonymy of <i>Planorbis glaber</i> —W. Nelson ... ..	181
Suggestions for finding the smaller land shells—H. Laver, F.L.S. ...	264
Shell collecting in Curacao—J. S. Gibbons, M.B. ... ..	370
Ten days' dredging at Oban—(Rev.) A. M. Norman, M.A. ... ..	275
Variety caused by locality—J. B. Bridgman ... ..	70
White variety of <i>Limnæa palustris</i> near Leeds—J. W. Taylor ... ..	29
"  "  "  "  at Southport—E. Collier ... ..	139
<i>Zonites glaber</i> Studer, near Leeds—H. Crowther ... ..	215
"  "  "  "  —W. Nelson ... ..	21
"  excavatus var. <i>vitrina</i> Fer, near Huddersfield—J. Whitwham ...	29
"  glaber near Huddersfield—L. Peace ... ..	36

#### REPRINTS.

A partial comparison of the Conchology of the Atlantic and Pacific coasts of North America—R. E. C. Stearns ... ..	31
Critical examination of certain species of the American continent and the West Indies, described as belonging to <i>Helicina</i> in Lovell Reeve's <i>Conchologia Iconica</i> —T. Bland ... ..	105
Description of new species of shells—G. B. Sowerby, junr. ... ..	78
Introduction of <i>Planorbis dilatatus</i> into the British Isles—T. Rogers ...	81
<i>Salpa spinosa</i> of the West coast of Ireland—A. G. More ... ..	43
The Pectens, or Scallop-Shells—R. E. C. Stearns ... ..	43
The Mollusca of Europe compared with those of Eastern North America —J. G. Jeffreys, F.R.S. ... ..	8

		PAGE.
NEW SPECIES		
DESCRIBED IN THIS VOLUME.		
Actinobolus Africanus—Marrat	... ..	312
Achatina albopicta—Smith	... ..	346
„ biscalpta „	... ..	349
„ dimidiata „	... ..	348
„ simplex „	... ..	347
„ Transvaalensis—Smith	... ..	351
„ zebroides „	... ..	347
Buliminus cinereus—Taylor	... ..	281
„ costatus „	... ..	280
„ Gibbonsi „	... ..	280
„ obesus „	... ..	255
„ olivaceus „	... ..	253
„ tumidus „	... ..	254
Cionella Morseana, Doherty	... ..	342
Clausilia bilabrata—Smith	... ..	120
„ kobensis—Smith	... ..	122
Columbella cuspidata—Marrat	... ..	242
Conus cuneiformis—Smith	... ..	202
„ Traversianus—Smith	... ..	107
Crassatella Africana—Marrat	... ..	382
Drillia rosolina—Marrat	... ..	239
„ filosa—Marrat	... ..	240
Gonaxis Gibbonsi—Taylor	... ..	252
Gladius Martini—Marrat	... ..	244
Helix Goodwinii—Smith	... ..	119
Limnæa Goodwinii—Smith	... ..	125
Melania Niponica—Smith	... ..	123
Marginella callosa—Marrat	... ..	137
„ (Glabella) Davisiana, Marrat	... ..	205
„ (Gibberula) nana, Marrat	... ..	205
„ (Gibberula) lucida, Marrat	... ..	205
„ perla, Marrat	... ..	136
„ præcallosa (Higgins) Marrat	... ..	136
„ Tyermani, Marrat	... ..	136
„ Warrenii, Marrat	... ..	137
Nassa interstincta—Marrat	... ..	381

	PAGE.
<i>Nassa obliquata</i> —Marrat	243
„ <i>Smithii</i> „	204
<i>Natica caffra</i> „	204
„ ( <i>Mamma</i> ) <i>fabæ</i> —Marrat	205
<i>Opeas delicata</i> —Taylor	281
<i>Paludina vivipara</i> var. <i>atro-purpura</i> —Lloyd	6
<i>Planorbis glaber</i> var. <i>compressa</i> —Lloyd	7
„ <i>Gibbonsi</i> —Nelson	379
<i>Pleurotoma gracilis</i> —Marrat	240
Pupa <i>Cincinnatiensis</i> —Judge	343
<i>Pusionella recurvirostris</i> —Marrat	180
<i>Somatogyrus trothis</i> —Doherty	341
<i>Subulina intermedia</i> —Taylor	282
<i>Zonites ventrosus</i> —Taylor	253



## LIST OF AUTHORS WHO HAVE CONTRIBUTED TO THIS VOLUME.

Angas, G. F., F.L.S.	134, 178
Ashford, C.	19, 29, 180
Bland, T.	105, 128
Blatch, W. G.	129
Brazier, J., C.M.Z.S.	268
Bridgman, J. B.	70
Cooke, A. H.	321
Collier, E.	139
Crowther, H.	215
Damon, R.	217
Daniel, J. E.	50, 111, 113, 246, 247
Doherty, W.	341, 344
Fitzgerald, (Mrs.) J.	29, 51, 248, 249
Garrett, A.	335, 353
Gibbons, J. S., M.B.	233, 336, 339, 340, 367, 368, 369, 370, 416
Godlee, T.	67, 70
Gloyne, C. P.	37, 51, 97, 133, 175, 283, 337
Guppy, R. J. L., F.L.S.	109
Gwatkin, H. M., M.A.	321

## viii.

	PAGE.
Hatcher, W. H. ....	138
Hebden, J. ....	3, 97
Hele (Miss) F. M. ....	92, 248
Hemphill, H. ....	128
Jeffreys, J. G., LL.D., F.R.S. &c. ....	8
Judge, C. R. ....	343
Langdon, A. W. ....	71, 89
Laver, H., F.L.S. ....	264
Leslie, H. ....	33
Lloyd, R.M. ....	6
Marrat, F. P. ....	136, 179, 204, 237, 244, 381
Marshall, J. T. ....	131, 380
More, A. G. ....	43
Nelson, W. ....	21, 181, 186, 216, 376
Norman Rev. A. M., M.A. ....	275
Peace, L. ....	36, 174
Petterd, W. F. ....	394
Pidgeon, D. ....	54
Rimmer, R. ....	206, 265, 266
Roebuck, W. D. ....	248
Rogers, T. ....	17, 81
Sowerby, G. B. junr. ....	78
Simpson, E. ....	65, 93
Smith, E. A., F.Z.S. ....	107, 118, 202, 346
Stearns, R. E. C. ....	31, 43
Sutton, W. D. ....	22, 35, 49
Taylor, J. W. ....	29, 97, 185, 216, 217, 245, 251, 280
Taylor, G. ....	21, 92
Tye, G. S. ....	7, 30, 57, 68, 171, 230, 333, 401
Wetherby Prof. A. G. ....	207
Witter Prof. F. M. ....	382
Whitwham, J. ....	29
Yates, L. G. ....	182



THE  
QUARTERLY JOURNAL  
OF  
CONCHOLOGY.

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INTRODUCTION.

WE are glad to find that the study of the science of Conchology is becoming much more general. We are glad because we think it possesses advantages which many other sciences only possess in a smaller degree. Its objects lie around us on every hand, on mossy banks, in glassy pools, in rustling woods, in the deep sea, and on its shore. Its spoils too, are of very varied beauty of form and colour—the houses of the Mollusca—how many, very many of our fellow-men cannot boast of houses so comfortable, so convenient, so exceeding beautiful. These spoils need no elaborate preparation on the part of the collector, nor jealous care for their preservation, a plain wood cabinet, or boxes, a small round fishing net, some chip or tin pill boxes, are all that is required.

It must not be thought that the field of study is a restricted one, for besides a knowledge of the Molluscs themselves, a practical knowledge of Botany is desirable, in order to recognize on what plants they feed, and also that by recognizing the food-plant we may be on the alert to find the animal. Then an acquaintance with Geology will show upon what soils and rocks certain species are most surely found, and it will allow of an intelligent comparison with all the myriad fossil forms; for it must be remembered that by far the largest proportion of fossil remains are molluscos. A competent knowledge of Microscopy will amply repay some amount of patience, of time, and some little cost by proving an “open sesame” to many hidden wonders. Nor should we consider the study of these lowly creatures as likely to lead to no direct useful result; for it is by the study of the lower forms of life, that we hope perhaps ultimately to discover, what is life.

