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# **ILLUSTRATIONS**

**OF** 

# DIURNAL LEPIDOPTERA.

PART I. LYCÆNIDÆ.

BY

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LONDON:

JOHN VAN VOORST, PATERNOSTER ROW.

MDCCCLXIII.

PRINTED BY TAYLOR AND FRANCIS, RED LION COURT, PLEET STREET.

## PREFACE.

THE Trustees of the British Museum having declined to proceed with my Catalogue of the LYCENIDE, I have thought it best to continue these Illustrations as a separate work, and under a title which is *intelligible*. I have to regret, now, that a wish to contribute to a national work, as well as to avoid the personal cost attending such a publication, induced me to offer my services to a body of men who, with two or three exceptions, know nothing, and care as little, about Natural History. They have marred the uniformity of a work into which I had entered with all my heart.

To make this new work as complete as it is now in my power to do, I have incorporated all the species of Lycænidæ mentioned in the British Museum Catalogue, making a few corrections, and introducing the new species of *Amblypodia* in their proper places.

I hope to proceed with the Lycsenidse in my next Part; but in order to feel

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myself at liberty to work at any other family at the same time, I have adopted the comprehensive title of this work.

I must not conclude this Preface without expressing the great obligation I feel to those friends who have so generously aided me during its progress—to Dr. Gray of the British Museum, to Dr. Boisduval, Mr. A. R. Wallace, and Professor Westwood.

W. C. HEWITSON.

Oatlands,

April 24, 1863.

# INTRODUCTION.

The study of this very beautiful group of Butterflies seems to be beset with difficulties. Some strange anomalies attend them. Characters which in other groups would be considered significant, seem here to mean nothing. Of two species, of which it would require the best skill of the artist to show the difference, the male of one has on the underside of the anterior wing a tuft of long hair attached to the inner margin, whilst the other is without it. Of two other species equally alike, one has a spot on the centre of the anterior wing (formed usually by the different disposition of the scales) which can sometimes be seen only in one particular light, whilst the other, so nearly allied to it that it requires an accurate eye to note the difference, is without it.

The palpi differ greatly in length in the sexes of the same species; and of two butterflies which are far too nearly allied to be separated by more than specific distinction, one has the last joint unusually long, whilst in the other it is scarcely visible. The branches from the subcostal nervure, which are such an assistance in determining the position of genera with regard to each other in other families, here avail little, and differ in the sexes of the same species. The sexes, although they differ widely from each other above, are, most fortunately, very constant on the underside.



# DIURNAL LEPIDOPTERA.

## LYCÆNIDÆ.

## Genus EUMÆUS.

EUMEUS, Hübner, 1816. EUMENIA, Godart, 1825.

## 1. Eumæus Debora.

Eumena Debora, Hübner, Samml. Exot. Schmett. iii. Eumenia Childrense, G. R. Gray in Griffith's An. Kingd. Ins. ii. pl. 112. p. 677.

## 2. Eumæus Minyas.

Rusticus ad. Minyas, Hübn. Samml. Exot. Schmett. iii. Eumenia Minyjas, Boisd. Spec. Gén. Lép. Eumenia Toxea, Godart. Lucas, Hist. Nat. Lép. Ex. pl. 79. f. 1.

#### 3. Eumæus Atala.

Eumæus Atala, Westwood in Doubleday and Hewitson's Gen. Diurn. Lep. pl. 74. f. 1. p. 470. Eumenia Toxea, Guérin, Icon. Règ. An. Ins. pl. 80. f. 3, 3 a.

## Genus EPITOLA.

EPITOLA, Boisduval.

#### Epitola Elion.

Epitola Elion, Boisduval, MS. Westwood in Gen. Diurn. Lep. pl. 68. f. 5. p. 470. Hewitson, Brit. Mus. Cat. of Lycanida, pl. 1. f. 1.

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## Genus PHYTALA.

PHYTALA, Boisduval.

#### Phytala Elais.

Phytala Elais, Boisduval, MS. Westwood in Gen. Diurn. Lep. pl. 77. f. 2. p. 472. Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 2.

## Genus OGYRIS.

Ogyris, Doubleday.

## 1. Ogyris Abrota.

Q. Ogyris Abrota, Westwood in Gen. Diurn. Lep. pl. 75. f. 8. p. 472.
3. Hewitson, Exot. Butt. i. pl. 48. f. 1, 2. p. 95.

#### 2. Ogyris Idmo.

- 2. Ogyris Idmo, Doubleday, Brit. Mus. List. Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 3, 4. p. 2.
- d. Ogyris Orontas, Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 8, 9.

## 3. Ogyris Zosine.

Ogyris Zosine, Hewitson, Exot. Butt. i. pl. 48. f. 3, 4. p. 95. . Q. Howitson, Brit. Mus. Cat. Lyc. pl. 1. f. 7.

#### 4. Ogyris Olane.

Ogyris Olane, Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 10, 11.

#### 5. Ogyris Amaryllis.

Ogyris Amaryllis, Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 5, 6.

#### 6. Ogyris Orœtes.

Ogyris Orcetes, Hewitson, Brit. Mus. Cat. Lyc. pl. 1. f. 12, 13.

There are two butterflies in the Hope Collection of the University Museum at Oxford, which are, I believe, the males of *Amaryllis* and *Orætes*; they are of a brilliant morpho-blue, the margins are much narrower, and the transverse band on the underside of *Orætes* is broken in the middle.

## 7. Ogyris Genoveva.

Ogyris Genoveva, Hewitson, Exot. Butt. i. pl. 48. f. 5, 6.

#### Genus AMBLYPODIA.

Amblypodia, Horsfield.

Arhopala, Boisduval.

The genus Amblypodia of the "Genera of Diurnal Lepidoptera" seems to me to contain materials for several genera. I have included here the first thirteen species only of that work. These, and the numerous beautiful new species from the Collection of Mr. Wallace, form a very natural group. A. Narada and A. Anita, though somewhat aberrant (the males having a fourth branch from the subcostal nervure), are well placed where they are, and I think that it would be a mistake to separate them. Of the true position of A. Lycænaria of Felder and A. Cæca of the plate I have more doubt—they are of much more slender proportions than the rest of the genus. A. Vivarna, A. Amisena, and A. Quercetorum are perhaps not very well placed here—their presence seems somewhat to mar the uniformity of the genus; but as I know of no better position for them at present, I prefer to keep them where they are rather than to place them (as Dr. Felder proposes to do) in the genus Myrina.

### 1. Amblypodia Hercules.

Arhopala Hercules, Boisduval, MS.

Amblypodia Hercules, Hewitson, Brit. Mus. Cat. Lyc. pl. 8. f. 92, 93.

#### 2. Amblypodia Centaurus.

Amblypodia Centaurus, Horsfield, Cat. Lep. E. I. C. Mus. p. 102.
Polyommatus Helus, Godart, Enc. Méth. p. 652.
Amblypodia Pseudo-Centaurus, Doubleday, Brit. Mus. List.
Amblypodia Nakula, Felder, Lep. Malayica, Wien. Ent. Monats. iv. p. 395.

#### 3. Amblypodia Acerba, Hewitson. Plate I. of fig. 5.

UPPERSIDE. Male.—Brilliant ultramarine blue: the margins very narrow, black.

Underside rufous-brown clouded, the spots and bands indistinct. Anterior wing with

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the transverse band undivided, triangular, bordered on both sides with lilac-white. Posterior wing with a submarginal waved band of lilac-white.

Exp.  $2\frac{2}{10}$  inches.

In the Collection of A. R. Wallace, from Goram.

This may possibly be a variety of A. Centaurus.

## 4. Amblypodia Amytis.

Amblypodia Amytis, Hewitson, Brit. Mus. Cat. Lyc. pl. 2. f. 7, 8, 9.

### 5. Amblypodia Amantes.

Amblypodia Amantes, Hewitson, Brit. Mus. Cat. Lyc. pl. 2. f. 1, 2, 3.

## 6. Amblypodia Meander.

Arhopala Meander, Boisduval, Voy. Astrolabe, Ent. p. 76. Amblypodia Meander, Hewitson, Brit. Mus. Cat. Lyc. pl. 2, f. 4, 5, 6.

## 7. Amblypodia Acetes.

Amblypodia Acetes, Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 14, 15.

#### 8. Amblypodia Anarte. Plate I. of figs. 6, 7.

d. Amblypodia Anarte, Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 16, 17.

UPPERSIDE. Female.—Brown: both wings purple from the base to beyond the middle.

Underside rufous brown. Anterior wing with the transverse band broken, composed of distinct circular spots, the central spot projecting outwards beyond the rest.

Exp.  $2\frac{7}{90}$  inches.

In the Collection of A. R. Wallace, from Sumatra.

The underside of A. Anarte now figured must be considered as typical of the species. It is evident that the male figured in the British Museum Catalogue, figs. 16, 17, has the spots exaggerated and ill-formed; the drawing is, however, a correct copy of the butterfly from which it was taken.

#### 9. Amblypodia Alce.

Amblypodia Alce, Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 18, 19, 20.

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## 10. Amblypodia Auxesia, Hewitson. Plate I. figs. 2 1, & 2, 3.

UPPERSIDE. Male.—Pale blue glossed with green, chiefly near the base: the margins broadly brown: the nervures black.

Underside grey-brown, broadly white where the wings meet: the outer margins brown. Anterior wing with the second spot in the cell and the spot at the end of the cell unusually large: the transverse band composed of seven portions, the first three of equal size, bearing obliquely outwards; the other four further from the margin and parallel to it, scarcely separated, largest at the middle of the wing; all dark brown. Posterior wing with the spots near the costal margin unusually large and dark brown.

Female violet-blue, with a black spot at the end of the cell: the margins very broadly brown. On the underside it does not differ from the male.

Exp. 2 inches.

In the Collection of A. R. Wallace, from Sumatra.

This species is most nearly allied to Amblypodia Alce, Hewitson, of the British Museum Catalogue, figs. 18, 19, 20.

#### 11. Amblypodia Anthelus.

3. Amblypodia Anthelus, Doub!. & Hewits. Gen. Diurn. Lep. pl. 74. f. 6. Q. Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 23, 24.

#### 12. Amblypodia Camdeo.

Amblypodia Camdeo, Doubleday, Brit. Mus. List. Q. Horsfield & Moore, Cat. Lep. E.I.C. Mus. pl. 1 a. f. 6. p. 41. S. Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 25, 26.

#### 13. Amblypodia Eridanus.

Amblypodia Eridanus, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860. Amblypodia Camdeo, var., Hewitson, Brit. Mus. Cat. Lyc. p. 5.

## 14. Amblypodia annulata. Plate III. fig. 21.

Amblypodia annulata, Felder, Lep. Amboin. Sitz. Acad. Wiss. Wien. Hewitson, Brit. Mus. Cat. Lyc. p. 6.

#### 15. Amblypodia Aexone. Plate III. figs. ♂ 20, ♀ 24.

UPPERSIDE. Male.—Brilliant silvery morpho-blue: the margins narrow, dark brown. Anterior wing with the costal margin, the apex, and outer margin purple-blue.

Underside dark brown. Anterior wing pale brown, with the basal half between the

costal margin and the median nervure dark brown, marked by four short linear spots of silvery white as in A. Centaurus: the transverse band unbroken, of nearly equal breadth: the outer margin broadly brown. Posterior wing dark brown, with a submarginal band of pale brown parallel to the margin, broad near the apex, linear as it approaches the abdominal fold.

Female differs from the male only in having the costal and outer margins of the anterior wing and the apex of the posterior wing broadly brown.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of A. R. Wallace, from Waigiou.

This is one of a group of several species of great beauty, unsurpassed, except in size, by the glorious Morphos of the New World. A. Helius of Cramer, A. Theba of Boisduval, A. Anthore and A. Acron of the Museum Catalogue, A. Aexone, A. Azenia and A. Axiothea of this work, although resembling each other, above, in the same inimitable blue, are singularly different underneath, and I think few would turn over this species, after gazing on the effulgence of its upper surface, without an exclamation of surprise at the unexpected contrast.

#### 16. Amblypodia Anthore.

Amblypodia Anthore, Hewitson, Brit. Mus. Cat. Lyc. pl. 3. f. 21, 22.

## 17. Amblypodia Phryxus.

Arhopala Phryxus, Boisduval, Voy. Astrolabe, Ent. p. 75.

#### 18. Amblypodia Theba. Plate V. o figs. 29, 30.

Amblypodia Theba, Boisduval, MS.

UPPERSIDE. Male.—Brilliant silvery morpho-blue, glossed with green: the margins brown. Anterior wing with the apical half rich purple.

Underside rufous brown: the basal circular spots as usual and bordered with white: the transverse bands of both wings absent, their places supplied by numerous irregular white lines.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of Dr. Boisduval, from Mindoro, Philippine Islands.

It will be readily seen that this species is very closely allied to A. Anthore, Hewitson, of the Museum Catalogue, figs. 21, 22. The white lines of the underside occupy different positions on the wings of the two species; A. Theba has besides, on the anterior wing, a submarginal band of oval rings.

#### Amblypodia Helius.

Papilio Helius, Cramer, Pap. Exot. pl. 201. f. F, G. Polyommatus Helus, Lucas, Lép. Exot. pl. 44. f. 4.



#### 20. Amblypodia Aedias.

Amblypodia Aedias, Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 36.

Amblypodia Helus (Helius, Cram.), Horsfield, Cat. Lep. E. I. C. Mus. p. 103.

## 21. Amblypodia Axiothea, Hewitson. Plate II. & figs. 10, 11.

UPPERSIDE. Male.—Brilliant silvery morpho-blue: the margins narrow, dark brown. Anterior wing with the costal margin, the apex, and outer margin ultramarine blue.

Underside white. Anterior wing crossed before the middle by two short broad bands of brown: the usual transverse band of equal breadth, nearly straight. Posterior wing with two bands from the middle of the costal margin and two bands from the inner margin, which meet in one large irregular spot below the middle.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of A. R. Wallace, from New Guinea.

## 22. Amblypodia Acron.

Amblypodia Acron, Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 53, 54.

## 23. Amblypodia Azenia, Hewitson. Plate III. & figs. 22, 23.

UPPERSIDE. Male.—Brilliant morpho-blue: the margins narrow, dark brown. Anterior wing with the costal margin and apex ultramarine blue.

Underside lilac-white. Anterior wing with the transverse band of nearly equal breadth, slightly curved at its lower extremity. Posterior wing with the transverse band broad, broken.

Female with the blue less brilliant: the costal and outer margins of the anterior wing broadly black. On the underside it does not differ from the male.

Exp. 118 inch.

In the Collections of A. R. Wallace and W. C. Hewitson, from Waigiou.

## 24. Amblypodia Admete, Hewitson. Plate III. & figs. 18, 19.

UPPERSIDE. Male.—Violet-blue: the outer margins dark brown, broader on the posterior wing.

Underside grey-brown. Anterior wing rufous from the base to the middle, without the usual basal spots: the transverse band broad, equal, curved, dark brown. Posterior wing with a broken irregular band of white beyond the middle, and two submarginal bands of white lunular and triangular spots.

Exp. 1 inch.

In the Collection of A. R. Wallace, from Ceram.

## 25. Amblypodia Alitæus.

Amblypodia Alitæus, Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 45, 46.

#### 26. Amblypodia Achelous.

Amblypodia Achelous, Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 47, 48.

## 27. Amblypodia Silhetensis.

Amblypodia Silhetensis, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 27, 28.

## 28. Amblypodia Adatha.

Amblypodia Adatha, Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 29, 30, 31. Amblypodia Cleander, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.

## 29. Amblypodia Micale.

Amblypodia Micale, Boisduval, MS. Hombron et Jacquinot, Voy. Pôle Sud, Lép. pl. 3. f. 11, 12. Hewitson, Brit. Mus. Cat. Lyc. p. 7.

#### 30. Amblypodia nobilis.

Amblypodia nobilis, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.

## 31. Amblypodia Vihara.

Amblypodia Vihara, Felder, Lep. Malayica, Wien. Ent. Monats. iv. p. 395.

#### 32. Amblypodia Ate, Hewitson. Plate I. o fig. 4.

UPPERSIDE. Male.—Violet-blue: the margins black, narrow.

UNDERSIDE rufous brown. Anterior wing without any of the basal spots: a small spot at the end of the cell: the transverse band straight. Posterior wing with the principal transverse band also nearly straight: the anal angle profusely dotted with silvery blue.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of A. R. Wallace, from Amboyna.

Probably only a variety of A. Adatha of the Museum Catalogue, figs. 29, 30, 31.

## 33. Amblypodia Adonias.

Amblypodia Adonias, Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 32, 33.

## 34. Amblypodia Eumolphus.

Papilio Eumolphus, Cramer, pl. 299. f. G, H.
Amblypodia Eumolphus, Hewitson, Brit. Mus. Cat. Lyc. pl. 8. f. 89.

#### 35. Amblypodia aurea.

Amblypodia aurea, Havitson, Brit. Mus. Cat. Lyc. pl. 8. f. 87, 88.

## 36. Amblypodia Bazalus.

Amblypodia Bazalus, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 37, 38.

## 37. Amblypodia Atosia, Hewitson. Plate II. 2 figs. 8, 9.

UPPERSIDE. Male.—Lilac-blue: the margins black, very narrow. Anterior wing with a large central spot of somewhat different colour, not seen except in a certain light, and not produced by any unusual arrangement of the scales.

UNDERSIDE rufous brown. Anterior wing with the transverse band broken, composed of seven parts: three together, the fourth projecting outwardly from the rest, the three following further from the margin than the fourth.

Female.—Violet-blue. Anterior wing with the costal margin, the apex, and the outer margin broadly black, the nervures black. Posterior wing with the apex and outer margin broadly dark brown, the nervures black.

Exp.  $1\frac{8}{10}$  inch.

In the Collections of A. R. Wallace and W. C. Hewitson, from Sumatra.

