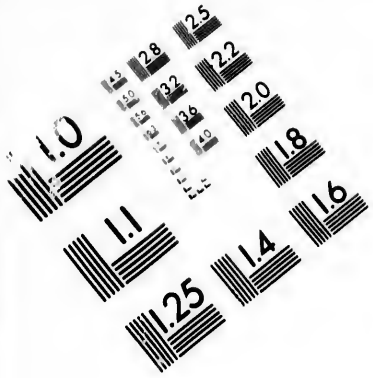


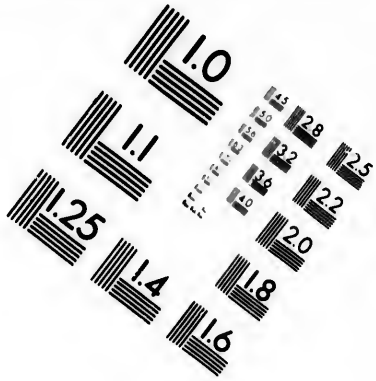
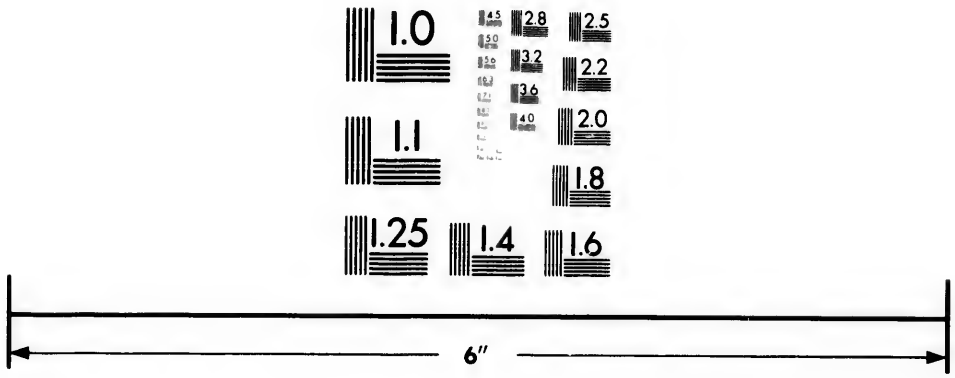
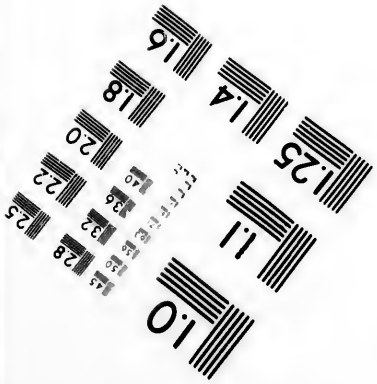
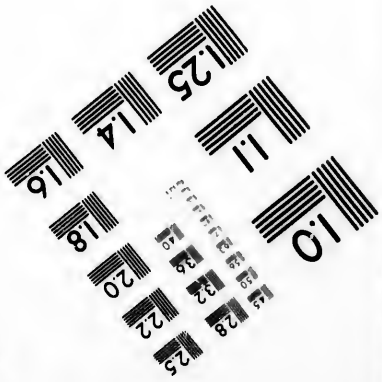


IMAGE EVALUATION TEST TARGET (MT-3)







Photographic Sciences Corporation

23 WEST MAIN STREET
WEBSTER, N.Y. 14580
(716) 872-4503

CIHM/ICMH
Microfiche
Series.

CIHM/ICMH
Collection de
microfiches.

Canadian Institute for Historical Microreproductions / Institut canadien de microreproductions historiques

© 1981

Technical and Bibliographic Notes/Notes techniques et bibliographiques

The Institute has attempted to obtain the best original copy available for filming. Features of this copy which may be bibliographically unique, which may alter any of the images in the reproduction, or which may significantly change the usual method of filming, are checked below.

L'Institut a microfilmé le meilleur exemplaire qu'il lui a été possible de se procurer. Les détails de cet exemplaire qui sont peut-être uniques du point de vue bibliographique, qui peuvent modifier une image reproduite, ou qui peuvent exiger une modification dans la méthode normale de filmage sont indiqués ci-dessous.

- ☐ Coloured covers/ Couverture de couleur
- ☐ Covers damaged/ Couverture endommagée
- ☐ Covers restored and/or laminated/ Couverture restaurée et/ou pelliculée
- ☐ Cover title missing/ Le titre de couverture manque
- ☐ Coloured maps/ Cartes géographiques en couleur
- ☐ Coloured ink (i.e. other than blue or black)/ Encre de couleur (i.e. autre que bleue ou noire)
- ☐ Coloured plates and/or illustrations/ Planches et/ou illustrations en couleur
- ☑ Bound with other material/ Relié avec d'autres documents
- ☐ Tight binding may cause shadows or distortion along interior margin/ La reliure serrée peut causer de l'ombre ou de la distortion le long de la marge intérieure
- ☐ Blank leaves added during restoration may appear within the text. Whenever possible, these have been omitted from filming/ Il se peut que certaines pages blanches ajoutées lors d'une restauration apparaissent dans le texte, mais, lorsque cela était possible, ces pages n'ont pas été filmées.
- ☐ Additional comments:/ Commentaires supplémentaires:

- ☐ Coloured pages/ Pages de couleur
- ☑ Pages damaged/ Pages endommagées
- ☐ Pages restored and/or laminated/ Pages restaurées et/ou pelliculées
- ☑ Pages discoloured, stained or foxed/ Pages décolorées, tachetées ou piquées
- ☐ Pages detached/ Pages détachées
- ☑ Showthrough/ Transparence
- ☐ Quality of print varies/ Qualité inégale de l'impression
- ☐ Includes supplementary material/ Comprend du matériel supplémentaire
- ☐ Only edition available/ Seule édition disponible
- ☐ Pages wholly or partially obscured by errata slips, tissues, etc., have been refilmed to ensure the best possible image/ Les pages totalement ou partiellement obscurcies par un feuillet d'errata, une pelure, etc., ont été filmées à nouveau de façon à obtenir la meilleure image possible.

This item is filmed at the reduction ratio checked below/
Ce document est filmé au taux de réduction indiqué ci-dessous.

10X	12X	14X	16X	18X	20X	22X	24X	26X	28X	30X	32X
						✓					

The copy filmed here has been reproduced thanks to the generosity of:

D.B. Weldon Library
University of Western Ontario

The images appearing here are the best quality possible considering the condition and legibility of the original copy and in keeping with the filming contract specifications.

Original copies in printed paper covers are filmed beginning with the front cover and ending on the last page with a printed or illustrated impression, or the back cover when appropriate. All other original copies are filmed beginning on the first page with a printed or illustrated impression, and ending on the last page with a printed or illustrated impression.

The last recorded frame on each microfiche shall contain the symbol → (meaning "CONTINUED"), or the symbol ▽ (meaning "END"), whichever applies.

Maps, plates, charts, etc., may be filmed at different reduction ratios. Those too large to be entirely included in one exposure are filmed beginning in the upper left hand corner, left to right and top to bottom, as many frames as required. The following diagrams illustrate the method:

L'exemplaire filmé fut reproduit grâce à la générosité de:

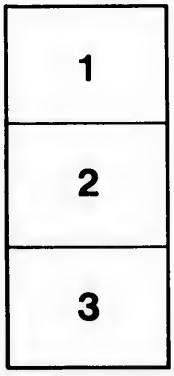
D.B. Weldon Library
University of Western Ontario

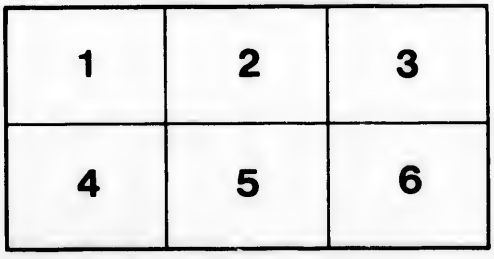
Les images suivantes ont été reproduites avec le plus grand soin, compte tenu de la condition et de la netteté de l'exemplaire filmé, et en conformité avec les conditions du contrat de filmage.

Les exemplaires originaux dont la couverture en papier est imprimée sont filmés en commençant par le premier plat et en terminant soit par la dernière page qui comporte une empreinte d'impression ou d'illustration, soit par le second plat, selon le cas. Tous les autres exemplaires originaux sont filmés en commençant par la première page qui comporte une empreinte d'impression ou d'illustration et en terminant par la dernière page qui comporte une telle empreinte.

Un des symboles suivants apparaîtra sur la dernière image de chaque microfiche, selon le cas: le symbole → signifie "A SUIVRE", le symbole ▽ signifie "FIN".

Les cartes, planches, tableaux, etc., peuvent être filmés à des taux de réduction différents. Lorsque le document est trop grand pour être reproduit en un seul cliché, il est filmé à partir de l'angle supérieur gauche, de gauche à droite, et de haut en bas, en prenant le nombre d'images nécessaire. Les diagrammes suivants illustrent la méthode.





32X

CATALOGUE

OF THE

LEPIDOPTERA

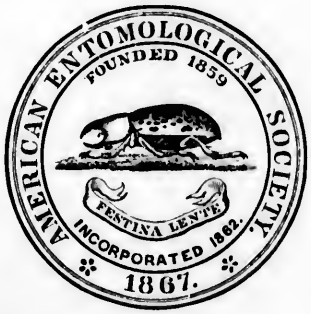
OF

AMERICA NORTH OF MEXICO.

PART I.—DIURNALS.

BY

WILLIAM H. EDWARDS.



PHILADELPHIA:
AMERICAN ENTOMOLOGICAL SOCIETY.
1877.

CATALOGUE

OF THE

DIURNAL LEPIDOPTERA

OF

AMERICA NORTH OF MEXICO.

ADVERTISEMENT.

Since the publication of the Synopsis which completed the first volume of the "Butterflies of North America," in 1872, a large number of new species have been described, belonging to the North American fauna, while the position of many given in the Synopsis has been determined by bringing together the types from several collections. Many also were included on various information, now regarded as erroneous. And much has been learned, in the last few years, of the phenomena of dimorphism, whereby two or more forms which had been regarded as distinct species have resolved into one.

For these reasons, if no other, a new catalogue of species of the Diurnals is required. And indeed, for many and good reasons, new and reformed catalogues of every class of the Lepidoptera of North America are required, and it is intended that this shall be the first of a complete series.

In the preparation of the present one I have received large assistance from Mr. Lintner and Mr. Henry Edwards, and, in general, the plan herein adopted, and the changes from the Synopsis, both as to the genera and species, have met their approval. I have also availed myself somewhat of Mr. Scudder's recent Revisions and Lists, so far as regards the species, though differing widely from him as to the genera and nomenclature.

It will be found that something over twenty species formerly accredited to the fauna have been dropped, and this has been done for want of authentication, no modern collector, so far as I have been able to learn, having taken any of these species within our territory. Several of them, all sub-tropical, were included in the Synopsis from verbal information received by me when I first began to collect butter-

flies. Others were found in Weidemeyer's Catalogue, 1864, and in works of various authors. Any such species which has not been taken within the United States the last twenty years, during which the whole country has been searched by eager collectors, may be set down as a very rare visitor, and good evidence is needed to prove that it was ever found here. A list of such species will, however, be given, for the satisfaction of any person who prefers to consider them as entitled to recognition.

For the same reason, I omit all of Mr. Reakirt's Southern Californian species which have not been seen by collectors since he gave them a habitat. These were obtained from Mr. Lorquin, the younger, who notoriously mixed his Mexican with Californian and even European insects, unlabelled, whence Mr. Reakirt was led into several admitted errors.

It has not been considered necessary to encumber these pages with references to works that are inaccessible to most of the lepidopterists and collectors of the country, and therefore I have given from such works merely enough to accredit the species; but have quoted fully from American authors, or others who have treated especially of American butterflies. Students who desire farther and fuller information can readily find it in Kirby's Catalogue, a most valuable and surprisingly accurate work in its references, and which no one who cares to know of the literature of the science should be without. I have also made references to authors who have treated of the preparatory stages, no matter how briefly, or of the habits of either larva or imago, and have indicated this class of information by a special sign.

In the general arrangement, while adopting the families and subfamilies of some of the later systematists, I adhere mainly to the order of Doubleday and his associates in the "Genera of Diurnal Lepidoptera." I have not seen reasons to induce me to follow these systematists spoken of in their radical changes, whereby the Papilionidæ are degraded, founded as they avowedly are on partial characters drawn from the imago, and almost regardless of the preparatory stages.

A great many systems of arrangement have had their rise and fall within the last half century based on one character or other of the imago, and it is safe to say that none will be other than temporary which does not regard the egg, and larva and chrysalis, as well as the butterfly. And it will be a very long time before the knowledge of the Lepidoptera is so complete as to permit of any permanent arrangement.

Certainly I do not believe the Papilionidæ to be the nearest allies

ot the Hesperidæ, and through them of the Heterocera, and can confidently assert that, in the preparatory stages, these two families are as unlike as any of the series. And as to the butterflies themselves they stand at the two poles. Even Mr. Bates says of the Papilionidæ, they are "quite unconnected with the Hesperidæ, no connecting links between the two families being known." (Jl. of Entom. 1861, Dec.) In the imago, some Danainæ and Heliconiinæ closely resemble species of Papilioninæ and of Pierinæ, and in any arrangement these four sub-families should stand near each other. But the fact of atrophied fore legs in Danais should no more give it precedence over Papilio than does such atrophy in other orders of insects give pre-eminence to the species subject to this phenomenon, or to the genera and families which contain them.

I do not believe that one family of the Diurnals has necessarily been evolved from another, and all from the Heterocera, by successive stages, in a direct line, as is implied in the arrangement I object to, but rather that, if such development may have sometimes taken place, in other cases families have radiated from a common progenitor, just as a group of species has done. And here and there resemblances between such families must be expected to occur, just as they do occur between the species, in both cases merely because they had a common origin.

The proposition is enunciated by Mr. Darwin, that "distinct species present analogous variations, and a variety of one species often assumes some of the characters of an allied species, or reverts to some of the characters of an early progenitor." And what is true of species is just as true of genera and families.

Moreover there may be affinities which are so only in appearance, arrived at through "biological necessity," as where the larvæ of Parnassius protects its chrysalis by a sort of coccoon, after the fashion of certain of the Heterocera, a fact much insisted on by the advocates of the modern arrangement. Now that habit may well have been found useful in this genus, considering the exposure to which the species are subject, dwelling on lofty mountains, treeless, often shrubless, and storm-swept. A naked and suspended chrysalis would stand a poor chance of surviving in such a region, and it is well known that the Parnassians alone of the Papilioninæ have been able to gain and maintain a foothold in elevated districts. That they have done it is owing to the necessary modification of the habits of the larvæ, and it is a singular notion that success in such respect should work the degradation of themselves and all their blood relations.

I have followed the recommendation of the Committee of the British Association of 1842, by giving the terminations of family and subfamily names in *idæ* and *inæ*, a practice very generally adopted since that day and both simple and convenient.

And I have aimed at presenting the genera, at least as far as Hesperidæ, as nearly as possible as they existed thirty years ago, when Doubleday's great work was published, in which each genus was carefully and elaborately defined. This was before the tendency towards incorporating the whole of Hübner's bekannter Schmetterlinge into the nomenclature began to prevail, or creating genera by wholesale by mere indication of types, without definition, or encroaching on the rights of species by creating so-called genera on infinitesimal differences.

The Rules adopted at Buffalo have in great degree delivered us from these evils. If genera are founded in nature, then nature should be followed, and a compact group like Parnassius, Colias, Callidryas, Argynnis, should receive a genus name. And if subdivisions be desirable for the sake of convenience, in the genera which have numerous species, they should be divided into sections. Such sections whether natural or artificial are not genera. Nevertheless it has been the fashion of late to split up a genus into numerous, co-equal, so-called genera, with no clue in their several names to their relationship. If genera are artificial creations, made for convenience, it must be in the last degree improper that they should be multiplied so as to overwhelm the science, and bury it out of sight. I follow the example of Doubleday and Boisduval in this matter.

And as a first step in the much needed reform, I strike out the name of Hübner wherever it is appended to a genus, neither believing Hübner's coitus to be genera, nor even could they be so held, that they received from Hübner satisfactory definition. Doubleday introduced a few of these coitus names for his own genera, and out of courtesy attached the letters "Hüb." to them. His example has finally led to the wholesale displacement of his own name and the names of his associates, and of the many distinguished lepidopterists of the last two generations, by the accrediting a large proportion of the existing genera to Hübner. I have shown elsewhere (Can. Ent. vol. 8), the injustice of these proceedings, and refuse to be a party to them. In every case, the genus in this Catalogue is, or is intended to be, credited to the author who first proposed and described it, and courtesy gives place to justice.

It remains to speak of the arrangement of the Hesperidæ. Mr.

Scudder, several years ago, furnished me the names he adopted in his revision of this family,—the only family, by the way, connected with our fauna, which needed revision,—sending them from Europe, and I received his list barely in time to include it in the closing pages of the Synopsis and my volume, with no interval for examination or explanation. To this day it stands a bare list of names, without authority, the groups indicated never having received definition. It was at once found objectionable on account of the excessive restriction of the groups called genera, there being no less than thirty-nine to one hundred and six species. Prof. Zeller, (Ent. Zeit. Stet. 1874), might well ask, "what would become of us if all the Hesperians of the world, and all the Lepidoptera also, were thus split up into such genera. The least result would be that the difficulty of determining the species would resolve itself into the greater one of determining the genus." Some few of these groups would doubtless stand as genera, if defined, but in most cases, there is no reason why several should not be embraced in a single genus. That I gave them currency and endorsement through the Synopsis has been a matter for regret.

Inasmuch as the Hesperidæ undoubtedly needed revision, Dr. Otto Speyer kindly consented, at the request of Mr. Lintner, to undertake the task. It is believed that the arrangement proposed by him will be satisfactory. But it must not be forgotten that any present arrangement of this family, much more for one geographical section of it, is only provisional. Of this Dr Speyer himself writes: "A systematic treatment of the Hesperidæ is a very difficult task, and, according to my opinion, can only be accomplished with reference to the whole known family, in all parts of the world, of which the American Hesperians form only a small fragment. But as there exists at present no general system for this family answering all demands, and as there is not likely to be one very soon, local specialists are obliged to confine themselves, whether they will or not, to their own species. Even for the European fauna, we have been obliged to content ourselves with a highly deficient provisional grouping of the Hesperians, so imperfect indeed, that I have not been able yet to accept these so-called genera, and in my own collection, I still bring everything under the name Hesperia,—a procedure allowable, under the circumstances, for the European fauna, poor in species, but not suitable for the richer American fauna."

W. H. EDWARDS.

Coalburgh, W. Va. Feb. 1877.

NAMES OF AUTHORS AND WORKS QUOTED

AND ABBREVIATIONS USED.