In introducing the Quarterly Journal of Conchology to the public, we have been desirous of satisfying a long-felt want of students of the science. Our chief objects are two—first, to encourage and stimulate original research by freely opening our pages to all who take an interest in the science, however humble they may be, and more especially to all careful and accurate observers. Second, to bring the works of the great masters of the science within the reach of all collectors, by reprinting from time to time in our pages their more important papers which appear in the high priced publications.

In addition to these two chief objects, we shall endeavour to point out the great importance of, and to promote the study of the geographical distribution of species. By a systematic inquiry into this subject, in which but little has been done, we believe many interesting phenomena will be discovered, bearing on the habits, food, and perhaps the origin of varieties. We must strongly urge the formation of local lists in every district. We shall always be glad to make them public. We may shortly be able to propose a scheme which will give a more organized character to this important work.

We hope that our pages may also afford a means for comparing results on the part of students, for encouraging the undertaking of combined and definite work, and also afford a means of general communication.

Thus far as regards present students, but is it too much to hope that we may be the means of inducing others to take up the study? We cannot, it is true, offer any "fierce exciting joys" in its pursuit, but to those who wish a change from the bustle and haste of life, and from the feverish excitement of political and social strife, we can promise quiet, refreshing enjoyment—country rambles in the summer time—long nights in winter, arranging, studying, tabulating, and recording results, and comparing them with those of other collectors. In accepting this escape from the turmoil of ordinary life, we need not fear we shall lose our interest in our fellow men, in their well-being and progress, but we hope shall each be able to say—

"I love not man the less, but nature more  
From these our interviews in which I steal  
From all I was, or am, or may be, and mingle with the universe and feel  
What I can ne'er express, yet cannot all conceal."



A LIST OF LAND AND FRESHWATER SHELLS  
COLLECTED IN THE NEIGHBOURHOOD OF  
WAKEFIELD.

By JOSEPH HEBDEN.

This List of Shells is the result of several years' collecting, and for much valuable information, I am indebted to my friends Messrs. Wm. Lund and G. Taylor, the former of whom was for many years a most assiduous and successful conchologist.

It might have been made much more extensive but for the desirability of restricting the area of the district.

**Sphærium corneum** *L.*—Common in the ponds and canals throughout the district.

**Sphærium rivicola** *Leach.*—Plentiful in the Barnsley and Stanley canals.

**Sphærium ovale** *Ferussac.*—This local species is plentiful in the canal near Stanley, and is met with more rarely in the Wakefield and Barnsley canal.

**Sphærium lacustre** *Muller.*—Occurs in the Barnsley canal, plentiful in a pond at Sandal.

**Pisidium amnicum** *Muller.*—Common in the Barnsley and Stanley canals.

**Pisidium fontinale** *Draparnaud.*—Pond at Sandal.

**Pisidium fontinale** var. **Henslowana** *Shepp.*—Barnsley canal.

**Pisidium fontinale** var. **pulchella** *Jenyns.*—Barnsley canal.

**Pisidium nitidum** *Jenyns.*—Found in ponds throughout the district.

**Unio tumidus** *Phillipson.*—In the canal near Barnsley.

**Unio tumidus** var. **radiata** *Jeffr.*—Plentiful in the canal at Heath.

**Unio pictorum** *L.*—Moderately common in the Barnsley and Stanley canals.

**Anodonta cygnea** *L.*—Common throughout the district.

**Anodonta cygnea** var. **radiata** *Muller.*—In the lake at Nostell Priory.

**Anodonta anatina** *L.*—Occurs in the canal near Barnsley.

**Anodonta anatina** var. **radiata** *Jeffr.*—Canal, nr. Barnsley.

**Dreissena polymorpha** *Pallas.*—Plentiful in the Barnsley canal, Winterset Reservoir, and New-miller-dam.

**Neritina fluviatilis** *L.*—Common in the Wakefield and Barnsley canal.

**Paludina vivipara** *L.*—Common in the Wakefield and Barnsley canal, and more rarely in a stream near Sandal Castle.

**Bythinia tentaculata** *L.*—Common throughout the district.

**Bythinia tentaculata** var. **decollata** *Jeffr.*—Found plentifully at Kirkthorpe.

**Bythinia Leachii** *Shepp.*—Found commonly amongst decaying sedges at the sides of the Wakefield and Barnsley canal.

**Valvata piscinalis** *Muller.*—Moderately common in the Wakefield and Barnsley canal.

*Valvata piscinalis* var. *subcylindrica* *Jeffr.*—River Went, near Ackworth.

*Planorbis nitidus* *Muller.*—Found at Kirkthorpe and Hemsworth.

*Planorbis nautilus* *L.*—Common at Ossett and Cold Hiendley.

*Planorbis nautilus* var. *cristata* *Draparnaud.*—Occurs with the type.

*Planorbis albus* *Muller.*—Various places round Wakefield.

*Planorbis albus* var. *Draparnaldi* *Shepp.*—Very fine specimens of this local variety from a pond at Sandal.

*Planorbis spirorbis* *Muller.*—Common throughout the district. A beautiful white variety occurs at Dircar

*Planorbis vortex* *L.*—Very common throughout the district, with *P. spirorbis*.

*Planorbis carinatus* *Muller.*—Common in the Wakefield and Barnsley canal. A dwarf form occurs in a pond nr. Sandal Castle.

*Planorbis complanatus* *L.*—Common throughout district.

*Planorbis corneus* *L.*—Abundant in a pond at Castleford. Evidently introduced.

*Planorbis contortus* *L.*—Very abundant in ponds at Castleford and near Frystone Hall.

*Physa hypnorum* *L.*—Common in a ditch at Stanley, where the specimens are very fine; more rarely at Cold Hiendley. Very common at Horbury.

*Physa fontinalis* *L.*—Common in the Barnsley canal, and in nearly every stream throughout the district.

*Physa fontinalis* var. *oblonga* *Jeffr.*—Common in the River Went at Ackworth.

*Limnæa peregra* *Muller.*—In a ditch at Stanley, common.

*Limnæa peregra* var. *ovata* *Draparnaud.*—Barnsley canal. Other forms of this most variable species occur throughout the district.

*Limnæa auricularia* *L.*—Occurs in canals at Horbury and Walton, and in the Cold Hiendley and Hemsworth dams.

*Limnæa stagnalis* *L.*—Barnsley canal. Very fine specimens at Kirkthorpe.

*Limnæa stagnalis* var. *fragilis* *L.*—Abundant in a stream near Castleford.

*Limnæa palustris* *Muller.*—In a pond on the canal side near Heath Bridge.

*Limnæa palustris* var. *elongata* *Jeffr.*—Occurs in the same pond.

*Limnæa palustris* var. *tincta* *Jeffr.*—Barnsley canal.

*Limnæa truncatula* *Muller.*—Common in ditches throughout the district.

*Limnæa truncatula* var. *elegans* *Jeffr.*—Standbridge, near Sandal.

*Limnæa glabra* *Muller.*—Very abundant in a pond at Havercroft where the specimens are small. Common near Ossett.



*Limnæa glabra* var. *elongata* *Jeffr.*—Common and very fine at Ossett, amongst which are numbers of decollated specimens

*Ancylus fluviatilis* *Muller.*—Common at Kirkthorpe.

*Ancylus fluviatilis* var. *Capuloides* *Jan.*—This local and rare variety occurs in the River Went, near Ackworth, also in a small stream near Sandal Castle.

*Ancylus fluviatilis* var. *albida* *Jeffr.*—Pugneys.

*Ancylus lacustris* *L.*—Barnsley canal occasionally, plentiful in a pond at Cold Hiendley.

*Arion ater* *L.*—Common throughout the district.

*Arion flavus* *Fer.*—Common throughout the district.

*Limax gagates* *Drap.*—Bridge at Fall Ing.

*Limax flavus* *L.*—Common throughout the district.

*Limax agrestis* *L.*—Common.

*Limax arborum* *Bouch.-Chant.*—Occurs at Haw Park.

*Limax maximus* *L.*—Common throughout the district.

*Succinea putris* *L.*—Common throughout the district.

*Succinea elegans* *Risso.*—Common at Ackworth.