The spots on the underside of the male are less distinctly marked than those of the female. This species scarcely differs on the underside from A. Adonias and A. Eumolphus. It is nearly allied to A. Agaba of Hewitson in the Museum Catalogue, figs. 39, 40: on the upperside the two species are alike.

#### 38. Amblypodia Critala. Plate IV. figs. 26, 27.

Amblypodia Critala, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860. Hewitson, Brit. Mus. Cat. Lyc. no. 67. p. 15.

This species, though judiciously placed in the genus Amblypodia by Dr. Felder, bears but

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little resemblance to its neighbours. It is, as he remarks, very similar to P. Danis of Cramer.

In the Collections of Dr. Felder and A. R. Wallace, from Amboyna and Ceram.

## 39. Amblypodia Agaba.

Amblypodia Agaba, Hewitson, Brit. Mus. Cat. Lyc. pl. 4. f. 39, 40.

## 40. Amblypodia Alea.

Amblypodia Alea, Hewitson, Brit. Mus. Cat. Lyc. pl. 7. f. 79, 81.

## 41. Amblypodia Atrax.

Amblypodia Atrax, Havitson, Brit. Mus. Cat. Lyc. pl. 7. f. 80, 82.

## 42. Amblypodia Ganesa.

Amblypodia Ganesa, Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1 a. f. 9. p. 44.

## 43. Amblypodia Rama.

- d. Thecla Rama, Kollar in Hugel's Kaschmir, pl. 4. f. 1, 2.
- Amblypodia Querceti, Boisduval, MS. Doubleday, Brit. Mus. List.
- Q. Amblypodia Dodonsea, Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1 a. f. 8. p. 43.

#### 44. Amblypodia Abseus.

Amblypodia Abseus, Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 51, 52.

Most of the examples of this species have a nearly white spot on the middle of the costal margin on the underside of the posterior wing as in A. Ammon.

#### 45. Amblypodia Ammon.

Amblypodia Ammon, Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 49, 50.

#### 46. Amblypodia Diardi.

Amblypodia Diardi, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 5. f. 41, 42.

## 47. Amblypodia Areste.

Amblypodia Areste, Havitson, Brit. Mus. Cat. Lyc. pl. 5. f. 43, 44.

## 48. Amblypodia Apidanus.

Papilio Apidanus, Cramer, pl. 137. f. F, G. Papilio Dorimond, Stoll, Suppl. Cramer, pl. 37. f. 4, 4 D.

## 49. Amblypodia fulgida. Plate V. 2 fig. 31.

Arhopala fulgida, Boisduval, MS.

UPPERSIDE. Female.—Dark brown: the centre of both wings from the base to beyond the middle brilliant ultramarine blue.

UNDERSIDE. Anterior wing pale rufous brown, the apex tinted with lilac: the base, a broad band at the end of the cell (attached to it), and the transverse band, which is broad and of equal breadth except at its termination, rufous brown. Posterior wing lilac, crossed near the base by a broad transverse band, and before the middle by a narrower oblique band: a large suffused spot of dark rufous brown towards the outer margin: two short bands of paler brown near the anal angle: two black spots near the outer margin crowned with gold.

Exp.  $1_{10}$  inch.

In the Collection of Dr. Boisduval, from the Philippine Islands.

Near A. Apidanus; but differs from it considerably in the position of the spots of the posterior wing.

#### 50. Amblypodia Ameria.

Amblypodia Ameria, Howitson, Brit. Mus. Cat. Lyc. pl. 8. f. 85, 86.

#### 51. Amblypodia Anniella.

Amblypodia Anniella, Hewitson, Brit. Mus. Cat. Lyc. pl. 8. f. 83, 84.

#### 52. Amblypodia Fulla.

Amblypodia Fulla, Boisduval, MS. Howitson, Brit. Mus. Cat. Lyc. pl. 6. f. 67, 68.

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## 53. Amblypodia disparilis. Plate IV. of fig. 25.

Amblypodia disparilis, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.

In the Collections of Dr. Felder and W. C. Hewitson.

Through the liberality of Dr. Felder I am enabled to figure this species, he having kindly presented me with an example for that purpose.

#### 54. Amblypodia Arvina, Hewitson. Plate II. of figs. 16, 17.

UPPERSIDE. *Male*.—Brilliant ultramarine blue (colour of *Anniella* of the Museum Catalogue): the margins very narrow, black.

Underside glossy lilac-brown, the spots alone dull red-brown: the transverse band of the anterior wing of nearly equal breadth: the penultimate spot projecting inwardly beyond the rest.

Exp.  $1\frac{13}{30}$  inch.

In the Collection of W. C. Hewitson, from Java.

The dark glossy colour of the underside, in which the spots are seen with difficulty, sufficiently distinguishes this from all other species.

## 55. Amblypodia Agesias.

Amblypodia Agesias, Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 55, 56.

#### 56. Amblypodia Muta.

Amblypodia Muta, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 57, 58.

#### 57. Amblypodia Epimuta.

Amblypodia Epimuta, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 59, 60.

#### 58. Amblypodia Hypomuta. Plate II. o fig. 13.

Amblypodia Hypomuta, Boisduval, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 63, 64. Amblypodia Amphimuta, Felder, Lep. Malayica, Wien. Ent. Monats. iv. p. 396.

I expressed my regret that the figure of this species in the British Museum Catalogue, fig. 64, did not represent it to my satisfaction; the band of the anterior wing is there too broad, and does not represent as it ought the projecting central spot. I have now repeated the underside without colour, and I trust that the arrangement of the spots will be distinctly seen. This is one of the commonest species: it differs much in size, but may be known, on the upperside, by

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the very narrow border of the wings of the male and the very broad border of those of the female; on the underside by the transverse band of the male, which has the middle spot projecting outwardly beyond the rest, and by the same band of the female, which has the middle and last spot also projecting outwards.

## 59. Amblypodia Metamuta, Hewitson. Plate II. of figs. 14, 15.

UPPERSIDE. Male.—Anterior wing violet-blue: posterior wing brilliant morpho-blue: the margins broad, dark brown.

Underside. Anterior wing with the first three spots of the transverse band placed obliquely outwards, the other two spots a little within them and placed transversely.

Exp. 11 inch.

In the Collection of A. R. Wallace, from Sumatra.

This species may be readily distinguished from A. Hypomuta by the broad margins and by the different blue of the anterior and posterior wings.

## 60. Amblypodia Aroa, Hewitson. Plate II. & fig. 12.

UPPERSIDE. Male.—Violet-blue: the margins very narrow, black.

Underside rufous brown. Anterior wing with the band of nearly equal breadth, slightly curved.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of A. R. Wallace, from Sumatra.

I have figured three closely allied species without colour, believing that I can thus best show the minute distinctions which seem to separate them. A. Aroa is very nearly allied to A. Hypomuta: the blue of its upperside is less brilliant, and the spots and bands of the underside appear to be much wider apart. A. Hypomuta seems, on the posterior wing, as if covered throughout with spots, the spaces between the bands and spots having nearly the same appearance as the usual spots and bands themselves have.

#### 61. Amblypodia inornata.

Amblypodia inornata, Felder, Lep. Malayica, Wien. Ent. Monats. iv. p. 396.

### 62. Amblypodia Perimuta.

Amblypodia Perimuta, Boisdwal, MS. Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 65, 66.

## 63. Amblypodia Agelastus.

Amblypodia Agelastus, Hewitson, Brit. Mus. Cat. Lyc. pl. 6. f. 61, 62.

## 64. Amblypodia Lycenaria.

Amblypodia Lycenaria, Felder, Lep. Malayica, Wien. Ent. Monats. iv. p. 396.

#### 65. Amblypodia Cæca, Hewitson. Plate IV. of fig. 28.

UPPERSIDE. Male.—Lilac-blue: the margins very narrow, black.

Underside grey-brown. Anterior wing with a spot at the end of the cell: the transverse band at first oblique, equal, afterwards curved, broader, and indistinct. Posterior wing with two or three spots near the base: the transverse band broken; its first portion, as on the anterior wing, oblique and well defined.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of A. R. Wallace, from Sarawak.

Like A. Lycænaria of Felder, this species is much more slightly formed than the rest of this genus.

## 66. Amblypodia Vivarna.

Amblypodia Vivarna, Horsfield, Cat. Lep. E. I. C. Mus. p. 99. Hewitson, Brit. Mus. Cat. Lyc. pl. 7.f. 73, 75, 77.

#### 67. Amblypodia Amisena.

Amblypodia Amisena, Hewitson, Brit. Mus. Cat. Lyc. pl. 7. f. 74, 78.

## 68. Amblypodia Quercetorum.

Amblypodia Quercetorum, Boisduval, MS. Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1a. f. 7. p. 42.

Hewitson, Brit. Mus. Cat. Lyc. (text) p. 14.

Amblypodia Vivarna, Hewitson, Brit. Mus. Cat. Lyc. pl. 7. f. 76.

## 69. Amblypodia Narada.

Thecla Narada, Horsfield, Cat. Lep. E. I. C. Mus. pl. 1. f. 8. p. 98.

#### 70. Amblypodia Anita.

Amblypodia Anita, Hewitson, Brit. Mus. Cat. Lyc. pl. 8. f. 90, 91.

#### 71. Amblypodia Aglais.

Arhopala Aglais, Felder, Novara Expedition, Lep. pl. 29. of fig. 11, p. 223.

In the Collection of W. C. Hewitson, from Luzon.

Near to A. Centaurus.

### 72. Amblypodia Araxes.

Arhopala Araxes, Felder, Novara Expedition, Lep. pl. 29. figs. 3, 4, Q 5, p. 224. Amblypodia Amantes, var., Hewitson, Brit. Mus. Cat. p. 4.

In the Collection of W. C. Hewitson, from Macassar.

## 73. Amblypodia Anunda, Hewitson. Plate III. a. of fig. 32.

UPPERSIDE. Male.—Brilliant morpho-blue; the margins dark brown, narrow.

Underside rufous-brown. Anterior wing with several brown and white spots alternately between the subcostal nervures: two large brown rounded spots within the cell, a quadrate spot at the end of the cell, and below it a triangular spot: the spots which compose the usual band are far from the margin, three above the median nervure and one large and oblong below it, all bordered with white: two bands near the outer margin, the inner band of large spots. Posterior wing with several rounded spots near the base and costal margin: the spots below obscurely defined: the anal angle irrorated with white marked by two black spots crowned with silvery blue: a submarginal band of brown spots.

Exp. 2 inches.

In the Collection of W. C. Hewitson, from Borneo.

Nearest to A. Achelous, of which it is probably only a variety, although twice as large.

#### 74. Amblypodia Agnis.

Arhopala Agnis, Felder, Novara Expedition, p. 228.

A. Anarte 2, Hewitson, Lycanida, pl. 1. figs. 6, 7.

In the Collection of W. C. Hewitson, from Sumatra.

#### 75. Amblypodia Phænops.

Arhopala Phænope, Felder, Novara Expedition, p. 227.

"Larger than Atrax, Hew. Near to Adatha, Hew. Brit. Mus. Cat. figs. 29, 30 (not 31)."

Published April 1869.

c\*



## 76. Amblypodia nobilis.

Arhopala nobilis, Felder, Novara Expedition, pl. 29. & fig. 6, p. 226.

Near to A. Meander.

## 77. Amblypodia Gilolensis.

Arhopala Gilolensis, Felder, Novara Expedition, Lep. p. 225.

Near A. Silhetensis.

## 78. Amblypodia Elfeta, Hewitson. Plate III.a. 9 fig. 40.

UPPERSIDE. Female.—Rufous-brown, darker on the anterior wing. Both wings have the base irrorated with cerulean blue, very slightly on the posterior wing.

Underside rufous-brown. Anterior wing with two large round spots within the cell, a broad band at the end of the cell extending to the first median nervule, the transverse band (broken at the middle) of six oval spots, the sixth minute, and a submarginal band of lunular spots, all brown bordered with white. Posterior wing with six round spots near the base, a spot at the end of the cell, a triangular spot towards the inner margin, and a semicircular band of round spots, all brown bordered with white: two submarginal bands bordered above with white: two black spots at the anal angle crowned with white, the space between them black irrorated with blue.

Exp. 13 inch.

In the Collection of W. C. Hewitson, from Sulla (Celebes).

Nearest to A. Acetes.

#### 79. Amblypodia Padus.

Arhopala Padus, Felder, Novara Expedition, p. 230.

"Very near to Eridanus."

## 80. Amblypodia Ocrida, Hewitson. Plate III. a. figs. 38, 39.

UPPERSIDE silvery cerulean-blue. Anterior wing with the costal and outer margins very broadly dark brown. Posterior wing with the apex and outer margin to the tail also brown: the nervures black.

Underside grey-brown. Anterior wing with the three spots at the cell, one spot below these, and the transverse band, which is hexafid and of equal breadth, dark brown bordered

with white: a submarginal brown band: the inner margin pale marked near its base by two brown spots. Posterior wing with the usual spots and a submarginal band of brown: anal angle with the two black spots crowned with silvery green, the space between them irrorated with green.

Exp.  $1\frac{13}{20}$  inch.

In the Collections of George Semper and W. C. Hewitson, from Mindanso.

This species and A. Corinda scarcely differ on the underside.

#### 81. Amblypodia Corinda, Hewitson. Plate III.a. figs. 34, 35, 2 33.

UPPERSIDE. Male.—Rufous-brown, darker towards the outer margins, where it is tinted with purple.

Underside rufous. Anterior wing with two spots in the cell, one at the end of the cell, one below this, and the transverse band, which is very broad, all brown bordered with white: a submarginal band and indistinct marginal lunules: the inner margin below the middle broadly grey-white. Posterior wing with many large brown spots bordered with paler colour: anal angle with the two black spots crowned with silvery blue, the space between them also irrorated with the same blue.

Female like the male, except that the upperside of the anterior wing is darker brown, with a large space of lilac-blue from the base to beyond the middle, and that there is a small blue spot on the centre of the posterior wing.

Exp.  $1\frac{15}{30}$  inch.

In the Collections of George Semper and W. C. Hewitson, from the Philippines.

## 82. Amblypodia Myrzala, Hewitson. Plate III. b. & figs. 41, 42.

UPPERSIDE. Male.—Violet-blue, the margins dark brown, narrow.

Underside dark rufous-brown, pale near the inner margin of the anterior wing, tinted with lilac near the costal margin of the posterior wing. Anterior wing with two spots in the cell, one at the end of the cell, and the upper half of the transverse band which is broken in the middle bordered with white, two spots below these and the lower half of the band less distinct and bordered with pale brown: a submarginal band bordered with lilac near the apex. Posterior wing crowded with irregular spots bordered with white: a white spot near the middle of the costal margin as in A. Ammon: two black spots at the anal angle crowned with brilliant silvery blue, the space between them black irrorated with the same blue.

Exp.  $1\frac{17}{20}$  inch.

In the Collection of George Semper, from Mindanao.

#### 83. Amblypodia Hesba, Hewitson. Plate III. b. fig. 47.

UPPERSIDE. Male.—Brilliant morpho-blue: the margins bark brown, narrow: the fringe paler.

Underside rufous-brown. Anterior wing with the three spots in and at the end of the cell, a triangular spot, and a small round spot below them: the transverse band of six spots broken below the fourth spot and a submarginal band of spots all dark brown bordered with pale ochreous-brown: the inner margin broadly grey. Posterior wing with numerous round and oval spots: two black spots at the anal angle crowned with silvery blue: the spot between them decorated with the same blue.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of George Semper, from Mindanao.

## 84. Amblypodia Enotria, Hewitson. Plate IIIc. fig. 56.

UPPERSIDE brilliant violet-blue, tinted with carmine: the fringe rufous-brown.

Underside rufous-brown, tinted with purple, paler at the outer margins. Both wings with the usual circular subbasal spots. Anterior wing with the transverse band broken widely apart at its middle, each portion of four spots. Posterior wing with the first two spots of the circular transverse band on the costal margin large and nearly separate from the rest which are in pairs: two brown spots at the base of the tail crowned with silvery blue, the lobe black.

Exp.  $1\frac{18}{20}$  inch.

In the Collection of Mr. George Semper, from Mindanao.

#### 85. Amblypodia Tephlis. Plate III. c. of figs. 57, 58.

Arhopala Tephlis, Boisduval, MS.

Upperside. Male.—Violet-blue: the margins dark brown, narrow.

Underside rufous-brown, the spots and bands bordered with white. Anterior wing with the inner margin broadly grey: the transverse band interrupted in the middle, the last spot minute. Posterior wing traversed longitudinally by a band of white, the spots crowded together: a black spot at the base of the tail and the lobe black, the space between them pale blue.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of Dr. Boisduval, from Gilolo.

#### 86. Amblypodia Alesia.

Arhopala Alesia, Felder, Novara Expedition, pl. 29. f. 18, p. 235.

A beautiful thing, unlike any other species.

#### 87. Amblypodia Enea, Hewitson. Plate III. c. fig. 55.

UPPERSIDE. Male.—Violet-blue: the margins dark brown, narrow.

Underside rufous. Both wings with several very indistinct bands of a slightly darker colour. Anterior wing with the transverse band unbroken, and of equal breadth.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of Mr. W. S. Atkinson, from Darjeeling.

## 88. Amblypodia Aronya, Hewitson. Plate III. b. figs. 45, 46.

UPPERSIDE cerulean-blue mingled with white: the margins broadly brown. Anterior wing marked by two brown spots, one at the end of the cell, the other near the apex. Posterior wing rufous-grey near the costal margin, crossed obliquely by some lines of white (seen through).

Underside. Both wings dark brown, with some circular spots near the base, and numerous transverse linear bands of white. Posterior wing with the two black spots, the anal spot crowned with pale blue, the other and the spot between them irrorated with the same blue.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of Mr. George Semper, from Mindanao.

Nearest to A. Helius and A. Anthore.

#### 89. Amblypodia albopunctata, Hewitson. Plate III. b. & figs. 43, 44.

UPPERSIDE. Male.—Brilliant cerulean-blue, with the fringe rufous. Anterior wing with the costal and outer margins very slightly brown. Posterior wing with a white line before the fringe.