AGASSIZ, L.—Lake Superior, 1850.
AM. ENT.—American Entomologist, St. Louis, 1869–70.
AM. NAT.—American Naturalist.
ANN. N. Y. LYC. N. HIST.—Annals of the New York Lyceum of Natural History.
ANN. SOC. ENT. FR.—Annals de la Societé Entomologique de France.
BATES, H. W.
BEHR, Dr. Hermann.
BETHUNE, Rev. C. J.
BLANCH.—Blanchard.
BD.—Dr. Boisduval, Icones historique des Lepidopteres, 1833.
Species General des Lepidopteres I, 1836.
Lepidopteres de la Californie, 1869.
BD.-LEC.—Boisduval and Leconte. Lepidopteres de l'Amerique septentrionale, 1833.
BUL. BUF. SOC. N. SCI.—Bulletin of the Buffalo Society of Natural Sciences.
BUTLER, A. G.—Lepidoptera Exotica, 1869–74.
Catalogue of the Satyridæ in the British Museum, 1868.
CAN. ENT.—Canadian Entomologist.
CAN. NAT.—Canadian Naturalist.
CRAM.—Cramer, Papillons Exotiques, 1779–82.
CURTIS.—Appendix to Ross' Arctic Expedition, 1835.
DALM.—Dalman.
DE SAGRA.—Natural History of Cuba.
D'URBAN.
DODGE, G. M.
DOUB.—Doubleday, Edw.
DRURY.—Illustrations of Exotic Entomology, 1770–82.
H. EDW.—Edwards Henry. Pacific Coast Lepidoptera, 1875–77.
EDW.—Edwards, W. H. Butterflies of North America, Vol. I, 1868–72. Vol. II, 1874.
EN. AN. MUS. ST. PETERSBURG.—Enumeratio Corporum Animalium Musei Imperialis Academiæ Scientiarum Petropolitanæ, Part I, 1855–63.
ENC. METH.—Enclopedie Methodique.
ENTOM.—The Entomologist, London.
ENT. MO. MAG.—Entomologist's Monthly Magazine, London.
ESP.—Esper, Die Europaischen Schmetterlinge, 1777–94.
F.—Fabricius. Systema Entomologiæ, 1775.
Species Insectorum II, 1781.
Mantissa Insectorum II, 1787.
Entomologia Systematica III, 1793.

FELD.—Felder, Dr. C. Reise der Novara, 1867.
FISCH.—Fischer. Entomographie de la Russie, 1823–24.
FISHER.
FITCH, Dr. Asa.
FREYER.—Neuere Beitrage zur Schmetterlingskunde, 1831–58.
GEN. DI. LEP.—Genera of Diurnal Lepidoptera. Doubleday, Westwood and Hewitson, 1846–52.
GEYER.—Continuation of Hübner's Exotischer Schmetterlinge.
GODT.—Godart. Encyclopedie Methodique, IX.
GRAY, Dr. Edw.
GROTE, A. R.
GR.-ROB.—Grote and Robinson.
GUERIN.—Iconographie de Regne Animal, 1844.
HARR.—Harris, Dr. T. W. Insects Injurious to Vegetation, 2d. ed., 1862.
HERR.-SCHAEF.—Herrick. Schaeffer.
HEW.—Hewitson, W. C. Exotic Butterflies.
Illustrations of Lycænidæ.
HIST. NAT. DE CUBA.—Memorias sobre la Historia Natural de la Isla de Cuba, Poey, I, 1851.
HUB.—Hübner. Sammlung Europaischer Schmetterlinge, 1793–1827.
Sammlung Exotischer Schmetterlinge, 1816–24.
Zutraege zur Sammlung Exotischer Schmetterlinge, 1818–25.
HUMPH.-WEST.—Humphreys and Westwood. British Butterflies, 1848.
KIRBY, Rev. W.—Fauna Boreali-Americana IV, 1837.
KIRTLAND, Dr. C.
KOLL.—Kollar.
LATR.—Latreille.
LEACH, Dr. W. E.
LED.—Lederer.
LEF.—Lefebore, A.
L.—Linnæus. Museum Ludovicæ Ulricæ Reginæ, 1764.
Systema Naturæ II, 1767.
Mantissa I.
LINTN.—Lintner, J. A. Entomological Contributions.
LUCAS.
MAYNARD, C. J.
MEAD, T. L.—Report upon Geographical and Geological Explorations, etc., in charge of Lt. G. M. Wheeler, Vol. V. Zoology. Diurnal Lepidoptera.
MEN.—Ménétriés, E.
MEM. BOST. SOC. N. HIST.—Memoirs of the Boston Society of Natural History.
MO. ENT. REP.—Missouri Entomological Reports.
MORR.—Morris, Rev. J. G. Synopsis of the described Lepidoptera of North America, 1862.
OCHS.—Ochsheimer. Die Schmetterlinge von Europa, 1807–16.
PACK. GUI.—Packard, Dr. A. S. Jr. A Guide to the Study of Insects, 1869.
PARKER, Rev. H. W.
POEY, Prof. F.—Centurie Lepidopteres de l'ile de Cuba, 1832.
PUTNAM, F. W.
PSYCHE.—Organ of the Cambridge Entomological Club I, 1876.

Pa. Am. Ass. Adv. Sc.—Proceedings of the American Association for the Advancement of Science.
Pa. E. Soc. Ph.—Proceedings of the Entomological Society of Philadelphia.
Pa. Cal. Ac. N. Sci.—Proceedings of the California Academy of Natural Sciences.
Pa. Bost. Soc. N. Hist.—Proceedings of the Boston Society of Natural History.
Pa. Davenport Ac. N. Sci.—Proceedings of the Davenport (Iowa), Academy of Natural Sciences I.
Pa. Ess. Ins.—Proceedings of the Essex Institute, Salem.
Ramb.—Rambur.
Reak.—Reakirt, T.
Reg. Anim. de Cuv.—Regne Animal de Cuvier.
Rev. Zool.—Revue Zoologique, Paris.
Ridings, James.
Rep. Hayd. Exp.—Report on the Geological Survey of Montana, etc., Hayden.
Riley, C. V.—Missouri Entomological Reports.
Saund.—Saunders, W.
Say, Thos.—American Entomology, 1824-28.
Schrank.
Schneid.—Schneider, D. H.
Scud.—Scudder, S. H. A Systematic Revision of some of the American Butterflies, 1872.
Sill. Jl.—Silliman's American Journal of Science and Arts.
Sm.-Abb.—Smith and Abbot. Insects of Georgia, 1797.
Somm.—Sommer.
Speyer, Dr. Adolf.
Stoll.—Supplementband zu Papillons Exotiques, (Cramer), 1787-96.
Streck.—Streecker, H. Lepidoptera, 1872.
Swainson, W.
Thunb.—Thunberg. Dissertatio Insecta Suecica II, 1791.
Tr. A. E. Soc.—Transactions of the American Entomological Society.
Tr. Chic. Ac. N. Sci.—Transactions of the Chicago Academy of Natural Sciences.
Tr. Ent. Soc. Lond.—Transactions of the Entomological Society, London.
Tr. N. Y. St. Ag. Soc.—Transactions of the New York State Agricultural Society.
Von Prunn.—Von Prunner. Lepidoptera Pedemontana, 1793.
Walsh, B. D.
Westwood, Prof. J. O.
Whitney, C. P.
Wien. Ent. Monats.—Wiener Entomologische Monatschrift.

Signs used.—♂, male. ♀, female. ✳, mention of preparatory stages. ✕, species unknown to me, and perhaps not properly classified.

CATALOGUE.

PAPILIONIDÆ.

PAPILIONINÆ.

PAPILIO, L.

1. **Ajax**, L.

dim. var. WALSHII, Edw. But. N. A. 1, 1, pl. 1, ∗.
Marcellus, Cram.

sub.-var. *Abbotii*, Edw. l. c. pl. 1, fig. 6.
Ajax, Sm.-Abb. pl. 4, ∗.

dim. var. TELAMONIDES, Feld.—Edw. l. c. 2, pl. 2, ∗.
Ajax, Bd.-Lec. pl. 1.

dim. var. MARCELLUS, Bd.-Lec. 8, pl. 2. Edw. l. c. 3, pl. 3, ∗.
Ajax, Esper.

Hab.—Pennsylvania to Texas; Mississippi Valley.

2. **Sinon**, F.—Bd. Sp. Gen. 1, 260. Bd.-Lec. 11, pl. 3. Morr. 9.
Protesilaus, Drury.
Hab.—Florida, (occasional); Cuba.

3. **Philenor**, L.—Sm.-Abb. pl. 3, ∗. Say, 1, pl. 1. Bd. Sp. Gen. 1, 324. Bd.-Lec. 29, pl. 11, ∗. Morr. 6. Riley, 2d. Mo. Ent. Rep. 116, ∗.
Astinous, Cram.
Hab.—Atlantic to Pacific; Canada to Gulf of Mexico.

4. **Villiersii**, Bd.-Lec. 36, pl. 14. Morr. 12.
Hab.—Florida, (occasional); Cuba.

5. **Machaon**, L.—Morr. 12.
var. ALIASKA, Scud. Pr. Bost. Soc. N. Hist. 12, 45.
Hab.—British America; Alaska.

6. **Hippocrates**, Feld. Verh. Zool. Bot. Ges. 14, 314.
var. OREGONIA, Edw. Tr. A. E. Soc. 5, 208.
Hab.—Oregon; Columbia River, (coll. H. Edwards).

7. **Zolicaon,** Bd. Ann. Soc. Ent. Fr. 2, 10, 281. Morr. 4. Edw. But. N. A. 2, pl. 6, ✱. H. Edw. Pr. Cal. Ac. N. Sci. 5, 163, ✱. Streck. pl. 6, fig. 3, ♀.

Hab.—Oregon to Arizona; Montana; Colorado.

8. **Indra,** Reak. Pr. E. Soc. Ph. 6, 123. Streck. pl. 2, fig. 1, ♂. Putnam, Proc. Davenport Ac. N. Sci. 1, pl. 35, ♀.

Hab.—Colorado; Nevada.

9. **Pergamus,** H. Edw. Pr. Cal. Ac. N. Sci. 5, 423.

Hab.—Southern California.

10. **Bairdii,** Edw. Pr. E. Soc. Ph. 6, 200. Mead, Rep. Wheeler Exp. 5, 740.

Hab.—Arizona.

11. **Brevicauda,** Saund. in Pack. Guide, 245. Edw. But. N. A. 2, pl. 8, ✱.

Anticostiensis, Streck. pl. 2, fig. 2, ♀.

Hab.—Anticosti; Newfoundland; Quebec.

12. **Asterias,** F.—Bd. Sp. Gen. 1, 332. Bd.-Lec. 14, pl. 4, ✱. Morr. 5. Harr. 263, pl. 4, ✱. Lintn. Pr. E. Soc. Ph. 3, 51, ✱.

Troilus, Sm.-Abb. pl. 1.

Hab.—Atlantic to Pacific; Canada to Gulf of Mexico; Arizona.

var. ASTEROIDES, Reak. Pr. Ac. N. Sci. Ph. 1866, 43. Streck. pl. 6, fig. 4, ♀.

Hab.—Southern States; Arizona; occasional in Northern States.

var. CALVERLEYI, Grote, Pr. E. Soc. Ph. 2, 441, pl. 10, ♂. Edw. But. N. A. 2, pl. 11, ♂♀.

Hab.—Occasional on Long Island, (coll. Calverley), and Florida, (coll. Mead).

13. **Americus,** Koll.

Sadalus, Lucas, Rev. Zool. 1852, 133, pl. 10.

Hab.—Southern California; Arizona, (Wheeler Exp.).

14. **Troilus,** L.—Bd. Sp. Gen. 1, 334. Bd.-Lec. 26, pl. 10, ✱. Morr. 5. Harr. 266, ✱. Saund. Can. Ent. 1, 73, ✱.

Ilioneus, Sm.-Abb. pl. 2.

Hab.—Atlantic States; Mississippi Valley.

15. **Eurymedon**, Bd. Ann. Soc. Ent. Fr. 2, 10, 280. Morr. 4. Edw. But. N. A. 2, 1, pl. 1, ∗. H. Edw. Pr. Cal. Ac. N. Sci. 5, 164, ∗. Streck. pl. 4, fig. 1, ♂.
Hab.—California to British Columbia; Arizona to Montana.

16. **Rutulus**, Bd. Ann. Soc. Ent. Fr. 2, 10, 279. Morr. 3. H. Edw. l. c. 5, 165, ∗. Mead, Rep. Wheeler Exp. 5, 741.
Hab.—Pacific States; Rocky Mountains.

17. **Turnus**, L.—Say, pl. 40. Bd. Sp. Gen. 1, 338. Bd.-Lec. 19, pl. 6, 7, ∗. Morr. 2. Harr. 268, fig. 97, 98, ∗. Saund. Can. Ent. 1, 74; ibid, 6, 2, ∗. Lintn. Pr. E. Soc. Phila. 3, 50. Edw. But. N. A. 2, pl. 3, 4, ∗.
Hab.—Atlantic States to Rocky Mountains; British America to Mackenzie's River; Alaska; Canada; Nova Scotia; Newfoundland.

dim. var. ♀ GLAUCUS, L.—Bd.-Lec. 22, pl. 8, 9. Ridings, Pr. E. Soc. Ph. 1, 266. Walsh, l. c. 1, 349. Edw. But. N. A. 2, pl. 6.
Hab.—Southern New York, and Wisconsin to Gulf of Mexico; Kansas to Texas.

18. **Daunus**, Bd. Sp. Gen. 1, 342. Ridings, Pr. E. Soc. 1, 278, fig. 2. Edw. But. N. A. 2, pl. 2. H. Edw. Pr. Cal. Ac. N. Sc. 5, 325, ∗. Streck. pl. 6, fig. 1, 2. Mead, Rep. Wheeler Exp. 5, 741.
Hab.—Arizona to Montana; Oregon.

19. **Pilumnus**, Bd. Sp. Gen. 1, 340. Streck. pl. 2, fig. 3, ♂.
Hab.—Arizona; New Mexico.

20. **Palamedes**, Drury.
Calchas, Bd.-Lec. 17, pl. 5, ∗. Morr. 7.
Hab.—Florida to Virginia; Gulf States.

21. **Cresphontes**, Cram.
Thoas, Bd. Sp Gen. 1, 355. Bd.-Lec. 31, pl. 12, 13, ∗. Morr. 7.
Hab.—Southern and Western States; occasional in Wisconsin, Michigan and Ontario.

22. **Polydamas**, L.—Bd. Sp. Gen. 1, 321. Bd.-Lec. 37, pl. 15. Morr. 13.
Hab.—Florida; Cuba.

PARNASSIUS, Latr.

23. **Clodius,** Mén.—Edw. But. N. A. 1, 18, pl. 4, fig. 5, 6, ♂.
Hab.—California; Montana.

24. **Baldur.**
Clarius, Edw. (nec. Eversm.), l. c. pl. 4, fig. 1—4, ♂ ♀.
Hab.—California, Sierras; Utah; Montana.
var. MÉNÉTRIÉSII, H. Edw. Pr. Cal. Ac. N. Sci. v. 6.
Hab.—California.

25. **Smintheus,** Doub. Gen. Di. Lep. pl. 4. Edw. l. c. 1, 21, pl. 5—7. Mead, Rep. Wheeler Exp. 5, 742.
Sayii, Edw.
Hab.—Rocky Mountains; Montana to New Mexico; California.
var. BEHRII, Edw. l. c. pl. 6, fig. 3, 4.
Hab.—Colorado; California.

26. **Nomion,** Fisch.—Bd. Sp. Gen. 1, 397, pl. 2. Morr. 14.
Hab.—Alaska, Sitka, (coll. Behr.); Siberia.

27. **Eversmanni,** Mén.—Scud. Pr. Bost. Soc. N. Hist. 12, 45. Edw. l. c. 1, 25, pl. 7, fig. 6, 7.
Hab.—Alaska; Siberia.

PIERINÆ.

PIERIS, Schrank.

28. **Ilaire,** Godt.—Poey, Cent. Lep. Cuba, pl. Bd. Sp. Gen. 491.
Hab.—Florida, occasional; (coll. Mead).

29. **Monuste,** L.—Bd. Sp. Gen. 1, 495. Morr. 16.
Cleomes, Bd.-Lec. 43, pl. 16, ∗.
Hab.—Southern States; Texas.

30. **Menapia,** Feld.—Morr. 19. Edw. But. N. A. 1, 27, pl. 8, ♂; id. Suppl. Notes, l. c. 1, ♀. Streck. pl. 2, fig. 4, ♀. H. Edw. Pr. Cal. Ac. N. Sci. 5, 165, ∗. Mead, Rep. Wheeler Exp. 5, 743.
Tau, Scud. Pr. Bost. Soc. N. Hist. 3, 183.
Nimonia, Bd.
Hab.—California; Oregon; Colorado; Vancouver's Island.

31. **Beckerii,** Edw. But. N. A. 1, 28, pl. 8. Mead, l. c. 5, 745.
Hab.—Utah; Nevada; Arizona.

32. **Sisymbri,** Bd. Ann. Soc. Ent. Fr. 2, 10, 284. Morr. 17.
Hab.—California.

33. **Occidentalis,** Reak. Pr. E. Soc. Ph. 6, 133. Mead, Rep. Wheeler Exp. 5, 745.
Hab.—Rocky Mountains to the Pacific.

34. **Calyce,** Edw. Tr. A. E. Soc. 3, 189.
Hab.—Nevada, (perhaps spring form of *Occidentalis*).

35. **Protodice,** Bd.-Lec. 45, pl. 17. Morr. 17. Riley, 2d. Mo. Ent. Rep. 104, ∗.
dim. var. VERNALIS, Edw. Pr. E. Soc. Ph. 2, 501; id. But. N. A. 1, 31, pl. 9.
Nasturtii, Edw.
Hab.—Middle, Southern and Western States, to Pacific.

36. **Oleracea,** Bd. Spec. Gen. 1, 518. Harr. 270, fig. 99; id. in Agassiz' Lake Superior, 386, pl. 7, fig. 1. Morr. 19. Riley, 2d. Mo. Ent. Rep. 105. ∗. Lintn. Ent. Cont. 1, 28, ∗. Bethune, Can. Ent. 5, 37, ∗.
Cruciferarum, Bd.
Casta, Kirby, Faun. Bor. Am. 4, pl. 3, fig. 1.
Iberidis, Bd.
Hab.—Northern States; Rocky Mountains; New Mexico; California; British America; Canada; Nova Scotia.

37. **Virginiensis,** Edw. Tr. A. E. Soc. 3, 13; id. But. N. A. 1, 32, pl. 9.
Hab.—West Virginia; occasional in New York and Canada.

38. **Napi,** L.
dim. var. PALLIDA, Scud. Pr. Bost. Soc. N. Hist. 3, 183.
Castoria, Reak.
Nasturtii, Bd.
Napi, Streck. pl. 8, fig. 4, 5.
dim. var. NAPÆÆ, Esper.
Venosa, Scud. l. c. 8, 182.
Frigida, Scud. l. c. 8, 181.
Napi, Streck. pl. 8, fig. 2, 3.
Hab.—California to British Columbia and Alaska; Labrador.
dim. var. BRYONIÆ, Ochs.
Hulda, Edw. (arctic form), Tr. A. E. Soc. 2, 370.
Hab.—Kodiak.

39. **Rapæ**, L.—Riley, 2d. Mo. Ent. Rep. 108, *.
dim. var. MARGINALIS, Scud. Pr. Bost. Soc. N. Hist. 8, 182
Rapæ, Streck. pl. 8, fig. 6.
dim. var. YREKA, Reak. Proc. Ac. N. Sci. Ph. 1866, 32.
Resedæ, Bd.
Rapæ, Streck. pl. 8, fig. 7.
var. NOV.-ANGLIÆ, Scud. Can. Ent. 4, 79. Streck. pl. 8, fig. 8.
Hab.—United States; British Columbia; Canada; Nova Scotia.

NATHALIS, Bd.

40. **Iole**, Bd. Sp. Gen. 1, 589. Morr. 12. Mead, Rep. Wheeler Exp. 5, 747.
var. *Irene*, Fitch, Tr. N. Y. St. Ag. Soc. 1856, 485.
Hab.—Missouri to California; New Mexico; Arizona.

ANTHOCHARIS, Bd.

41. **Lanceolata**, Bd. Ann. Soc. Ent. Fr. 2, 10, 284. Morr. 21. Streck. pl. 6, fig. 5.
Edwardsii, Behr.
Hab.—California.