*Vitrina pellucida* *Muller.*—Common throughout district.

*Zonites cellarius* *Muller.*—Common throughout district.

*Zonites alliaris* *Muller.*—Common throughout district.

*Zonites nitidulus* *Drap.*—Common throughout district.

*Zonites nitidulus* var. *nitens* *Michaud.*—Beautiful pinkish white coloured specimens of this variety occur at Newton.

*Zonites purus* *Alder.*—Occurs at Haw Park.

*Zonites purus* var. *margaritacea* *Jeffr.*—Common throughout the district.

*Zonites radiatulus* *Alder.*—Rare at Sandal Castle.

*Zonites nitidus* *Muller.*—Stanley and Cold Hiendley, locally abundant.

*Zonites excavatus* *Bean.*—Common at Haw Park and at Bullcliffe Wood.

*Zonites crystallinus* *Muller.*—Common throughout district.

*Zonites fulvus* *Muller.*—Scarce throughout the district.

*Helix aculeata* *Muller.*—Common at Haw Park, and occurs sparingly throughout the district.

*Helix aspersa* *Muller.*—Common throughout the district.

*Helix nemoralis* *L.*—Common throughout the district.

*Helix nemoralis* var. *hortensis* *Muller.*—Common throughout the district.

*Helix nemoralis* v. *hybrida* *Poi.*—Occasionally at Newton.

*Helix nemoralis* var. *major* *Fer.*—Chevet, rare.

*Helix nemoralis* var. *minor* *Jeffr.*—Rather common at Stanley.

*Helix Cantiana* *Montagu.*—Canal side near Walton, and at Chevet Lane. At the latter locality specimens are scarcer and of less size than formerly.

*Helix rufescens* *Pennant.*—Common throughout district.

*Helix rufescens* var. *albida* *Jeffr.*—Very rare, one specimen near Crofton Station.

*Helix rufescens* v. *minor* *Jeffr.*—Rather common nr. Chevet.

*Helix hispida* *L.*—Common throughout the district.

*Helix virgata* *Da Costa.*—Very local, only occurring on and about a railway bridge near Oakenshaw.

*Helix caperata* *Mont.*—Common throughout the district.

*Helix caperata* var. *ornata* *Picard.*—Occurs along with the type, frequently.

*Helix caperata* var. *subscalaris* *Jeffr.*—Rare, one specimen on Sandal Castle Hill.

*Helix caperata* var. *Gigaxii* *Charp.*—Frequently met with in Chevet Lane.

*Helix ericetorum* *Muller.*—Sandal Castle Hill, where I also found a scalariform specimen.

*Helix rotundata* *Muller.*—Common throughout the district.

*Helix rotundata* var. *alba* *Moquin-Tandon.*—My friend, Mr. G. Taylor, has taken three specimens of this rare variety near Ossett.

*Helix pygmæa* *Drap.*—Scarce at Haw Park and other places in the district.

*Helix pulchella* *Muller.*—Common in a quarry at Oakenshaw and New-miller-dam.

*Helix pulchella* var. *costata* *Muller.*—Occurs plentifully with the type at Oakenshaw.

*Bulimus obscurus* *Muller.*—Rare at Sandal Castle Hill.

*Vertigo pygmæa* *Drap.*—Rare, occurs at Dirtcar, where the specimens have four teeth.

*Clausilia rugosa* *Drap.*—Occurs at Sandal, Newmarket, and Woodlesford.

*Cochlicopa lubrica* *Muller.*—Haw Park.

*Cochlicopa lubrica* var. *lubricoides* *Fer.*—Haw Park and Sandal Castle Hill.

*Acme lineata* *Drap.*—Living specimens of this rare Mollusk were found in decaying timber on the canal side, near Haw Park, by myself and Mr. Wm. Lund.

SANDAL COMMON, Near Wakefield, Dec. 26th, 1873.

**On Varieties of *Paludina vivipara* and *Planorbis glaber*.**—Having been so fortunate during the past year as to find a new and distinct variety of each of these fresh-water Shells, which have been kindly determined for me by Mr. J. G. Jeffreys, F.R.S., I send a description of them for the information of your readers.

*PALUDINA VIVIPARA* var. *ATRO-PURPURA.*—Shell same shape as the normal form, but of a black colour, which, when viewed by transmitted light, is dark purple, being in fact the same colour as the bands of other specimens which occur with it. I found it in the canal at Pontypool this spring in numbers, together with the type and the variety *unicolor*; and besides this, there were with them all intermediately coloured ones, between *unicolor* and *atro-purpura*; these evidently being the ends of a series, *unicolor* being that in which all traces of the bands have vanished, and *atro-purpura* that in which they have so spread themselves as to have entirely obliterated all traces of the green ground colour of the typical shell.

PLANORBIS GLABER var. COMPRESSA—Shell more concave below than in the type, and only depressed in the centre on the upper side, the whorls also are rounder and do not increase so quickly, making the whole shell more compact. Found in the neighbourhood of Birmingham.—R. M. LLOYD, 60, Villa-road, Handsworth, Birmingham, December 18th, 1873.

ON THE OCCURRENCE OF *COCHLICOPA TRIDENS*  
VAR *CRYSTALLINA*, DUPUY, IN THE NEIGHBOURHOOD OF BIRMINGHAM.

By G. SHERRIFF TYE.

Any interested reader turning to page 291, vol. I. of Mr. Jeffreys' "British Conchology," will there find recorded the occurrence of this lovely little shell at Weoley Castle. [In Mr. Jeffreys' book spelt "Wheeley."] I believe the original spot from whence the shells here indicated were taken, is in a garden now attached to a farm-house. A short distance from this spot my friend Mr. Nelson, after diligent search, was rewarded by finding two or three shells, shewing much to our mutual satisfaction, that this charming variety still inhabits the locality.

Having hitherto looked upon it as a rarity, I consider myself fortunate in having since found it in three other places in the Birmingham district. First at Perry Bar, secondly at Hamstead, at the former place I found an interesting variety of a pale whitish yellow colour, more opaque than *crystallina*, but brilliant. Hamstead furnished the greatest number of the crystalline variety. My friends, Messrs. Nelson and Lloyd and myself, obtained amongst us nearly two dozen shells, yet left many young to furnish a progeny for future collectors.

The third habitat is Dudley, where, on a pleasant day in April this year, Mr. Lloyd and myself found it in company with *C. lubrica* and *Carychium minimum* in the still romantic grounds of Dudley Castle.

These three localities are all in the county of Stafford, and their distance from Birmingham is as follows:—Perry Bar,  $2\frac{1}{2}$  miles; Hamstead,  $2\frac{1}{2}$  miles; Dudley about 8 miles. Weoley Castle is in Worcestershire, and is situated about  $4\frac{1}{2}$  miles from Birmingham.

A single specimen has also been taken by Mr. Shrive, near Knowle, Warwickshire.

*C. tridens* is distributed throughout the neighbourhood of Birmingham, occurring abundantly in many places and sparingly in others; indeed a collector searching for it in almost any "likely looking" locality would hardly be disappointed, yet it appears to be much less plentiful in other districts.

It would be interesting to learn the distribution of this species in Great Britain. The records of its occurrence in our eastern counties are rare, and it is doubtful whether it inhabits Scotland or Ireland. Mr. Jeffreys has recorded one locality for it in Wales.

It may be looked for at the roots of grass (*i.e.*, at the base of the blades) or in the middle of thick tufts, among moss, or under

herbage or stones in rather damp places "all the year round," but early in the year, if the weather be mild, is the best time, before vegetation gets too luxuriant and Phœbus too powerful, for our little Cochlicopa, like many others of our native mollusks, is no "feather-bed soldier" but bestirs himself ere yet the last snow has departed before the soft breath of spring.

Unlike its brother *C. lubrica*, *C. tridens* has a limited foreign distribution, being only reported from France and Germany, while the former has a world-wide distribution.

HANDSWORTH, December 18th, 1873.

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## THE MOLLUSCA OF EUROPE COMPARED WITH THOSE OF EASTERN NORTH AMERICA.

By J. GWYN JEFFREYS, F.R.S.