Underside rufous-brown, with numerous lines and minute spots of white. Anterior wing with four white lines within and one at the termination of the cell: a bifid white spot at the apex. Posterior wing with three white spots more conspicuous than the rest near the basal half of the costal margin, and two black spots crowned with blue at the anal angle.

Female does not differ from the male, except that it is of a paler dull blue, and that the apex is broadly brown.

Exp. 111 inch.

In the Collection of Mr. W. S. Atkinson, of Calcutta, from Maulmain.



## 90. Amblypodia Asopia, Hewitson. Plate III. c. figs. 50, 51.

UPPERSIDE blue or lilac-blue. Anterior wing with the costal margin rufous-brown, the outer margin broadly dark brown. Posterior wing with the apex and outer margin rufous-brown.

Underside rufous: the basal spots of both wings small. Anterior wing with the transverse band (except at the lowest spot) unbroken: the submarginal band broad and distinct. Posterior wing with the transverse band much broken and indistinct.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of Mr. W. S. Atkinson, from Maulmain.

## 91. Amblypodia Canulia, Hewitson. Plate III. c. of fig. 54.

UPPERSIDE. Male.—Violet-blue: the margins narrow, dark brown.

Underside green-grey. Anterior wing with two indistinct bands near the outer margin, and some submarginal spots of brown. Posterior wing crossed beyond the middle by three bands and some submarginal spots of grey-brown: the space between the first and second bands tinted with white, the third band bordered below with white marked by a black spot.

Exp. 118 inch.

In the Collection of W. C. Hewitson, from the Philippines.

## 92. Amblypodia Selta, Hewitson. Plate III. a. figs. 36, 37.

UPPERSIDE lilac-blue, with the margins broadly dark brown, darkest on the anterior wing. Anterior wing with a black line at the end of the cell.

Underside lilac. Both wings with the usual subbasal spots and a submarginal macular band. Anterior wing with a straight broad equal band before the apex. Posterior wing with a large quadrate spot at the middle of the costal margin, from which branch off two other bands of spots all rufous-brown: black spots on each side of the tail and at the anal angle irrorated with blue.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of Mr. W. S. Atkinson, from Maulmain.

Differs from A. Alea only in the very straight and much broader band before the apex of the anterior wing, which is, in this genus, the most prominent guide to species.

#### 93. Amblypodia Alaconia, Hewitson. Plate III. c. figs. 52, 53.

UPPERSIDE lilac-blue, with the margins very broad dark brown.

Underside brown: the spots darker brown bordered with paler colour. Anterior wing

with two basal spots only, the transverse band unbroken, hexafid, broadest on the costal margin: two submarginal brown bands, the outer band macular. Posterior wing crowded with spots, one spot on the costal margin below its middle large and angular.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of W. C. Hewitson, from Borneo.

I have before stated that I think it quite unnecessary to describe in detail the position of the spots on the underside of the wings, when I have done my best (with which, however, I am not at all satisfied) to denote them by figures.

#### 94. Amblypodia Amphimuta.

Arhopala Amphimuta, Felder, Novara Expedition, pl. 29. f. 8, p. 232. Amblypodia Hypomuta, variety, Hewitson, Lycanida, p. 12.

## 95. Amblypodia Antimuta.

Arhopala Antimuta, Felder, Novara Expedition, p. 233.

## 96. Amblypodia Chinensis.

Arhopala Chinensis, Felder, Novara Expedition, pl. 29. f. 10, p. 231.

In the Collection of W. C. Hewitson, from North India.

Very near to Areste.

#### 97. Amblypodia Asinarus.

Arhopala Asinarus, Felder, Novara Expedition, p. 235.

#### 98. Amblypodia Arsenius.

Arhopala Arsenius, Felder, Novara Expedition, pl. 29. f. 15, p. 236.

This species and Asinarus are near to Rama.

#### 99. Amblypodia Atkinsoni, Hewitson. Plate III. b. figs. 48, 49.

UPPERSIDE rufous-brown, darkest on the anterior wing. Both wings dentated: both blue from the base to beyond the middle. The costal margin of the anterior wing spotted with white.

Underside pale brown irrorated with darker colour. Anterior wing dark brown from the base to beyond the middle, the cell crossed by four white lines followed by two similar lines of the same colour: a submarginal band of lunular spots: three oblique white lines near the costal margin. Posterior wing with its costal margin sinuated, the apex projecting, a triangular brown spot on the costal margin near its base, two black lines at the end of the cell, and a zigzag submarginal black line.

Exp.  $1\frac{15}{20}$  inch.

In the Collection of Mr. W. S. Atkinson, from Maulmain.

- A. Tyrannus, Felder, Novara Expedition, pl. 29. figs. 1, 2, is a variety of A. Hercules, Hew. Brit. Mus. Cat. pl. 8. figs. 92, 93.
- A. Philander, Felder, Nov. Exp. pl. 29. f. 9, is a variety of A. Adatha (Micale), Hew. Brit. Mus. Cat. pl. 4. figs. 29, 30, 31.
- A. Amphea, Felder, Nov. Exp. pl. 29. f. 19, is A. Abseus, Hew. Brit. Mus. Cat. pl. 5. figs. 51, 52.

The Felders have figured A. Nakula (Centaurus, var.), A. nobilis, A. Vihara, A. Eridanus, A. Lycænaria, A. Amphimuta, and A. inornata, previously referred to, but not figured in this work.

At the same time that I have reason to congratulate myself at having been able, through the kindness of my friends Mr. George Semper of Altona, and Mr. Atkinson of Calcutta, to add so many beautiful new species to this genus, I have to regret the delay which they have caused in the progress of the work. These specimens, and those of *Myrina*, have been lent me from a distance, and I could no longer delay their publication. I have therefore thought it best, whilst adding to these, to complete the other genera at the same time and up to the same date. Other friends, Mr. Bates and Mr. Saunders, whose collections of the genus *Thecla* have been several years in my keeping, will, I hope, forgive this digression.

ANOPS. 15

## Genus ANOPS.

Anops, Boisduval.
Phædra, Horsfield.

I have retained Dr. Boisduval's name for this genus in preference to that of Dr. Horsfield, which was founded in error.

#### 1. Anops Thetys.

- Q. Papilio Thetys, Drury, ii. pl. 9. f. 3, 4. Cramer, pl. 238. f. D.
- 3. Papilio Phædrus, Fabricius, Mant. Ins. ii. p. 79; Syst. Ent. iii. p. 307 (Terricola, Horsfield).
- J. Candalides Phædrus, Hübner, Zutr. f. 263, 264 (Cinyra, Moore).
- J. Anops Phædrus, Boisdwal, Spec. Gén. Lép. pl. 23. f. 1 (Santana, Moore).
- J. Papilio Cinyra, Cramer, pl. 238. f. C.
- Q. Papilio Æsopus, Fabricius, loc. cit.
- 3. Phædra insularis, Horsfield, Cat. Lep. E. I. C. Mus. p. 125, 1829. Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1 a. f. 14. p. 53.
- & Q. Anops Barsine, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.
- 3 Q. Phædra Nesophila, Felder, Wien. Ent. Monats. vi. p. 289.

In Collections from North India, Ceylon, Celebes, Borneo, and Amboyna.

After a careful and repeated examination of a large series of specimens, and every wish to adopt the species proposed by other entomologists, I feel compelled most reluctantly to come to the conclusion that this genus, as we know it up to the present time, contains two species only—A. Bulis, which is easily known, and A. Thetys, of which the difficulty is to find two examples that are alike, varying in the males in the breadth of the margin, in the females in the colour of the centre of the wings, and on the underside of both from a pure spotless white to the clouded, distinctly banded variety from Borneo and Celebes. A variety of the female in the Collection of Mr. Wallace is all brown above, with the exception of a moderate-sized white spot on the middle of the anterior wing, and a minute round spot of the same colour near the apex of the posterior wing.

#### 2. Anops Bulis. Plate IV. of fig. 1, var.

Anope Bulis, Boisduval, MS. Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. pl. 75. f. 5. Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 53.

Phædra Tagalica, Felder, Wien. Ent. Monats. vi. p. 289.

UPPERSIDE. Male.—Dark glossy brown. Anterior wing with the apex acute: a large

central orange spot. Posterior wing with the anal angle acute: a large orange spot near the apex.

Underside lustrous white, irrorated throughout with minute black dots. Both wings crossed near the middle by a nearly straight ill-defined band slightly tinted with lilac, and bordered below by a waved black line: commencing near the apex of the anterior wing and ending below the middle of the abdominal fold, sometimes continuous, sometimes broken where the wings meet. Posterior wing with a second very indistinct broken band beyond the middle. Both wings with a line of minute black spots near the outer margin.

Exp. 15 inch.

In the Collection of W. C. Hewitson, from North India.

The male of Anops Bulis very nearly resembles the dark females of A. Thetys: it may be always readily known from the numerous varieties of A. Thetys not only by the peculiar form of its wings, but also by the position of the transverse band of the underside, which is nearer the apex of the anterior wing, and crosses the posterior wing at the end of the cell and in a line with the disco-cellular nervures.

## Genus DEUDORIX, Hewitson.

APHNÆUS, part., Doubleday. DIPSAS, part., Westwood.

Head large; eyes large and prominent, hirsute, the space between them occupied by some bright colour. Palpi squamose, smooth; the terminal joint in the male very short, slender (much longer in the female). Antennæ long, distinctly clubbed; the club long (less distinct in the female). Body very robust, densely covered with long hair.

Anterior wing triangular; costal margin straight or slightly curved, apex acute; outer margin slightly curved outwards from the apex to the middle inwards near the anal angle. Costal nervure extending to beyond the middle of the margin; the subcostal nervure with three branches, two before the end of the cell, the third at a distance from the apex; the discoidal cell long, closed by the disco-cellular nervules in a straight line,—the first obsolete, the second and third of nearly equal length, joining the third branch of the median nervure a little beyond its base; the upper discoidal nervure leaves the subcostal before the end of the discoidal cell.

Posterior wing with one tail (with the exception of D. Timoleon, which has two); the anal angle with a large and conspicuous lobe; the costal nervure continued to the apex of the wing;

the subcostal branched before the end of the cell; the disco-cellular nervures of equal length, joining the third median nervule a very little beyond its base.

I would very gladly have adopted the generic name of *Dipsas* for this group of butterflies, could it have been retained. The genus *Dipsas* of Doubleday was intended to contain two species only, *Thecla Sila* of Kollar (Hugel's Kaschmir, pl. 4) and the *Dipsas Ataxus* of the "Genera of Diurnal Lepidoptera" (pl. 74). Mr. Westwood has also constructed his genus *Dipsas*, and made the dissections for that purpose, from one of these species; and as they must for the future take their places next to *Thecla Quercus*, from which they do not differ except in colour, and have very little resemblance to the other species with which they have been associated, I am compelled reluctantly to abandon the genus *Dipsas*.

The genus *Deudorix*, of which *Epijarbas* is typical, seems to form a very natural group; it will contain species which are placed by Mr. Westwood in several genera with which they do not seem to accord. If I have the good fortune to place them better than he has done, he will himself be the first to acknowledge it, and will give me credit when I say that I would much rather tread in his footsteps than trace a track for myself where the way is ill-defined. *D. Timoleon* and *D. Nila* are somewhat aberrant: their eyes are smooth, and the males have a fourth branch from the subcostal nervure. The wings of *D. Galathea* are less pointed than in the more typical species, but in this it resembles the females of some of them. Several of the species have great resemblance to the *Hesperida*, and must, like them, be of rapid flight.

D. Amyntor, D. Despæna, D. Eos, D. Loxias, D. Epijarbas, and D. Diovis are without a tuft of hair (which the males of all the other species possess) at the inner margin on the underside of the anterior wing. To adopt it as a sectional character would only disarrange species which should come close together.

#### 1. Deudorix Amyntor. Plate VIII. of figs. 19, 20.

2. Papilio Amyntor, Herbst, pl. 300. f. 5, 6.

Myrina Amyntor, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476. Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 49.

In the Collection of W. C. Hewitson, from North India.

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## 2. Deudorix Perse, Hewitson. Plate VIII. figs. o 24, 25, 2 26.

UPPERSIDE. Male.—Brown: the centre of both wings silvery blue. Posterior wing tailed: the nervures and a spot on the anal lobe black.

Underside. Both wings with a spot at the end of the cell and a transverse macular band beyond the middle, all rufous brown, bordered on both sides with black: both with a submarginal band of brown spots. Posterior wing with a black spot near the base: the caudal spot, the lobe, and a spot between them which is irrorated with blue, black.

Female does not differ from the male except in size, and in having a central spot of white on the anterior wing.

Exp.  $\sigma 1\frac{15}{20}$ ,  $\Omega 2\frac{7}{20}$  inches.

In the Collection of W. C. Hewitson, from North India.

## 3. Deudorix Smilis, Hewitson. Plate VIII. ♀ figs. 22, 23.

UPPERSIDE. Female.—Brown: the centre of both wings cerulean blue. Posterior wing tailed: the nervures, the caudal spot, a spot on the anal lobe, a submarginal line, and the tail (except the tip) black.

Underside. The spots and bands as in Amblypodia: each wing with spots near the base, each with a large spot at the end of the cell, each with a transverse band (broken at the middle of the anterior wing), all rufous brown, bordered on both sides with black. Anterior wing with a submarginal band of brown spots: the caudal spot, the lobe (which is crowned with silver), a spot between them (which is irrorated with silvery blue), the outer margin, and the tail, all black: a band of pale blue above the lobe, and a submarginal line of white.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of the East India Museum, from East India.

#### 4. Deudorix Despoena, Hewitson. Plate VI. figs. of 1, 3, ♀ 2.

UPPERSIDE. Male.—Anterior wing black, with a large spot of cerulean blue, touching the inner margin from the base to beyond the middle. Posterior wing with one tail: the base of the costal margin, the apex, and the border of the abdominal fold pale brown: a spot at the end of the cell, the nervures, and outer margin black.

Underside cream-colour. Anterior wing with the outer margin and a submarginal band rufous brown: a large dark-brown triangular spot at the middle of the costal margin. Posterior wing crossed at its middle by a narrow band, dark brown at first, rufous below: a broad band of brown (which nearly meets the last-described) near the abdominal margin: the outer margin near the base of the tail orange-yellow, bordered above and divided in the middle by dark brown dotted with blue: a submarginal band of pale brown from the middle to near the apex.

Female with the costal and outer margins of the anterior wing broadly black:

DEUDORIX. 19

a minute black spot at the end of the cell: the base and inner margin blue, the centre white. Posterior wing light blue, with a large white spot below the middle of the costal margin: the outer margin broadly brown (narrow where the blue meets it), with a submarginal line of white: the anal lobe black. On the underside it is like the male, except that the large spot on the anterior wing is less triangular, the marginal bands much broader.

Exp.  $1\frac{8}{10}$  inch.

In the Collections of W. W. Saunders and A. R. Wallace, from Waigiou.

## 5. Deudorix Eos, Hewitson. Plate VI. of figs. 8, 9.

UPPERSIDE. Male.—Anterior wing black, with a spot of brilliant blue near the base. Posterior wing with one tail, brilliant ultramarine blue, the apex brown: the end of the cell, the nervures, and outer margin black: an orange spot on the anal lobe.

UNDERSIDE cream-colour: both wings crossed at the middle by a broad common band of dark brown, marked on the anterior wing by a white spot. Anterior wing with the outer margin broadly brown, traversed by a band of lilac-white. Posterior wing with a broad band of black (traversed by a line of blue) near the inner margin: the outer margin broadly black, traversed from the apex to the middle by a line of blue: the anal angle orange: the caudal spot, the lobe, a spot between them (which is irrorated with blue), and the tail (except its tip) black: the band above the orange spot irrorated with silvery blue.

Exp. 115 inch.

In the Collection of A. R. Wallace, from Batchian.

## 6. Deudorix Loxias, Hewitson. Plate VI. o figs. 4, 5.

UPPERSIDE. Male.—Dark brown. Anterior wing with a central spot of blue. Posterior wing with one tail, light blue, the inner margin broadly brown.

Underside pale yellow, with a circular band near the base, a double transverse band beyond the middle (united in one before it reaches the anal angle), and the outer margin brown. Posterior wing with three transverse bands of dark brown—one before the middle, a second beyond the middle, the third narrow, submarginal: the outer margin also brown, traversed by a line of white: the caudal spot, a spot between it and the lobe, and the band above them, slightly dotted with silvery blue.

Exp. 1 inch.

In the Collection of A. R. Wallace, from Menado.

#### 7. Deudorix Domitia, Hewitson. Plate VI. o figs. 6, 7.

UPPERSIDE. Male.—Rufous brown. Anterior wing with a longitudinal rufous band within the cell: the anal lobe and the fringe at the base of the tails white.

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Underside yellow. Anterior wing with three black spots—one on the middle of the cell, a triangular spot on the costal margin beyond the middle, and a smaller spot between the second and third median nervules: the apex and a large spot on the inner margin grey. Posterior wing with one tail: the outer margin brown: the caudal spot, the lobe, and two spots between them black, irrorated with blue, and above these spots two parallel black lines.

Female does not differ from the male, except that the underside is nearly white, the third spot of the anterior wing scarcely seen.

Exp. 118 inch.

In the Collection of A. R. Wallace, from Singapore.

## 8. Deudorix Epijarbas. Plate VII. figs. of 16, 18, 2 17.

Thecla Epijarbas, Boisduval, MS.

Aphnæus Epijarbas, Doubleday, Brit. Mus. List.

Dipsas Epijarbas, Moore, Cat. Lep. E. I. C. Mus. p. 32.

In the Collections of A. R. Wallace and W. C. Hewitson, from Macassar and North India.