42. **Creusa**, Doub. Gen. Di. Lep. pl. 7.
Hyantis, Edw. Tr. A. E. Soc. 3, 205.
Hab.—Colorado to California; Rocky Mountains.

43. **Olympia**, Edw. l. c. 3, 266; id. But. N. A. 2, pl. 1 of Anth.
Hab.—West Virginia; Missouri; Kansas; Texas.

44. **Ausonides**, Bd. Lep. de la Cal. 40. Edw. But. N. A. 2, pl. 1 of Anth. *; id. Pr. E. Soc. Ph. 2, 81. Mead, Rep. Wheeler Exp. 5, 747.
Hab.—Colorado to California; Rocky Mountains.

45. **Cethura**, Feld. Reise Nov. 2, 182, pl. 25.
Cooperii, Behr.—Edw. But. N. A. 1, 36, pl. 10.
Angelina, Bd.
Hab.—Southern California.

46. **Sara**, Bd. Ann. Soc. Ent. Fr. 2, 10, 285. Morr. 21. Edw. But. N. A. 1, 37, pl. 11.
Hab.—California.

47. **Reakirtii**, Edw. Tr. A. E. Soc. 2, 369; id. But. N. A. 1, 35, pl. 10.
Hab.—California.

48. **Julia**, Edw. Tr. A. E. Soc. 4, 61. Streck. pl. 6, fig. 6, 7. Mead, Rep. Wheeler Exp. 5. 748.
Hab.—Colorado; New Mexico; Arizona.

49. **Genutia**, Bd. Sp. Gen. 1, 565. Morr. 20.
Hab.—New York to Virginia; Western States; Texas.

CALLIDRYAS, Bd.

50. **Eubule**, L.—Sm.-Abb. pl. 5, ∗. Bd. Sp. Gen. 1, 613. Morr. 25. Bd.-Lec. 74, pl. 24. Butler, Lep. Exot. 58, pl. 22.
Hab.—Southern States; occasional in Mississippi Valley; Ohio; Arizona; West Virginia and Long Island.

51. **Sennæ**, L.—Butler, l. c. 59, pl. 23.
♂ *Marcellina*, Cram.
♀ *Eubule*, Cram.
var. ♀ *Orbis*, Poey, Cent. Lep. Cuba, pl.
Hab.—Florida; Texas; Kansas; Nebraska, occasional; (coll. Dodge).

52. **Agarithe**, Bd. Sp. Gen. 1, 623. Butler, l. c. 121, pl. 45.
Hab.—Texas; (auct. Butl.).

53. **Philea**, L.—Bd. Sp. Gen. 1, 619. Butler, l. c. 92, pl. 35.
Hab.—Texas, occasional; also Illinois, (Am. Ent. 2, 340).

GONEPTERYX, Leach.

54. **Lyside**, Godt.—Bd. Sp. Gen. 1, 603. Morr. 24.
Hab.—Texas.

COLIAS, F.

Group I.

55. **Eurydice**, Bd. Ann. Soc. Ent. Fr. 3, 1855, 32. Edw. But. N. A. 1, 51, pl. 16. H. Edw. Proc. Cal. Ac. N. Sci. v. 6, ∗.
Wosnesenski, Mén.—Morr. 32.
♀ *Rhamni*, Bd.
Hab.—California; Oregon; Arizona.

56. **Cæsonia**, Stoll.—Bd. Spec. Gen. 1, 635. Morr. 27. Bd.-Lec. 67, pl. 22.
Hab.—Southern States; Miss. Valley; Kansas; Texas; Ariz.

Group II.

57. **Meadii**, Edw. Tr. A. E. Soc. 3, 267; id. But. N. A. 1, 58, pl. 19. Mead, Rep. Wheeler Exp. 5, 750.
Hab.—Colorado; Montana; New Mexico.

Group III.

58. **Hecla**, Lef. Ann. Soc. Ent. Fr. 5, 384.
Hab.—Greenland; Disco Island.

59. **Boothii**, Curtis, App. Ross Exp. 65, pl. A, fig. 3—5.
var. *Chione*, Ross, l. c. fig. 5, 6.
Hab.—Arctic America.

60. **Eurytheme**, Bd. Ann. Soc. Ent. Fr. 2, 10, 286. Morr. 29. Edw. But. N. A. 1, 43, pl. 14. H. Edw. Proc. Cal. Ac. N. Sci. 5, 162, ∗. Mead, Rep. Wheeler Exp. 5, 748.
Amphidusa, Bd.
Edusa, var. *Californica*, Mén.
Hab.—Southern and Western States to the Pacific; occasional in Middle States, Ontario and Quebec.

61. **Keewaydin**, Edw. But. N. A. 1, 47, pl. 15.
var. *Ariadne*, Edw. Tr. A. E. Soc. 3, 12.
Hab.—Southern, Western States to Pacific.

62. **Christina**, Edw. Pr. E. Soc. Ph. 2, 79; id. But. N. A. 1, 41, pl. 13.
Hab.—British America, Great Slave Lake; Athabasca.

63. **Astræa**, Edw. Tr. A. E. Soc. 4, 61.
Hab.—Montana.

Group IV.

64. **Eriphyle**, Edw. Tr. A. E. Soc. 5, 202.
Hab.—British Columbia.

65. **Philodice**, Godt.—Bd.-Lec. 64, pl. 21. Morr. 29. Harr. 272, figs. 100—102, ∗. Saund. Can. Ent. 1, 54, ∗. Riley, 2d. Ag. Rep. Mo. 116, ∗. Edw. But. N. A. 2, pl. 2, 3 of Colias, ∗.
var. *Anthyale*, Hüb.
Hab.—United States east of Rocky Mountains; British America; Canada; Nova Scotia.

66. **Chrysomelas**, H. Edw. Pr. Cal. Ac. N. Sci. v. 6.
Hab.—California.

67. **Occidentalis**, Scud. Pr. Bost. Soc. N. Hist. 9, 109. Edw. But. N. A. 1, 55, pl. 18.
Hab.—British America; Slave River; Caribeo.

68. **Interior**, Scud. l. c. 9, 108.
Solivaga, H. Edw. l. c. v. 6.
Hab.—British America; Ontario; Quebec; Alaska.

69. **Emilia**, Edw. Tr. A. E. Soc. 3, 12.
Hab.—California.

70. **Harfordii**, H. Edw. Pr. Cal. Ac. N. Sci. v. 6.
Hab.—California.

71. **Barbara**, H. Edw. l. c. v. 6.
Hab.—California.

72. **Scudderii**, Reak. Pr. E. Soc. Ph. 4, 217. Edw. But. N. A. 1, 57, pl. 19. Mead, Rep. Wheeler Exp. 5, 749.
Hab.—Colorado; Montana; Utah; British Columbia.

73. **Alexandra**, Edw. Pr. E. Soc. Ph. 2, 14, pl. 11; id. But. N. A. 1, 39, pl. 12. Mead, l. c. 5, 749.
Hab.—Colorado; Rocky Mountains.

74. **Laurentina**, Scud.
Philodice, var. *Laurentina*, Scud., Pr. Bost. Soc. N. Hist. 18, 4.
Hab.—Cape Breton Island; Quebec; Maine.

75. **Pelidne**, Bd. Sp. Gen. 1, 644. Bd.-Lec. 66. Morr. 30. Edw. But. N. A. 2, pl. 1 of Colias.
Labradorensis, Scud. Pr. Bost. Soc. N. Hist. 9, 107.
Hab.—Labrador; Alaska, (coll. Behr.).

76. **Nastes**, Bd. Sp. Gen. 1, 648. Morr. 30. Edw. But. N. A. 2, pl. 1 of Colias.
Hab.—Labrador.

77. **Chippewa**, Edw.
Helena, (pre-occupied), Edw. Pr. E. Soc. Ph. 2, 80; id. But. N. A. 1, 40, pl. 12.
Hab.—British America, Great Slave Lake.

78. **Palæno**, L.—Bd. Sp. Gen. 1, 645.
Hab.—Labrador; Alaska, (coll. Behr.).

Group V.

79. **Behrii**, Edw. Pr. E. Soc. Ph. 6, 201; id. But. N. A. 1, 42, pl. 13.

Hab.—California, Yosemite.

TERIAS, Swain.

80. **Nicippe**, Cram.—Say, 2, pl. 30. Bd.-Lec. 55, pl. 20, ∗. Morr. 33.

Hab.—Pennsylvania to Gulf; Mississippi Valley; Arizona.

81. **Proterpia**, F.—Bd. Sp. Gen. 1, 654. Morr. 35.

Hab.—Texas.

82. **Gundlachia**, Poey, Hist. Nat. de Cuba, 1, 246, pl. 24.

Proterpia, var. A. Bd. Sp. Gen. 1, 655.

Hab.—Texas, (coll. Boll.).

83. **Westwoodi**, Bd. Sp. Gen. 1, 666.

Hab.—Texas, (coll. Mead).

84. **Mexicana**, Bd. Sp. Gen. 1, 655, pl. 3. Morr. 36.

Hab.—Texas to Arizona; California; occasional in Kansas and Nebraska, (coll. Dodge).

85. **Lisa**, Bd. Sp. Gen. 1, 661. Bd.-Lec. 53, pl. 19, ∗. Morr. 34.

Hab.—Rhode Island to Gulf of Mexico; Texas; Western States; Kansas.

86. **Delia**, Cram.—Bd. Sp. Gen. 1, 663. Bd.-Lec. 49, pl. 18, ∗. Morr. 34.

Hab.—Gulf States.

87. **Jucunda**, Bd. Sp. Gen. 1, 665. Bd.-Lec. 52, pl. 19. Morr. 35.

Hab.—Gulf States.

NYMPHALIDÆ.

HELICONINÆ.

HELICONIA, Latr.

88. **Charitonia**, L.—Bd.-Lec. 140, pl. 41. Morr. 39.

Hab.—Florida; Georgia; South Carolina, (coast, sea islands).

DANAINÆ.

DANAIS, Latr.

89. **Archippus**, F.—Sm.-Abb. pl. 6, ∗. Morr. 38. Bd.-Lec. 137, pl. 40, ∗. Harr. 280, ∗. Saund. Can. Ent. 5, 4, ∗. Riley, 3rd. Mo. Ent. Rep. 143, ∗. Edw. Can. Ent. 8, 119, ∗. Scud. Psyche, 1, 81, ∗.
Plexippus, Say, 3, pl. 54.
Hab.—United States; British America; Canada; Nova Scotia.

90. **Berenice**, Cram.—Bd.-Lec. 134, pl. 39, ∗. Morr. 37.
Gilippus, Sm.-Abb. pl. 7, ∗.
Hab.—Southern States; Colorado; Arizona.

91. **Strigosa**, Bates, Ent. Mo. Mag. 1, 32.
Hab.—Texas.

NYMPHALINÆ.

COLÆNIS, Doub.

92. **Julia**, F.
Alcionea, Cram. 3, pl. 215, fig. A. F. G.
Hab.—Texas, occasional; (coll. Belfrage).

93. **Delila**, F.
Cillene, Cram. 3, pl. 215, fig. D. E.
Hab.—Texas, occasional; (coll. Belfrage).

AGRAULIS, Blanch.

94. **Vanillæ**, L.—Bd.-Lec. 143, pl. 42, ∗. Morr. 40.
Passifloræ, Sm.-Abb. pl. 12.
Hab.—Southern States; California; Arizona; occasional in West Virginia.

ARGYNNIS, F.

Group I.

95. **Diana**, Cram.—Say, 1, pl. 17, ♂. Edw. Pr. E. Soc. Ph. 3, 431, ♀; id. But. N. A. 1, 61, pl. 20; id. l. c. 2, pl. 7 of Argyn. ∗; id. Can. Ent. 6, 121, ∗.
Hab.—West Virginia to Georgia; Kentucky; Arkansas.

96. **Nokomis**, Edw. Pr. Ac. N. Sc. Ph. 1862, 221; id. But. N. A. 1, 71, pl. 23. Mead, Rep. Wheeler Exp. 5, 751, pl. 35.
Hab.—Arizona.

97. **Leto,** Behr. Pr. Cal. Ac. N. Sc. 2, 173. Edw But. N. A. 1, 83, pl. 29.
Hab.—California; Oregon.

98. **Idalia,** Drury.—Bd.-Lec. 147, pl. 43. Morr. 41. Harr. 285, fig. 110.
Hab.—Massachusetts to Nebraska; Arkansas.
var. ASHTAROTH, Fisher, Pr. Ac. N. Sc. Ph. 1858, 179, pl. 2; id. l. c. 1859, 352. Morr. 47.
Hab.—New Jersey.

99. **Nitocris,** Edw. Tr. A. E. Soc. 5, 15. Mead, Rep. Wheeler Exp. 5, 751.
Hab.—Arizona.

100. **Cybele,** F.—Edw. But. N. A. 1, 65, pl. 21; id. Can. Ent. 6, 121, ∗. Saund. l. c. 4, 121, ∗.
Hab.—Atlantic and Western States to Kansas; Nebraska; Canada.

101. **Carpenterii,** Edw. Tr. A. E. Soc. 5, 204.
Hab.—Arizona.

102. **Aphrodite,** F.—Edw. But. N. A. 1, 69, pl. 22; id. Can. Ent. 6, 121, ∗. Harr. 286, fig. 111, ♀.
Hab.—Northern and Middle States; Kansas; Nebraska; Canada; Nova Scotia.

103. **Alcestis,** Edw. l. c. 5, 289.
Hab.—Illinois; Iowa; Colorado.

104. **Atlantis,** Edw. Pr. Ac. N. Sci. Ph. 1862, 54; id. But. N. A. 1, 73, pl. 24. Pack. Guide, 252, ∗. Edw. Can. Ent. 9, Feb. 1877, ∗. Mead, Rep. Wheeler Exp. 5, 754.
Hab.—New England; New York; Iowa; Colorado; British America, Columbia to Nova Scotia.

105. **Columbia,** H. Edw. Pr. Cal. Ac. N. Sci. 6, 1877.
Hab.—British Columbia.

106. **Nausicaa,** Edw. Tr. A. E. Soc. 5, 104. Mead, l. c. 5, 752.
Hab.—Arizona.

107. **Bremnerii,** Edw. l. c. 4, 63; id. But. N. A. 2, pl. 4 of Argyn.
Hab.—Oregon; British Columbia; Vancouver's Island; Montana, (auct. Scud.).

108. **Behrensii**, Edw. l. c. 2, 370; id. But. N. A. 1, 87, pl. 31.
Hab.—California, Mendocino.

109. **Bischoffii**, Edw. l. c. 3, 189; id. But. N. A. 2, pl. 3 of Argyn.
Hab.—Alaska.

110. **Opis**, Edw. l. c. 5, 105; id. But. N. A. 2, pl. 3 of Argyn.
Hab.—British Columbia, Bald Mountain.

111. **Rhodope**, Edw. l. c. 5, 13; id. But. N. A. 2, pl. 6 of Argyn.
Hab.—British Columbia.

112. **Halcyone**, Edw. But. N. A. 1, 81, pl. 28. Mead, l. c. 5, 754.
Hab.—Colorado; Wyoming.

113. **Coronis**, Behr. Pr. Cal. Ac. N. Sci. 2, 173, "No. 2." Edw. Pr. E. Soc. Ph. 3, 435.
Juba, Bd.
Hab.—California.

114. **Callippe**, Bd. Ann. Soc. Ent. Fr. 2, 10, 302. Morr. 46. Edw. But. N. A. 1, 75, pl. 25.
Hab.—California.

115. **Liliana**, H. Edw. Pr. Cal. Ac. N. Sci. 6, Dec. 1876.
Hab.—California.

116. **Nevadensis**, Edw. Tr. A. E. Soc. 3, 14; id. But. N. A. 1, 91, pl. 33.
Hab.—Nevada; Utah; Montana; British America, Rocky Mountains.

117. **Edwardsii**, Reak. Pr. E. Soc. Ph. 6, 137. Edw. But. N. A. 1, 85, pl. 30. Mead, l. c. 5, 754.
Hab.—Colorado; Montana.

118. **Meadii**, Edw. Tr. A. E. Soc. 5, 67; id. But. N. A. 2, pl. 2 of Argyn. Mead, l. c. 5, 755.
Hab.—Colorado; Montana; Utah.

119. **Rupestris**, Behr, Pr. Cal. Ac. N. Sci. 2, 175, "No. 6;" id. l. c. 3, pl. 84. Edw. But. N. A. 2, pl. 7 of Argyn.
Hab.—California, Soda Spring.

120. **Inornata**, Edw. Tr. A. E. Soc. 4, 64; id. But. N. A. 2, pl. 5 of Argyn.
Hab.—California; Nevada.

121. **Adiante**, Bd. Lep. de la Cal. 61.
Adiaste, Edw. Pr. E. Soc. Ph. 3, 436.
Hab.—California.

122. **Clio**, Edw. Tr. A. E Soc. 5, 106.
Hab.—Colorado; Montana.

123. **Eurynome**, Edw. l. c. 4, 66; id. But. N. A. 2, pl. 8 of Argyn. Mead, l. c. 5, 755.
Astarte, Edw. (not Doubl.).
Hab.—Colorado.

124. **Montivaga**, Behr. Pr. Cal. Ac. N. Sci. 2, 174, "No. 4;" id. l. c. 3, 84.
Eyleis, Bd.
Hab.—California, Sierras.

125. **Mormonia**, Bd. Lep. de la Cal. 58.
Hab.—California.

126. **Irene**, Bd. Lep. de la Cal. 59, (in *Eyleis*).
Hab.—California.

127. **Hesperis**, Edw. Pr. E. Soc. Ph. 2, 502; id. But. N. A. 1, 77, pl. 26. Mead, l. c. 5, 754.
Hab.—Colorado; Montana; Utah.

128. **Zerene**, Bd. Ann. Soc. Ent. Fr. 2, 10, 303. Behr. Proc. Cal. Ac. N. Sci. 2, 175, "No. 9." Edw. But. N. A. 1, 89, pl. 32.
Hydaspe, Bd.
Hab.—California.

129. **Monticola**, Behr. Pr. Cal. Ac. N. Sci. 2, 175, "No. 8;" id. l. c. 3, 84. Edw. But. N. A. 1, 79, pl. 27.
Hab.—California; Oregon.

var. PURPURASCENS, H. Edw. Pr. Cal. Ac. N. Sc. 6, Dec. 1876.
Hab.—Oregon.

Group II.

130. **Myrina**, Cram.—Say, 3, pl. 46. Bd.-Lec. 155, pl. 45. Morr. 45. Harr. 286, fig. 112. Saund. Can. Ent. 1, 55, ∗. Edw. Can. Ent. 8, 161, ∗.
Hab.—Eastern, Middle, and North-western States; British America; Canada; Nova Scotia.

131. **Triclaris,** Hüb.—Scud. Pr. Bost. Soc. N. Hist. 17, 37. Mead, l. c. 5, 757.
Ossianus, Bd.-Lec. 157. Morr. 48.
Hab.—Colorado; Rocky Mountains; British America; Labrador.

132. **Helena,** Edw. Tr. A. E. Soc. 3, 268. Mead, l. c. 5, 757.
Hab.—Colorado; Montana; New Mexico.

133. **Chariclea,** Schneid.—Bd. Spec. Gen. 1, pl. 11, fig. 2. Bd.-Lec. 161. Scud. Pr. Bost. Soc. N. Hist. 17, 40. Morr. 49.
Hab.—Colorado; British America; Columbia; Labrador; Greenland.

134. **Boisduvalii,** Somm. in Bd. Icones, 1, 98, pl. 20.
Hab.—British America; Columbia.