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After mentioning that he had dredged last autumn on the coast of New England in a steamer provided by the Government of the United States, and that he had inspected all the principal collections of Mollusca made in Eastern North America, the author compared the Mollusca of Europe with those of Massachusetts. He estimated the former to contain about 1000 species (viz. 200 land and freshwater, and 800 marine), and the latter to contain about 400 species (viz. 110 land and freshwater, and 290 marine); and he took Mr. Binney's edition of the late Professor Gould's 'Report on the Invertebrata of Massachusetts,' published in 1870, as the standard of comparison. That work gives 401 species, of which Mr. Jeffreys considered 41 to be varieties and the young of other species, leaving 360 apparently distinct species. About 40 species may be added to this number in consequence of the recent researches of Professor Verrill and Mr. Whiteaves on the coast of New England and in the Gulf of St. Lawrence. Mr. Jeffreys identified 173 out of the 360 Massachusetts species as European, viz., land and freshwater 39 (out of 110), and marine 134 (out of 250), the proportion in the former case being 28 per cent., and in the latter nearly 54 per cent.; and he produced a tabulated list of the species in support of his statement. He proposed to account for the distribution of the North-American Mollusca thus identified, by showing that the land and freshwater species had probably migrated from Europe to Canada through Northern Asia, and that most of the marine species must have been transported from the Arctic seas by Davis's-Strait currents southwards to Cape Cod, and the remainder from the Mediterranean and western coasts of the Atlantic by the Gulf-stream in a northerly direction. He renewed his objection to the term "representative species." The author concluded by expressing his gratitude for the kind hospitality and attention which he received from naturalists during his visit to North America last year.

*Mollusca of Eastern North America, according to Binney's edition of Gould's 'Invertebrata of Massachusetts.'*

Page.	Name of Species.	N. or S. of Cape Cod.	European.	Synonyms and Remarks.
28	<i>Teredo navalis</i> , Linne ...	N	E	Wood's Hole, Mass., J. G. J.
29	..... <i>Norvegica</i> , Spengler ...	N	E	
30	..... <i>megotara</i> , Hanley ...	N	E	
31	..... <i>Thompsonii</i> , Tryon ...	S		
32	..... <i>dilatata</i> , Stimpson ...	N		<i>T. megotara</i> , variety.
33	..... <i>chlorotica</i> , Gould (1870) ...	N	E	<i>T. pedicellata</i> , Quatrefages [1849, var.
34	<i>Xylotrya fimbriata</i> , Jeffreys ...	S		
36	<i>Pholas costata</i> , L. ...	S		
38	..... <i>truncata</i> , Say ...	S		
39	<i>Zirfæa crispata</i> , L. ...	N	E	Genus <i>Pholas</i> .
40	<i>Solen ensis</i> , L. ...	N	E	
43	<i>Solecurtus gibbus</i> , Sp. ...	S		
44	..... <i>divisus</i> , Sp. ...	S		
46	<i>Machæra squama</i> , Blainville ...	N		<i>G. Siliqua</i> .
47	..... <i>costata</i> , Say ...	N		<i>G. Siliqua</i> .
48	<i>Solemya velum</i> , Say (1822) ...	N		<i>S. togata</i> , young.
50	..... <i>borealis</i> , Totten (1834) ...	N	E	<i>S. togata</i> , Poli, 1791.
51	<i>Panopæa arctica</i> , Lamarck (1818) ...	N	E	<i>Saxicava Norvegica</i> , sp. 1793
53	<i>Glycymeris siliqua</i> , Chemnitz ...	N	E	<i>G. Cyrtodaria</i> .
55	<i>Mya arenaria</i> , L. ...	N	E	
58	..... <i>truncata</i> , L. ...	N	E	
60	<i>Corbula contracta</i> , Say ...	S		
61	<i>Næra pellucida</i> , St. ...	N	E	
62	<i>Pandora trilineata</i> , Say ...	N		
64	<i>Lyonsia hyalina</i> , Conrad ...	N		Allied to <i>L. Norvegica</i> .
65	..... <i>arenosa</i> , Müller ...	N	E	
66	<i>Anatina papyracea</i> , Say ...	N		
68	<i>Cochlodesma Leanum</i> , Conrad ...	N		Allied to <i>Thracia prætennis</i> which is European.
69	<i>Thracia Conradi</i> , Couthouy (1838) ...	N		<i>T. inflata</i> , J. Sowerby, 1845.
71	..... <i>myopsis</i> (Beck) Müll (1842) ...	N	E	<i>T. truncata</i> , Brown, 1827.
72	..... <i>truncata</i> , Mighels & Adams (1842) ...	N	E	Not <i>T. truncata</i> , Br. <i>T. septentrionalis</i> , Jeffr. MS.
73	<i>Mactra solidissima</i> , Ch. ...	N		Loven received a single valve from Finmark.
75	..... <i>ovalis</i> , Gould ...	N		<i>M. solidissima</i> , var.
77	..... <i>lateralis</i> , Say ...	N		Allied to <i>M. subtruncata</i> , which is European.
79	<i>Cumingia tellinoides</i> , Conr. ...	S		
80	<i>Ceronia arctata</i> , Conr. ...	N		<i>Mesodesma deauratum</i> , var.
81	..... <i>deaurata</i> , Turton ...	N		<i>G. Mesodesma</i>
83	<i>Kellia planulata</i> , St. ...	N		<i>G. Lasca</i> .
83	..... <i>suborbicularis</i> , Montagu ...	N	E	
85	<i>Turtonia minuta</i> , Fabricius ...	N	E	<i>G. Cyamium</i> .
86	<i>Montacuta elevata</i> , St. ...	N	E	
87	<i>Saxicava rugosa</i> , Pennant ...	N	E	Linne instead of Pennant.
89	..... <i>arctica</i> , L. ...	N		<i>S. rugosa</i> , var.
90	<i>Petricola pholadiformis</i> , Lam. ...	N		Valentia, Ireland; fragment
92	..... <i>dactylus</i> , Say ...	N		<i>P. pholadiformis</i> , var.
93	<i>Macoma fusca</i> , Say (1826) ...	N	E	<i>Tellina Balthica</i> , L., 1766.
95	..... <i>proxima</i> , Gray (1839) ...	N	E	<i>T. calcaria</i> , Ch., 1782.
96	<i>Tellina tenta</i> , Say ...	S		
97	..... <i>tenera</i> , Say ...	N		Allied to <i>T. tenuis</i> .
98	<i>Lucina filosa</i> , St. (1851) ...	N	E	<i>L. borealis</i> , L., 1766.