## 9. Deudorix Diovis, Hewitson. Plate VII. figs. ♀ 10, ♂ 11, 12.

UPPERSIDE. Male.—Anterior wing dark brown, with a large central triangular spot of glossy scarlet. Posterior wing with one tail scarlet: the costal and inner margins broadly brown: the nervures and the outer margin black: the anal lobe rufous, with a black spot.

Understde rufous grey. Anterior wing with a square spot at the end of the cell, a broad transverse straight band beyond the middle, and an indistinct submarginal line, all brown, bordered on both sides with white. Posterior wing crossed by several white lines: the caudal spot (which is surrounded with orange) and the anal lobe black, the black spots above the lobe thickly dotted with silvery blue.

Female.—Grey-brown. Anterior wing with the costal and outer margins and a spot at the end of the cell darker brown. On the underside it is like the male, except that the white lines of the posterior wing are slightly different in their position.

Exp. of  $l_{10}^6$ ,  $l_{10}^8$  inch.

In the Collection of W. C. Hewitson, from Australia.

This is very closely, perhaps too closely, allied to *D. Epijarbas*. It will be seen, by comparing the figures of the plate, that there is considerable difference in the form of the posterior wings, and that they differ in the arrangement of the white bands on the underside of the posterior wings. In colour they are different, but this is not worth much, the figure of *D. Epijarbas* being unusually dark. The females of both species are alike.



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#### 10. Deudorix Xenophon.

Hesperia Xenophon, Fabricius, Ent. Syst. iii. pt. i. p. 272.

Polyommatus Xenophon, Godart, Enc. Méth. p. 640.

Thecla Xenophon, Horsfield, Cat. Lep. E. I. C. Mus. p. 94 (not of Donovan).

Donovan's figure (Insects of India, pl. 41. f. 3), which has been referred to as intended to represent this species, is evidently the upperside of his figure 2 of the same plate, *Thecla Tyrtæus* of Fabricius (*Polyommatus Hugon* of Godart), and is a very good figure, representing the two tails.

## 11. Deudorix Dicetas, Hewitson. Plate VII. figs. of 14, ♀ 13, 15.

UPPERSIDE. Male.—Dark brown: the centre of all the wings pale yellow.

Underside. Both wings crossed beyond the middle by a continuous common rufous band; its outer border white, zigzag near the anal angle of the posterior wing, and bordered on both sides with silvery white near the inner margin: both wings with an indistinct submarginal rufous band. Posterior wing tailed: the caudal spot and the lobe black, the space between them irrorated with black and white.

Female.—Rufous brown: the centre of the anterior wing and a large portion of the posterior wing beyond the middle rufous. On the underside it scarcely differs from the male.

Exp. o 111, 2 117 inch.

In the Collection of A. R. Wallace, from Macassar.

#### 12. Deudorix Pheretima, Hewitson. PLATE IX. figs. ♀ 27, ♂ 28, 29.

UPPERSIDE. Male.—Rufous brown: the centre of both wings rufous. Posterior wing tailed.

Underside rufous brown. Anterior wing with two large spots before the middle; posterior wing with two or three spots: both wings crossed beyond the middle by a band of brown, slightly undulated on the anterior wing and bordered outwardly with white, broken into spots on the posterior wing and bordered on both sides with white: both with an indistinct band of brown near the outer margin. Posterior wing with the caudal spot, the lobe, and a large spot between them, which is irrorated with silvery blue, all black: a silver spot above the lobe.

Female, which is rufous brown above, glossed with blue, does not differ from the male on the underside, except that the spots of the posterior wing are smaller and of somewhat different form.

Exp. 17 inch.

In the Collections of the British Museum and A. R. Wallace, from Sarawak.

Var. d. With the transverse band of the underside narrower, straighter: the spot nearest the costal margin of the posterior wing linear. From Singapore.



## 13. Deudorix Petosiris, Hewitson. Plate IX. & figs. 30, 31.

UPPERSIDE. Male.—Rufous. Anterior wing with the costal margin and apex broadly brown. Posterior wing tailed.

Underside. Both wings with two rufous-brown spots before the middle; both crossed beyond the middle by a nearly straight rufous-brown band and by an indistinct submarginal band of the same colour. Posterior wing with the caudal spot and anal lobe dark brown: a submarginal white line near the tails.

Female.—Brown, slightly glossed with dull blue on the underside. It differs from the male only in having the transverse band of the posterior wing bordered below and near the inner margin on both sides with white.

Exp.  $1\frac{11}{20}$  inch.

In the Collections of the British Museum and B. B. Labrey, from East India.

## 14. Deudorix Melampus.

Papilio Melampus, Cramer, pl. 362. f. G, H.
Papilio Jarbas, Fabricius, Mant. Ins. ii. p. 68. Donovan, Ins. of India, pl. 40. f. 3.
Theela Sorya, Kollar in Hugel's Kaschmir, pl. 5. f. 1, 2.

In the Collection of W. C. Hewitson, from North India.

#### 15. Deudorix Phranga, Hewitson. Plate IX. of figs. 34, 35.

UPPERSIDE. Male.—Anterior wing black, with a part of the base and the inner margin green-blue. Posterior wing tailed, green-blue: the outer margin black, traversed from the anal angle to the middle by a line of white: the anal lobe black, with its centre orange.

UNDERSIDE. Both wings crossed beyond the middle by a band of brown, broken where the wings meet: bordered on both sides with white—continuous on the anterior wing, broken on the posterior wing. Posterior wing tailed: the caudal spot (which is crowned with orange), the lobe (which is crowned first with white and then with orange), a spot between them (which is irrorated with silvery blue), all black: a submarginal line of white, and upon it, outside the caudal spot, some lunules of white.

Exp. 11 inch.

In the Collection of A. R. Wallace, from Batchian.

#### 16. Deudorix Varuna. Plates IX. & X. figs. ♂ 32, 33, ♀ 36, 37.

Thecla Varuna, Horsfield, Cat. Lep. E. I. C. Mus. p. 91, Dipsas Varuna, Westwood in Gen. Diurn. Lep. p. 480.

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### 17. Deudorix Elcia, Hewitson. Plate X. o figs. 38, 39.

UPPERSIDE. Male.—Anterior wing black: from the inner margin to the middle dull violet-blue: a silky rufous spot at the centre of the wing. Posterior wing tailed, dull violet-blue: the lobe orange: the outer margin black, traversed by a white line.

Underside grey-green. Both wings with a large spot at the end of the cell: a transverse band beyond the middle (broken where the wings meet), continuous and equal on the anterior wing, much broken into spots on the posterior wing and bordered on both sides with white: both wings with a second transverse band near the margin. Posterior wing with the caudal spot and the lobe black, crowned with orange: the margin black, with a parallel line of white.

Exp. 11 inch.

In the Collection of W. C. Hewitson, from the Philippine Islands.

## 18. Deudorix Manea, Hewitson. Plate X. figs. of 40, ♀ 41.

UPPERSIDE. Male.—Dull purple-brown, glossed by a variable brilliant violet-blue. Posterior wing tailed: the lobe black, the fringe white.

Underside green-grey. Both wings with an indistinct spot at the end of the cell: a narrow transverse rufous-brown band beyond the middle (not meeting where the wings meet), continuous on the anterior wing, slightly broken on the posterior wing, bordered with white below: both with a transverse band near the outer margin: the margin black, the fringe white. Posterior wing with the caudal spot (which is crowned with yellow) and the lobe black, the space between them irrorated with black and white.

Female.—Uniform rufous brown: the bands of the underside broader.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Celebes.

# 19. Deudorix Nissa, var. Plate X. figs. of 42, 43, ♀ 44.

Thecla Nissa, Kollar in Hugel's Kaschmir, pl. 4. f. 3, 4. p. 412. Amblypodia Nissa, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 46.

In the Collection of W. C. Hewitson, from North India.

A variable species. The male is sometimes, as in Kollar's figure, without the red spot on the middle of the anterior wing; sometimes it is more distinctly marked than in the figure 42 of the plate. In colour it differs from other allied species, and, like the females of *Varuna* and *Pheretima*, is of a dull grey- or indigo-blue. On the underside the transverse band is far apart where the wings meet.

#### 20. Deudorix Orseis, Hewitson.

UPPERSIDE. Male.—Dark brown, glossed with dull indigo-blue. Anterior wing with the apex rounded. Posterior wing tailed: the anal lobe black, with a spot of orange-yellow.



Underside rufous brown, glossed with purple. Both wings with a large spot at the end of the cell: a transverse rufous-brown band beyond the middle (not continuous where the wings meet), nearly straight and equal on the anterior wing, broad and slightly broken on the posterior wing and bordered on both sides with white: the caudal spot (which is crowned with orange) and the lobe black, the space between them irrorated with silvery white: a submarginal line of white: the margin black.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of A. R. Wallace, from Sumatra.

This species is so closely allied to D. Chozeba that I had passed it over, believing it to be its female, until I found that they were both of the same sex; it differs from D. Chozeba in the less acute apex of the anterior wing and the larger proportion of blue. On the underside it is tinted with purple: the spots and bands are much more distinctly marked than in D. Chozeba, and resemble D. Varuna. I regret that there is no figure, being quite aware of the futility of attempting to define, by written description only, the minute traits which serve to mark the specific distinctions of closely allied species amongst the Lycanida.

# 21. Dendorix Nasaka. Plate V. of figs. 45, 46.

Thecla Nasaka, Horsfield, Cat. Lep. E. I. C. Mus. p. 91. Dipsas Nasaka, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 480.

## 22. Deudorix Chozeba, Hewitson. Plate V. o figs. 47, 48.

UPPERSIDE. Male.—Brown, glossed with blue. Posterior wing tailed: the anal lobe with a spot of orange-yellow.

Underside rufous brown. Both wings with two lines at the end of the cell: both crossed beyond the middle by a transverse band (not continuous where the wings meet), on the anterior wing straight and even, slightly interrupted on the posterior wing: both with a very indistinct band near the outer margin: the caudal spot (which is crowned with orange) and the lobe black: a large space between them irrorated with silvery white: a submarginal line and a line above the lobe white.

Exp.  $1\frac{3}{20}$  inch.

In the Collection of A. R. Wallace, from Sumatra.

# 23. Deudorix Isocrates.

- d Q. Hesperia Isocrates, Fabricius, Ent. Syst. iii. p. 266.
- Q. Hesperia Pann, Fabricius, Ent. Syst. iii. p. 276. Donovan, Ins. of India, pl. 38. f. 1.

In the Collection of W. C. Hewitson, from North India.

# 24. Deudorix Anta. Plate V. figs. ♂ 49, ♀ 50, 51.

Lyceena Anta, Trimen, Trans. Ent. Soc. 3rd ser. i. p. 402.

In the Collections of W. W. Saunders and W. C. Hewitson, from Natal.

#### 25. Deudorix Galathea.

d. Thecla Galathea, Swainson, Zool. Illus. 1st ser. pl. 69. Iolaus Galathea, Westwood in Gon. Diurn. Lop. p. 481.

Female.—UPPERSIDE brown; the outer margin black: posterior wing with the lobe orange, with a central black spot dotted with silvery blue. UNDERSIDE grey-white: both wings with a spot at the end of the cell; both crossed beyond the middle by a broad band somewhat darker than the wing, bordered on both sides with dark brown and again with white; both with an indistinct submarginal band. Anterior wing with the outer margin broadly rufous brown. Posterior wing with the caudal spot (which is surrounded with orange), the anal lobe (which is crowned with orange and dotted with golden green), the spot between them (which is thickly dotted with blue), and the outer margin and tail (except the tip) black.

In the Collections of the British Museum and W. C. Hewitson, from Sierra Leone.

#### 26. Deudorix Timoleon.

Papilio Timoleon, Stoll, Suppl. Cramer, pl. 32. f. 4, 4 D.

Thecla Timoleon, Boisduval, Spec. Gén. Lép. pl. 22. f. 4.

Amblypodia Timoleon, Westwood in Gen. Diurn. Lep. p. 478.

Amblypodia Rochana, Horsfield, Cat. Lep. E. I. C. Mus. p. 108. Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1a. f. 10.

Myrina Lazarena, Felder, Wien. Ent. Monats. vi. p. 293.

In the Collections of the British Museum and W. C. Hewitson, from Penang and Borneo.

## 27. Deudorix Mæcenas.

Deudorix Timoleon, var. Plate VIII. Q fig. 21.

Hesperia Maccenas, Fabricius, Ent. Syst. iii. pt. i. p. 271. Donovan, Ins. of China, pl. 41. f. 2.

Thecla Nila, Kollar in Hugel's Kaschmir, pl. 4. f. 5, 6. p. 413.

In the Collection of W. C. Hewitson, from North India.

The variety of the plate was drawn from a belief that there was only one species; since then, I am inclined to think that there are two. First, the *Timoleon* of Stoll (a wretched figure), the insect figured by Dr. Boisduval, and *Rochana* of Horsfield and Moore, which agree in having the posterior wing broad at the anal angle, with two slender tails; and secondly, distinct from them, the figure in Donovan's Insects of China, the *Nila* of Kollar, and the figure of the plate, which have the posterior wing much more pointed at the anal angle and with one broad tail.

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The white spots on the underside of the posterior wing of *Mæcenas* are much less distinctly defined, the large white spot near the base is shorter, the double zigzag white lines which cross the wing of *Timoleon* (converging into one) are scarcely seen in *Mæcenas*, and the slender white line which in *Timoleon* connects the basal spot and the transverse lines is in *Mæcenas* represented by a round spot.

# Genus LOXURA.

LOXURA, Horsfield.

#### 1. Loxura Alcides.

Papilio Alcides, Cramer, pl. 96. f. D, E.
Loxura Alcides, Boisduval, Spec. Gén. Lép. pl. 22. f. 3.
Papilio Silenus, Fabricius, Mant. Ins. ii. p. 85.
Papilio Corax, Cramer, pl. 379. f. D, E.
Loxura Surya, Moore, Cat. Lep. E. I. C. Mus. pl. 1 a. f. 13.

# 2. Loxura Atymnus.

Papilio Atymnus, Cramer, pl. 331. f. D, E. Donovan, Ins. of China, pl. 39. f. 1.

Loxura Atymnus, Horsfield, Cat. Lep. E. I. C. Mus. pl. 11. f. 6, 6 a. p. 121. Boisduval, Spec. Gén. Lép. pl. 7. f. 3.

#### 3. Loxura Pita.

Loxura Pita, Horsfield, Cat. Lep. E. I. C. Mus. p. 122.

In the Collections of the British Museum and A. R. Wallace, from Java.

Mr. Wallace's Collection contains both sexes of this species. The male is without spots on either wing: the female has (as described by Dr. Horsfield) a transverse band of spots on the posterior wing.

## 4. Loxura tripunctata, Hewitson.

Loxura Pita, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. pl. 74. f. 2. p. 475.

In the Collections of the British Museum and W. C. Hewitson, from Sylhet.

## 5. Loxura Dermaptera. Plate IV. of figs. 3, 4.

Loxura Dermaptera, Wallengren, Lep. Caff. Act. Acad. Holm. ser. nov. ii. no. 4, 1857. Anyas, Illustrations of Port Natal, pl. 30. f. 9.

In the Collection of the British Museum, from Zoolu, South Africa.

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## Genus MYRINA.

#### MYBINA, Godart.

This genus contains species of great diversity of form and colour. The males of one species, M. Amrita, have a fourth branch from the subcostal nervure, the rest have two or three branches; but as this difference is unaccompanied by any corresponding diversity in the structure, and seems here only worthy of notice as a specific character, I have not used it as a sectional demarcation. M. Amrita, M. Otraeda, M. Phocides, M. Sugriva, and M. Nedymond have, as in the genus Deudoria, a tuft of long hair on the inner margin of the underside of the anterior wing; and below it, on the posterior wing, a cup-like depression. Some species have the longest tail close to the anal angle and in a line with the submedian nervure; others have it in continuation with the third branch of the median nervure. I have divided the genus into two sections. Most of those included in the second section are of much more robust habit than those which precede them; their antennæ are longer and more distinctly clubbed; they resemble Deudoria, but have the palpi longer.

Amblypodia Jangala of Horsfield, and two new species closely allied to it, ought probably to come into this genus; at the present time I have hesitated to include them.

#### A. Head small. Eyes small, smooth.

1. Myrina Amrita. Plate XI. figs. ♀ 1, ♂ 2, 3.

Myrina Amrita, Felder, Wien. Ent. Monats. iv. p. 395.

Exp.  $1_{10}^{8}$  inch.

In the Collections of the East India Museum and Dr. Felder, from India and Malacca.

This species differs in a remarkable way from the rest of the genus. In the male, the inner margin of the anterior wing is rounded and projected outwardly, as in *Euplæa*; the middle of this margin has a tuft of long hair projecting from it at right angles, which covers a curious circular cup-like hollow spot on the opposite margin of the posterior wing: the male has, besides this, a fourth branch from the subcostal nervure of the anterior wing.

2. Myrina Macsa. Plate XI. o figs. 4, 5.

UPPERSIDE. Male.—Anterior wing pale blue from the base to the middle, the costal

margin (which is pale brown) excepted: the outer half of the wing dark brown. Posterior wing with two tails of unequal length, pale rufous brown: the centre light blue, clouded with brown, the outer margin darker brown: a submarginal line which passes down the tails, the caudal and anal spots black: the fringe and tails white.

Underside white. Anterior wing with the outer margin and a band parallel to it rufous brown. Posterio wing with two submarginal lines of rufous brown from the apex to the caudal spot: the caudal and anal spots black, broadly bordered above with crimson: a zigzag line above these spots and the outer margin black: the fringe white.

Exp. 2 inches.

In the Collection of the British Museum, from Sierra Leone.

## 3. Myrina Thymbræus.

d. Sithon Thymbræus, Hübner, Zutr. f. 671, 672.

Myrina Thymbræus, Westwood in Gen. Diurn. Lep. p. 476.