135. **Freya,** Thunb.—Hüb. Eur. Sch. 1, fig. 55, 56. Morr. 46. Scud. l. c. 17. Mead, l. c. 5, 756.
Tarquinius. Curtis.
Hab.—Colorado; Rocky Mountains; British America.

136. **Montinus,** Scud. Pr. Ess. Ins. 3, 166; id. Pr. Bost. Soc. N. Hist. 7, 626, pl. 14.
Hab.—New Hampshire, White Mountains.

137. **Polaris,** Bd. Icones, pl. 20. Sp. Gen. 1, pl. 11, fig. 1. Bd.-Lec. 159. Scud. l. c. 17, 46. Morr. 48.
Hab.—Arctic America; Greenland; Labrador.

138. **Frigga,** Thunb.—Scud. l. c. 17, 49. Hüb. Eur. Sch. 1, fig. 49, 50.
Hab.—British America; Labrador; Colorado; Rocky Mountains.

139. **Bellona,** F.—Bd.-Lec. 164, pl. 45. Morr. 45. Harr. 287, fig. 113, 114.
Hab.—Northern United States; Rocky Mountains; California; British America; Canada.

140. **Epithore,** Bd. Lep. de la Cal. 58. Edw. Pr. E. Soc. Ph. 2, 504. Mead, l. c. 5, 756.
Hab.—California; Oregon; Colorado.

141. **Improba,** Butler, Ent. Mo. Mag. 13, 206.
Hab.—Arctic America, Cambridge Bay.

EUPTOIETA, Doub.

142. **Claudia,** Cram. 1, pl. 69, fig. E. F. Mead, Rep. Wheeler Exp. 5, 750, ∗. Edw. Can. Ent. 2, 163, ∗.
Columbina, Bd.-Lec. 153, pl. 44. Morr. 44.
Hab.—New York to the Gulf of Mexico; Mississippi Valley; Colorado; Arizona; California.

143. **Hegesia,** Cram. 3, pl. 209, fig. E. F.
Columbina, F.
Hab.—Southern California, occasional; (coll. H. Edw.).

MELITÆA, F.

Group I.

144. **Phæton,** Drury.—Bd.-Lec. 167, pl. 47. Morr. 50. Harr. 288, fig. 115. Edw. But. N. A. 2, pl. 1 of Melitæa, ∗.
Hab.—United States east of Rocky Mountains; Canada; Lake of the Woods.

145. **Chalcedon,** Doub. Gen. Di. Lep. pl. 23. Edw. But. N. A. 1, 95, pl. 34. H. Edw. Pr. Cal. Ac. N. Sci. 5, 167, ∗.
Hab.—California.

146. **Cooperi,** Behr. Pr. Cal. Ac. N. Sci. 3, 90.
Hab.—California.

147. **Anicia,** Doub. Gen. Di. Lep. pl. 23. Edw. Pr. E. Soc. Ph. 1, 223. Mead, Rep. Wheeler Exp. 5, 758.
Hab.—California; Nevada; Colorado; Montana.

148. **Nubigena,** Behr. Pr. Cal. Ac. N. Sci. 3, 91. Mead, l. c. 5, 758, ∗.
Hab.—California; Colorado; New Mexico; Montana.

149. **Quino,** Behr. l. c. 3, 90.
Hab.—California, Mendocino.

150. **Editha,** Bd. Ann. Soc. Ent. Fr. 2, 10, 304. Morr. 51. H. Edw. Proc. Cal. Ac. N. Sci. 5, 167.
Hab.—California.

151. **Helvia,** Scud. Pr. Bost. Soc. N. Hist. 12, 43.
Hab.—Alaska.

152. **Sterope,** Edw. Tr. A. E. Soc. 3, 190.
Hab.—Oregon.

Group II.

153. **Palla**, Bd. Ann. Soc. Ent. Fr. 2, 10, 305. Morr. 52. Behr. Pr. Cal. Acad. N. Sci. 3, 88. H. Edw. id. 5, 167, *.
var. HELCITA, Bd. Lep. de la Cal. 55.
Hab.—California; Nevada.

154. **Hoffmanni**, Behr. l. c. 3, 89.
var. WHITNEYII, Behr. l. c. 3, 88.
Hab.—California; Nevada.

155. **Gabbii**, Behr. l. c. 3, 89.
Sonoræ, Bd.
Hab.—Southern California.

156. **Acastus**, Edw. Tr. A. E. Soc. 5, 16. Mead, Rep. Wheeler Exp. 5, 761.
Hab.—Nevada; Utah; Montana.

Group III.

157. **Leanira**, Bd. Lep. de la Cal. 57. Behr. Pr. Cal. Acad. N. Sci. 3, 91. Mead, l. c. 5, pl. 37.
Hab.—California; Arizona.
var. OBLITERATA, H. Edw. Pr. Cal. Ac. N. Sci. 6, Dec. 1876.
Hab.—California.

158. **Thekla**, Edw. Tr. A. E. Soc. 3, 191.
Hab.—Southern California; Arizona.

159. **Minuta**, Edw. Pr. Ac. N. Sc. Ph. 1861, 161. Mead, l. c. 5, pl. 36.
Arachne, Edw.
Hab.—Colorado; Arizona; New Mexico; Texas.

PHYCIODES, Doub.

Group I.

160. **Harrisii**, Scud. Pr. Ess. Ins. 3, 167.
Hab.—New England; New York; Canada.

161. **Nycteis**, Doub. Gen. Di. Lep. pl. 23. Riley, Pr. Am. Ass. Adv. Sc. 1874, 108, *. Lintn. Ent. Cont. 1, 26, *. Edw. Can. Ent. 5, 224, *. Mead, Rep. Wheeler Exp. 5, 762.
Ismeria, Harr.
Oenone, Scud.
Harrisii, Saund. Can. Ent. 4, 161, *. Edw. id. 2, 163.
Hab.—New England to Colorado; Montana; Texas; Canada.

162. **Carlota,** Reak. Pr. E. Soc. Ph. 6, 141. Mead, l. c. 5, 762.
Hab.—Southern and Western States; Rocky Mountains; occasional in West Virginia.

Group II.

163. **Vesta,** Edw. Tr. A. E. Soc. 2, 371.
Hab.—Texas.

164. **Phaon,** Edw. Pr. E. Soc. Ph. 2, 505.
Hab.—Gulf States; Texas; Kansas, occasional; (coll. Snow.).

165. **Tharos,** Drury.
dim. var. MARCIA, Edw. Tr. A. E. Soc. 2, 207; id. Can. Ent. 9, 1, ∗.
dim. var. MORPHEUS, F.—Drury, 1, pl. 21, ♀.
Cocyta, Cram. 2, pl. 101, fig. A. B. ♂.
Tharos, Bd.-Lec. 170, pl. 47. Mead, Can. Ent. 7, 161, ∗.
Pharos, Harr. 289, fig. 116, 117.
aberr. *Packardii*, Saund. in Pack. Guide, 256.
Hab.—United States excluding Pacific States; New Mexico; British America to Pacific; Southern Labrador; Anticosti; Nova Scotia.

166. **Batesii,** Reak. Pr. E. Soc. Ph. 5, 226.
Hab.—Virginia to New York.

167. **Pratensis,** Behr. Pr. Cal. Ac. N. Sci. 3, 86.
♀ *Campestris*, Behr. l. c. 3, 86.
Pulchella, Bd.
Hab.—California; Oregon.

168. **Camillus,** Edw. Tr. A. E. Soc. 3, 268.
♀ *Emissa*, Edw. l. c. 3, 269. Mead, Rep. Wheeler Exp. 5, 764.
Pallida, Edw.
Mata, Reak.—Streck. pl. 8, fig. 11. Mead, l. c. 5, 763.
Hab.—Colorado; Rocky Mountains; Montana; Texas; Kansas.

169. **Orseis,** Edw. Tr. A. E. Soc. 3, 206.
Hab.—California, Sierras; Oregon; (perhaps dim. var. of *Pratensis*, winter form).

170. **Mylitta,** Edw. Pr. Ac. N. Sci. Ph. 1861, 160. H. Edw. Pr. Cal. Ac. N. Sci. 5, 167, ∗.
Colliua, Behr.
Epula, Bd.
Hab.—California; Arizona.

171. **Montana,** Behr. Pr. Cal. Ac. N. Sci. 3, 85.
Orsa, Bd.
Hab.—California, Sierras; Lake Tahoe.

172. **Picta,** Edw. Pr. E. Soc. Ph. 4, 201. Streck. pl. 8, fig. 10.
Hab.—Colorado; Nebraska, (coll. Dodge).

173. **Canace,** Edw. Tr. A. E. Soc. 3, 206.
Hab.—Arizona.

ERESIA, Doub.

174. **Frisia,** Poey, Cent. Lep. Cuba, pl. 2.
Gyges, Hew.
Hab.—Key West.

175. **Texana,** Edw. Pr. E. Soc. Ph. 2, 81.
Cincta, Edw.
Smerdis, Hew.
Hab.—Texas; Florida.

176. **Punctata,** Edw. Tr. A. E. Soc. 3, 191.
Hab.—Arizona; New Mexico.

SYNCHLOE, Bd.

177. **Janais,** Drury, 3, pl. 17.
Hab.—Texas.

178. **Mediatrix,** Feld.—Reise Novara, 3, 395.
(*Saundersii,* Edw. Synop.).
Hab.—Texas.

179. **Adjutrix,** Seud. Syn. List, 1875, 269.
(*Lacinia,* Edw. Synop.).
Hab.—Texas.

180. **Erodyle,** Bates, Ent. Mo. Mag. 1, 84.
Hab.—Texas.

181. **Crocale,** Edw. Tr. A. E. Soc. 5, 17. Mead, Rep. Wheeler Exp. 5, 765, pl. 37.
Hab.—Arizona.

CYSTINEURA, Bd.

182. **Amymone,** Men. En. An. Mus. St. Petersburg, 1, 123, pl. 9.
Hab.—Texas.

GRAPTA, Kirby.

183. **Interrogationis,** F.

dim. var. UMBROSA, Lintn. Tr. A. E. Soc. 2, 313. Edw. But. N. A. 1, 109, pl. 38.

dim. var. FABRICII, Edw. Tr. A. E. Soc. 3, 5; id. But. N. A. 1, 113, pl. 39, ∗.

C Aureum, Bd.-Lec. 192, pl. 51.

Interrogationis, Harr. 298, fig. 124.

Hab.—United States except Pacific; Arizona; Canada; Nova Scotia.

184. **Comma,** Harr.

dim. var. HARRISII, Edw. Can. Ent. 5, 184.

Comma, Harr. 300, pl. 4, fig. 1. Lintn. Pr. E. Soc. Ph. 3, 55, ∗. Edw. But. N. A. 1, 99, pl. 36, ∗.

dim. var. DRYAS, Edw. Tr. A. E. Soc. 3, 17; id. But. N. A. 1, 107, pl. 37.

Hab.—Eastern, Middle and Northwestern States; Kansas; Texas; Canada; Nova Scotia.

185. **Satyrus,** Edw. Tr. A. E. Soc. 2, 374; id. But. N. A. 1, 119, pl. 40, ∗. H. Edw. Pr. Cal. Ac. N. Sc. 5, 168, ∗. Pearson, Can. Ent. 7, 216, ∗. Mead, Rep. Wheeler Exp. 5, 767.

Hab.—Colorado to California; New Mexico; Oregon; British America; Ontario.

186. **Marsyas,** Edw. Tr. A. E. Soc. 3, 16; id. But. N. A. 2, pl. 2 of Grapta.

Hab.—California.

187. **Hylas,** Edw. Tr. A. E. Soc. 4, 68; id. But. N. A. 2, pl. 2 of Grapta. Mead, l. c. 5, 768.

Hab.—Colorado.

188. **Rusticus,** Edw. Tr. A. E. Soc. 5, 107.

Hab.—California; Vancouver's Island.

189. **Faunus,** Edw. Pr. Ac. N. Sci. Ph. 1862, 222; id. But. N. A. 1, 97, pl. 35. Pearson, Can. Ent. 7, 49, ∗.

Hab.—Mountains of New England and New York; occasional West Virginia to Georgia; British America; Atlantic to Pacific.

190. **Silvius,** Edw. Tr. A. E. Soc. 5, 108.
Hab.—California.

191. **Zephyrus,** Edw. Tr. A. E. Soc. 3, 16; id. But. N. A. 1, 121, pl. 40. H. Edw. Pr. Cal. Ac. N. Sc. 5, 169, ∗. Mead, l. c. 5, 769.
Hab.—Montana to New Mexico; Utah; California; Oregon.

192. **Gracilis,** Gr.-Rob. Ann. N. Y. Lyc. N. Hist. 8, 432. Streck. pl. 8, fig. 14.
Hab.—New Hampshire, White Mountains; British America; Quebec; Alaska.

193. **Oreas,** Edw. Tr. A. E. Soc. 2, 373; id. 5, 109.
Hab.—California; Oregon.

194. **Silenus,** Edw. l. c. 3, 15; id. But. N. A. 2, pl. 1 of Grapta.
Hab.—Oregon; Vancouver's Island.

195. **Progne,** Cram.—Bd.-Lec. 188, pl. 50. Morr. 56. Harr. 301. Lintn. Pr. E. Soc. Phil. 3, 58, ∗.
C Argenteum, Kirby.
Hab.—Northern and Western States; British Americea; Canada; Nova Scotia; Anticosti.

196. **J Album,** Bd.—Bd.-Lec. 185, pl. 50. Morr. 56. Harr. 298. Lintn. Pr. E. Soc. Ph. 3, 58, ∗.
Hab.—Northern States; Wisconsin; British America to Pacific; Canada; Nova Scotia; South Labrador.

VANESSA, F.

197. **Antiopa,** L.—Bd.-Lec. 173. Morr. 57. Harr. 296, fig. 121, 122, ∗. Lintn. Pr. E. Soc. Ph. 3, 59, ∗. Saund. Can. Ent. 1, 75, ∗.
var. ——— Bunker, Can. Ent. 8, 240.
var. LINTNERII, Fitch, 3d. Rep. N. Y. St. Ag. Soc. No. 211. Morr. 57.
Hab.—United States; British America; Canada; Nova Scotia; South Labrador.

198. **Californica,** Bd. Ann. Soc. Ent. Fr. 2, 10, 306. Morr. 58. Behr, Pr. Cal. Ac. Sci. 4, 123, ∗. Mead, l. c. 5, 769. H. Edw. Pr. Cal. Ac. N. Sci. 5, 171, ∗.
Hab.—California; Oregon; Colorado.

199. **Milberti**, Godt.—Bd.-Lec. 187, pl. 50. Morr. 56. Harr. 302, fig. 125. Lintn. Pr. E. Soc. Ph. 3, 61, ∗. Saund. Can. Ent. 1, 76, ∗. Mead, l. c. 5, 769, ∗.

FURCILLATA, Say, 2, pl. 27.

Hab.—Northern States; Wisconsin; Colorado; Montana; California; British America; Canada; Nova Scotia.

PYRAMEIS, Doub.

200. **Atalanta**, L.—Bd.-Lec. 175. Morr. 58. Harr. 294, fig. 120, ∗.

Hab.—United States; British America; Canada; Nova Scotia; Anticosti.

201. **Huntera**, Drury.—Sm.-Abb. pl. 9, ∗. Bd.-Lec. 180, pl. 48, ∗. Morr. 60. Harr. 292, fig. 119, ∗. Lintn. Pr. E. Soc. Ph. 3, 63, ∗. Saund. Can. Ent. 1, 105, ∗.

Hab.—Northern United States; Kansas; British America; Canada; Nova Scotia; South Labrador.

202. **Cardui**, L.—Bd.-Lec. 178. Morr. 59. Saund. Can. Ent. 1, 93, ∗. Scud. Am. Nat. 10, 392, 602, ∗.

Hab.—United States, generally; British America; Canada.

203. **Carye**, Hüb. Samml. Ex. Schmett. 1. Behr, Pr. Cal. Ac. N. Sci. 4, 125, ∗. H. Edw. l. c. 5, 329, ∗.

Hab.—California; Arizona.

JUNONIA, Doub.

204. **Lavinia**, Cram.

var. ORYTHIA, Sm.-Abb. 1, pl. 8.

Cœnia, Hüb.—Bd.-Lec. 182, pl. 49, ∗. Morr. 61.

Lavinia, Harr. 293.

Hab.—Middle and Southern States to Pacific; occasional Massachusetts and Ontario.

ANARTIA, Doub.

205. **Jatrophæ**, L.—Cram. 3, pl. 202, fig. E. F. Morr. 62.

Hab.—Texas; Florida.

EUREMA, Bd.

206. **Lethe**, F. Ent. Syst. 3, 80.

Hab.—Texas, occasional; (coll. Belfrage).

EUNICA, Feld.

207. **Modesta**, Bates, Ent. Mo. Mag. 1, 113.

Hab.—Texas, occasional; (coll. Boll.).

208. ——— ?

Monima, Scud. (not Cramer).
Hyperipte, Edw. Synop. (not Hüb.).
Hab.—Florida, occasional; (coll. Edwards).

TIMETES, Bd.

209. **Coresia**, Godt. Enc. Meth. 9, 359.
Zerynthia, Hüb. Ex. Schmett. 2.
Hab.—Texas, occasional; (coll. Belfrage).

210. **Petreus**, Cram. 1, pl. 87, fig. D. E.
(*Eleucha*, Edw. Synop.).
Hab.—Florida, occasional; (coll. Chapman).

211. **Eleucha**, Doub. Gen. Di. Lep. pl. 33.
Hab.—Texas, occasional; (coll. Belfrage).

212. **Chiron**, F.
Marius, Cram. 3, pl. 200, fig. D. E.
Hab.—Texas, occasional; (coll. Belfrage).

CALLICORE, Doub.

213. **Clymena**, Cram. 1, pl. 24, fig. E. F.
Hab.—Florida, occasional; (coll. Edwards).

LIMENITIS, F.

214. **Ursula**, F.—Sm.-Abb. pl. 10, ∗. Bd.-Lec. 199, pl. 53, ∗. Morr. 64.
Astyanax, F.
Ephestion, Stoll. Harr. 283, ∗.
Hab.—Atlantic States; Mississippi Valley; Kansas; Arizona; Canada.

215. **Proserpina**, Edw. Pr. E. Soc. Ph. 5, 148; id. But. N. A. 1, 125, pl. 41.
Hab.—New York, Catskill Mountains; New Hampshire, White Mountains; Canada; Nova Scotia.

216. **Arthemis**, Drury.—Say, 2, pl. 23. Bd.-Lec. 202, pl. 54. Morr. 65. Harr. 283, pl. 1, fig. 7. Lintn. Pr. E. Soc. Ph. 3, 62, ∗. Mead, Can. Ent. 7, 162, ∗.
Lamina, F.
Hab.—Northern United States; British America to Pacific; Canada; Nova Scotia.

217. **Weidemeyerii**, Edw. Pr. Ac. N. Sc. Ph. 1861, 162; id. But. N. A. 1, 127, pl. 42. Morr. 327. Mead, Rep. Wheeler Exp. 5, 770, pl. 38.
Hab.—Rocky Mountains; Montana to New Mexico; Utah; Arizona.

218. **Disippus**, Godt.—Bd.-Lec. 204, pl. 55, ∗. Morr. 65. Harr. 281, fig. 109. Lintn. Pr. E. Soc. Ph. 3, 63, ∗. Riley, 3rd. Mo. Ent. Rep. 153, ∗.
var. ——— Mead, Can. Ent. 4, 216.
Hab.—United States; Canada; Nova Scotia.