Page.	Name of Species.	N or S. of Cape Cod	European.	Synonyms and Remarks.
99	<i>Lucina dentata</i> , Wood ...	S		
100	<i>Cryptodon Gouldii</i> , Phil. (1845)	N	E	<i>Axinus flexuosus</i> Mont, var. 1803.
101	<i>Sphaerium simile</i> , Say (1816) ...	N		<i>S. striatinum</i> , Lam., 1818.
103	..... <i>partumeium</i> , ,, (1822) ...	N	E	<i>S. lacustre</i> , Muller, 1774.
104	..... <i>rhomboideum</i> , ,, ...	N		Allied to <i>S. corneum</i> ,
105	..... <i>Vermontanum</i> , Prime (1861) ..	N	E	which is European. <i>S. pisidioides</i> , Gray, 1856. Perhaps introduced into England.
106	..... <i>truncatum</i> , Linsley ...	N		<i>S. lacustre</i> , var.
107	..... <i>tenuis</i> , Prime ...	N		
107	..... <i>securis</i> , ,, ...	N		<i>S. lacustre</i> , var. <i>Rykholtii</i>
108	..... <i>occidentale</i> , ,, ...	N		
109	<i>Pisidium dubium</i> , Say (1816) ...	N	E	<i>P. annicum</i> , Mull. 1774.
110	..... <i>Adamsii</i> , Prime (1851) ...	N	E	<i>P. fontinale</i> Draparnaud, [1805.
110	..... <i>compressum</i> , ,, ...	N		
112	..... <i>æquilaterale</i> , ,, ...	N		Allied to <i>P. nitidum</i> , which is European.
113	..... <i>ferrugineum</i> , Prime ...	N		<i>P. pusillum</i> , var. <i>obtusalis</i>
113	..... <i>abditum</i> , Haldeman (1841)	N	E	<i>P. pusillum</i> , Gmelin, 1788
115	..... <i>variabile</i> , Prime ...	N		
116	..... <i>ventricosum</i> , ,, ...	N		Possibly some of these North American species may be reduced in number.
117	<i>Astarte castanea</i> , Say ...	N		Perhaps a variety of <i>A.</i> <i>borealis</i> , Ch.
119	..... <i>sulcata</i> , Da Costa ...	N	E	Including <i>A. undata</i> , Gould = <i>A. Omalii</i> , J. Sow.
121	..... <i>semisulcata</i> , Leach (1817) ...	N	E	<i>A. borealis</i> , Ch., 1784 var.
123	..... <i>quadrans</i> , Gould ...	N		<i>A. castanea</i> , var. <i>nana</i> .
124	..... <i>elliptica</i> , Hanley ...	N		<i>A. sulcata</i> , var.
125	..... <i>Banksii</i> , Leach (1817) ...	N	E	<i>A. compressa</i> , Mt. 1803 var.
126	..... <i>crebricostata</i> , Forbes (1847)	N	E	<i>A. depressa</i> , Br., 1827.
127	<i>Astarte Portlandica</i> , Mighels ...	N		<i>A. compressa</i> , var.
128	<i>Gouldia mactracea</i> , Linsley ...	N		<i>G. Crassatella</i> .
129	<i>Cyprina Islandica</i> , L ...	N	E	
131	<i>Cytherea convexa</i> , Say ...	N		<i>G. Venus</i> .
133	<i>Venus mercenaria</i> , L. ...	N		
135	..... <i>notata</i> , Say ...	N		<i>V. mercenaria</i> , var.
136	<i>Tapes fluctuosa</i> , Gould ...	N	E	<i>G. Venus</i> .
137	<i>Gemma gemma</i> , Totten ...	N		<i>V. mercenaria</i> , young.
138	..... <i>Manhattensis</i> , Prime ...	S		
139	<i>Cardium Islandicum</i> , L. ...	N	E	
141	..... <i>elegantulum</i> , (Beck), Möll.	N	E	
143	<i>Liocardium Mortoni</i> , Conr. ...	N		<i>G. Cardium</i> .
144	<i>Aphrodita Groenlandica</i> , Ch. ...	N	E	
146	<i>Cardita borealis</i> , Conr. (1836) ...	N	E	<i>C. sulcata</i> , Bruguiere, 1792 [var.
147	<i>Arca pexata</i> , Say ...	S		
148	..... <i>transversa</i> , Say ...	N		<i>A. pexata</i> , var.
149	<i>Nucula tenuis</i> , Mont. ...	N	E	
150	..... <i>proxima</i> , Say ...	N		
152	..... <i>expansa</i> , Reeve ...	N		<i>N. tenuis</i> , var.
153	..... <i>delphinodontata</i> , Migh	N	E	
154	<i>Yoldia limatula</i> , Say (1831)	N	E	<i>Y. artica</i> , Sars. <i>G. Leda</i> .
155	..... <i>obesa</i> , St. ...	N		Allied to <i>Leda lucida</i> , which is European.
156	..... <i>siliqua</i> , Reeve (1855) ...	N	E	<i>L. arctica</i> , Gray, 1819.
157	..... <i>thracæformis</i> , Storer ...	N	E	<i>G. Leda</i> .

Page.	Name of Species.	N. or S. of Cape Cod.	European.	Synonyms and Remarks.
159	<i>Yoldia sapotilla</i> , Gould (1841) ..	N	E	<i>L. hyperborea</i> , Lov. 1846.
160	..... <i>myalis</i> , Couth ..	N	...	<i>G. Leda</i> .
161	<i>Leda tenuisulcata</i> , Couth (1838)	N	E	<i>L. pernula</i> , Mull. 1770, var.
163	..... <i>Jacksonii</i> , Gould ...	N	...	<i>L. pernula</i> , var.
164	..... <i>minuta</i> , Fabr. ...	N	E	Mull. instead of Fabr.
165	..... <i>caudata</i> , Donovan ...	N	...	<i>L. minuta</i> , var.
167	<i>Unio complanatus</i> , Solander ...	N	...	
169	..... <i>nasutus</i> , Say ...	N	...	
170	..... <i>radiatus</i> , Gm. ...	S	...	
172	..... <i>cariosus</i> , Say ...	S	...	
173	..... <i>ochraceus</i> , Say ...	S	...	Perhaps <i>U. cariosus</i> , var.
174	<i>Margaritana arcuata</i> , Bar. (1823)	N	E	<i>Unio margaritifera</i> , L. 1766
176	..... <i>undulata</i> , Say ...	S	...	<i>G. Unio</i> .
177	..... <i>marginata</i> , Gould ...	S	...	<i>G. Unio</i> .
178	<i>Anodon fluviatilis</i> , Lea ...	S	...	Dillwyn, 1817 instead of Lea <i>Anodonta cygnea</i> L. 1766
180	..... <i>implicata</i> , Say ...	N	...	<i>G. Anodonta. A. cygnea</i> var.
182	..... <i>undulata</i> , Say ...	S	...	<i>G. Anodonta</i> .
183	<i>Mytilus edulis</i> , L. ...	N	E	
186	<i>Modiola modiolus</i> , L. ...	N	E	<i>G. Mytilus</i> .
188	..... <i>plicatula</i> , Lam. ...	N	...	<i>G. Mytilus</i> .
190	<i>Modiolaria nigra</i> , Gray ...	N	E	
192	..... <i>discors</i> , L. ...	N	E	
193	..... <i>corrugata</i> , St. ...	N	E	
194	<i>Crenella glandula</i> , Tott.	N	E	
195	..... <i>pectinula</i> , Gould (1841) ..	N	E	<i>C. faba</i> , Fabr., 1780.
196	<i>Pecten tenuicostatus</i> , Migh. & Ad.	N	...	
198	..... <i>Islandicus</i> , Müll. ...	N	E	
199	..... <i>irradians</i> , Lam. ...	N	...	
200	..... <i>fuscus</i> , Linsl. ...	N	...	<i>P. irradians</i> , young.
202	<i>Ostrea Virginiana</i> , Lister ...	N	...	
203	..... <i>borealis</i> , Lam. ...	S	...	<i>O. Virginiana</i> , var.
204	<i>Anomia ephippium</i> , L. ...	N	E	
204	..... <i>aculeata</i> , Gm. ...	N	...	<i>A. ephippium</i> , var.
205	..... <i>electrica</i> , L. ...	N	...	<i>A. ephippium</i> , var.
206	..... <i>squamula</i> , L. ...	N	...	<i>A. ephippium</i> , young.
208	<i>Terebratulina septentrionalis</i> Couth (1839) ...	N	E	<i>Terebratula caput-serpentis</i>
210	<i>Rhynchonella psittacea</i> , Gm. ...	N	E	[L., 1764, var.
211	<i>Waldheimia cranium</i> , Gm. ...	N	E	Mull. instead of Gm. <i>G. Terebratula</i> .
213	<i>Philine sinuata</i> , St. ...	N	...	Allied to <i>P. nitida</i> , which
213	..... <i>quadrata</i> , S. Wood ...	N	E	[is European.
214	..... <i>lineolata</i> , Couth (1839) ...	N	E	<i>P. lima</i> , Br., 1827.
215	<i>Scaphander puncto-striatus</i> , Migh. & Ad. (1842) ...	N	E	<i>S. librarius</i> , Lov., 1846.
216	<i>Diaphana hiemalis</i> , Couth (1839)	N	E	<i>Utriculus globosus</i> Lov 1846
216	..... <i>debilis</i> , Gould (1840) ...	N	E	<i>Utriculus hyalinus</i> , Turtt., 1834.
217	<i>Utriculus Gouldii</i> , Couth. (1839)	N	E	<i>U. turritus</i> , Moll., 1842.
218	..... <i>pertenuis</i> , Migh. ...	N	...	<i>U. Gouldii</i> , young.
219	..... <i>canaliculatus</i> , Say ...	S	...	
220	<i>Cylichna alba</i> , Br. ...	N	E	
221	..... <i>oryza</i> , Tott. (1835) ...	N	E	<i>Bulla utriculus</i> , Brocchi, [1814.
222	<i>Bulla incincta</i> , Migh. ...	N	...	
222	..... <i>solitaria</i> , Say ...	S	...	
223	..... <i>occulta</i> , Migh. & Ad. (1842)	N	E	<i>Cylichna striata</i> , Br., 1827
224	<i>Tornatella puncto-striata</i> , Ad. ...	S	...	<i>G. Actæon</i> .