Q. Amblypodia Jalindra, Horsfield, Cat. Lep. E. I. C. Mus. p. 110. Westwood, Gen. Diurn. Lep. p. 478. Polyommatus Nedymond, Godart, Enc. Méth. p. 634.

In the Collection of the East India Museum, and the Hope Collection of the Oxford University Museum, from Java.

#### 4. Myrina Mandarinus. Plate XI. ♀ figs. 6, 7.

Myrina Mandarinus, Doubleday, Brit. Mus. List, p. 22.

UPPERSIDE. Male.—Anterior wing brown, with a large spot of dull cerulean blue from the base to beyond the middle, bounded by the inner margin and the first median nervule. Posterior wing cerulean blue: the costal margin and apex broadly brown: one or two spots at the base of the tail and one at the anal lobe black.

Underside yellow. Anterior wing crossed beyond the middle by a triangular rufous band: from the band to the outer margin rufous, paler, crossed by a submarginal band of rufous brown. Posterior wing with a broad rufous band, and a submarginal band of the same colour from the costal margin to the middle: the caudal spot (which is crowned with orange), the spot at the anal lobe (which is crowned with blue), some zigzag lines above them, and the outer margin black: the fringe white.

Female rufous brown: the anal angle of the posterior wing broadly white, marked with three large black spots: the outer margin and the centre of the tails black: the fringe white.

Exp.  $1\frac{9}{10}$  inch.

· In the Collection of W. C. Hewitson, from Sylhet.

This species is closely allied to M. Thymbraus; the males are, however, entirely different. 1

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regret that, when the figures of the plate were drawn, I was not aware that an example of the male is in the Hope-Collection of the Oxford University Museum.

### 5. Myrina Cinesia, Hewitson. Plate XIII. figs. of 18, 19, 2 20.

UPPERSIDE. Male.—Violet-blue. Anterior wing with the inner margin projecting, curved as in Euplæa. Posterior wing with three tails and a broad white fringe.

Underside orange rufous. Posterior wing with the caudal spot, the anal lobe, a band above them (of which they form a part) with its inner border dentated and traversed by a line of silvery blue, a second band above it, the base of the tails, and a line on the outer margin, all black.

Female does not differ from the male, except that it is brown above, with three white spots near the tails, and that the submarginal band of the underside of the posterior wing is not dentated on its inner border as in the male.

Exp.  $\sigma 1\frac{13}{20}$ ,  $\Omega 1\frac{5}{20}$  inch.

In the Collection of A. R. Wallace, from Sarawak.

The only female which I have seen is so much smaller than the male, that I had some hesitation in pairing them; there is some little difference also (as I have pointed out) in the shape of the submarginal band on the underside. I have little doubt that they are one species.

# 6. Myrina Maneia, Hewitson. Plate XII. & figs. 14, 15.

UPPERSIDE. Male.—Dark brown. Anterior wing brilliant blue from the base to beyond the middle. Posterior wing with one tail: the anal angle and a marginal line black: a band of four spots, two caudal spots (one touching the margin), the tail, and the fringe white.

Underside white. Anterior wing with its outer half rufous, marked at the anal angle by two white spots, and bordered inwardly by darker colour, forming a transverse band across the wing. Posterior wing with a short rufous band at the apex, the outer margin, two spots near it (one on each side of the tail), a band above them, and a spot above the band, all black.

Female does not differ from the male, except that it is without the blue of the anterior wing.

Exp. 111 inch.

In the Collection of A. R. Wallace, from Singapore.

## 7. Myrina Otraeda, Hewitson. Plate XV. of fig. 34.

UPPERSIDE cerulean blue: the inner margin slightly curved, projecting. Anterior wing with the costal margin, the apex, and nervures black. Posterior wing tailed: the costal margin broadly black.

Underside white. Both wings crossed beyond the middle by a common rufous band.

Anterior wing from the band (forming part of it) to the outer margin brown. Posterior wing with a round spot of brown near the base of the costal margin (forming a hollow on the upper side of the wing); clouded with brown beyond the band: the caudal spot and lobe and a small spot between them black, slightly dotted with blue.

Exp. 14 inch.

In the Hope Collection of the Oxford University Museum, from Sierra Leone.

The figure of this species was made from a very imperfect specimen, kindly lent me by Professor Westwood, from the Hope Collection. It has a large white spot on each of the anterior wings, which I have not mentioned in the description because these spots appear to have been produced by having all the blue scales rubbed off. It has a similar tuft of hair on the anterior wing, and cup-like hollow to meet it on the posterior wing, which I have mentioned in *M. Amrita*. The spot which I have indicated on the underside of the posterior wing, representing the convex side of the said hollow, would not be visible, I think, unless the white scales were rubbed off. It would, if perfect, have three tails.

# 8. Myrina Orpheus. Plate XVI. ♀ fig. 45.

Myrina Massiva, Hewitson. PLATE XII. of figs. 10, 11.

Myrina Orpheus, Boisduval, MS. Felder, Wien. Ent. Monats. vi. p. 292.

In the Collections of the British Museum and Dr. Boisduval, from Luzon, Philippine Islands.

The plate containing the male of this species was completed previous to the publication of Dr. Boisduval's name: since then, his kindness has enabled me to add an illustration of the female.

#### 9. Myrina Jaffra.

Myrina Jaffra, Godart, Enc. Méth. p. 593. Horsfield, Cat. Lep. E. I. C. Mus. pl. 2. f. 5, 5 a. p. 118. Boisduval, Spec. Gén. Lép. pl. 7. f. 4. Lucas, Hist. Nat. Lép. Ex. pl. 43. f. 4.

In the Collection of W. C. Hewitson, from Sylhet.

# 10. Myrina Acte. Plate XII. of figs. 8, 9.

Myrina Acte, Doubleday, Brit. Mus. List. Horsfield & Moore, Cat. E. I. C. Mus. p. 47.

In the Collection of W. C. Hewitson, from Northern India.

#### 11. Myrina Scaeva, Hewitson. Plate XV. of figs. 39, 40.

UPPERSIDE. Male.—Dark brown. Anterior wing with a central spot of blue dots.

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Posterior wing with three tails, cerulean silvery blue: the base, the costal margin, and the outer margin from the apex to the middle dark brown: two caudal spots and the tails black: a submarginal line and the fringe white.

Underside white. Anterior wing with a triangular spot on the costal margin, the apex, and outer margin rufous brown: the base, two large spots in and below the cell, the end of the cell, several spots on the costal margin, a broken macular band beyond the middle, and a submarginal line, all black. Posterior wing with several spots, short lines in pairs, a submarginal line, and the outer margin black: the caudal black spots crowned with silvery blue.

Exp. 1 inch.

In the Collection of A. R. Wallace, from Singapore.

### 12. Myrina Tharis.

Oxylides Tharis, Hübner, Zutr. f. 883, 884.

Myrina Pharis, Doubleday in Brit. Mus. List. Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. pl. 74. f. 3.

In the Collection of W. C. Hewitson, from Malacca.

# 13. Myrina Chitra.

Thecla Chitra, Horsfield, Cat. Lep. E. I. C. Mus. pl. 1. f. 5. p. 117.

Myrina Chitra, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476.

In the Collections of the British Museum and A. R. Wallace, from Java and Singapore.

#### 14. Myrina Ravindra.

Myrina Ravindra, Horsfield, Cat. Lep. E. I. C. Mus. p. 117. pl. 1. f. 11, 11 a. Boisduval, Spec. Gén. Lép. pl. 22. f. 1.

## 15. Myrina Estella, Hewitson. Plate XVI. of figs. 50, 51.

UPPERSIDE. Male.—Purple-brown: the margins black: the tails, a submarginal line near them, and the fringe white.

Underside grey-white. Anterior wing broadly rufous brown at the apex and outer margin: two large round spots in the cell and a spot at the end of the cell rufous brown: the transverse band very irregular, broken midway, at first broad and triangular. Posterior wing with several spots and signag lines.



Female does not differ from the male, except that it is rufous brown above, and has the anal angle of the posterior wing grey, with two large caudal black spots.

Exp.  $1\frac{7}{30}$  inch.

In the Collection of W. C. Hewitson, from Sumatra.

Very closely allied to *M. Thesmia*, from which it does not differ above, except in the nearly straight inner margin of the anterior wing of the male. On the underside the transverse band of the anterior wing is a sufficient distinction.

## 16. Myrina Thesmia, Hewitson. Plate XIV. figs. of 25, 27, ♀ 26.

UPPERSIDE. Male.—Purple-brown. Anterior wing with the inner margin curved, projecting. Posterior wing with three tails: the outer margin and base of the tails black: a submarginal line between the tails, the fringe, and the tails white.

Underside. Anterior wing rufous orange, with two spots in and below the cell, a spot at the end of the cell, three transverse lines (the first, which is near the second, indistinct), the outer margin, and fringe, all brown. Posterior wing white (the apex rufous), with eight brown spots, followed by several zigzag black lines: the caudal spot, the lobe, and the space between them crowned with silvery blue: a spot above the lobe also powdered with blue: the outer margin black: the fringe white.

Female does not differ from the male, except that it is rufous brown above, and has the anal angle of the posterior wing grey, marked with the caudal spots.

Exp.  $1\frac{7}{60}$  inch.

In the Collection of W. C. Hewitson, from Singapore and Sumatra.

Closely allied to *M. Ravindra*: although the males are very different, the females are alike on the upperside. On the underside this species differs from *Ravindra* chiefly in having the lower spots of the posterior wing represented by double lines. A male, in the Collection of Mr. Wallace, has a rufous spot at the centre of the anterior wing, as represented in the accompanying figure.

# 17. Myrina Lisias.

Papilio Lisias, Fabricius, Mant. Ins. ii. p. 65. Donovan, Ins. of India, pl. 40. f. 1.

Myrina Lisias, Godart, Enc. Méth. p. 593. Boisduval, Spec. Gén. Lép. pl. 22. f. 2. Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476. Moore, Cat. Lep. E. I. C. Mus. p. 48.

In the Collection of the British Museum, from East India.

#### 18. Myrina Theda. Plate XVI. of figs. 46, 47.

Myrina Theda, Boisduval, MS. Felder, Wien. Ent. Monats. vi. p. 291.

In the Collection of Dr. Boisduval, from Mindanao, Philippine Islands.

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## 19. Myrina Namusa, Hewitson. Plate XIII. 2 figs. 23, 24.

UPPERSIDE. Female.—Rufous brown. Anterior wing crossed at the middle by an oblique irregular band of rufous yellow: the wing beyond the band dark brown. Posterior wing with three tails: a submarginal line between the tails: the tails (except the base, which is brown) and the fringe white.

Underside pale yellow, with numerous rufous spots and black lines: the spots near the tails crowned with silvery blue.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of A. R. Wallace, from Macassar.

I have not described this species minutely. It is so like the next species on the underside that it will be best to point out the difference:—on the anterior wing of this species there is a short pale rufous band from the middle of the costal margin before the transverse lines; the first two transverse lines are much closer together than in *M. Nænia*, and parallel to each other: on the posterior wing it is without the rufous spot near the abdominal fold.

# 20. Myrina Nania, Hewitson. Plate XIII. o figs. 21, 22.

UPPERSIDE. Male.—Of a uniform purple-brown. Anterior wing slightly rufous at the centre: the inner margin projecting, rounded. Posterior wing with three tails: the caudal spot, the lobe, and outer margin black: a submarginal line between the tails, and the fringe white.

Underside grey-white, with numerous rufous spots and brown lines. Anterior wing with a spot near the base, a band crossing the cell, a spot at the end of the cell, three transverse lines (the second zigzag), and the outer margin rufous brown. Posterior wing with eight rufous spots and several transverse lines: a spot at the middle of the outer margin, the caudal spot, the anal lobe (which are black), a spot between them, and a spot above the lobe (which is bordered below with orange), all crowned with silvery blue.

Exp. 1 to inch.

In the Collection of W. C. Hewitson, from Celebes.

## 21. Myrina Lisides, Hewitson. Plate XIV. of figs. 28, 29.

Myrina Lisides, Doubleday, Brit. Mus. List.

UPPERSIDE. Male.—Brown. Anterior wing with the centre rufous: the base irrorated with blue. Posterior wing cerulean blue, with two tails: the costal margin and apex broadly brown: the caudal spot, the outer margin, and base of the tails black: the fringe and tails white.

Underside white. Anterior wing with a large quadrate spot on the costal margin beyond the middle, a line below it, the outer margin, and a submarginal line rufous. Posterior wing

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with a rufous spot before the middle, a spot near the apex, and two submarginal bands of linear spots; the caudal spot, the lobe, and a spot between them (which are dotted with pale blue), the base of the tails, and the outer margin, all black.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of the British Museum, from Sylhet.

# 22. Myrina Marciana, Hewitson. Plate XII. ♀ figs. 12, 13. Plate XVI. ♂ fig. 44.

UPPERSIDE. Male.—Dull scarlet. Anterior wing with the base, the costal margin, the apex, and outer margin broadly dark brown: the nervures and a spot at the base of the median nervules black. Posterior wing with the abdominal fold brown: the outer margin, which is narrow, and tails black.

Underside rufous. Both wings crossed beyond the middle by an indistinct interrupted brown line, both with a line at the end of the cell. Posterior wing with two ill-defined spots at the base of the tails, the lobe, and the outer margin black: a spot at the anal angle and a submarginal line white.

Female.—Rufous brown. Anterior wing with an oblong rufous spot at the end of the cell, divided by the disco-cellular nervules: two spots (scarcely seen) between the median nervules, and a fourth rufous spot below these (forming together a semicircle). Posterior wing with the base of the tails broadly grey: the outer margin and tails white.

Exp. of 140, 2 148 inch.

In the Collection of A. R. Wallace, from Sumatra and Sarawak.

The figure of the female of this species was drawn from an imperfect specimen and does not represent correctly the spots of the anterior wing, which I have endeavoured to rectify in the description.

## 23. Myrina Liger.

Papilio Liger, Cramer, pl. 254. f. E, F. Fabricius, Spec. Ins. App. p. 504; Mant. Ins. ii. p. 67. Polyommatus Liger, Godart, Enc. Méth. p. 622.

Amblypodia Liger, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 478.

In the Collection of the British Museum, from Sierra Leone.

## 24. Myrina Syrinx. Plate XIV. o figs. 32, 33.

Myrina Syrinx, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860. Myrina Onyx, Doubleday, Brit. Mus. List.

In the Collection of W. C. Hewitson, from North India.

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## 25. Myrina Epirus.

Myrina Epirus, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.

In the Collection of Dr. Felder, from Amboyna.

Dr. Felder has kindly sent me a drawing of this beautiful species. It is much larger than Syrinx, and, though it resembles it above, is more like Thymbræus on the underside, with the addition of a central transverse band on both wings.

### 26. Myrina Ciniata, Hewitson. Plate XIV. figs. 30, 31.

UPPERSIDE dark brown. Anterior wing with a central white spot. Posterior wing with three tails and a submarginal line of white.

Underside rufous brown. Both wings crossed by a common band of white: the caudal spot, two spots outside of it, the lobe, and two grey spots between them crowned with silver: a spot above the lobe, and the end of the transverse white band powdered with silver: a broad submarginal white line: the margin black.

Exp.  $0\frac{2}{10}$  to  $1\frac{3}{10}$  inch.

In the Collections of A. R. Wallace and W. C. Hewitson, from Batchian and India.

A small example of this species, in my Collection, has the white spot of the anterior wing larger and broader, and the band on the underside of the posterior wing much less distinct.

#### 27. Myrina Triopas.

Papilio Triopas, Cramer, pl. 320. f. G, H, 1782.

Papilio Amor, Fabricius, Mant. Ins. ii. p. 65. Godart, Enc. Méth. p. 620. Guérin, Icon. Règ. An. Ins. pl. 81. f. 6.

Myrina Amor, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476.

Myrina Triopas, Moore, Cat. Lep. E. I. C. Mus. p. 49.

In the Collection of W. C. Hewitson, from East India.

## 28. Myrina Lefebvrei. Plate XVI. o figs. 52, 53.

Myrina Lefebvrei, Felder, Wien. Ent. Monats. vi. p. 291.

In the Collections of Dr. Boisduval and W. C. Hewitson, from Luzon, Philippine Islands.

Dr. Felder, whilst placing this species with Myrina, points out several peculiarities in which it differs from the other species of the genus; these discrepancies induced Dr. Boisduval to propose a new genus for it; but as its points of resemblance to Myrina surpass its divergencies, I have preferred to place it where it is.

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## B. Head larger. Eyes large, hirsute.

#### 29. Myrina Sugriva.

Myrina Sugriva, Horsfield, Cat. Lep. E. I. C. Mus. pl. 1. f. 10, 10 a. p. 105. Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1a. f. 12. Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476.

Myrina Aroca, Felder, Verzeichniss von den Naturforschern der k. k. Fregatte Novara aus den Verhandlungen der k. k. Zool.-Botan. Gesellsch. Wien (1862).

In the Collection of the British Museum, from India and Java.

There is a variety (male) of this species in the British Museum, from India, which is without the blue spot at the apex of the posterior wing.

### 30. Myrina Phocides.

Myrina Jolcus. Plate XIII. ♀ figs. 16, 17.

Hesperia Phocides, Fabricius, Ent. Syst. iii. p. 282. Donovan, Nat. Repos. ii. pl. 44. f. 1.

- d. Myrina Isabella, Doleschall; Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860.
- Q. Myrina Jolcus, Felder, Lep. Amboin. loc. cit.

In the Collections of A. R. Wallace and W. C. Hewitson, from Aru.

The original specimen of this species, described by Fabricius, is now in the Banksian Collection at the Linnean Society.

# 31. Myrina Camorta.

Myrina Camorta, Felder, Verzeichniss von den Naturforschern der k. k. Fregatte Novara.

#### 32. Myrina Lapithis, Hewitson. Plate XV. figs. of 35, 36, \$\mathbb{Q}\$ 37, 38.

Thecla Lapithis, Boisduval, MS.

Amblypodia Lapithis, Doubleday, Brit. Mus. List.