219. **Lorquini**, Bd. Ann. Soc. Ent. Fr. 2, 10, 301. Morr. 66. Edw. But. N. A. 1, 129, pl. 43. Mead, l. c. 5, pl. 38. H. Edw. Pr. Cal. Ac. N. Sci. 5, 171, ∗.
Hab.—California; Arizona.

HETEROCHROA, Bd.

220. **Californica**, Butler, Pr. Zool. Soc. Lond. 1865, 485. Mead, l. c. 5, pl. 38. H. Edw. Pr. Cal. Ac. N. Sci. 5, 171, ∗.
Eulalia, Bd.
Bredowii, Edw. But. N. A. 1, 131, pl. 44.
Hab.—California; Arizona.

APATURA, F.

221. **Celtis**, Bd.—Bd.-Lec. 210, pl. 57. Morr. 68. Edw. But. N. A. 2, pl. 1 of Apat.
Lycaon, Riley, 6th. Mo. Ent. Rep. 137, ∗.
Hab.—Virginia to Gulf of Mex.; Miss. Valley; Kansas; Texas.

222. **Leilia**, Edw. Tr. A. E. Soc. 5, 103; id. But. N. A. 2, pl. 1 of Apat. Mead, l. c. 5, 770.
Hab.—Arizona.

223. **Alicia**, Edw. But. N. A. 1, 133, pl. 45.
Hab.—Gulf States; Georgia to Texas.

224. **Clyton**, Bd.—Bd.-Lec. 208, pl. 56. Morr. 68.
Herse, Riley, 6th. Mo. Ent. Rep. 140, ∗.
dim. var. PROSERPINA, Scud. Tr. Ac. N. Sci. Chic. 1, 332. Edw. But. N. A. 2, pl. 2, of Apat.
dim. var. OCELLATA, Edw. l. c. pl. 2.
var. FLORA, Edw. l. c.
Hab.—New York to Gulf of Mexico; Mississippi Valley; Kan.

PAPHIA, West.

225. **Andria,** Scud. Syn. List, 248.
Glycerium, Edw. But. N. A. 1, 135, pl. 46, ∗. Riley, 2d. Mo. Ent. Rep. 125, ∗.
Hab.—Illinois to Kansas; Texas.

226. **Troglodyta,** F.
Astyanax, Cram. 4, 337, fig. A. B.
Hab.—Florida; (auct. Scud.).

SATYRINÆ.

NEONYMPHA, West.

227. **Eurytris,** F.
Eurythris, Bd.-Lec. pl. 51, ∗. Morr. 73. Harr. 306, fig. 129. Saund. Can. Ent. 2, 139, ∗.
Hab.—Atlantic States; Mississippi Valley; Canada.

228. **Sosybius,** F.—Bd.-Lec. pl. 63, ∗. Morr. 74.
Hab.—Middle and Southern States; Mississippi Valley.

229. **Rubricata,** Edw. Tr. A. E. Soc. 3, 212.
Hab.—Texas.

230. **Areolatus,** Sm.-Abb. 1, pl. 13, ∗. Bd.-Lec. pl. 63, ∗. Morr. 74.
Hab.—Gulf States; occasional in New Jersey; (coll. Meyer).

231. **Gemma,** Hüb.—Bd.-Lec. pl. 62, ∗. Morr. 73.
Hab.—West Virginia to Gulf States.

232. **Henshawi,** Edw. Tr. A. E. Soc. 5, 205.
Hab.—Arizona.

233. **Canthus,** L.—Bd.-Lec. pl. 60. Morr. 74.
Boisduvalli, Harr. 305, fig. 128.
Hab.—Northern States; Ontario; Quebec.

COENONYMPHA, West.

234. **California,** West.-Hen. Gen. Di. Lep. 398, pl. 67.
Californius, Bd.
var. ERYNGII, H. Edw. Pr. Cal. Ac. N. Sci. v. 6, Dec. 1876.
var. GALACTINUS, Ann. Soc. Ent. Fr. 2, 10, 309. Morr. 80.
Hab.—California; Montana.

235. **Inornata,** Edw. Pr. Ac. N. Sc. Ph. 1861, 163. Morr. 328.
Hab.—Montana; British America, Lake Winnipeg.

236. **Ochracea,** Edw. l. c. 1861, 163. Morr. 328. Mead, Rep. Wheeler Exp. 5, 772.
Hab.—Rocky Mountains; Montana to Arizona; Kansas; British America, Lake Winnipeg.

237. **Ampelos,** Edw. Tr. A. E. Soc. 3, 213.
Hab.—Oregon; Montana.

238. **Kodiak,** Edw. l. c. 2, 375.
Hab.—Kodiak.

239. **Brenda,** Edw. l. c. 2, 375.
Hab.—California, Los Angelos.

240. **Pamphiloides,** Reak. Pr. E. Soc. Ph. 6, 146, ♂.
Hab.—California.

EREBIA, Dalm.

241. **Fasciata,** Butl. Cat. Satyr. B. Mus. 92, pl. 2, fig. 8.
Hab.—Boreal America.

242. **Discoidalis,** Kirby, Faun. Bor. Am. 4, 298, pl. 3, fig. 2, 3. Morr. 75.
Hab.—Boreal America.

243. **Vesagus,** West.-Hen. Gen. Di. Lep. 380, pl. 64, ♂.
Hab.—Rocky Mountains; (prob. B. Am.).

244. **Rossii,** Curtis, App. Ex. Ross. 67, pl. A.
Hab.—Boreal America.

245. **Mancinus,** West.-Hen. Gen. Di. Lep. 380, pl. 54, ♂.
Hab.—Rocky Mountains; British America; Alaska.

246. **Haydenii,** Edw. Rep. Hayden Exp. Monta. 1872, 467; id. Tr. A. E. Soc. 5, 19.
Hab.—Montana.

247. **Callias,** Edw. Tr. A. E. Soc. 3, 274.
Tyndarus, Esper.
var. *Callias,* Mead, Rep. Wheeler Exp. 5, 775.
Hab.—Colorado; Mexico.

248. **Epipsodea,** Butl. Cat. Satyr. Brit. Mus. 80, pl. 2. Mead, l. c. 5, 775.
Rhodia, Edw. Tr. A. E. Soc. 3, 273.
Hab.—Colorado; New Mexico.

DEBIS, West.

249. **Portlandia,** F.—Bd.-Lec. 226, pl. 58, ✱.
Andromacha, Hüb.—Say, 2, pl. 36. Morr. 78.
Hab.—Middle and Southern States; Mississippi Valley; Iowa; Montana.

GYROCHEILUS, Butl.

250. **Tritonia,** Edw. Tr. A. E. Soc. 5, 18.
Hab.—Arizona.

HIPPARCHIA, F.

251. **Ridingsii,** Edw. Pr. E. Soc. Ph. 4, 201. Streck. pl. 4, fig. 6, ♀. Mead, l. c. 5, 774.
Hab.—Colorado; Nevada; Montana.

SATYRUS, West.

252. **Pegala,** F.—Morr. 77. Edw. Pr. E. Soc. Ph. 6, 195.
Hab.—Gulf States.

253. **Alope,** F.—Bd.-Lec. 228, pl. 59, ✱. Morr. 76. Harr. 305, fig. 127. Edw. Pr. E. Soc. Ph. 6, 196–200.
Hab.—Atlantic States; Mississippi Valley; Ontario.

254. **Boopis,** Behr. Proc. Cal. Ac. N. Sc. 3, 164.
Hab.—California; Oregon; Montana.

255. **Nephele,** Kirby, Faun. Bor. Am. 4, 297. Morr. 76. Harr. 306, fig. 130. Edw. l. c. 6, 195.
Hab.—Northern States; Maine to Nebraska; British America; Canada.

256. **Wheeleri,** Edw. Tr. A. E. Soc. 4, 343; id. But. N. A. 2, pl. 1, of Satyr. Mead, l. c. 5, 773, pl. 39.
Hoffmanni, Streck. pl. 4, fig. 8, ♀; pl. 8, fig. 12, ♂.
Hab.—Utah; Southern California; Arizona, Apache.

257. **Gabbii,** Edw. Tr. A. E. Soc. 3, 193.
Hab.—Oregon.

258. **Phocus,** Edw. l. c. 5, 14.
Hab.—British Columbia; Montana.

259. **Ariane,** Bd. Ann. Soc. Ent. Fr. 2, 10, 307. Morr. 77.
Hab.—California.

260. **Meadii,** Edw. Tr. A. E. Soc. 4, 70. Mead, l. c. 5, 774.
Hab.—Colorado; Arizona.

261. **Silvestris,** Edw. Pr. Ac. N. Sc. Ph. 1861, 162.
Hab.—California; Nevada; Montana.

262. **Sthenele,** Bd. Ann. Soc. Ent. Fr. 2, 10, 308. Morr. 77. Streck. pl. 4, fig. 7, ♂.
Hab.—California.

263. **Oetus,** Bd. Lep. de la Cal. 63.
Hab.—California.

264. **Charon,** Edw. Tr. A. E. Soc. 4, 69. Mead, Rep. Wheeler Exp. 5, 773.
Hab.—Montana; Colorado; New Mexico.

CHIONOBAS, Bois.

265. **Gigas,** Butl. Cat. Satyr. Br. Mus. 161, pl. 2. Edw. But. N. A. 2, pl. 1, ♀, pl. 2, ♂, of Chionobas.
Hab.—Vancouver's Island.

266. **Iduna,** Edw. l. c. 2, pl. 1 of Chionobas.
Hab.—California.

267. **Californica,** Bd. Lep. de la Cal. 62. Edw. l. c. 2, pl. 2 of Chionobas.
Hab.—California.

268. **Nevadensis,** Feld. Reise Nov. 3, pl. 62, fig. 4, 5.
Hab.—California.

269. **Chryxus,** West.-Hen. Gen. Di. Lep. 383, pl. 64. Edw. Pr. E. Soc. Ph. 2, 82. Scud. id. 5, 5. Mead, l. c. 5, 777.
Taygete, Edw.
Calais, Scud.
Hab.—Rocky Mountains; California; Hudson's Bay.

270. **Uhleri,** Reak. Pr. E. Soc. Ph. 6, 143. Mead, l. c. 5, 776. Streck. pl. 4, fig. 5, ♂.
Hab.—Rocky Mountains; Colorado; Montana.

271. **Tarpeia,** Esper, Eur. Schmett. 1, pl. 83. Butl. Cat. Satyr. Brit. Mus. p. 161.
Nanna, Mén.
Hab.—Boreal America.

272. **Bore**, Esper, Eur. Schmett. 1, pl. 100. Scud. Pr. E. Soc. Ph. 5, 10..
Bootes, Hüb.
Taygete, Geyer.
Hab.—Labrador; Newfoundland; Greenland.

273. **Jutta**, Hüb. Eur. Schmett. 1, fig. 614, 615. Scud. l. c. 5, 3.
Balder, Hüb.
Hab.—British America; Hudson's Bay; Quebec; Labrador.

274. **Semidea**, Say, 3, pl. 50. Harr. 304, fig. 126. Morr. 80. Scud. l. c. 5, 3; id. Geol. Rep. N. H. 1, 344. Mead, l. c. 5, 776.
Oeno, Bd. Icones, 195, pl. 39. Scud. l. c. 5, 13.
Also, Bd.
Crambis, Freyer.
Assimilis, Butl.
Hab.—Labrador; Boreal America; White Mountains of New Hampshire; Colorado; New Mexico.

275. **Subhyalina**, Curtis, App. Ross Exp. 68.
Hab.—Boreal America.

LIBYTHEINÆ.

LIBYTHEA, F.

276. **Bachmanni**, Kirtland, Sill. Jl. 2, 13, 336. Edw. But. N. A. 2, pl. 1 of Libythea, ∗.
Hab.—Atlantic States; Mississippi Valley; Kansas; Texas.

277. **Carinenta**, Cram. 2, 108, fig. E. F.
Hab.—New Mexico; Arizona.

ERYCINIDÆ.

ERYCININÆ.

LEMONIAS, West.

278. **Mormo**, Feld.—Morr. 104.
Dumeti, Behr.
Mormonia, Bd.
Hab.—California; Utah; Arizona; New Mexico.

279. **Cythera**, Edw. Tr. A. E. Soc. 4, 345. Mead, Rep. Wheeler Exp. 5, pl. 36.
Hab.—Arizona.

280. **Virgulti,** Behr. Pr. Cal. Ac. N. Sc. 3, 178.
Sonorensis, Feld.
Hab.—Southern California.

281. **Palmerii,** Edw. Tr. A. E. Soc. 3, 195.
Hab.—Arizona.

CHARIS, West.

282. **Cænius,** L.
Pumila, Bd.-Lec. 131, pl. 37. Morr. 104.
Hab.—Southern States.

283. **Borealis,** Gr.-Rob. Ann. N. Y. Lyc. N. Hist. 8, 351.
Hab.—Middle States; Illinois.

284. **Nemesis,** Edw. Tr. A. E. Soc. 3, 212.
Hab.—Arizona.

EUMENIA, Latr.

285. **Atala,** Poey, Cent. Lep. Cuba, pl. 2.
Toxea, Gray.
Hab.—Florida.

LYCÆNIDÆ.

THECLINÆ.

THECLA, F.

Group I.

286. **Grunus,** Bd. Ann. Soc. Ent. Fr. 2, 10, 289; id. Lep. de la Cal. 43. Morr. 100.
Hab.—California, Yosemite.

Group II.

287. **Crysalus,** Edw. Tr. A. E. Soc. 4, 344.
Hab.—Colorado; Utah.

288. **Halesus,** Cram.—Bd.-Lec. 83, pl. 25, ∗. Morr. 91.
Dolichos, Hüb.
Juanita, Scud.
Hab.—Gulf States; California.

289. **M-Album,** Bd.-Lec. 86, pl. 26, ∗. Morr. 92.
Psyche, Bd.-Lec. 88, pl. 27.
Hab.—Gulf States; occasional in Virginia and Pennsylvania.

Group III.

290. **Favonius,** Sm.-Abb. 1, pl. 14, ∗.
Hab.—Gulf States; South Carolina.

291. **Autolycus,** Edw. Tr. A. E. Soc. 3, 271.
Hab.—Texas; Missouri.

292. **Alcestis,** Edw. l. c. 3, 271.
Hab.—Texas.

293. **Humuli,** Harr. 276, pl. 4, fig. 3.
Favonius, Bd.-Lec. 95, pl. 30, ∗. Morr. 95.
var. *Hyperici,* Bd.-Lec. 90, pl. 28.
Hab.—Middle and Southern States; Mississippi Valley.

294. **Melinus,** Hüb. Zutraeg. fig. 121, 122. Bd. Ann. Soc. Ent. Fr. 2, 10, 287.
var. PUDICA, H. Edw. Trans. Cal. Ac. Sc. 6, Dec. 1876.
Hab.—California.

295. **Acis,** Drury, 1, pl. 1. Morr. 101.
Hab.—Florida, Key West.

296. **Strigosa,** Harr. 276. Edw. But. N. A. 1, 144, pl. 48. Saund. Can. Ent. 1, 99, ∗.
Liparops, Scud. (nec. Bd.-Lec.).
Hab.—Atlantic States; Mississippi Valley; Canada.

297. **Ontario,** Edw. Tr. A. E. Soc. 2, 209; id. But. N. A. 1, 143, pl. 48.
Hab.—Ontario; New England, (auct. Scud.).

298. **Calanus,** Hüb.
Falacer, Bd.-Lec. 92, pl. 29, ∗. Morr. 95.
Inorata, Gr.-Rob. Saund. Can. Ent. 1, 57, ∗.
Lorata, Gr.-Rob.
Hab.—Atlantic States; Mississippi Valley; Texas; New Mexico; Canada.

299. **Edwardsii,** Saund. in Gr.-Rob. Tr. A. E. Soc. 1, 172.
Falacer, Harr.
Calanus, Gr.-Rob.
Hab.—Northern States, Maine to Nebraska; Colorado; Canada.

300. **Acadica**, Edw. Pr. Ac. N. Sc. Ph. 1862, 55; id. But. N. A. 1, 140, pl. 48. Saund. Can. Ent. 1, 95, ∗.
Souhegan, Whitney.
Hab.—Northern States; Canada.

301. **Californica**, Edw. l. c. 1862, 223.
var. CYGNUS, Edw. Tr. A. E. Soc. 3, 207.
Borus, Bd.
Hab.—California; Oregon; Vancouver's Island.

302. **Auretorum**, Bd. Ann. Soc. Ent. Fr. 2, 10, 288. Morr. 99.
Hab.—California.

303. **Sylvinus**, Bd. l. c. 2, 10, 287. Morr. 99.
Hab.—California.

304. **Dryope**, Edw. Tr. A. E. Soc. 3, 19, 193.
Hab.—California.

305. **Putnami**, H. Edw. Pr. Cal. Ac. N. Sci. 6, Sept. 1876.
Hab.—Utah, Spring Lake.

306. **Adenostomatis**, H. Edw. l. c. 6, Sept. 1876.
Hab.—Southern California, Tehachipi Pass.

307. **Spadix**, H. Edw. l. c. 6, Dec. 1876.
Hab.—California.

308. **Tetra**, Behr. in Edw. Tr. A. E. Soc. 3, 19.
Hab.—California.

309. **Chalcis**, Behr. in lit. Edw. l. c. 2, 376.
Hab.—California.

310. **Sæpium**, Bd. Ann. Soc. Ent. Fr. 2, 10, 288. Morr. 99.
Hab.—California; Utah; Colorado.

311. **Nelsoni**, Bd. Lep. de la Cal. 43.
Hab.—California, Yosemite.

312. **Ninus**, Edw. Tr. A. E. Soc. 3, 270.
Hab.—Colorado.

313. **Spinetorum**, Bd. in Hew. Illust. Part 3, fig. 198, 199. Bd. Lep. de la Cal. 42.
Hab.—California, Mount Shasta and Placer County.

314. **Siva**, Edw. Tr. A. E. Soc. 5, 110.
Hab.—Arizona.

315. **Smilacis**, Bd.—Bd.-Lec. 107, pl. 33, ✱. Morr. 98.
Auburniana, Harr. 277.
Hab.—Atlantic States; Mississippi Valley; Texas.

316. **Castalis**, Edw. Tr. A. E. Soc. 3, 208.
Hab.—Texas.

317. **Poeas**, Hüb.—Bd.-Lec. 111, pl. 35. Morr. 103.
Hab.—Southern States; West Virginia; Kentucky.

318. **Columella**, F.
Eurytulus, Hüb. Samml. Exot. Schmett. 2.
Modesta, Maynard, Am. Nat. 7, 178.
Ocellifera, Gr.
Hab.—Florida; Texas; occasional in Western New York, (coll. Grote).

Group IV.

319. **Behrii**, Edw. Tr. A. E. Soc. 3, 18.
Hab.—California; Nevada.

320. **Augustus**, Kirby, Faun. Bor. Am. 4, 298, pl. 3, fig. 4, 5. Harr. 279, fig. 108. Morr. 103.
Hab.—Boreal America; Canada; Eastern States.

321. **Iroides**, Bd. Ann. Soc. Ent. Fr. 2, 10, 289. Morr. 100.
Hab.—Oregon; British Columbia.

322. **Irus**, Godt.—Bd.-Lec. 101, pl. 31. Morr. 97.
var. *Arsace*, Bd.-Lec. 103, pl. 32.
var. HENRICI, Gr.-Rob. Tr. A. E. Soc. 1, 174.
Hab.—Atlantic States; Mississippi Valley; Kansas; Vancouver's Island.

323. **Eryphon**, Bd. l. c. 2, 10, 290. Morr. 100.
Hab.—California.

324. **Niphon**, Hüb.—Bd.-Lec. 105, pl. 33. Morr. 98.
Hab.—Atlantic States; Mississippi Valley; Colorado; Canada; Nova Scotia.