Page.	Name of Species.	N. or S. of Cape Cod.	European.	Synonyms and Remarks.
226	<i>Polycera Lessonii, D'Orbigny</i> ...	N	E	
228	<i>Doris bilamellata, L.</i> ...	N	E	
229	..... <i>tenella, Agassiz</i> ...	N	...	Perhaps <i>D. inconspicua</i> , which is European.
229	..... <i>pallida, Ag. (1870)</i> ...	N	E	<i>D. aspera</i> , Alder & Hancock, 1842.
230	..... <i>diademata, Ag. (1870)</i> ...	N	E	<i>D. tuberculata</i> , Cuvr. 1802
231	..... <i>planulata, St. (1853)</i> ...	N	E	<i>D. repanda</i> , A. & H., 1842
232	..... <i>grisea, St.</i> ...	N	...	"Very closely allied to <i>D. inconspicua</i> ."
233	<i>Ancula sulphurea, St.</i> ...	N	...	"Very like to <i>Ancula cristata</i> ," which is European
234	<i>Dendronotus arborescens, Müll.</i>	N	E	
236	<i>Dota coronata, Gm.</i> ...	N	E	
238	<i>Æolis papillosa, L.</i> ...	N	E	
240	..... <i>salmonacea, De Kay (1843)</i> ...	N	...	<i>Æolis bodoensis</i> , Moll., 1842
241	..... <i>Bostoniensis, Couth.</i> ...	N	...	"Approaching closely <i>E. coronata</i> of Forbes," [which is European.
242	..... <i>rufibranchialis, Johnston</i> ...	N	E	
243	..... <i>pilata, Gould</i> ...	N	...	
245	..... <i>stellata, St.</i> ...	N	...	
246	..... <i>purpurea, St.</i> ...	N	...	
246	..... <i>picta, A. &amp; H.</i> ...	N	E	
247	..... <i>diversa, Couth</i> ...	N	...	
248	..... <i>despecta, Johnston</i> ...	N	E	
249	..... <i>gymnota, De Kay</i> ...	N	...	"Nearly allied to <i>E. cininna</i> ," which is European
250	<i>Calliopæa (?) fuscata, Gould</i> ...	N	...	
251	<i>Embletonia fuscata, Gould</i> ...	N	...	
252	..... <i>remigata, Gould</i> ...	N	...	
253	<i>Hermæa cruciata, Alex. Ag.</i> ...	S	...	
254	<i>Alderia Harvardiensis, Ag.</i>	N	...	
255	<i>Elysia chlorotica, Ag.</i> ...	N	...	
256	<i>Placobranchus catulus, Ag.</i>	N	...	
258	<i>Limapontia zonata, St.</i> ...	N	...	
258	<i>Chiton apiculatus, Say</i> ...	S	...	
259	..... <i>cinereus, L.</i> ...	S	E	<i>C. marginatus</i> , not <i>C. cinereus</i> . A single specimen only; questionable
260	..... <i>ruber, Lowe</i> ...	N	E	
261	..... <i>marmoreus, Fabr.</i> ...	N	E	
263	..... <i>albus, Mont.</i> ...	N	E	L., not Mont.
263	..... <i>mendicarius, Migh. &amp; Ad. (1842)</i> ...	N	E	<i>C. Hanleyi</i> , Bean, Thorpe, [1844.
264	<i>Amicula Emersonii, Couth</i>	N	...	
266	<i>Dentalium dentale, L.</i> ...	N	...	<i>D. striolatum</i> , var.
266	<i>Entalis striolata, St. (1851)</i> ...	N	E	<i>Dentalium abyssorum</i> , Sars, 1858, var.
267	<i>Tectura testudinalis, Müll</i> ...	N	E	
269	..... <i>alveus, Conr.</i> ...	N	...	<i>T. testudinalis</i> , var.
270	<i>Lepeta cæca, Müll</i> ...	N	E	
271	<i>Crepidula fornicata, L.</i> ...	N	E	
272	..... <i>plana, Say</i> ...	N	...	<i>C. fornicata</i> , var.
273	..... <i>convexa, Say</i> ...	N	...	
274	..... <i>glauca, Say</i> ...	N	...	<i>C. fornicata</i> , var.
275	<i>Crucibulum striatum, Say</i>	N	...	
276	<i>Cemoria noachina, L.</i> ...	N	E	<i>G. Puncturella</i> .
277	<i>Ianthina fragilis, Deshayes</i> ...	N	E	Lam., not Desh. Specific name changed to <i>communis</i> , 1822.



Page.	Name of Species.	N. or S. of Cape Cod.	European.	Synonyms and Remarks.
278	<i>Adeorbis costulata</i> , Moll ...	N	E	<i>G. Mölleria</i> .
279	<i>Margarita cinerea</i> , Couth ...	N	E	<i>G. Trochus</i> .
280	..... undulata, Sowerby (1838)	N	E	<i>Trochus Granlandicus</i> , Ch., 1781.
281	..... helicina, Fabr. ...	N	E	<i>G. Trochus</i> .
282	..... argentata, Gould (1841) ...	N	E	<i>Trochus glaucus</i> , Moll. 1842
283	..... obscura, Couth ...	N	E	<i>G. Trochus</i> .
284	..... acuminata, Migh. & Ad. ...	N	...	<i>Trochus varicosus</i> , young.
285	..... varicosa, Migh & Ad (1842)	N	E	<i>M. elegantissima</i> , Bean, S. Wood, 1848. <i>G. Trochus</i>
286	<i>Trochus occidentalis</i> , Migh & Ad	N	E	
286	<i>Valvata tricarinata</i> , Say (1817)	N	E	<i>V. piscinalis</i> , Mull., 1774,
288	..... pupoidea, Gould ...?	N		[var.]
289	<i>Melantho decisa</i> , Say ...	N		
292	<i>Amnicola pallida</i> , Haldeman ...	N	...	<i>G. Hydrobia</i> .
293	..... limosa, Say ...	N	...	<i>G. Hydrobia</i> .
294	..... granum, Say ...	N	...	<i>G. Hydrobia</i> .
295	<i>Pomatiopsis lapidaria</i> , Say ...	S		
296	<i>Skenea planorbis</i> , Fabr. ...	N	E	
297	<i>Rissoella</i> ? eburnea, St. ...	N	...	<i>G. Rissoa</i> .
297	..... sulcosa, Migh. ...	N	...	<i>G. Rissoa</i> . One specimen only.
298	<i>Rissoa minuta</i> , Tott. (1834) ...	N	E	<i>Hydrobia ventrosa</i> , Mont., 1803, var.
299	..... latior, Migh. & Ad. ...	N		
299	..... aculeus, Gould (1841) ...	N	E	<i>R. striata</i> , J. Adams, 1795.
300	..... multilineata, St. ...	N	...	<i>R. striata</i> , var.
301	..... Mighelsi, St. ...	N		
301	..... exarata, St. ...	N		
301	..... carinata, Migh. & Ad. ...	N		
302	<i>Lacuna vincta</i> , Mont. (1803) ...	N	E	<i>L. divaricata</i> , Fabr., 1780.
303	..... neritoidea, Gould (1840) .	N	E	<i>L. pallidula</i> , Turt. 1827 var
304	<i>Littorina rudis</i> , Don. ...	N	E	Maton, instead of Don.
306	..... tenebrosa, Mont. ...	N	E	<i>L. rudis</i> , var.
398	..... litorea, L. ...	N	E	
309	..... palliata, Say (1822) ...	N	E	<i>L. obtusata</i> , L., 1766, var. <i>L. limata</i> , Low, 1846.
311	..... irrorata, Say ...	S		
311	<i>Scalaria Nov-angliæ</i> , Couth ...	N	...	<i>S. multistriata</i> , var.
312	..... lineata, Say ...	S		
313	..... multistriata, Say ...	S		
314	..... Groenlandica, Ch. ...	N	E	
315	<i>Cæcum pulchellum</i> , St. ...	S		
316	<i>Vermetus radricula</i> , St. ...	S		
317	<i>Turritella erosa</i> , Couth (1839) ...	N	E	<i>T. polaris</i> , Möll., 1842.
318	..... reticulata, Migh. & Ad. (1842) ...	N	E	<i>T. lactea</i> , Möll., 1842.
319	..... acicula, St. ...	N		
320	<i>Aporrhais occidentalis</i> , Beck ...	N		
321	<i>Bittium nigrum</i> , Tott. ...	S	...	<i>G. Cerithium</i> .
322	..... Greenii, Ad. (1839) ...	N	E	<i>Cerithiopsis tubercularis</i> , [Mont., 1803.
323	<i>Triforis nigrocinctus</i> , Ad. ...	S		
325	<i>Odostomia producta</i> , Ad. ...	S		
325	..... fusca, Ad. ...	S		
327	..... dealbata, St. ...	N		
327	..... modesta, St. ...	N		
327	..... bisuturalis, Say ...	N		
328	..... trifida, Tott. ...	S	...	<i>S. impressa</i> , var.
329	..... seminuda, Ad. ...	N		