Myrina Lapithis, Moore, Cat. Lep. E. I. C. Mus. p. 48.

UPPERSIDE. Male.—Anterior wing dark brown. Posterior wing brilliant blue, with one tail.

UNDERSIDE. Anterior wing rufous, crossed transversely before the middle by a band of

White, bordered on both sides with dark brown: a transverse line of the same colour beyond the middle. Posterior wing silvery white, with several black spots: the apex broadly rufous: the caudal spot, a spot outside of it, the lobe, a spot between them, and a spot above them irrorated with silvery blue: the outer margin black, traversed by a line of white: the tails black.

Female rufous brown: the apex of the posterior wing and tail white: on the underside it does not differ from the male, except that the tails are white.

Exp.  $1\frac{2}{10}$  inch.

In the Collections of the British Museum and A. R. Wallace, from Singapore.

On the underside this species varies considerably in the form of the line which crosses the anterior wing beyond the middle, as well as in the size of the black spots of the posterior wing.

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### 33. Myrina Nedymond.

Papilio Nedymond, Cramer, pl. 299. f. E, F.

Thecla Nedymond, Horsfield, Cat. Lep. E. I. C. Mus. p. 96.

Myrina Nedymond, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 476.

In the Collections of the British Museum and W. C. Hewitson, from Java and Sumatra.

# 34. Myrina Malika. Plate XV. o figs. 41, 42, 43.

Thecla Malika, Horsfield, Cat. Lep. E. I. C. Mus. p. 90.

Dipsas Malika, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 480. Moore, Cat. Lep. E. I. C. Mus. p. 37. pl. 1a. f. 5.

In the Collections of the British Museum and A. R. Wallace, from Java and Sumatra.

This species, which is closely allied to M. Lapithis, differs, like it, in the size of the black spots on the underside of the posterior wing.

# 35. Myrina Lorisona, Hewitson. Plate XVI. of figs. 48, 49.

UPPERSIDE. Male.—Dark brown. Anterior wing with a round orange spot below the middle. Posterior wing with one tail, orange: the outer margin dark brown: the base and inner margin broadly rufous brown.

UNDERSIDE. Anterior wing grey, with a spot at the end of the cell, a broad transverse band, a submarginal line, and the outer margin brown. Posterior wing white, with four spots near the base and one at the middle of the costal margin dark brown, followed by several zigzag lines of paler brown: the caudal spot, the lobe, and a smaller spot between them (which is dotted with silver) black, crowned with orange.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of the British Museum, from Sierra Leone.

#### 36. Myrina Pallene.

Myrina Pallene, Wallengren, Lep. Caff. Act. Acad. Scien. Holm. ser. nov. ii. no. 4.

#### 37. Myrina Jangala.

Amblypodia Jangala, Horsfield, Cat. Lep. E. I. C. Mus. p. 113. Westwood, Gen. Diurn. Lep. p. 478. Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1a. f. 11.

Var. Female with the underside rufous: the spots near the anal angle of the posterior wing also rufous but darker.

In the Collection of W. C. Hewitson, from Northern India.

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# 38. Myrina Travana, Hewitson. Plate XVII. o figs. 59, 60.

Underside. Male.—Dark brown, with a spot of violet-blue near the base of both wings. Underside dark rufous brown. Both wings crossed beyond the middle by a linear band of dark brown. Posterior wing with a spot at the base of the tail, a spot outside of this, a spot at the anal angle, and a fourth spot between the last two irrorated with white, all crowned with brilliant silver-blue: below these spots a submarginal line of white.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of W. C. Hewitson, from Sumatra and Borneo.

This species, from the Collection of Mr. Wallace, is easily distinguished from M. Jangaia by its much greater breadth of wing.

# 39. Myrina Orsolina, Hewitson. Plate XVII. figs. & 56, 58, 9 57.

UPPERSIDE. Male.—Dark brown. Anterior wing with a large trifid spot of pale blue from the base. Posterior wing with a central spot of blue: the anal black spot irrorated with silver-blue: a submarginal line and the fringe near the tails white.

Underside. Orange-yellow. Both wings crossed beyond the middle by a very pale broken linear brown band. Posterior wing with four large spots of dark brown near the tails (the spot between the tails irrorated with grey-white), all crowned with brilliant silver-blue, with above them three spots of white bordered with black; the white spot nearest the anal angle also crowned with silver-blue: a submarginal white line near the tails: the margin dark brown, the fringe white.

Female like the male, except that the upperside is of a uniform rufous brown.

Exp.  $1_{10}^4$  inch.

In the Collection of W. C. Hewitson, from Celebes and Macassar.

## 40. Myrina Hypoleuca. Plate XVII. of figs. 54, 55.

Thecla Hypoleuca, Boisduval, MS.

UPPERSIDE. Male.—Dark brown. Anterior wing irrorated from the base to the middle with silver-blue. Posterior wing silver-blue, with the base and the outer margin dark brown: the abdominal fold thickly clothed with rufous brown hair: the inner margin and base of the tails white.

Underside rufous orange, darker towards the outer margin of the anterior wing. Posterior wing with two black spots near the anal angle, with above them a broken line of brown: the outer margin near the tails dark brown: the fringe white.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of Dr. Boisduval, from Java.

The only example of this species which I have seen has been (with his usual kindness) sent

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me by Dr. Boisduval to figure. It has unfortunately lost the anal tail on both sides, so that I cannot vouch for the accuracy of my figure. It seems most nearly to resemble M. Marciana.

## 41. Myrina Donina, Hewitson. Plate XVII. 2 figs. 61, 62.

UPPERSIDE. Female.—Dark brown, paler towards the base of both wings. Posterior wing crossed beyond the middle by two bands of white spots: the fringe rufous white.

Underside glossy white. Both wings crossed beyond the middle by two indistinct pale rufous bands: a small black spot at an unusual distance from the base of the tail: the outer margin rufous.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of W. C. Hewitson, from Burmah.

This is a species of peculiar interest, and unlike anything we have yet seen. I place it here with some doubt. In its form and the colouring of the underside it resembles *Anops*.

# 42. Myrina Ceres. Plate XVII. of fig. 63.

Thecla Ceres, Boisdwal, MS.

UPPERSIDE. Male.—Lilac-blue. Anterior wing with the apex and outer margin broadly dark brown. Posterior wing with the apex rufous brown: two slender tails: a small black spot at the base of the outer tail: the apical spot gold and carmine bordered below with pale blue, on the left side with black.

Underside. Grey-white, clouded near the base of both wings with pale rufous brown: both with a linear band at the end of the cell. Anterior wing with a lunular spot within the cell, a linear zigzag band a little beyond the middle (bordered inwardly with rufous brown,) a submarginal indistinct linear band, and the outer margin all carmine. Posterior wing crossed near the base by a curved broken band of five lunular spots, and at the middle by a very angular, linear, broken band, all carmine: a submarginal band indistinct and carmine from the costal margin to the middle, black above the anal spots: the spots black bordered above with orange, below with pale blue: the outer margin carmine: the apex pale rufous brown.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of Dr. Boisduval, from Amazoulou.

I can find no place for this species which seems to me so appropriate as that in which it is placed. It is without the third branch of the subcostal nervure of *Iolaus*, but has the tuft of hair between the wings which separates it from *Hypolycæna*. It has, however, very little likeness to any species of *Myrina*, except in the prolonged form of the posterior wing, in which it resembles *M. Hypoleuca*.

[I have thought it best to add here two corrections to the former part of this work. For Myrina Thymbræus, page 28, Horsfield's name of Jalindra, having the priority, must be adopted; and Myrina Syrinx of Felder (p. 34) must give place to M. Onyx of Doubleday, this species having been previously described by Horsfield and Moore. The two species must therefore stand thus:—

# Myrina Jalindra.

Amblypodia Jalindra, Horsfield (1829). Sithon Thymbræus, Hübner, Zutr. f. 671, 672 (1832).

# Myrina Onyx.

Myrina Onyx, Horefield & Moore (1857). Myrina Syrinx, Felder (1860).]

# Genus IOLAUS.

IOLAUS, Hübner.

I hope and trust that *Iolaus*, as I have grouped it here, comprehending as it does part of *Amblypodia* and part of *Iolaus* of Doubleday and Westwood, will be considered a good genus. I have taken *P. Eurisus* of Cramer as the type. The palpi have the second joint very long, the third joint (long in the females) projecting outwards, as shown in Plate XX. The subcostal nervure has a third branch. The males of most of the species are remarkable for a tuft of long hair, varying in colour, which projects inwards from, and at a right angle with, the inner margin on the underside of the anterior wing. Some have the margin projecting outwards as in *Euplæa*, all met by a polished surface on the posterior wing. I have never seen *I. Ismenias* of Klug and Ehrenberg, but have little doubt that it has its true position here. I do not know *I. Cippus* of Godart.

#### Males with a tuft of hair where the wings meet.

#### 1. Iolaus Eurisus.

Papilio Eurisus, Cramer, pl. 221. f. D, E. Hesperia Helius, Fabricius, Mant. Ins. ii. p. 65. Iolaus Helius, Westwood, Gen. Diurn. Lep. p. 481.

In the Collections of the British Museum and W. W. Saunders, from West Africa.



#### 2. Iolaus Silas.

- Q. Iolaus Silas, Westwood in Doubleday and Hewitson's Gen. Diurn Lep. pl. 74. f. 5.
- J. Thecla Nega, Herrich-Schäffer, Samml. Exot. Schm. f. 51, 52.

In the Collection of W. C. Hewitson, from Natal.

#### 3. Iolaus Ismenias.

Lycæna Ismenias, Klug & Ehrenberg, Symb. Phys. pl. 40. f. 1, 2. Iolaus Ismenias, Westwood in Doubleday & Hewitson's Gen. Diurn. Lep. p. 481.

# 4. Iolaus Sidus. Plate XX. Q fig. 25.

Iolaus Sidus, Trimen, Trans. Ent. Soc. Lond. 3rd ser. vol. ii. p. 176.

UPPERSIDE. Male.—Bright pale blue, with two crimson spots near the anal angle.

Underside white. Anterior wing with the costal and outer margins orange, crossed beyond the middle by a band of carmine: a black spot near the anal angle. Posterior wing crossed obliquely by two carmine bands: the first, near the middle, is broken and changes to black when it makes the angular bend towards the inner margin: the second, beyond the middle, changes to orange above the tails: two black spots crowned with orange near the anal angle: the margin orange from the apex to the middle, black near the tails: the fringe white.

Female.—UPPERSIDE grey-blue from the base to the middle of both wings. Anterior wing with a large central spot of white: the apical half dark brown. Posterior wing with the costal margin rufous brown: two submarginal linear bands of dark brown, enclosing near the apex two spots of white: two black spots at the base of the tails crowned with orange: the spot at the anal angle carmine: a submarginal white line near the tails: the margin black, the fringe white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Natal.

I have not seen the male of this species.

## 5. Iolaus Bowkeri.

Iolaus Bowkeri, Trimen, Trans. Ent. Soc. Lond. 3rd ser. vol. ii. p. 176.

#### 6. Iolaus Calisto.

Anthene Calisto, Doubleday & Hewitson's Gen. Diurn. Lep. pl. 75. f. 6. Thecla Calisto, Westwood, Gen. Diurn. Lep. p. 487.

Underside. Male.—White. Both wings crossed beyond the middle by a linear, indis-



tinct, broken band of brown. Anterior wing with the costal and outer margin rufous. Posterior wing with a large carmine spot near the tail, marked at its lower border with black: a black spot at the anal angle crowned with carmine irrorated with pale blue: a short submarginal black line near the tail: the outer margin black, the fringe white.

In the Collection of the British Museum, from Sierra Leone.

# 7. Iolaus Iasis, Hewitson. PLATE XIX. & figs. 11, 12.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the inner margin projecting as in Euplæa, and clothed below with patches of long hair: the apical half dark brown. Posterior wing with a polished surface where the wings meet, the apex brown: the outer margins black.

Underside white. Both wings crossed by an indistinct linear band of brown, broken on the posterior wing: the caudal and anal spots orange slightly irrorated with blue.

Exp. 14 inch.

In the Hope Collection of the University Museum at Oxford.

The several species which I am describing have the inner margin of the anterior wing clothed with long hair, remarkable especially in this species. This hair is in two separate patches of black and rufous, and is one-fifth of an inch long.

# 8. Iolaus Deva. Plate XVIII. figs. & 4, 5, 2 3.

Amblypodia Deva, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 46.

In the Collections of the British and East India Museums, from India (Canara).

#### 9. Iolaus Anysis, Hewitson. Plate XIX. of figs. 17, 18.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the inner margin projecting, rounded: the apical half dark brown. Posterior wing polished where it meets the upper wing: a spot at the anal angle, and outer margin, black.

Underside grey. Both wings crossed near the middle by a band of white, and beyond the middle by a black line. Anterior wing with a spot of brown near the anal angle. Posterior wing with some obscure brown spots bordered with white near the outer margin: a black spot near the tail crowned with orange, a black spot at the anal angle: the space between the spots dark brown irrorated with white.

Exp.  $1\frac{13}{20}$  inch.

In the Collection of W. C. Hewitson, from Macassar.

In this species the tuft of hair is black.



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# 10. Iolaus Vidura.

Amblypodia Vidura, Horsfield, Cat. Lop. E. I. C. Mus. pl. 1. f. 6, p. 113. Horsfield & Moore, p. 45. Westwood in Gen. Diurn. Lep. p. 478.

Male with the tuft of hair at the meeting of the wings white.

Female like the male, except that it is of a paler blue.

Var. Female with the margins of the anterior wing broader and paler: a white spot at the end of the cell: posterior wing rufous brown, the centre only blue.

In the Collection of W. C. Hewitson, from Silhet and Sumatra.

Examples of this species from Silhet have the anal angle of the posterior wing longer than those brought by Mr. Wallace from Sumatra.

## 11. Iolaus Cotys, Hewitson. Plate XIX. of figs. 19, 20.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal and outer margins and apex broadly dark brown, the tuft of hair where the wings meet dark brown: posterior wing with the apex rufous brown.

Underside rufous grey. Both wings crossed at the middle by a broad band of white: beyond the middle by a line of dark brown, and by a submarginal obscure rufous band: the two black spots near the anal angle crowned with orange: the space between the said spots brown irrorated with white.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of the British Museum, from Nepal.

This species, though closely allied to *I. Vidura*, differs from it in many respects. It has, though a male, all the appearance of a female in colour, and is without the tust of white hair on the upperside of the anterior wing. On the underside it has the white band much broader.

#### 12. Iolaus Cleobis. Plate XVIII. figs. ♂ 8, 9, ♀ 10.

Polyommatus Cleobis, Godart, Enc. Méth. p. 634.

Amblypodia Cleobis, Westwood in Gen. Diurn. Lep. p. 478.

Amblypodia Hypatida, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 45.

Var. Male with the spots near the anal angle on the underside of the posterior wing entirely orange, without the black spots.

In the Collection of W. C. Hewitson, from Northern India.

## 13. Iolaus Ister, Hewitson. Plate XIX. 2 figs. 15, 16.

UPPERSIDE. Female.—Cerulean blue. Anterior wing with the apical half dark brown. Posterior wing with the apex pale rufous brown.



Underside rufous or grey-brown, crossed beyond the middle by a linear band of rufous brown bordered outwardly with grey-white. Posterior wing with the apical spots broadly bordered above with orange, the space between them white irrorated with black, and slightly crowned with orange.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of the British Museum, from India.

This, though a female, has all the characters of a male. It is closely allied to *I. Cleobis*, but differs in colour from both sexes of that species. It resembles the male of *I. Cleobis* in the position of the band of the underside, less circular than that of the female. Its wings are not so broad as are those of the female, and it is without the black spots near the anal angle of the posterior wing.

# 14. Iolaus Icetas, Hewitson. Plate XVIII. & figs. 6, 7.

UPPERSIDE. Male.—Brilliant ultramarine blue. Anterior wing with more than the outer half dark brown: the tuft of hair at the meeting of the wings black. Posterior wing with the costal and outer margins brown.

UNDERSIDE grey, paler towards the outer margins. Both wings crossed beyond the middle by a linear band of brown (apart where the wings meet) and by an indistinct submarginal band of rufous brown: the outer margin rufous. Posterior wing with the two black spots near the anal angle crowned with orange.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. C. Hewitson, from India.

Nearly allied to *I. Longinus*, but easily distinguished from it by having the tuft of hair where the wings meet.

#### Males without a tuft of hair where the wings meet.

## 15. Iolaus Isseus, Hewitson. Plate XIX. & figs. 13, 14.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal and outer margins and apex broadly brown. Posterior wing with the apex brown.

Underside rufous grey. Both wings crossed a little beyond the middle by a continuous common linear band of brown: both with an indistinct submarginal brown band. Posterior wing with a large space of orange at the apex, marked with the two black spots, the anal spot bordered inwardly with silvery blue: the space between them brown irrorated with white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Sumatra and Sarawak.

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## 16. Iolaus Iapyx, Hewitson. Plate XVIII. of figs. 1, 2.

UPPERSIDE. Male.—Dark brown. Anterior wing with a triangular spot of ultramarine blue at the base. Posterior wing with the anal half blue: the black spot at the anal angle bordered above with orange, below with pale blue.

Underside grey-white; white near the outer margin of the posterior wing. Both wings crossed near the middle by a continuous linear band of dark brown (forming a regular segment of a circle) and by a pale submarginal rufous band: the outer margin of the anterior wing rufous, of the posterior wing black. Posterior wing with the black spot at the base of the tails broadly bordered with orange: the anal spot with silver: some conical white spots on the margin marked with brown.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of W. C. Hewitson, from Celebes.

This species is nearly allied to *I. Longinus*, from which it differs in the position of the linear band of the underside of the posterior wing. In this species the said band is much further from the outer margin, and is much more regularly curved, forming a complete segment of a circle. It is also nearly allied to *I. Mantra*, but is of a different colour on the underside, and is without the beautiful silvery blue which adorns the anal angle of that species.