325. **Affinis**, Edw. Pr. Ac. N. Sc. Ph. 1862, 223.
Hab.—Utah.

326. **Dumetorum**, Bd. Ann. Soc. Ent. Fr. 2, 10, 291. Morr. 100.
Viridis, Edw. l. c. 223.
Hab.—California; Nevada; Oregon.

327. **Læta**, Edw. l. c. 1862, 55; id. But. N. A. 1, 139, pl. 48.
Clothilde, Edw.
Hab.—Maine to West Virginia; Ontario; Quebec.

328. **Fuliginosa**, Edw. l. c. 1861, 164.
Suasa, Bd.
Hab.—California, Lake Tahoe.

329. **Titus**, F.
Mopsus, Hüb.—Bd.-Lec. 109, pl. 34, ∗. Morr. 102. Saund. Can. Ent. 1, 96, ∗.
Hab.—United States generally; British America; Ontario; Quebec.

LYCAENINÆ.

FENISECA, Grote.

330. **Tarquinius**, F.
Crat[illegible], Bd.-Lec. 128, pl. 37. Morr. 85.
Porsenna, Scud.
Hab.—Atlantic States; Mississippi Valley; Ontario. Quebec Nova Scotia.

CHRYSOPHANUS, Doub.

Group I.

331. **Arota**, Bd. Ann. Soc. Ent. Fr. 2, 10, 293. Morr. 86. Streck. pl. 10, fig. 27, 28.
Hab.—California.

332. **Virginiensis**, Edw. Tr. A. E. Soc. 3, 21.
Hab.—California; Nevada.

333. **Hermes**, Edw. l. c. 3, 21.
Hab.—California; Nevada.

Group II.

334. **Xanthoides**, Bd. Ann. Soc. Ent. Fr. 2, 10, 292; id. Lep. de la Cal. 45. Morr. 86. Streck. pl. 10, fig. 12, 13.
Hab.—California.

335. **Dione**, Scud. Tr. Chic. Ac. Sci. 1, 330.
Hab.—Iowa; Nebraska; Missouri; Kansas.

336. **Gorgon**, Bd. l. c. 2, 10, 292. Morr. 86. Streck. pl. 10, fig. 17.
Hab.—California.

337. **Thoe**, Bd.-Lec. 125, pl. 38. Morr. 84. Saund. Can. Ent. 1, 57, ∗.

Hyllus, Edw. Synop. nec Cram.

Hab.—Northern United States; Maine to Nebraska; Kansas; Canada.

338. **Nais**, Edw. Tr. A. E. Soc. 5, 291.

Hab.—Arizona.

Group III.

339. **Mariposa**, Reak. Pr. E. Soc. Ph. 6, 149. Streck. pl. 10, fig. 25, 26.

Nivalis, Bd.

Hab.—California.

340. **Zeroe**, Bd. Lep. de la Cal. 45.

Ianthe, Edw. Tr. A. E. Soc. 3, 211. Streck. pl. 10, fig. 23, 24.

Hab.—California; Colorado.

341. **Helloides**, Bd. Ann. Soc. Ent. Fr. 2, 10, 291. Morr. 86. Streck. pl. 10, fig. 19, 20. Mead, Rep. Wheeler Exp. 5, 780, ∗.

Castro, Reak.

Hab.—Montana to Arizona; California; Oregon.

342. **Dorcas**, Kirby, Faun. Bor. Am. 4, 299, pl. 4. Morr. 90.

Hab.—British America; Southern Labrador.

343. **Epixanthe**, Bd.-Lec. 127, pl. 38. Morr. 85. Saund. Can. Ent. 1, 57.

Hab.—Northern United States; Kansas; British America; Canada.

344. **Americana**, D'Urban, Can. Nat. 5, 246. Harr. 273, fig. 104, ∗. Saund. Can. Ent. 1, 3, ∗.

Phlæas, Bd.-Lec. 123. Morr. 84.

Hypophlæas, Bd.

Hab.—Northern States; West Virginia; Kentucky; California, (auct. Boisduval); British America, Columbia to Canada; Nova Scotia.

Group IV.

345. **Cupreus,** Edw. Tr. A. E. Soc. 3, 20; id. But. N. A. 2, pl. 1 of Chrys.

Hab.—Oregon; California; Sierras.

346. **Rubidus,** Behr. Pr. E. Soc. Ph. 6, 208. Edw. But. N. A. 2, pl. 1 of Chrys.

Hab.—Oregon; Montana; Nevada.

347. **Sirius,** Edw. l. c. 3, 270; id. But. N. A. 2, pl. 1 of Chrys. Mead, l. c. 5, 781.

Hab.—Montana; Colorado; Arizona.

LYCAENA, Fab.

Group I.

348. **Heteronea,** Bd. Ann. Soc. Ent. Fr. 2, 10, 298. Morr. 89. Edw. But. N. A. 2, pl. 1 of Lyc. Streck. pl. 10, fig. 6, ♂, 7, ♀. Mead, l. c. 5, 781.

Hab.—California; Utah; Colorado.

349. **Clara,** H. Edw. Pr. Cal. Ac. N. Sc. 6, Feb. 1877.

Hab.—California, Los Angelos.

350. **Speciosa,** H. Edw. l. c. v. 6, Dec. 1876.

Hab.—California, Kern County.

351. **Lycea,** Edw. Pr. E. Soc. Ph. 2, 507. Mead, l. c. 5, 785, ∗.
Rapahoe, Reak.—Streck, pl. 10, fig. 14, ♂, 15, ♀.

Hab.—Montana; Colorado; Arizona.

352. **Amica,** Edw. l. c. 2, 80.

Hab.—British America, Mackenzie's River.

353. **Sagitifera,** Feld. Reise Nov. 2, 281, pl. 35.
Catalina, Reak. Pr. Ac. N. Sc. Ph. 1866, 244. Streck. pl. 10, fig. 1, ♂, 2, ♀.
Lorquini, Behr, Pr. Cal. Ac. N. Sc. 3, 280.
Daunia, Edw. Mead, l. c. 5, 785.
var. *Viaca,* Edw. Tr. A. E. Soc. 3, 209.
Rhæa, Bd.

Hab.—Colorado; California.

354. **Icaroides,** Bd. Ann. Soc. Ent. Fr. 2, 10, 297. Morr. 88.
Dædalus, Behr, Pr. Cal. Ac. N. Sc. 3, 280.
var. *Pardalis,* Behr, l. c. 3, 280.
Mintha, Edw. Tr. A. E. Soc. 3, 194.
Maricopa, Reak.
Erymus, Bd.
Hab.—California. A species subject to much variation.

355. **Fulla,** Edw. Tr. A. E. Soc. 3, 194.
Hab.—California, Sierras.

356. **Pembina,** Edw. Pr. Ac. N. Sc. Ph. 1862, 224.
Hab.—British America, Slave Lake.

357. **Pheres,** Bd. Ann. Soc. Ent. Fr. 2, 10, 297. Morr. 89.
var. *Evius,* Bd. lep de la Cal. 49.
Hab.—California to Colorado; Oregon; British Columbia; Vancouver's Island.

358. **Phileros,** Bd. Lep. de la Cal. 50.
Helios, Edw. Tr. A. E. Soc. 3, 208.
Hab.—California; Utah; Arizona.

359. **Ardea,** Edw. Tr. A. E. Soc. 3, 209.
Hab.—California.

360. **Kodiak,** Edw. l. c. 3, 20.
Hab.—Kodiak.

361. **Orcus,** Edw. l. c. 3, 276.
Hab.—California.

362. **Sæpiolus,** Bd. Ann. Soc. Ent. Fr. 2, 10, 296. Morr. 88. Mead, l. c. 5, 784, ∗.
dim. var. ♀ AEHAJA, Behr, Pr. Cal. Ac. N. Sci. 3, 280.
Rufescens, Bd. Mead, l. c. 5, 784.
Hab.—California to Colorado.

Group II.

363. **Xerxes,** Bd. l. c. 2, 10, 296. Morr. 88.
Hab.—California.

364. **Antiacis**, Bd. l. c. 2, 10, 300. Morr. 90.
Behrii, Edw. Pr. Ac. N. Sc. Ph. 1862, 224.
Polyphemus, Bd.
var. *Mertila*, Edw. Pr. E. Soc. Ph. 6, 206.
Hab.—California; Arizona.

365. **Couperi**, Grote, Bul. Buf. Soc. N. Sc. 1, 185.
Pembina, Streck. pl. 10, fig. 10, ♂, 11, ♀.
Hab.—Anticosti; Southern Labrador.

366. **Lygdamas**, Doub. Entomologist, 1842, 209. Edw. But. N. A. 1, 148, pl. 49. Mead, l. c. 5, 784.
var. ORO, Scud. Can. Ent. 8, 23.
Hab.—Atlantic States; Michigan; Ohio; Colorado.

367. **Sonorensis**, Feld. Reise Nov. 2, 281, pl. 35, fig. 3, 4.
Regia, Bd. Lep. de la Cal. 46. Edw. But. N. A. 2, pl. 1 of Lyc.
Hab.—Southern California, Los Angelos.

Group III.

368. **Tehama**, Reak. Pr. Ac. N. Sc. Ph. 1866, 246.
Cilla, Behr, Pr. Cal. Ac. N. Sc. 3, 281.
Nestos, Bd.
Hab.—California.

369. **Orbitulus**, Von Prunner. Streck. pl. 10. fig. 16, ♂.
Rustica, Edw. Pr. E. Soc. Ph. 4, 203. Mead, l. c. 5, 783.
Hab.—Colorado; Rocky Mountains.

370. **Aquilo**, Bd. Icones, 1, 62, pl. 12, fig. 7, 8.
Franklinii, Curtis, App. Ross Exp. 69, pl. A, fig. 8, 9.
Hab.—Boreal America; Labrador.

Group IV.

371. **Enoptes**, Bd. Ann. Soc. Ent. Fr. 2, 10, 298. Morr. 89.
Hab.—California, Sierras; Arizona.

372. **Glaucon**, Edw. Tr. A. E. Soc. 3, 210. Mead, l. c. 5, 782.
Hab.—Colorado.

373. **Battoides**, Behr, Pr. Cal. Ac. N. Sc. 3, 282. Mead, l. c. 5, 782.
Hab.—California, Sierras; Nevada; Colorado.

374. **Lupini**, Bd. Lep. de la Cal. pl. 46.
Minehaha, Scud.
Hab.—California, Yosemite; Montana.

375. **Melissa**, Edw. Tr. A. E. Soc. 4, 346. Streck. pl. 10, fig. 8, ♂, 9, ♀. Mead, l. c. 5, 783, pl. 36.
Hab.—Arizona; New Mexico; Colorado; Montana; Nevada.

376. **Scudderii**, Edw. Pr. Ac. N. Sc. Ph. 1861, 164; id. l. c. 1862, 225.
Hab.—New York; Michigan; California; British Columbia; Ontario; Southern Labrador.

377. **Acmon**, West.-Hew. Gen. Di. Lep. pl. 76. Mead, l. c. 5, 782.
Antuegon, Bd. Morr. 87.
Hab.—California; Arizona; Colorado.

378. **Anna**, Edw. Pr. Ac. N. Sc. Ph. 1861, 163. Streck. pl. 10, fig. 4, ♂, 5, ♀.
Cajona, Reak.
Argyrotoxus, Behr, Pr. Cal. Ac. N. Sc. 3, 281.
Philemon, Bd.
Hab.—California to Colorado; Montana; Oregon.

379. **Piasus**, Bd. Ann. Soc. Ent. Fr. 2, 10, 299. Morr. 89.
Echo, Edw. Pr. E. Soc. Ph. 2, 506.
Hab.—California; Arizona; Colorado.

380. **Pseudargiolus**, Bd.-Lec.
dim. var. Violacea, Edw. Pr. E. Soc. Ph. 6, 201; id. But. N. A. 1, 147, pl. 49.
dim. var. Pseudargiolus, Bd.-Lec. 118, pl. 36. Edw. l. c. 1, 151, pl. 50; id. Can. Ent. 7, 81, ∗.
Argiolus, Sm.-Abb.
Hab.—Middle, Southern and Western States.

381. **Neglecta**, Edw. Pr. Ac. N. Sci. Ph. 1862, 56; id. But. N. A. 1, 153, pl. 50. Saund. Can. Ent. 1, 100, ∗.
Hab.—Northern and Middle States; British America; Canada.

382. **Lucia**, Kirby, Faun Bor. Am. 4, 299, pl. 3, fig. 8, 9. Harr. 275.
Hab.—Northern States; British America; Canada; Southern Labrador.

Group V.

383. **Amyntula**, Bd. Ann. Soc. Ent. Fr. 2, 10, 294. Morr. 87.
Hab.—California; Arizona.

384. **Comyntas**, Godt.—Bd.-Lec. 120, pl. 36. Morr. 83. Harr. 275, ∗. Edw. Can. Ent. 8, 202, ∗.
Hab.—Atlantic States; Mississippi Valley; Rocky Mountains; British America; Canada.

385. **Shasta**, Edw. Pr. Ac. N. Sci. Ph. 1862, 224.
Calchas, Behr, Pr. Cal. Ac. N. Sc. 3, 281.
Nivium, Bd.
Hab.—California; Oregon; Nevada; Utah.

386. **Monica**, Reak. Pr. Ac. N. Sci. Ph. 1866, 244. Streck. pl. 10, fig. 18.
Hab.—Southern California; Arizona.

387. **Alce**, Edw. Tr. A. E. Soc. 3, 272.
Isola, Mead, (not Reakirt), Rep. Wheeler Exp. 5, 783.
Hab.—Colorado; Arizona; Texas; occasional in Kansas; (coll. Snow.).

388. **Gyas**, Edw. l. c. 3, 210.
Hab.—Arizona.

389. **Filenus**, Poey, Cent. Lep. Cuba, pl. 2. Bd.-Lec. 114, pl. 35 Morr. 82.
Hab.—Gulf States.

390. **Isophthalma**, Herr.-Schaeff.
Pseudofea, Morrison, Bul. Buf. Soc. N. Sc. 1, 186.
Hab.—Florida; Georgia.

391. **Ammon**, Lef.-De. Sag. Hist. N. Cuba, 612, pl. 16.
Hab.—Florida Keys.

392. **Fea**, Edw. Tr. A. E. Soc. 3, 211.
Hab.—Texas.

393. **Exilis**, Bd. Ann. Soc. Ent. Fr. 2, 10, 294. Morr. 87.
Hab.—California; Arizona.

394. **Marina**, Reak. Pr. Ac. N. Sc. Ph. 1868, 87.
Hab.—Southern California, Los Angelos; (coll. Russell).

395. **Theonus**, Lef.-De. Sag. Hist. N. Cuba, 611, pl. 16.
Cassius, Morrison, Bul. Buf. Soc. N. Sc. 1, 187.
Hab.—Florida Keys.

HESPERIDÆ.

SECTION I.

CARTEROCEPHALUS, Led.

396. **Mandan**, Edw. Pr. E. Soc. Ph. 2, 20, pl. 5.

Mesapano, Scud. Pr. Bost. Soc. N. Hist. 11, 383.

Skada, Edw.

Hab.—British America, Pacific to Labrador; California, Mendocino; New Hampshire, White Mountains.

397. **Omaha**, Edw. l. c. 2, 21.

Mingo, Edw.

Californica, Scud. Syst. Rev. 54.

Hab.—Colorado; California; occasional in West Virginia, (coll. J. E. Meyer).

ANCYLOXYPHA, Feld.

398. **Numitor**, F.—Morr. 120.

Puer, Hüb.

Marginatus, Harr. 308, fig. 131.

Hab.—Atlantic and Western States; Texas; Kansas; Nebraska.

COPÆODES, Speyer.

399. **Procris**, Edw. Tr. A. E. Soc. 3, 215, ♂, ♀.

var. *Waco*, Edw. l. c. 2, 122, ♂.

Minima, Edw. l. c. 196, ♂.

Hab.—Texas.

400. **Arene**, Edw. l. c. 3, 214.

Hab.—Arizona; Texas.

THYMELICUS, Speyer.

401. **Hylax**, Edw. l. c. 3, 274.

Hab.—Colorado; Dakota.

402. **Garita**, Reak. Pr. E. Soc. Ph. 6, 150.

Powescheik, Parker, Am. Ent. 2, 271.

Hab.—Colorado; Illinois; Iowa; Nebraska.

PAMPHILA, F.

Group I.

403. **Massasoit**, Scud. Pr. Ess. Ins. 3, 171.
Hab.—New England; Long Island; Middle States; Texas; Colorado.

404. **Zabulon**, Bd.-Lec. pl. 76. Morr. 116.
Hobomok, Harr. 313, fig. 137.
Quadriquina, Scud.
dim. var. ♀, POCAHONTAS, Scud. Pr. Ess. Ins. 3, 171.
Hab.—Atlantic States; Mississippi Valley; Texas; Arizona; Canada.

Group II.

405. **Sylvanus**, F.—Bd. Ann. Soc. Ent. Fr. 2, 10, 313.
Hab.—Europe; California, (auct. Boisduval).

406. **Sylvanoides**, Bd. l. c. 2, 10, 313. Morr. 107.
Sonora, Scud. Syst. Rev. 57.
Hab.—California.

407. **Ruricola**, Bd. l. c. 2, 10, 315, ♂. Morr. 109.
Hab.—California.

408. **Comma**, L.—Esp. Eur. Schmett. 1, pl. 23. Hüb Eur. Schmett. 1, fig. 479—481. Bd. Ann. Soc. Ent. Fr. 2, 10, 313.
var. —— Scud. Mem. Bost. Soc. N. H. 2, 350, pl. 10, fig. 12—15.
Juba, Scud. l. c. 2, 349, pl. 10, fig. 19, 20.
Manitoba, Scud. l. c. 351, fig. 8—11.
var. COLORADO, Scud. l. c. 349, fig. 16—18.
Nevada, Scud. l. c. 347, fig. 1—4.
Sylvanoides, Scud. (nec Bd.) l. c. 351, fig. 21, 22.
Hab.—British America, Pacific to Labrador; Rocky Mountains; Montana to Arizona; Colorado to California.

409. **Sassacus**, Scud. Pr. Ess. Ins. 3, 173; id. Mem. Bost. Soc. N. Hist. 2, 346, pl. 10, fig. 5, 7.
Hab.—New England; Illinois; Georgia.

410. **Pawnee**, Dodge, Can. Ent. 6, 44.
Hab.—Nebraska.

411. **Ottoe**, Edw. Pr. E. Soc. Ph. 6, 207. Scud. Mem. Bost. Soc. N. Hist. 2, 348, pl. 10, fig. 6.
Hab.—Indian Territory; Kansas; Nebraska.

412. **Napa**, Edw. l. c. 4, 202, pl. 1.
Dacotah, Edw.
Ridingsii, Reak. Pr. E. Soc. Ph. 6, 151, ♀.
dim. var. ♀, MELANE, Edw. Tr. A. E. Soc. 2, 312.
Hab.—Colorado.

413. **Draco**, Edw. l. c. 3, 274.
Hab.—Colorado.

414. **Metea**, Scud. Proc. Ess. Ins. 3, 177.
Hab.—Connecticut; New York; Texas.

415. **Uncas**, Edw. Pr. E. Soc. Ph. 2, 19, pl. 5.
Hab.—Pennsylvania; Delaware; Ohio; Kansas; Dakota; Colorado; New Mexico; British America.

416. **Licinus**, Edw. Tr. A. E. Soc. 3, 275.
Hab.—Texas.

417. **Seminole**, Scud. Syst. Rev. 55.
Hab.—Florida.

418. **Attalus**, Edw. l. c. 3, 276.
Hab.—Texas.