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330	<i>Odostomia impressa</i> , Say (1822)	S	...	<i>O. calata</i> , Cailliaud, 1865.
331	<i>Turbonilla interrupta</i> , Tott (1834)	N	E	<i>Melania rufa</i> , Ph., 1836, var. <i>G. Odostomia</i> .
331	..... <i>nivea</i> , St. ....	N	...	Perhaps <i>Turbo lacteus</i> , L.
332	<i>Eulima oleacea</i> , Kurtz & St. ..	S	...	<i>G. Odostomia</i> .
333	<i>Menestho albula</i> , Möll. ....	N	...	Apparently not this species, which is American.
334	<i>Velutina haliotoidea</i> , Fabr. (1780)	N	E	<i>V. lavigata</i> , Pennant, 1777
335	..... <i>zonata</i> , Gould, (1841) ...	N	E	<i>V. undata</i> , Brown, 1827.
337	<i>Lamellaria perspicua</i> , L. ....	N	E	
338	<i>Lunatia heros</i> , Say (1822) ...	N	...	<i>Natica catenoides</i> , S. Wood 1848.
340	..... <i>triseriata</i> , Say ... ..	N	...	<i>Natica heros</i> , young.
341	... .. <i>Greenlandica</i> , Möll ...	N	E	Beck, <i>vide</i> Möll. <i>G. Natica</i>
342	<i>Natica clausa</i> , Bdp. & Sow. (1829)	N	E	<i>N. affinis</i> , Gm., 1790.
344	..... <i>pusilla</i> , Say ... ..	S	...	
344	<i>Mamma? immaculata</i> , Tott ...	N	...	<i>G. Natica</i> .
345	<i>Neverita duplicata</i> , Say ... ..	S	...	<i>G. Natica</i> .
347	<i>Bulbus flavus</i> , Gould, (1840) ...	N	E	<i>Natica Smithii</i> , Brown 1839 = <i>N. aperta</i> , Lov., 1846
348	<i>Amauropsis helicoides</i> , Johnston (1835) ... ..	N	E	<i>Natica Islandica</i> , Gm. 1790
349	<i>Pleurotoma bicarinata</i> , Couth ...	N	E	
350	..... <i>plicata</i> , Ad. (1842) ...	N	E	<i>P. declivis</i> , Lov., 1846.
351	<i>Bela turricula</i> , Mont. ....	N	E	<i>G. Pleurotoma</i> .
352	..... <i>harpularia</i> , Couth ...	N	E	<i>G. Pleurotoma</i> .
353	..... <i>violacea</i> , Migh & Ad. (1842)	N	E	<i>Defrancia Beckii</i> , Möll., 1842. <i>G. Pleurotoma</i> .
354	..... <i>decussata</i> , Couth (1841) ...	N	E	<i>Pleurotoma Trevelyana</i> , Turt., 1834.
355	..... <i>cancellata</i> , Migh. & Ad. (1842) ... ..	N	E	<i>Defrancia Pingelii</i> , Möll., 1842. <i>G. Pleurotoma</i>
355	..... <i>pleurotomaria</i> , Couth (1839)	N	E	<i>Buccinum pyramidale</i> , Ström, 179—. <i>G. Pleuro-</i> [ <i>toma</i> .
356	<i>Columbella avara</i> , Say ... ..	S	...	
357	..... <i>rosacea</i> , Gould, (1840) ...	N	E	<i>C. Holbollii</i> , Beck, Möll., [1842.
358	..... <i>dissimilis</i> , St. ....	N	...	
359	..... <i>lunata</i> , Say ... ..	S	...	
360	<i>Purpura lapillus</i> ... ..	N	E	
362	<i>Nassa obsoleta</i> , Say ... ..	N	...	Subgenus <i>Desmoulea</i> .
364	..... <i>trivittata</i> , Say (1822) ...	N	...	<i>N. propinqua</i> , J. Sow., 1824
365	..... <i>vibex</i> , Say ... ..	S	...	
366	<i>Buccinum undatum</i> , L. ....	N	E	
368	..... <i>ciliatum</i> , Fabr. ... ..	N	E	Not that species, but <i>B.</i> <i>undulatum</i> , Möll.
369	..... <i>Donovani</i> , Gray (1839) ...	N	E	<i>B. glaciale</i> , L., 1766.
370	..... <i>cinereum</i> , Say ... ..	N	...	<i>G. Urosalpinx</i> , allied to <i>Purpura</i> .
371	<i>Fusus Islandicus</i> , Gm. ... ..	N	...	Not that species, but <i>F.</i> <i>curtus</i> , Jeffr.
372	..... <i>pygmæus</i> , St. ....	N	...	Not <i>Buccinum Sabini</i> or <i>Fusus Sabini</i> , Gray.
373	..... <i>ventricosus</i> , Gray ... ..	N	...	
374	..... <i>tornatus</i> , Gould (1840) ...	N	E	<i>F. despectus</i> , L., 1766.
375	..... <i>decemcostatus</i> , Say ... ..	N	...	
377	<i>Trophon clathratus</i> , L. ....	N	E	Not that species, but <i>T.</i> <i>truncatus</i> , Str.
378	..... <i>scalariformis</i> , Gould (1840)	N	E	<i>T. clathratus</i> , L., 1766.