#### 17. Iolaus Diaeus, Hewitson. Plate XX. figs. 3 27, 28, 2 26.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the apical half dark brown. Posterior wing with the apex rufous.

Underside grey. Both wings crossed beyond the middle by a linear rufous band, and an indistinct very pale submarginal band of the same colour. Posterior wing with the two black spots crowned with orange near the anal angle.

Female like the male, except that it is of a paler hue, that the anterior wing has its centre white and a small black spot at the end of the cell, and that the posterior wing has a submarginal band of brown spots.

Exp. 11 inch.

In the Collection of the East India Museum, from Northern India.

## 18. Iolaus Longinus.

Hesperia Longinus, Fabricius, Ent. Syst. v. p. 430.

Polyommatus Longinus, Godart, Enc. Méth. p. 634. Lucas, Lép. Exot. pl. 44. f. 3.

Bithys Longinus, Hübner, Zutr. f. 933, 934.

Amblypodia Longinus, Horsfield, Cat. Lep. E. I. C. Mus. pl. 1. f. 7, p. 110. Westwood in Gen. Diurn. Lep. p. 478. Horsfield & Moore, Cat. Lep. p. 45.

Amblypodia Pseudolonginus, Doubleday, Brit. Mus. List. Westwood, Gen. Diurn. Lep. p. 478. Horsfield & Moore, Cat. Lep. p. 45.

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UPPERSIDE. Female.—Grey-blue. Anterior wing nearly white towards the centre: the costal and outer margins and apex brown. Posterior wing with the costal margins rufous-brown, crossed beyond the middle by a zigzag band of dark brown: a submarginal band of brown: two spots at the base of the tails and the apical spot black.

I must confess myself quite unable to understand why *I. Pseudolonginus* was separated from this species. It is true that the linear bands on the underside differ much in their intensity and are sometimes nearly absent in the males; but there is no other difference.

## 19. Iolaus Cippus.

Hesperia Cippus, Fabricius, Ent. Syst. v. sup. p. 429. Polyommatus Cippus, Godart, Enc. Méth. p. 634. Amblypodia Cippus, Westwood in Gen. Diurn. Lep. p. 478.

## 20. Iolaus Mantra. Plate XX. 2 fig. 24.

Pseudolycæna Mantra, Felder, Wien. Ent. Monats. iv. p. 396.

UPPERSIDE. Male and Female.—Cerulian blue, the apical half dark brown.

Var. Female.—Brown, paler on the posterior wing. Anterior wing with the base pale blue. Posterior wing all brown, with the two black spots near the anal angle, the space between them and their bases crowned with orange and irrorated with silvery blue: a submarginal line of white near the tails; the margin black, the fringe silvery white.

In the Collection of W. C. Hewitson, from Macassar.

# 21. Iolaus Cyrillus, Hewitson. Plate XX. figs. 3 22, 23, 2 21.

UPPERSIDE. Male.—Anterior wing dark brown, paler near the middle; the base pale blue. Posterior wing cerulean blue, with an apical black spot crowned with orange and irrorated with silver-green: the outer margin black: the fringe white.

Underside ochreous. Both wings crossed beyond the middle by a continuous band of white, broader on the posterior wing, bordered inwardly with brown. Posterior wing with the usual black spots: the spot at the base of the tail crowned with orange, the apical spot crowned with silver: a large space of white between and below the spots irrorated with black: a submarginal line near the tails and the fringe white: the margin black.

Female like the male, except that both wings are dark brown with the base only pale blue.

Exp. 2 inches.

In the Collections of W. C. Hewitson and W. W. Saunders, from Macassar.



## 22. Iolaus maculatus, Hewitson. Plate XXI. ♀ figs. 29, 30.

UPPERSIDE. Female.—Anterior wing dark brown, with a large central spot of white from the base to beyond the middle, with its base and a spot at its middle lilac. Posterior wing with the costal margin, a submarginal band of spots, a spot above these, and the outer margin dark brown: a submarginal line of white and some lilac spots.

UNDERSIDE white, with numerous black spots.

Exp.  $1\frac{8}{10}$  inch.

In the Collections of W. C. Hewitson and W. W. Saunders, from Silhet.

I have had difficulty in fixing the true position of this very unusually marked species. It bears a general resemblance to the female of *Hypolycena Phorbas*. It has, however, the long palpi of *Iolaus*, as well as the third branch from the subcostal nervure. Two examples only have, I believe, hitherto arrived in Europe.

# Genus CAMENA, Hewitson.

Head large; eyes smooth, the space between them prominent, thickly clothed alternately with black and white hair. Palpi smooth, very erect, long; the second joint compressed, rising above the head; the terminal joint of the male as long as the second. Antennæ of moderate length, with numerous short joints indicated by white on the underside. Body robust.

Anterior wing triangular; costal margin nearly straight; outer margin slightly curved outwards, shorter than the other margins; inner margin slightly projecting near the base, where it is clothed with a tuft of hair on its underside. Costal nervure extending to the middle of the margin; subcostal nervure with three branches, two before the end of the cell, the third at a distance from the apex; the discoidal cell half the length of the wing, closed by two disco-cellular nervules in a straight line,—the second three times as long as the first, joining the third branch of the median nervure a little beyond its base; the upper discoidal nervure leaves the subcostal before the end of the cell.

Posterior wing with two slender tails; the abdominal fold and anal angle clothed thickly with long hair; the costal nervure continued to the apex of the wing; the subcostal branched before the end of the cell; the cell short, closed obliquely by nervules of equal length joining the third branch of the median nervule a little beyond its base.

The species of this genus, though nearly allied to those of Deudoryx, differs from them in having its eyes smooth, its antennæ shorter, and in being without the distinct lobe of the posterior wing. It resembles nearly some of the species which compose the second section of the genus Myrina, but differs from them also in its smooth eyes, in

possessing a third subcostal nervule, and in the greater length of the terminal joint of the palpi. In colour, and in having the tuft of hair between the wings, it appears to come near Iolaus, but has very different palpi.

# Camena Ctesia, Hewitson. Plate XX. of figs. 1, 2.

UPPERSIDE. Male.—Brilliant ultramarine blue marked by a triangular dark brown spot: all the margins broadly dark brown. Posterior wing with the apex dark brown: an apical brown spot irrorated with white.

Underside glossy grey. Both wings with a brown spot at the end of the cell, each crossed beyond the middle by a band of dark brown spots bordered with white: each with a band of brown (scarcely visible on the anterior wing) near the outer margin. Posterior wing with a submarginal band of brown spots, the two apical spots crowned with orange.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of W. C. Hewitson and F. Moore, from Northern India.

# Genus HYPOLYCÆNA.

#### HYPOLYCENA, Felder.

I had set apart the insects which are now included in Hypolycæna as the representatives of a new genus before I had the pleasure of knowing that Dr. Felder had thus proposed to unite those which form the eastern portion of the present genus. I have adopted his genus, but have made it more comprehensive, and, I hope, not less compact, by adding the African species which have been included in Iolaus, H. Amasa with its long tails forming the connecting link of the two groups. The palpi of both sexes are nearly alike and very erect, the second joint compressed, the terminal joint of some of the females very long and like a fine needle. They are without the third branch from the subcostal nervure, and thus show their relationship to some of the species of Myrina and the true Theclas. They are without the tuft of hair between the wings. H. Cæculus, though in appearance more like Iolaus, has the palpi of this genus, and has not the third subcostal branch.

I do not know H. Freja of Fabricius, and therefore place it here with doubt.



# 1. Hypolycæna Erylus. Plate XXI. figs. ♂ 1, ♀ 2, 4.

Polyommatus Erylus, Godart, Enc. Méth. p. 633.

Amblypodia Erylus, Horsfield, Cat. Lep. E. I. C. Mus. p. 111.

Myrina Erylus, Westwood in Gen. Diurn. Lep. p. 476. Horsfield & Moore, Cat. Lep. E. I. C. p. 50.

In the Collection of W. C. Hewitson, from Celebes and Macassar.

Var. Female of smaller size: the anterior wing paler, crossed at the middle by a transverse band of dark brown followed by a similar band of obscure white spots: the posterior wing with a submarginal band of three white spots.

In the Collection of W. C. Hewitson, from Waigiou, Malacca, Sarawak, Celebes, and Morty.

### 2. Hypolycena Tmolus. Plate XXI. figs. \$6, \$23.

Hypolycena Tmolus, Felder, Wien. Ent. Monats. vol. vi. p. 293, 1862.

In the Collection of W. C. Hewitson, from Luzon and Lizard Island.

I had thought that the insect from Luzon (figure 3 of the plate) described by Dr. Felder as a new species might be only a female variety of *H. Erylus*, until I received the example at figure 6, which I believe to be its male. The female does not differ from *Erylus* on the underside, and has the transverse band continuous, or nearly so, where the wings meet, whilst in figure 6 it is far apart.

#### 3. Hypolycena Phorbas. Plate XXI. figs. & 5, 8, 2 7.

Q. Hesperia Phorbas, Fabricius, Ent. Syst. iii. p. 277.

Papilio Phorbas, Donovan, Ins. of India, pl. 41. f. 5.

Dipsas Phorbas, Westwood, Gen. Diurn. Lep. p. 480.

In the Collection of W. C. Hewitson, from New Guinea, Waigiou, and Mysol.

Examples of this species differ greatly in size. A male from Mysol, from the Collection of Mr. Wallace, measures only an inch and two-tenths across the wings, whilst another male from Waigiou is an inch and seven-tenths. Some males are without the longitudinal ray of white on the anterior wing.

# 4. Hypolycena Thecloides. PLATE XXII. of figs. 9, 10.

Myrina Theoloides, Felder, Wien. Ent. Monats. vol. iv. p. 395.

In the Collection of W. C. Hewitson, from Singapore.

On the underside this species scarcely differs from H. Amasa. I have not seen its female.

# 5. Hypolycena Sipylus. Plate XXII. & figs. 11, 12, 13, 14.

Myrina Sipylus, Felder, Lep. Amboin. Sitz. Akad. Wiss. Wien, 1860. Hypolycæna Tharrytas, Boisduval, Felder, Wien. Ent. Monats. vol. vi. p. 294.

In the Collection of W. C. Hewitson, from Celebes, Amboyna, Luzon.

Female like the male, except that it is rufous-brown, and that the posterior wing has a broad band of white traversed by a band of brown at the middle of the outer margin.

Figures 13 and 14 of the plate represent *H. Sipylus* of Felder, from Amboyna; figures 11 and 12 his *H. Tharrytas*, from Luzon, which seems to me to be only a variety of the former, the only difference being that *H. Tharrytas* has a larger portion of pale blue on the upperside, and that the bands and spots of the underside are less distinctly marked.

# 6. Hypolycena Philippus. Plate XXII. of figs. 15, 16, var.

Q. Hesperia Philippus, Fabricius, Ent. Syst. iii. p. 283.

Papilio Philippus, Donovan, Insects of India, pl. 42. f. 3.

Thecla Philippus, Westwood, in Gen. Diurn. Lep. p. 483.

Aphnæus Certhis, Doubleday, British Museum List, p. 26.

Iolaus Orejus, Hopffer in Peters's Reise nach Mossambique, pl. 25. f. 10, 11.

In the Collection of the British Museum, from Sierra Leone.

Var. (figs. 15, 16) with the inner band on the underside of the posterior wing more broken into spots: the colour of the male more rufous.

In the Collection of W. C. Hewitson, from Natal.

The females of this species resemble on the upperside of the posterior wing several others of this group, and show, I think, that they are in their proper position. Some of the males are much more beautifully glossed with violet-blue than the figure of the plate.

# 7. Hypolycena Othona, Hewitson. Plate XXII. figs. 17, 18.

UPPERSIDE pale cerulean blue. Anterior wing with the apical half rufous-brown. Posterior wing with the apex brown.

Underside white. Both wings crossed beyond the middle by an irregular band of rufous spots commencing in a large spot at the costal margin of each wing: both with a submarginal rufous line. Anterior wing with the costal and outer margins rufous. Posterior wing with a black spot near its base, and two black spots near the anal angle each crowned with orange.

Exp. 1 inch.

In the Collection of the British Museum, from Northern India.

# 8. Hypolycæna Amasa, Hewitson.

Hypolycena Etolus. Plate XXII. of figs. 19, 20.

Papilio Etolus, Fabricius, Mant. Ins. ii. p. 66.

Polyommatus Etolus, Godart, Enc. Mét. p. 639.

Amblypodia Etolus, Horsfield, Cat. Lep. E. I. C. Mus. pl. 1. f. 9, p. 115.

Myrina Etolus, Westwood in Gen. Diurn. Lep. p. 476. Horsfield & Moore, p. 49.

In the Collection of W. C. Hewitson, from India.

It is necessary to change the name of this species, the name *Etokus* having been previously used by Cramer to designate a species of *Aphnœus*.

## 9. Hypolycæna Lebona, Hewitson.

Hypolyceena Antifaunus o, Hewitson. Plate XXIII. Q figs. 28, 29.

UPPERSIDE. Male.—Dark brown, glossed near the base with violet-blue. Posterior wing with the abdominal margin broadly white.

Underside white. Both wings crossed at the middle by a continuous common rufous band: both with a submarginal line of brown. Anterior wing with the apex and outer margin broadly grey-brown. Posterior wing with the caudal black spot crowned with orange: the anal spot bordered inwardly with scarlet.

Female does not differ from the male, except that it has a white spot near the anal angle.

Exp. 9 inch.

In the Collection of W. C. Hewitson, from Old Calabar.

#### 10. Hypolycena Antifaunus.

Iolaus Antifaunus, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 75. f. d. Westwood in Gen. Diurn. Lep. p. 481.

Underside white. Both wings crossed at the middle by a continuous common rufous band: a submarginal line and the outer margin dark brown: the black spot at the base of the tail black, bordered above with orange: the anal spot bordered on its inner side with scarlet irrorated with lilac.

In the Collection of W. C. Hewitson, from Old Calabar.

### 11. Hypolycæna Hatita, Hewitson. PLATE XXIII. figs. of 21, 23, 24, ♀ 22.

UPPERSIDE. Male.—Dark brown. Posterior wing glossed with violet-blue: the margin of the abdominal fold clothed with white hair: the outer margin and centre of the tails black: a submarginal line at the base of the tails, and the fringe of the margin and tails, white.

Underside white. Both wings with an indistinct line at the end of the cell, a transverse rufous band (bordered on both sides with brown), a linear band of brown beyond the middle, and a submarginal band of indistinct brown spots. Anterior wing with the apex, the costal and



outer margins, and the fringe brown. Posterior wing with the caudal black spot partly bordered with orange: the apical spot with blue: the outer margin black, the fringe white.

Female like the male, except that it is rufous-brown above, and that the posterior wing has the outer half darker brown crossed by two short bands of white.

Exp.  $\sigma 1_{10}^{4}$ ,  $\Omega 1_{10}^{5}$  inch.

In the Collection of the British Museum, from Ashanti and Sierra Leone.

# 12. Hypolycæna Faunus.

Papilio Faunus, Drury, ii. pl. 1. f. 4, 5. Cramer, pl. 39. f. B, c, 96 & F, G. Godart, Enc. Mét. p. 618. Hesperia Hesiodus, Fabricius, Ent. Syst. iii. p. 260.

Papilio Hesiodus, Palisot de Beauvais, pl. 7. f. 5, 6, 7.

Iolaus Faunus, Westwood in Gen. Diurn. Lep. p. 481.

In the Collection of W. C. Hewitson, from Old Calabar.

This is singularly different in form from the neighbouring species. I have not quoted the description of *H. Faunus* in the 'Mantissa Insectorum' of Fabricius, because he says "subtus strigis duabus fulvis."

# 13. Hypolycena Eleala, Hewitson. Plate XXIII. figs. & 25, 27, \$26.

UPPERSIDE. Male.—Brilliant ultramarine blue, the margins black, broadest at the apex of the anterior wing and costal margin of the posterior wing.

Underside white. Both wings crossed at the middle by a continuous common rufous band: both with an indistinct submarginal band of brown. Anterior wing with the apex and outer margin grey-brown. Posterior wing with a submarginal band of brown spots: the caudal and apical spots black, crowned with orange.

Female rufous-brown. Posterior wing with a broad anal band of white divided by dark brown nervules: the black spot at the angle crowned with orange. Underside like the male.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from Old Calabar.

#### 14. Hypolycæna Cæculus.

Iolaus Cœculus, Hopffer in Peters's Reisenach Mossambique, pl. 25. f. 12, 13, 14, p. 402.

UPPERSIDE. Male.—Ultramarine blue. Anterior wing with the apex and outer margin broadly dark brown. Posterior wing with the costal margin brown: two black spots at the base of the tails, the anal spot orange and white.

Underside grey-white. Both wings crossed by four rufous bands; the first near the base

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broken into spots on the posterior wing: the second at the end of the cell short: the third widely apart where the wings meet: the outer margin also rufous. Posterior wing with the two black spots near the anal angle bordered with orange above, with blue below.

Female like the male, except that it is of a pale dull cerulean blue, with the apex and margins broader and rufous-brown.

Exp.  $\sigma 1_{\frac{5}{20}}$ ,  $\Omega 1_{\frac{8}{20}}$  inch.

In the Collection of W. C. Hewitson, from the Zambesi.

The underside of the example of this species which I have from the Zambesi is darker than usual and of a rufous grey.

# 15. Hypolycæna Freja.

Hesperia Freja, Fabricius, Ent. Syst. iii. p. 263. Myrina Freja, Westwood in Gen. Diurn. Lep. p. 476.

I have never seen this species, and place it here in ignorance as to its true position.