419. **Yuma**, Edw. Tr. A. E. Soc. 4, 346.
Hab.—Arizona.

420. **Meskei**, Edw. Can. Ent. 9, March, 1877, ♀.
Hab.—Texas.

421. **Snowi**, Edw. Can. Ent. 9, Feby. 1877.
Hab.—Colorado.

422. **Leonardus**, Harr. 314, fig. 138. Morr. 110.
Hab.—New England to West Virginia; Kansas.

423. **Nemorum**, Bd. Ann. Soc. Ent. Fr. 2, 10, 314. Morr. 107.
Yreka, Edw. Pr. E. Soc. Ph. 6, 207.
Hab.—California.

424. **Agricola,** Bd. l. c. 2, 10, 314. Morr. 108.
Hab.—California.

425. **Pratincola,** Bd. l. c. 2, 10, 315, ♂. Morr. 108.
Hab.—California.

426. **Campestris,** Bd. l. c. 2, 10, 316, ♂. Morr. 108.
Hab.—California.

427. **Huron,** Edw. Pr. E. Soc. Ph. 2, 16, pl. 1.
Hab.—Atlantic States; Mississippi Valley; Texas; Kansas; Arizona.

428. **Phylæus,** Drury.—Bd.-Lec. pl. 78. Morr. 118.
Vitellius, F.
Bucephalus, Humph.-West. Br. But. 126, pl. 40, fig. 1—3.
Hab.—Middle and Gulf States to Pacific.

429. **Brettus,** Bd.-Lec. pl. 75, ♂. Morr. 118.
Wingina, Scud. Pr. Ess. Ins. 3, 173, ♂ ♀.
Orono, Scud. Syst. Rev. 58.
Hab.—Gulf States; West Virginia.

430. **Pontiac,** Edw. Pr. E. Soc. Ph. 2, 17, pl. 11, ♂.
Conspicua, Edw. l. c. 2, 17, pl. 5, ♀. Parker, Can. Ent. 3, 51, ♂.
Hab.—Michigan; Iowa; Nebraska; Illinois.

431. **Chusca,** Edw. Tr. A. E. Soc. 4, 346.
Hab.—Arizona.

432. **Sabuleti,** Bd. Ann. Soc. Ent. Fr. 2, 10, 316. Morr. 109.
Hab.—California.

433. **Otho,** Sm.-Abb. pl. 16.
Hab.—Gulf States.

var. EGEREMET, Scud. Pr. Ess. Ins. 3, 174.
Otho, Bd.-Lec. pl. 77, ♂.
Ætna, Scud. Syst. Rev. 58.
Hab.—Atlantic States to Florida; Mississippi Valley; Canada.

434. **Peckius,** Kirby, Faun. Bor. Am. 4, 300, pl. 4. Morr. 120.
Wamsutta, Harr. 318, fig. 141.

Hab.—Northern and Middle States to Wisconsin; Kansas; Canada.

435. **Mystic,** Edw. Pr. E. Soc. Ph. 2, 15, pl. 1. Scud. Pr. Ess. Ins. 3, 172.

Hab.—New England; New York, Catskill Mountains; Canada.

436. **Cernes,*** Bd.-Lec. pl. 76.
Arogos, id. l. c. pl. 76.
Ahaton, Harr. 317, fig. 140.
Origines, Morr. 117.

Hab.—New England; Middle and Northwestern States; California.

437. **Manataaqua,** Scud. Pr. Ess Ins. 3, 175.
Cernes, Harr. 316.

Hab.—Atlantic to Pacific; Canada to Gulf of Mexico.

438. **Vestris,** Bd. Ann. Soc. Ent. Fr. 317, ♂. Morr. 109.

Hab.—California.

439. **Osceola,** Lintn. 28th. Rep. N. Y. State Mus.

Hab.—California, Mendocino.

440. **Metacomet,** Harr. 317.
Rurea, Edw. Pr. Ac. N. Sc. Ph. 1862, 58.
var. *Kiowah*, Reak. Pr. E. Soc. Ph. 6, 150.

Hab.—Northern States; Wisconsin; Kansas; Canada.

441. **Accius,** Sm.-Abb. pl. 23, ♀.
Monoco, Scud. Pr. Ess. Ins. 3, 178.
var. *Nortonii*, Edw. Tr. A. E. Soc. 1, 287.
Punctella, Gr.-Rob. l. c. 1, 1.

Hab.—Gulf States.

442. **Deva,** Edw. Tr. A. E. Soc. 5, 292.

Hab.—Arizona.

---

* The Fabrician name *Taumas* for *Cernes* cannot be retained from its collision with the older *Thaumas*, Hufnagel.—S.

443. **Maculata,** Edw. Pr. E. Soc. Ph. 4, 202, pl. 1.
Hab.—Gulf States; occasional in New York, (coll. Meske).

444. **Panoquin,** Scud. Pr. Ess. Ins. 3, 178.
Ophis, Edw. Tr. A. E. Soc. 216.
Hab.—Gulf States.

445. **Ocola,** Edw. Pr. E. Soc. Ph. 2, 20, pl. 11.
Hab.—Gulf States.

446. **Ethlius,** Cram. 4, pl. 392, fig. A, B.
Chemnis, F.
Olynthus, Bd.-Lec. pl. 75. Morr. 113.
Hab.—Gulf States.

447. **Verna,** Edw. Pr. Ac. N. Sc. Ph. 1862, 57.
Hab.—Maryland to Georgia; West Virginia; Kansas.

448. **Horus,** Edw. Tr. A. E. Soc. 3, 277.
Hab —Texas.

449. **Bimacula,** Gr.-Rob. Ann. N. Y. Lyc. N. Hist. 8, 433.
Acanootus, Scud. Pr. Bost. Soc. N. Hist. 11, 381.
Illinois, Dodge, Can. Ent. 4, 217.
Hab.—Massachusetts to Nebraska; Illinois.

450. **Arpa,** Bd.-Lec. pl. 68, ∗. Morr. 117.
Hab.—Gulf States; Nebraska, (coll. Dodge).

451. **Bulenta,** Bd.-Lec. pl. 67, ∗. Morr. 117.
Palatka, Edw. Tr. A. E. Soc. 1, 287.
Hab.—Gulf States.

452. **Viator,** Edw. Pr. E. Soc. Ph. 4, 202, pl. 1.
Hab.—Gulf States; Illinois; Wisconsin; New Jersey.

453. **Vitellius,** Sm.-Abb. pl. 17.
Iowa, Scud. Pr. Bost. Soc. N. Hist. 11, 6.
Hab.—Georgia; Iowa; Nebraska.

454. **Delaware,** Edw. Pr. E. Soc. Ph. 2, 19, pl. 5, ♂.
Logan, Edw. l. c. 2, 18, pl. 1, ♀.
Hab.—Pennsylvania to Florida; West Virginia; Illinois to Kansas; Nebraska; Dakota.

455. **Osyka,** Edw. Tr. A. E. Soc. 1, 288.
Hab.—Gulf States.

456. **Comus,** Edw. Tr. A. E. Soc. 5, 206.
Hab.—Texas.

457. **Eufala,** Edw. l. c. 2, 311.
Hab.—Louisiana; Texas.

458. **Fusca,** Gr.-Rob. l. c. 1, 2.
Hab.—Gulf States.

459. **Nereus,** Edw. l. c. 5, 207.
Hab.—Arizona.

460. **Hianna,** Scud. Pr. Bost. Soc. N. Hist. 11, 382.
Hab.—Massachusetts to Nebraska.

AMBLYSCIRTES, Speyer.

461. **Vialis,** Edw. Pr. Ac. N. Sci. Ph. 1862, 58.
Hab.—Middle, Southern and Western States.

462. **Eos,** Edw. Tr. A. E. Soc. 3, 276.
Hab.—Texas; Georgia.

463. **Samoset,** Scud. Pr. Ess. Ins. 3, 176.
Hegon, Scud. l. c. 3, 176.
Nemoris, Edw. Pr. E. Soc. Ph. 2, 507; l. c. 4, pl. 1.
Alternata, Gr. Rob. Tr. A. E. Soc. 1, 3.
Hab.—Northern and Middle States; Georgia; Wisconsin; Iowa; Ontario.

464. **Textor,** Hüb. Zutraeg. fig. 515, 516.
Oneko, Scud. Pr. Ess. Ins. 3, 176.
Wokulla, Edw. Tr. A. E. Soc. 2, 311.
Hab.—Gulf States; Georgia to Texas.

SECTION II.

PYRGUS, West.

465. **Ericetorum,** Bd. Ann. Soc. Ent. Fr. 2, 10, 313. Morr. 122.
Alba, Edw. Pr. E. Soc. Ph. 6, 206.
Hab.—California; Oregon; Arizona.

466. **Oceanus,** Edw. Tr. A. E. Soc. 3, 213.
Hab.—Arizona.

467. **Tessellata,** Scud. Syst. Rev. 52.
Oileus, West.
Oilus, Bd. Morr. 121.
Hab.—Atlantic to Pacific; Pennsylvania to Gulf of Mexico; Texas; Arizona.

468. **Centaureæ,** Ramb.
Ruralis, Bd. l. c. 2, 10, 311. Morr. 121.
Wyandot, Edw. Pr. E. Soc. Ph. 2, 21, pl. 5.
Hab.—New York; West Virginia; Colorado; Labrador.

469. **Ricara,** Edw. l. c. 4, 203, pl. 1.
Hab.—Colorado; California.

470. **Petreius,** Edw. Tr. A. E. Soc. 3, 195.
Hab.—Nevada; California.

471. **Cæspitatis,** Bd. Ann. Soc. Ent. Fr. 2, 10, 312, ♂. Morr. 121.
Hab.—California.

472. **Scriptura,** Bd. l. c. 2, 10, 312. Morr. 121.
Hab.—California; Arizona.

THANAOS, Bd.

473. **Brizo,** Bd.—Bd.-Lec. pl. 66, ♂. Harr. 309, fig. 132. Morr. 114.
Hab.—Atlantic, Southern and Western States; Texas; Kansas; British America; Ontario.

474. **Icelus,** Lintn. Ent. Cont. 1, 30, pl. 7, fig. 5, 6.
Hab.—New England; Middle States; Illinois.

475. **Lucilius,** Lintn. l. c. 1, 32, pl. 7, fig. 1, 2.
Hab.—New York; Middle and Western States; Dakota.

476. **Ausonius,** Lintn. l. c. 1, 34, pl. 7, fig. 11, 12.
Hab.—Middle States; West Virginia.

477. **Tages,** L.
var. *Cervantes,* Grasl.—Bd. Ann. Soc. Ent. Fr. 10, 310.
Hab.—California, (auct. Boisduval).

478. **Persius,** Scud. Pr. Ess. Ins. 3, 170.
Hab.—Northern, Middle and Western States; Colorado; New Mexico; California.

479. **Martialis,** Scud. Tr. Chic. Ac. N. Sci. 1, 335.
Hab.—Massachusetts to Georgia; Mississippi Valley; Kansas.

480. **Juvenalis,** F.—Sm.-Abb. pl. 21, ∗. Bd.-Lec. pl. 65, ∗. Harr. 309, ∗. Morr. 114.
Costalis, West.
Ennius, Scud.-Burg.* Pr. Bost. Soc. N. Hist. 13, 296.
Horatius, Scud.-Burg. l. c. 13, 301.
Virgilius, Scud.-Burg. l. c. 13, 302.
Terentius, Scud.-Burg. l. c. 13, 292.
Ovidius, Scud.-Burg. l. c. 13, 295.
Hab.—Atlantic and Gulf States; Mississippi Valley.

481. **Propertius,** Scud.-Burg. id. l. c. 13, 299.
Tibullus, Scud.-Burg. l. c. 13, 298.
Hab.—California.

482. **Plautus,** Scud.-Burg. l. c. 13, 304, ⁎.
Hab.—Florida.

483. **Tristis,** Bd. Ann. Soc. Ent. Fr. 2, 10, 311. Morr. 115.
Hab.—California; Arizona.

484. **Funeralis,** Scud.-Burg. l. c. 13, 293.
Hab.—Texas.

485. **Pacuvius,** Lintn. 28th. Rep. N. Y. State Mus.
Hab.—Arizona.

LINTNERIA, nov. gen.

486. **Zampa,** Edw. Tr. A. E. Soc. 5, 207.
Hab.—Arizona.

---

*The species credited to Scud.-Burg. were characterized solely from peculiarities in the genital armor. I do not regard such a characterization as a "description" entitling a species to recognition, and declined to admit these in the Synopsis. But in deference to Mr. Lintner's wishes I give them here, as I would in exceptional cases give manuscript names. How valueless the genital armor is for specific distinctions may be inferred from the synonymy.—E.

PHOLISORA, Speyer.

487. **Catullus,** Cram.—Sm.-Abb. pl. 24. Morr. 115.
Hab.—Atlantic, Southern and Western States; Texas; Kansas; Colorado; New Mexico.

488. **Alpheus,** Edw. Tr. A. E. Soc. 5, 206.
Hab.—New Mexico.

489. **Hayhurstii,** Edw. l. c. 3, 22.
Hab.—West Virginia to Kansas; Texas; New Mexico.

ACHYLODES, West.

490. **Thraso,** Hüb.—Bd. Sp. Gen. 1, pl. 13, fig. 6.
Tamenund, Edw. Tr. A. E. Soc. 3, 215.
Hab.—Texas.

EUDAMUS, Swain.

Group I.

491. **Pylades,** Scud. Pr. Bost. Soc. N. Hist. 12.
Bathyllus, Harr. 312, fig. 135.
Nevada, Scud. Syst. Rev. 50.
Hab.—Northern States to Gulf of Mexico; Dakota; Colorado to California; British America.

492. **Bathyllus,** Sm.-Abb. pl. 22. Bd.-Lec. pl. 74. Morr. 106.
Hab.—Southern States; Kansas; New Mexico; occasional in New York.

493. **Lycidas,** Sm.-Abb. pl. 20. Bd.-Lec. pl. 71, *. Morr. 106.
Lyciades, Hüb.
Hab.—Southern States; Mississippi Valley; occasional in New York.

494. **Epigena,** Butler, Lep. Exot. 65, pl. 25, fig. 6.
Orestes, Lintn. 28th Rep. N. Y. State Mus.
Hab.—Texas, (coll. Meske).

495. **Cellus,** Bd.—Bd.-Lec. pl. 73, *. Morr. 105.
Hab.—Southern States; West Virginia; Kentucky; Arizona.

Group II.

496. **Hesus,** West.-Hew. Gen. Di. Lep. pl. 78.
Hab.—Texas.

497. **Amyntas**, F.
Lividus, Hüb. Samml. Exot. Schmett.
Savigny, Latr.
Hab.—Florida, Key West.

498. **Tityrus**, F.—Sm.-Abb. pl. 19, ∗. Bd.-Lec. pl. 72, ∗. Harr. 310, pl. 5, ∗. Morr. 112.
Hab.—Atlantic States; Mississippi Valley; Kansas; Dakota; California.

Group III.

499. **Proteus**, L.—Sm.-Abb. pl. 18, ∗. Bd.-Lec. pl. 69, ∗. Morr. 106.
Hab.—Southern States.

500. **Simplicius**, Stoll. Supplt. pl. 39, fig. 6.
Eurycles, Latr.
Hab.—Texas; Arizona.

ERYCIDES, West.

501. **Urania**, West.-Hew. Gen. Di. Lep. pl. 79.
Hab.—Texas.

502. **Texana**, Scud. Syst. Rev. 47, ⚹.
Hab.—Texas.

503. **Sanguinea**, Scud. l. c. 47, ⚹.
Hab.—Texas.

PYRRHOPYGA, West.

504. **Araxes**, Hew. Desc. Hesp. 2, No. 3.
Hab.—Arizona; (coll. Wheeler Exp.).

MEGATHYMUS, Riley.

505. **Yuccæ**, Bd.-Lec. pl. 70. Riley, 8th. Mo. Ent. Rep. 169.
Hab.—Southern States; Arizona; New Mexico.

506. **Cofaqui**, Streeker, Pr. Ac. N. Sci. Ph. 1876, 148, ⚹.
Hab.—Florida.

Species hitherto accredited to the North American fauna, but omitted in this Catalogue for want of authentication.

PAPILIONIDÆ.

PIERINÆ.

Callidryas Cypris, F.—Bd. Sp. Gen. 1, 623. Butler, Lep. Exot. 106, pl. 39.
Hab.—Mexico; New Mexico, (Edw. Synop.)

Rhodocera Mærula, F.—Bd.-Lec. 71, pl. 23.=*Ecclipsis*, Cram.
Hab.—Mexico; Venezuela; Florida and New York, (Bd.-Lec.)

Rhodocera Clorinde, Godt.—Bd. Sp. Gen. 1, 599.
Hab.—Mexico; Brazil; New Mexico, (Edw. Synop.)

Colias Rutilans, Bd. Sp. Gen. 1, 642, pl. 3, C, fig. 3.
Hab.—Peru; United States, (Weidemeyer); California, (Ménétriés.)

Terias Midea, Mén.—Bd. Sp. Gen. 1, 659.
Hab.—Hayti; California, (Ménétriés.)

Terias Elathea, Cram.—Bd. Sp. Gen. 1, 664.
Hab.—Hayti; Surinam; Brazil; United States, (Weidemeyer); Florida, (Edw. Synop.)

Terias Palmira, Poey, Hist. Nat. de Cuba, 1, 249, pl. 24, fig. 4—6.
Hab.—Cuba; Venezuela; United States, (Weidemeyer); Georgia, (Edw. Synop.)

NYMPHALIDÆ.

HELICONINÆ.

Mechanitis Californica, Reak. Pr. E. Soc. Ph. 5, 223.
Hab.—Mexico; California, Los Angelos, (Reakirt.)

Ithomia Diaphana, Drury, 2, pl. 7.
Hab.—West Indies; United States, (Weidemeyer); Florida, (Edw. Synop.)

Ithomia Lycaste, F.—Reak. Pr. E. Soc. Ph. 5, 218.
Hab.—Mexico; California, Los Angelos, (Reakirt); Kansas, (Kirby's Cat.)

Ithomia Phono, Geyer, in Hüb. Zutr. Exot. Schmett. fig. 987—8. Scud. Syn. List, Bul. Buf. Soc. N. Sci. 1, 246.
Hab.—New Grenada; Florida, (Geyer.)

NYMPHALINÆ.

Ageronia Feronia, L.—Drury I, pl. 10.
Hab.—Mexico; Central America; Texas, (Edw. Synop. auct. Reak. in lit.)

Ageronia Fornax, Hüb. Samml. Exot. Schmett.
Hab.—Mexico; Central America; Texas, (Edw. Synop. auct. Reakirt, in lit.)

Argynnis Astarte, Doub. Gen. Di. Lep. pl. 23.
Hab.—Jamaica; United States, (Doubleday.)

Argynnis Nenoquis, Reakirt, Pr. Ac. N. Sc. Ph. 1866, 247.
Hab.—Rocky Mountains; Oregon, (Reakirt.)
This is *Dia.* Eur. Sp. and one of Lorquin's.

Argynnis Morrisii, Reakirt, l. c. 1866, 245.
Hab.—Oregon, (Reakirt.)
This is *Euphrosyne*, Eur. Sp. and one of Lorquin's.

Melitæa Theona, Mén. En. Au. Mus. St. Petersburg, 1, 86, pl. 2.
Hab.—Nicaragua; Southern California, (Ménétriés.)