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379	<i>Trophon muricatus</i> , Mont. ...	N	E	Doubtful as American.
380	<i>Busycon canaliculatum</i> , L. ...	S		
383	..... <i>carica</i> , Gm. ...	S		
385	<i>Fasciolaria ligata</i> , Migh. & Ad. ...	N		
386	<i>Ranella caudata</i> , Say ...	S		
387	<i>Cerithiopsis Emersonii</i> , Ad. ...	S	...	<i>G. Cerithium</i> , not <i>Cerithiopsis</i> .
389	..... <i>terebialis</i> , Ad. (1841) ...	S	E	<i>C. trilineata</i> , Ph., 1836.
390	<i>Trichotropis borealis</i> , Sowi. ...	N	E	Broderip and Sowerby's species.
391	<i>Admete viridula</i> , Fabr. ...	N	E	
394	<i>Vitrina limpida</i> , Gould, (1850) ...	N	E	<i>V. pellucida</i> , Mull., 1744
395	<i>Hyalina cellaria</i> , Müll. ...	N	E	<i>G. Zonites</i> .
396	..... <i>arborea</i> , Say ...	N	..	Closely allied to <i>Z. excavatus</i> , but umbilicus much less open.
397	..... <i>electrina</i> , Gould (1841) ...	N	E	<i>Zonites radiatulus</i> , Alder,
398	..... <i>indentata</i> , Say ...	N		[1830, var. <i>alba</i> .
399	..... <i>minuscula</i> , Binney ...	S		
400	..... <i>Binneyana</i> , Morse ...	N		
401	..... <i>milium</i> , Morse ...	N		
401	..... <i>ferrea</i> , Morse ...	N		
402	..... <i>chersina</i> , Say (1821) ...	N	E	<i>Zonites fulvus</i> , Mull., 1774
403	..... <i>minutissima</i> , Lea (1841) ...	N	E	<i>Helix pygmaea</i> , Drap., 1805
404	..... <i>multidentata</i> , Binney ...	N		
404	..... <i>lineata</i> , Say ...	N		
406	<i>Macrocyclus concava</i> , Say ...	N		
407	<i>Limax maximus</i> , L. ...	N	E	
408	..... <i>agrestis</i> , L. ...	N	E	
409	..... <i>campestris</i> , Binney (1841) ...	N	E	<i>L. levis</i> , Mull., 1774.
410	..... <i>flavus</i> , L. ...	N	E	
412	<i>Helix alternata</i> , Say ...	N		
413	..... <i>striatella</i> , Anthony ...	N		
415	..... <i>asteriscus</i> , Morse ...	N		
415	..... <i>labyrinthica</i> , Say ...	N		
417	..... <i>hirsuta</i> , Say ...	N		
418	..... <i>monodon</i> , Rackett ...	N		
420	..... <i>palliat</i> a, Say ...	N		
422	..... <i>tridentata</i> , Say ...	N		
423	..... <i>albolabris</i> , Say ...	N		
424	..... <i>dentifera</i> , Binn. ...	N		
425	..... <i>thyroides</i> , Say ...	N		
426	..... <i>Sayii</i> , Binn. ...	N		
427	..... ? <i>harpa</i> , Say ...	N	E	Sweden.
428	..... <i>pulchella</i> , Müll. ...	N	E	
429	..... <i>hortensis</i> , Müll. (1774) ...	N	E	<i>H. nemoralis</i> , L., 1766 var.
431	<i>Cionella subcylindrica</i> , L. ...	N	E	Perhaps that species, but described as inhabiting fresh water. <i>Cochlicopa lubrica</i> , Mull.
433	<i>Pupa muscorum</i> , L. ...	N	E	Linne's species is unascertainable. <i>P. marginata</i> , Drap.
433	..... <i>Hoppii</i> , Möll ...	N		
434	..... <i>pentodon</i> , Say ...	N		
435	..... <i>decora</i> , Gould ...	N		
436	..... <i>fallax</i> , Say ...	S		
437	..... <i>armifera</i> , Say ...	N		
438	..... <i>contracta</i> , Say ...	N		
439	..... <i>rupicola</i> , Say ...	N		

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439	Pupa corticaria, <i>Say</i> ... ..	N		
440	Vertigo Gouldii, <i>Binn.</i> (1843)	N	E	<i>V. alpestris</i> , Ald., 1830.
441	..... milium, <i>Gould</i> ... ..	N		
442	..... Bollesiana, <i>Morse</i> (1865)	N	E	<i>V. pygmaea</i> , Drap., 1801.
442	..... ovata, <i>Say</i> (1822) ... ..	N	E	<i>V. antiwertigo</i> , Drap., 1801
443	..... ventricosa, <i>Morse</i> (1865)	N	E	<i>V. Moulinsiana</i> , Dy., 1843
444	..... simplex, <i>Gould</i> (1840) ...	N	E	<i>V. edentula</i> , Drap., 1805.
445	Succinea ovalis, <i>Gould</i> (1841)	N	E	<i>S. elegans</i> , Risso. 1826.
446	..... avara, <i>Say</i> ... ..	N		Allied to <i>S. putris</i> , var. <i>ochracea</i>
447	..... obliqua, <i>Say</i> (1824) ... ..	N	E	<i>S. putris</i> , L., 1766.
448	..... Totteniana, <i>Lea</i> ... ..	N		<i>S. putris</i> , var.
451	Arion fuscus, <i>Müll</i> (1774) ... ..	N	E	Perhaps that species. <i>A.</i> <i>hortensis</i> , Ferussac 1819. <i>Zonites</i> is masculine; see [De Montfort.
453	Zonites inornata, <i>Say</i> ... ..	N		
454	..... suppressa, <i>Say</i> ... ..	N		
454	..... fuliginosa, <i>Griffith</i> ... ..	N		
457	Tebennophorus dorsalis, <i>Binn.</i>	N		
465	Alexia myosotis, <i>Drap.</i> ... ..	N	E	<i>G. Melampus</i> .
466	Carychium exiguum, <i>Say</i> (1822)	N	E	<i>C. minimum</i> , Mull., 1774.
467	Melampus bidentatus, <i>Say</i> ... ..	N		Specific name preoccupied. <i>M. corneus</i> , Desh.
471	Limnaea columella, <i>Say</i> (1817)	N	E	<i>L. peregrina</i> , Mull., 1774.
473	..... decollata, <i>Migh.</i> ... ..	N		<i>L. catascopium</i> , var.
474	..... ampla, <i>Migh.</i> ... ..	N		
475	..... elodes, <i>Say</i> (1821) ... ..	N	E	<i>L. palustris</i> , Mull., 1774.
478	..... desidiosa, <i>Say</i> ... ..	N		<i>L. truncatula</i> , var.
479	..... catascopium, <i>Say</i> ... ..	S		
480	..... umbilicata, <i>Ad.</i> ... ..	N		Allied to <i>L. truncatula</i> .
481	..... pallida, <i>Ad.</i> ... ..	N		<i>L. truncatula</i> , var. <i>elegans</i> .
482	..... humilis, <i>Say</i> (1822) ... ..	N	E	<i>L. truncatula</i> , Mull., 1774
483	Physa heterostropha, <i>Say</i> ... ..	N		More nearly allied to <i>P.</i> <i>rivalis</i> , Mat. & Rack. than [to <i>P. fontinalis</i> .
485	..... ancillaria, <i>Say</i> ... ..	S		
486	Bulinus elongatus, <i>Say</i> (1821)	N	E	<i>Physa hypnorum</i> , L., 1766.
488	Planorbis trivolvis, <i>Say</i> ... ..	N		
490	..... lentus, <i>Say</i> ... ..	N		<i>P. trivolvis</i> , var.
491	..... bicarinatus, <i>Say</i> ... ..	N		
492	..... campanulatus, <i>Say</i> ... ..	N		
493	..... hirsutus, <i>Gould</i> (1840) ... ..	N	E	<i>P. albus</i> , Mull., 1774.
494	..... deflectus, <i>Say</i> ... ..	N		<i>P. albus</i> , var. <i>Draparnaldi</i>
495	..... exacutus, <i>Say</i> ... ..	N		Allied to <i>P. nitidus</i> .
497	..... parvus, <i>Say</i> (1817-19) ... ..	N	E	<i>P. glaber</i> , Jeffr., 1828.
498	..... dilatatus, <i>Gould</i> ... ..	N	E	Perhaps introduced into England and naturalized
499	Segmentina armigera, <i>Say</i> ... ..	N		<i>G. Planorbis</i> .
501	Ancylus parallelus, <i>Hald.</i> ... ..	N		Allied to <i>A. lacustris</i> .
502	..... fuscus, <i>Ad.</i> ... ..	N		
504	Diacria trispinosa, <i>Lesueur</i> ... ..	N	E	<i>G. Cavolina</i> .
504	Psyche globulosa, <i>Rang</i> ... ..	N		
505	Heterofusus balea, <i>Moll</i> ... ..	N		<i>G. Spirialis</i> .
505	..... retroversus, <i>Fleming</i> ... ..	N	E	<i>G. Spirialis</i> .
507	Clione limacina, <i>Phipps</i> (1773)	N	E	<i>C. papilionacea</i> , Pall. 1766
509	Loligopsis pavo, <i>Les.</i> ... ..	N		
510	Ommastrephes sagittatus, <i>Fér &amp;</i> <i>D'Orb</i> ... ..	N		Lamarck's species. <i>G. Om-</i> [ <i>matostrephes</i> .
513	Loligo punctata, <i>De Kay</i> ... ..	N		
514	..... Pealei, <i>Les.</i> ... ..	N		
516	Spirula fragilis, <i>St.</i> , (1860) ... ..	S		<i>S. australis</i> , Brug. 1789-92