Phyciodes Ismeria, Bd.-Lec. 168, pl. 46.
Hab.—Carolina; Georgia, (Bd.-Lec.)
The figures purport to have been drawn by Abbot, and Mr. Scudder says were copied from an unpublished plate of Abbot's. The description in Bd.-Lec. is made up from their own plate, not from Abbot's. And no matter what the latter was, by the plate and description in Bd.-Lec. the species must stand or fall. An unpublished plate carries no authority, and it is not possible to tell from Bd.-Lec. what insect is intended.

Eresia Hermas, Hew. Exot. But. 3, pl. 5.=*Genigueh*, Reak. Pr. E. Soc. Ph. 5, 225.
Hab.—Mexico; Southern California, (Reakirt.)

Smyrna Karwinski, Geyer, in Hüb. Samml. Exot. Schmett.
Hab.—Mexico; United States, (Weidemeyer); Texas, (Edw. Synop.)

Victorina Steneles, L.—Cram. I, pl. 79.
Hab.—Central America; New Mexico, (Edw. Synop.)

Apatura Idyja, Hüb. Samml. Exot. Schmett.
Hab.—Central America; Texas, (Edw. Synop.)

Megistanis Aoheronta, F.=*Cadmus*, Cram. 1, pl. 22, fig. A. B.
Hab.—Tropical America; Texas, (Edw. Synop.)

Aganisthos Orion, F.—Bd.-Lec. 195, pl. 52.=*Odius*, F.=*Danae*, Cram.
Hab.—Tropical America; Florida, (Bd.-Lec.)

LIBYTHEINÆ.

Libythea Motya, Bd.-Lec. pl. 64.
Hab.—West Indies; Southern States, (Edw. Synop.)

ERYCINIDÆ.

ERYCININÆ.

Eumenia Minijas, Hüb. Samml. Exot. Schmett. Bd. Sp. Gen. 1, pl. 21, fig. 6.
Hab.—Mexico; Central America; Texas, (Edw Synop.)

LYCÆNIDÆ.

THECLINÆ.

Thecla Liparops, Bd.-Lec. 99, pl. 31.

This case is parallel to that of *Ismeria*—the plate credited to Abbot, and the description made up from the plate as it stands in Bd.-Lec. No such insect exists in nature, and science has made no provision for imaginary ones.

LYCÆNINÆ.

Lycæna Tejua, Reak. Pr. Ac. N. Sc. Ph. 1866, 245. Streck. pl. 10, fig. 3.
Hab.—Mexico; Southern California, (Reakirt.)

Addendum to List of Species.

Lycaena Lotis, Lintn. 28th. Rep. N. Y. State Mus.
Hab.—California, Mendocino. Allied to *Scudderii*.

Addenda to List of Authors.

Bunker, R.
Desc. Hesp.—Descriptions of Hesperidæ, by W. C. Hewitson.
Graslin, in Ann. Soc. Ent. Fr.
Kirby's Cat.—Catalogue of Diurnal Lepidoptera, 1871.
Scudder, S. H.—Synonymic List of the Butterflies of North A[illegible]
Scud.-Burg.—On Asymmetry in the Appendages of Hexapod [illegible]cts, by S. Scudder and E. Burgess, 1870.
Verh. Zool. Bot. Ges.—Verhandlungen Zoologisch-botanischen Gesellschaft in Wien.
Weidemeyer, J. W.—Catalogue of North American Butterflies, 1864.
Zoological Illustrations.—W. Swainson, 1820—21.

APPENDIX.

I give the definitions of Sections and Genera of the Hesperidæ as sent by Dr. Speyer, with his notes. The last three Genera were not mentioned by him. It is proper to say that Dr. Speyer ascribed Thymelicus, Pyrgus and Nisoniades to Hübner, and Amblyscirtes and Pholisora to Scudder. I am compelled, however, to substitute for these authors the names of the first one who defined each of these genera, and in the case of Thymelicus and the last two named, for this reason, to Dr. Speyer himself. If there has been an earlier definition of Thymelicus I have not been able to find it, though the name has been used by many authors from Stephens to this day. Nisoniades (1816) being rejected as a coitus name, and, were that not enough, for want of satisfactory definition, though it was used and defined by Westwood (1852), would give way to Thanaos, Boisd. (1832). Mr. Butler, who uses the coitus names liberally, nevertheless employs Thanaos, Bd. with this explanation: "the genus Nisoniades cannot stand, as its type is an Achylodes." Ent. Mo. Mag. 7, 97.—E.

HESPERIDÆ.

SECTION I.

Tibiæ generally with spines, at least the middle ones; male always without costal fold; usually, a black, scaleless discoidal stripe (stigma) on fore wings.

Note.—I have been unable to find a sharp limit between the two principal divisions of Hesperidæ characterized by Mr. Scudder, (Buf. Bul. 1, 195), and I doubt if such an one exists, unless perhaps indicated by the—not examined by myself—presence or absence of the corneous sheath "at the posterior extremity of the alimentary canal" in the males, which Mr. Scudder gives as a difference. The costal fold, mentioned by him, is wanting in some species of his Hesperides. (Pyrgus *Sao*, *Orbifer*, etc., Thanaos *Marloyi*). Nevertheless though the first quoted character should not be prevailing, the two tribes of Mr. Scudder seem to me to possess some natural rights. Therefore I have tried at least to indicate them. It seemed to me most natural to begin the series with those genera which are related to the bulk of the other Rhopalocera by the non-existence of the tibial epiphysis and the spurs on the middle tibiæ; the more as there exists no costal fold. I will not contend that this arrangement is the most natural; such

a judgment can only be given by one who has mastered the Hesperidæ of the whole world and not a mere fragment of them only. At the end of them is to be placed Euschemon at all events, which makes the transition to the Heterocera.—S.

CARTEROCEPHALUS, Led.

Tibiæ without tibial epiphysis; those of the hind legs without middle spurs; knob of antennæ elongate-ovoid; tip blunt, conical; last joint of palpi concealed by the long bristles of the middle joint; abdomen extending beyond the anal angle of hind wings.

Note.—The *tibial epiphysis* I call the mostly flat spine or lancet-shaped appendage on the inner side of the tibia of the fore leg, possessed by most of the Heterocera, but among the Rhopalocera by the Papilionidæ and Hesperidæ only. In the latter this appendage is externally covered with scales, interiorly and at the apex naked, and not reaching the end of the tibiæ.—S.

ANCYLOXYPHA, Feld.

Tibiæ with tibial epiphysis; those of the hind legs with middle spurs, (as in all the following genera). Similar to the foregoing genus; knob of antenna elongate-ovoid, rounded at tip, with a very short, slender spine attached to the last joint; last joint of palpi free, long, perpendicularly erected, slender, subulate; abdomen of male slender, twice as long as head and thorax; fore wings elongated, blunt; hind wings rounded, the costal margin long, surpassing the inner angle of fore wings; the inner margin short, not produced at the anal angle.

COPÆODES, Speyer.

Antennæ short, one-third as long as the triangular fore wings, at three-fifths of their length suddenly inflated to an ovoid knob, widely rounded in front, sub-truncate; last joint of palpi nearly free, perpendicular, a little recurved, subulate; hairs of the brush at base of antennæ dilated at tip; femora thinly villose; tibiæ nearly naked, those of middle legs with a pair of very short, fine spurs; abdomen glossy-scaled, hairless; the male with a fine black longitudinal stigma on the disc, which forms on the under side a prominent ridge, but is there covered with scales.

Note.—As much as I dislike the multiplication of genera, still less the separation of sinlge species, I feel myself compelled by the striking difference of character between a whole series of organs to separate generically *Procris* and Thymelicus. I hope that the diagnosis of the new genus will justify the separation. The scaly hairs at the base of antennæ would not justify the creation of a new genus; they seem also to exist in some species of other genera between the common hairs of the brush.—S.

THYMELICUS, Speyer.

Antennæ half as long as fore wings; at three-fifths of their length gradually inflated to an elongate-ovoid knob; tip conical, blunt; last joint of palpi con-

cealed, half its length or more, by the long bristles of the middle joint, nearly perpendicular, straight, subulate, or linear, covered with scales; femora and tibiæ with long hairs; tibiæ of middle legs with a series of short spines; abdomen densely hairy; anal angle of hind wings produced; male with stigma which is not prominent on the under side; at the base of antennæ a brush of stiff hairs.

PAMPHILA, F.

Knob of antenna thick, ovoid, or elongate-ovoid; the tip suddenly bent with a much contracted, pointed little hook, nearly half as long as the knob, and composed of a larger or smaller number of joints; sometimes of the apical joint alone, which then is placed upon the thick end of the knob as a short slender spine (*Phylæus*); the last joint of palpi conical or nearly linear, hardly projecting beyond the bristles of the middle joint; tibiæ generally with spines, the strongest and most constant on the middle tibiæ, the most feeble on the anterior; in some species all the tibiæ are without spines; body stout; abdomen as long as the head and thorax, reaching the anal angle of hind wings, or surpassing; fringes unicolored. The anterior wings of the typical species triangular, the costal margin long, nearly straight, apex slightly pointed; the hind margin oblique, very little or not at all convex; the inner margin much shorter than the costal; hind wings more or less produced on the sub-median nervure, at least in the male.

In Group I, the wings a little broader, the apical angle of fore wings obtuse, the hind margin less oblique and more convex. The two species have the apical hook of antennæ a little longer and stronger, especially at the base, than the typical species; tibiæ with spines, but feeble on the fore and hind legs; the male without stigma. There are numerous differences in the shape of the hooks of the antennæ and the spines of tibiæ. In respect to the hook, *Phylæus* differs most, the antennæ being shorter than in any other species,—only half as long as the abdomen; *Metea* has the apical hook forming a thick bent cone. The tibiæ of *Vitellius*, *Conspicua* and *Metacomet*, have no spines at all. The spines of the tibiæ of fore legs are often feeble and indistinct and seem to be wanting in *Comma*, *Peckius* and *Osyka*. *Verna* has only the middle tibiæ spined; *Hianna* has the hind tibiæ spined, but only on the apical third interiorly, between the two pairs of spurs.

NOTE.—As to Pamphila; the differences in the shape of the knob of antenna, the spines of tibiæ, the character of the stigma, are very remarkable, but none of them lead to a natural arrangement of the species. This is least the case with the spines and stigma (presence or absence of), as appears at once when the species without spines on the tibiæ (*Vitellius*, *Conspicua*, *Metacomet*), or those without discoidal stigma, are compared, and opposed to all the others. In regard to the antennæ, *Phylæus* differs most, but is otherwise in all characters an entirely typical Pamphila, and in shortness of antennæ the otherwise widely different *Huron* is its nearest neighbor. The spines of the tibiæ on the fore legs, and sometimes on the hind legs, are so short and fine, that they are difficult to recognize, and in danger of being pronounced wanting, though they are

only covered by clothing of hairs or scales. Scudder has unfortunately not given diagnoses for his genera, and it is not clear to me on what characters he has based them. Under such circumstances, it seems to me best to put together the species I am able to study in what in my opinion is the most natural manner. In some respects *Massasoit* differs most, and I would not have hesitated to separate it and *Zabulon* generically, just as Scudder has done, if *Zabulon*, which could not be separated from *Massasoit*, had not given a transition to the typical species.—S.

Many of the species included in Pamphila were not examined by Dr. Speyer, and as he may not care to be held responsible for the arrangement of these, I give below the species examined in the sequence furnished me. It will be seen that they embrace examples in almost every sub-group, and with this aid I have disposed the remaining species.—E.

Group 1. *Massasoit; Zabulon.*

Group 2. *Sylvanus; Comma; Sassacus; Metea; Leonardus; Huron; Phylæus; Brettus; Conspicua; Ætna=Otho; Peckius; Mystic; Manataaqua; Cernes; Metacomet; Bimacula; Vitellius; Osyka; Hianna.*

AMBLYSCIRTES, Speyer.

Antennæ like Pamphila, with slender conical apical hooks; the two basal joints of palpi covered anteriorly with a rough clothing of bristles and scaly hairs; thorax and femora roughly hairy; apical joint of palpi a little prominent; middle tibiæ spined; body less stout than in Pamphila; abdomen thin, scarcely reaching the anal angle of wing; the costal margin somewhat strongly curved at base, in the middle a very little concave; hind wings not produced at the anal angle; fringes light, marked with black at the ends of the nervules.

SECTION II.

Tibiæ rarely spined; the male generally with a costal fold of the fore wing; no discoidal stigma.

PYRGUS, West.

Knob of antenna elongate or ovoid, rounded at tip, straight or a little semilunar, somewhat compressed; the brush at base of antennæ strong, longer than half the diameter of the eyes; palpi surpassing the front by more than the length of the eyes; the apical joint thick, bluntly conic, densely scaled; tibiæ (of species examined) without spines; fringes light, marked with dark at the ends of the nervules.

THANAOS, Bd.

Knob of antenna spindle-shaped, semilunarly curved, a little compressed; brush at base of antennæ strong, longer than half the diameter of the eyes, bristling; palpi surpassing the front by more than the length of the eyes, the apical joint thick, bluntly conic, a little inclined, a little surpassing the long bristles of middle joint; abdomen as long as head and thorax or a little longer;

tibiæ without spines, hind ones with long hairs; fringes unicolored; anterior wing of male with costal fold.

LINTNERIA, n. gen.

Differs from Thanaos in the knob to antenna, which is more slender and much less abrupt; in the palpi which are shorter and less thickly clothed with bristles; and in the angulated (*Daunus*) or crenulated (*Zampa*) outline of hind wings.

Note.—**L. Zampa.** This semi-tropical species I sent to Mr. A. G. Butler for determination, and he thus replies: "*Zampa* seems to belong to a group of species provisionally retained under Thanaos and of which I consider H. *Daunus*, Cramer, to be the type. This group will consist of *Daunus*, Cr., *Zampa*, Edw., *Motozi*, Wallgr., *Purendra*, Moore, and one or two undescribed species from Angola and Abyssinia. Our example (British Museum) of *Daunus* is from St. Domingo, *Motozi* from Natal, *Purendra* from India and Ceylon. It should certainly be separated generically, and I should be glad if you would give it a distinctive name. Cramer's figure of *Daunus* gives a false idea of the form of the species." Mr. Butler accompanied this with a pen drawing of *Daunus*, its antennæ, palpi, etc., and the definition of the genus is his own.—E.

PHOLISORA, Speyer.

Very similar to Thanaos; knob of antenna spindle-shaped, a little shorter than in Thanaos; apical joint of palpi more prominent; clothing of the two basal joints below snow-white; brush at base of antennæ with highly scaly hairs; anterior coxæ white; hind tibiæ with fewer and shorter hairs; body more slender; abdomen longer than head and thorax; wings broader, more rounded; hind margin of fore wing less oblique.

EUDAMUS, Swain.

Antennæ a little longer than half the costal margin of fore wings; knob very slender, spindle-shaped, bent hook-like just beyond the middle and extended to a long, fine point; brush at base of antennæ very short; one-quarter as long as the diameter of the eyes; palpi surpassing front less than length of eyes; apical joint short, thick, conical; tibiæ without spines; abdomen short, not reaching the anal angle of the hind wings; male with narrow costal fold.

Group 1. Hind wings on sub-median nervure little or not all produced.

" 2. There prolonged in a lobe.

" 3. There caudated.

Note.—As to Eudamus: The few species of this large genus which I have been able to study allow no judgment as to the propriety or necessity of splitting them into several genera. Herrick-Schaeffer denies that even the long-tailed species are to be separated generically. I have not been able to find any other difference, except in the shape of the wings, and these seem not to allow the constituting of well separated groups.—S.

ERRATA.

Page 5, line 19, for Otto read Adolf.

Page 7, for Herrick. Schaeffer, read Herrick-Schaeffer.

Page 7, for Lefebore read Lefebvre.

Page 7, for Ochsheimer read Ochsenheimer.

Page 16, No. 59, read *Chione*, Curtis, etc.

Page 19, No. 89, transpose Scud. Psyche to *Plexippus*, line below.

Page 24, No. 144, for **Phæton** read **Phaeton.**

Page 26, No. 168, read, var. ♀ *Pallida*, Edw. Pr. E. Soc. Ph. 2, 505.
Mata, Reak. (bleached example).

Page 29, No. 197, var. LINTNERII, for 3rd. Rep. N. Y. St. Ag. Soc., read 3rd. Rep. Ins. N. Y.

Page 30, No. 199, for FURCILLATA read *Furcillata.*

Page 30, No. 207, for Modesta, etc., read

Monima, Cram. 4, 387, F, G, ♀.

Hab.—Texas, (coll. Boll.) I submitted this species to Mr. Butler and he pronounces it to be *Monima.* The Florida species in my collection is a different thing, and yet undetermined.

Page 33, No. 234, for West.-Hen., read West.-Hew.

Page 34, No. 243, for West.-Hen., read West.-Hew.

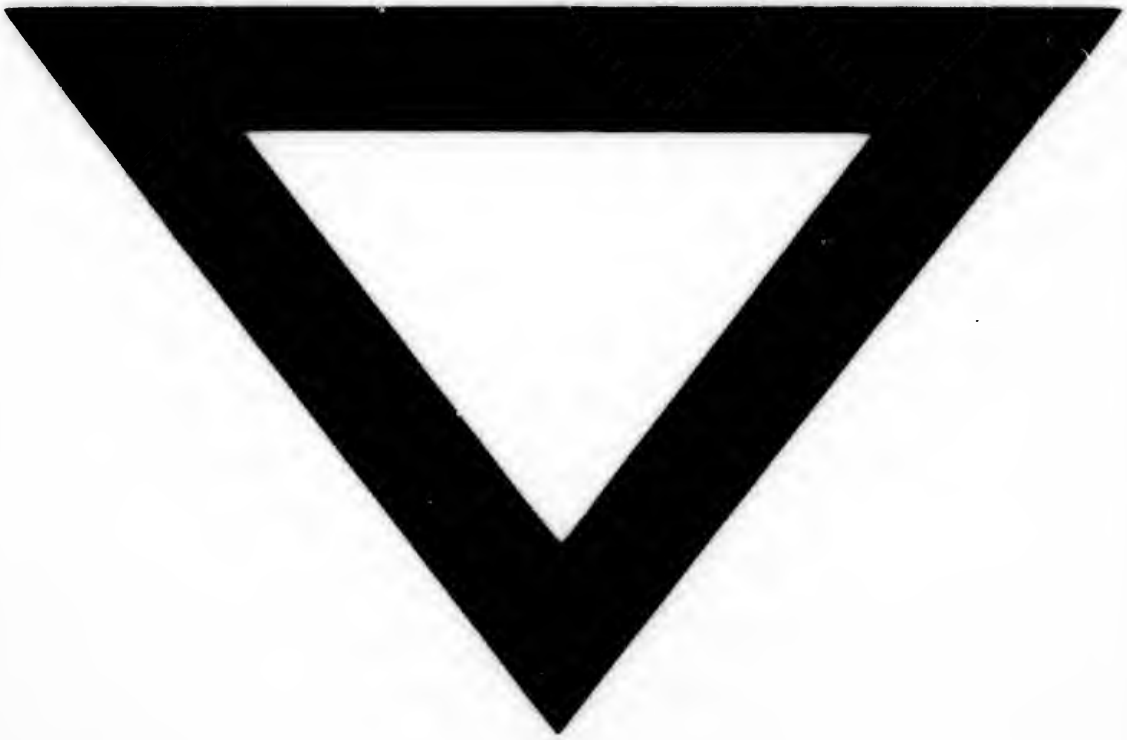
Page 34, No. 247, read *Tyndarus*, Esp., var. *Callias*, Mead.

Page 36, No. 269, for West.-Hen., read West.-Hew.

Page 46, No. 374, for *Minehaha*, read *Minnehaha.*

Page 47, No. 377, read *Antæon.*

below.

Ph. 2, 505.
ıple).
. Ag. Soc.,

ıitted this
nounces it
ies in my
d yet un-