# Genus IALMENUS.

#### IALMENUS, Hübner, Doubleday.

Ialmenus has no very characteristic traits to give it distinction as a genus. It will take in Chrysomallus and two other species for which it would be difficult to find a position so good. The eyes are smooth. The palpi are long (unusually long), in some of the males. In most of the species the second joint is smooth, or nearly so, but in I. Inous and I. Myrsilus it is clothed with hair. The antennæ have the joints short and very numerous. There are three branches from the subcostal nervure, and in the males of Chrysomallus and Ictinus a fourth branch.

# 1. Ialmenus Evagoras.

Papilio Evagoras, Donovan, Ins. of N. Holland, pl. 30. f. 1.

Myrina Evagoras, Godart, Enc. Meth. p. 593.

Ialmenus Evagoras, Hübner, Zuträge, f. 175, 176.

Thecla Evagoras, Boisduval, Voy. Astrolabe, p. 74. Westwood, Gen. Diurn. Lep. p. 487.

In the Collection of W. C. Hewitson, from Australia.

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# 2. Ialmenus Ictinus, Hewitson. Plate XXIV. figs. ♂ 7, 8, ♀ 6.

UPPERSIDE. Male.—Brown. Both wings with a large spot of silver-blue or green from the base to beyond the middle: the fringe white. Posterior wing with a submarginal line of white near the tail: the black spot at the base of the tail and the anal angle crowned with orange: a third black spot between them crowned with white.

Underside pale rufous. Both wings crossed beyond the middle by a band of black spots, and by two submarginal rufous bands: the outer margin black: the fringe white. Anterior wing with three black spots within the cell. Posterior wing with five spots before the middle and a line at the end of the cell black bordered with white: the black spots at the base of the tail and anal angle as above.

Female differs above in being much paler and in having more spots near the outer margin. On the underside in having all the spots and lines much larger, rufous, and more distinctly bordered with white, and in having the inner submarginal band broken into spots.

Exp.  $\delta l_{\frac{11}{20}}^{\frac{11}{20}}, \ 2 l_{\frac{15}{20}}^{\frac{15}{20}}$  inch.

In the Collection of W. C. Hewitson, from Australia.

# 3. Ialmenus Inous, Hewitson. Plate XXIV. of figs. 1, 2.

UPPERSIDE. Male.—Brown. Both wings with a large spot of silvery blue from the base to beyond the middle. Posterior wing dentated with a black spot near the outer margin.

Underside. Both wings crossed beyond the middle by a band of rufous spots, and by two submarginal rufous bands: the outer margin brown, the fringe white. Anterior wing with three spots in the cell and one below it. Posterior wing with several spots near the base and a band of white after the transverse band of spots: two black spots near the anal angle, each crowned with orange.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Swan River.

#### 4. Ialmenus Icilius, Hewitson. Plate XXIV. fig. 3.

UPPERSIDE. Male.—Pale rufous brown. Both wings with a large spot of silvery blue from the base to beyond the middle. Posterior wing with a black spot near the anal angle.

Underside pale rufous. Both wings with a band of pale rufous spots beyond the middle: the outer margins brown, the fringe silvery white. Anterior wing with three pale rufous spots in the cell. Posterior wing with several pale rufous spots before the middle: two black spots, each bordered with white, near the anal angle.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of the Hope Museum at Oxford, and of W. C. Hewitson.

# 5. Ialmenus Chrysomallus. Plate XXIV. ♀ figs. 4, 5.

3. Zesius Chrysomallus, Hübner, Zutr. f. 301, 302. Chrysophanus Chrysomallus, Westwood in Gen. Diurn. Lep. p. 499. Dipsas Chrysomallus, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 33.

In the Collection of W. W. Saunders, from Ceylon.

# 6. Ialmenus Myrsilus.

Ialmenus Myrsilus, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 75. f. 3. Thecla Myrsilus, Westwood, Gen. Diurn. Lep. p. 487. Thecla Chlorinda, Hombron & Jacquinot, Voy. Pôle Sud, pl. 3. f. 15, 16.

In the Collection of W. C. Hewitson, from Van Diemens Land.

# 7. Ialmenus Batikeli.

Lyceena Batikeli, Boisduval, Faune Ent. Madagas. pl. 3. f. 5.

# 8. Ialmenus Antalus,

Sithon Antalus, Hopffer in Peters's Reisenach Mossambique, pl. 25. f. 7, 8, p. 400.

# Genus UTICA, Hewitson.

This genus at present contains one species only, an Australian butterfly more nearly allied to *Ialmenus* than any other genus, but differing from the species of that genus too much to be included in it with them.

Eyes small, densely covered with hair. Palpi long: the second joint very long, covered with hair outwardly: the terminal joint rather short, broadest at the middle. Antennæ with the club oblong, distinct. Subcostal nervure with three branches, the third branch having its base at a distance from the apex of the wing.

# Utica Onycha, Hewitson. PLATE XXIV. figs. 11, 12.

UPPERSIDE. Female.—Pale grey-blue, the margins broadly rufous-brown: the fringe alternately brown and white. Anterior wing with a black line at the end of the cell. Posterior wing with a submarginal band of grey-white lunules; one short hairy tail.

Underside grey. Both wings with a submarginal band of lunular brown spots: basal half of the anterior wing slightly rufous. Anterior wing with a spot in the cell, an obscure spot below it, a spot at the end of the cell, two small spots near the costal margin, and a broad transverse band beyond the middle, all grey-brown bordered on both sides with white. Posterior wing with several spots near the base, a spot at the end of the cell, and a transverse band at the middle broken into spots toward the inner margin: the brown spot near the tail bordered with dull rufous orange.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Australia.

In the disposition of the bands and spots of the underside this species resembles Amblypodia.

# Genus ILERDA.

### ILERDA, Doubleday.

I am glad to adopt this and the genus *Ialmenus*, which were proposed by Mr. E. Doubleday, if only to relieve the genus *Thecla* of intruders which do not well accord with its numerous South American species.

*Rerda* has the palpi erect, covered with hair, the terminal joint long and smooth: the antennæ composed of long and few joints: the subcostal nervure with three branches. It is nearly allied to *Chrysophanus*, *Ilerda Sena* and *C. Pavana* forming the connecting links.

Colour, which in some genera seems to be of little worth in the discrimination of species, must be considered the chief guide in this—and, unless we can believe that these things can be speak a new dress in each generation, varying from a dull pale blue to the metallic sheen of a *Morpho*, a brilliant glittering green, and a lustre which in *I. Brahma* rivals *Chrysophanus ignitus*, a very good one.

#### 1. Ilerda Tamu.

3. Polyommatus Tamu, Kollar in Hügel's Kaschmir, pl. 5. f. 7, 8, p. 417.

Thecla Tamu, Westwood in Gen. Diurn. Lep.

Herda Tamu, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 28.

Var. Ilerda Androcles, Doubleday & Hewitson's Gen. Diurn. Lep. pl. 75. f. 2, p. 487.

UPPERSIDE. Female dark brown. Anterior wing with a narrow band of orange at a distance from the apex. Posterior wing with a narrow lunular submarginal band of orange, and under each lunule a line of pale blue.

UNDERSIDE like the male.

In the Collection of W. C. Hewitson, from India.

## 2. Ilerda Brahma.

Rerda Brahma, Horsfield & Moore, Cat. Lep. E. I. C. Mus. pl. 1a. f. 4, p. 29.

In the Collection of W. C. Hewitson, from Northern India.

## 3. Ilerda Oda, Hewitson. Plate XXIV. of figs. 9, 10.

UPPERSIDE. Male.—Lilac-blue without metallic lustre. Both wings broadly bordered with dark brown. Posterior wing with two lunular black spots crowned with orange at the anal angle.

Underside ochreous-yellow. Anterior wing with a spot at the end of the cell, and a transverse band beyond the middle brown: a submarginal band of pale brown: a black spot bordered with white at the anal angle. Posterior wing with the outer margin broadly scarlet irrorated with white and bordered above and below by lunular spots of black and white.

Female.—Dark brown. Anterior wing with a broad band of orange near the apex. Posterior wing with a broad submarginal band of orange. Underside like the male. Exp.  $1\frac{5}{20}$  inch.

In the Collections of W. C. Hewitson, W. W. Saunders, and Frederick Moore, from India.

This species seems to be distinct from the two preceding, and, besides its different colour, has the orange band at the outer margin on the underside of the posterior wing much broader, as in *I. Epicles*.

## 4. Ilerda Epicles.

Polyommatus Epicles, Godart, Enc. Méth. p. 646.

Thecla Epicles, Horsfield, Cat. Lep. E. I. C. Mus. p. 92. Westwood in Gen. Diurn. Lep. p. 487.

Q. Heliophorus Belenus, Hübner, Zutr. f. 785, 786.

Ilerda Epicles, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 29.

UPPERSIDE. Male.—Dark brown. Anterior wing with the basal half glossed with violetblue. Posterior wing with a broad submarginal band of conical scarlet spots.

In the Collection of W. C. Hewitson, from Sylhet and Java.

There is a variety of this species from Northern India in which the males are without the orange submarginal band of the anterior wing, and the females, instead of the large central orange spot of the anterior wing, have an oblique band of the same colour.

#### 5. Ilerda Moorei, Hewitson.

UPPERSIDE. Male.—Brilliant metallic blue. Anterior wing with the apical half dark brown, the costal margin rufous-brown. Posterior wing with the margins broadly rufous-brown: the anal angle with two or more scarlet lunules, the two only at the base of the tail distinct, the inner one marked below by a line of blue.

Underside orange-yellow, the outer margins rufous, the fringe white. Anterior wing with a spot of brown bordered with white near the anal angle. Posterior wing with the outer

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margin broadly scarlet irrorated throughout with white, marked by indistinct lunules of brown and a submarginal line of white.

Exp.  $1\frac{7}{20}$  inch.

In the Collections of the British Museum and F. Moore, from Bhotan.

The kindness of Mr. Frederick Moore, who has very recently received a fine series of these beautiful things from Sikkim, has enabled me to make the summary of this genus much more complete than it would otherwise have been. I regret, however, very much that these materials did not arrive in time to allow me to illustrate them with figures. I have pleasure in naming a new species after a friend and an ardent naturalist.

#### 6. Ilerda Sena.

Polyommatus Sena, Kollar in Hügel's Kaschmir, pl. 5. f. 3, 4, p. 415. Thecla Sena, Westwood in Gen. Diurn. Lep. Ilerda Sena, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 28.

In the Collection of W. C. Hewitson, from India.

# Genus CAPYS, Hewitson.

#### ZERITIS, Westwood.

The single species, the only representative of this genus at present known, has characters which place it widely apart from the African group with which it has hitherto been associated. It is very nearly allied to the genus *Deudorix*, from which it differs in being without the tail and lobe of the posterior wing.

Head large. Eyes large, densely clothed with hair. Palpi smooth, compressed, projecting outwards (not embracing the head), the terminal joint rather long. Antennæ long, distinctly clubbed, the club long. Body robust, covered with long hair. Subcostal nervure with three branches, the third branch having its base at a distance from the apex.

#### Capys Alphæus.

Papilio Alphæus, Cramer, pl. 182 E, F. Fabricius, Ent. Syst. iii. p. 333. Mant. Ins. p. 86. Polyommatus Alphæus, Godart, Encl. Méth. p. 663.

Zeritis Alphæus, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 77. fig. 3. Westwood in Gen. Diurn. Lep. p. 500.



## Genus APHNÆUS.

APHNÆUS, Hübner, Horsfield & Moore.

Amblypodia, Westwood.

Spindasis, Wallengren.

Aphnœus contains a very natural group of butterflies, somewhat difficult to define, however, as it approaches the Cape species of Zeritis. The eyes are smooth. The palpi are erect, embracing the head, covered with scales, the terminal joint short. The antennæ are short, becoming gradually thicker towards the joint, the club nearly half their length. The subcostal nervure has three joints, except in Orcas, which has a fourth. I have adopted Horsfield's species, and, having done so, have found it necessary to make another, A. Ictis, having some of the characters of both. The short bands of the anterior wing, the third and fourth from the base, are uncertain in their position and their length.

## With four branches from the subcostal nervure.

## 1. Aphnæus Orcas.

- d. Papilio Orcas, Drury, vol. iii. pl. 34. f. 2, 3. Polyommatus Orcas, Godart, Encl. Méth. p. 645.
- d. Hesperia Pindarus, Fabricius, Ent. Syst. iii. p. 262. Donovan, Insects of India, pl. 38. f. 2.

Female. UPPERSIDE uniform dark brown. Anterior wing with a pale yellow spot at the end of the cell.

Underside rufous-yellow: the spots silver-white bordered by red-brown. In the Hope Collection of the University of Oxford, from Sierra Leone.

The only example of this very beautiful species which I have seen is in the Hope Museum at Oxford, and has been generously lent to me by Professor Westwood. I am sorry that I did not know of its existence in time to give it a place upon the plate, since it is a female, the males only having been figured by Drury and Donovan. It is from Sierra Leone, and I do not believe that this species is an inhabitant of the East at all. The insects in the British and East-India Museums, from India, which have been catalogued by Doubleday, by Horsfield and Moore, and referred to by Westwood in the 'Genera' as representatives of this species, *Pindarus* of Fabricius and Donovan, are all referable to *A. Lohita* of Horsfield, and do not differ from it.



#### With three branches from the subcostal nervure.

# 2. Aphnæus Etolus. Plate XXV. o figs. 3, 4.

Papilio Etolus, Cramer, pl. 208. f. E, F. (1782).

Papilio Vulcanus, Fabricius, Mant. Ins. ii. p. 66 (1787). Donovan, Insects of India, pl. 38. f. 3. Hübner, Samml. Ex. Schm.

Polyommatus Vulcanus, Godart, Enc. Méth. p. 644.

Amblypodia Vulcanus, Westwood in Gen. Diurn. Lep. p. 479.

Aphnæus Etolus, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 38.

In the Collection of W. C. Hewitson, from India and Ceylon.

The beautiful variety represented by figure 4 is from the Collection of Dr. Boisduval.

# 3. Aphnæus Syama. Plate XXV. of fig. 7.

Amblypodia Syama, Horsfield, Cat. Lep. E. I. C. Mus. p. 107. Westwood in Gen. Diurn. Lep. p. 478. Aphnæus Syama, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 38.

In the Collection of W. C. Hewitson, from the Philippine Islands.

## 4. Aphnæus Lohita. Plate XXV. figs. 10, 11.

Amblypodia Lohita, Horsfield, Cat. Lep. E. I. C. Mus. p. 106. Westwood in Gen. Diurn. Lep. p. 478. Aphneus Lohita, Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 38.

In the Collection of W. C. Hewitson, from India and Sumatra.

This is the species which in the Collections of the British Museum and East India Company has been named *Pindarus*, to which it has but little resemblance.

## 5. Aphnæus Ictis, Hewitson. Plate XXV. figs. 8, 9.

UPPERSIDE. Male.—Rufous-brown. Anterior wing with a large central orange space: a spot in the cell, an oblique transverse band in the middle, a single spot near the costal margin followed by a short band of two spots, and an oblique band (which borders the brown of the outer margin and forms a triangle with the central band) all dark brown. Posterior wing with the space between and above the black spots near the tails orange.

Underside orange-yellow, with the transverse bands rufous bordered narrowly with rufousbrown, traversed by spots and lines of gold: the submarginal band composed of minute brown spots.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from Northern India.

A variety of this species has the orange space on the upperside of the anterior wing much smaller than that of the figure, and in the form of a triangle.

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## 6. Aphnæus Natalensis. Plate XXV. figs. of 1, of 2.

Aphnæus Natalensis, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 75. f. 4.

Amblypodia Natalensis, Westwood in Gen. Diurn. Lep. p. 479. Hopffer in Peters's Reise nach Mossambique, p. 399.

Spindasis Masilikazi, Wallengren, Lep. Caffrorum in Acta Reg. Acad. Scient. Holm. N. S. t. xi. no. 4.

In the Collection of W. C. Hewitson, from Natal and Old Calabar.

# 7. Aphnæus Acamas.

Thecla Acamas, Klug & Ehrenberg, Symb. Phys. pl. 40. f. 7, 8, 9.

Zeritis Acamas, Westwood in Gen. Diurn. Lep. p. 501.

Polyommatus Epargyros, Eversmann, Bull. Soc. Imp. Mos. pt. ii. vol. xxvii. pl. 1. f. 1, 2 (1854).

Cigaritis Acamas, Stäudinger, Cat. Lep. Europ. p. 4.

# 8. Aphnæus Nilus, Hewitson.

UPPERSIDE. Female.—Banded and clouded with brown. Anterior wing with a spot in the cell, a transverse broad band of dark brown in the middle joined to and forming a triangle with a broad band which has its origin near the apex, and enclosing a triangular space of white marked by an irregular brown spot. Posterior wing crossed obliquely near the middle by two bands of brown, and transversely beyond the middle by a band of the same colour. Both wings with a submarginal band of brown.

Underside pale rufous-yellow. Both wings with the outer margin and a submarginal line of spots dark brown. Anterior wing with two spots within the cell, a band of three distinct spots at the end of the cell, three spots forming a triangle and a broad transverse band. Posterior wing with an oblique band of three separate spots near the base: a band of four spots (touching) before the middle, a short undivided band, a small brown spot on the costal margin, and a transverse band: two small black spots near the anal angle with orange between them.

All the bands and spots of both wings of the same colour as the rest of the wing, bordered with dark rufous-brown and sparingly decorated with gold.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. C. Hewitson, from the White Nile.

The spots and bands on the underside of this species are placed nearly as in A. Acamas; they are, however, more divided into spots, are of the same colour as the rest of the wing, and much less spotted with gold. Above it is much obscured with brown.

## 9. Aphnæus Iza, Hewitson. Plate XXV. & fig. 5.

UPPERSIDE. Male.—Brown with obscure spots of paler and darker colour.

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Underside orange-yellow, with bands and spots of rufous-brown profusely decorated with gold.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of the British Museum.

## 10. Aphnæus Ella, Hewitson. Plate XXV. fig. 6.

UPPERSIDE brown: the inner margin of the anterior wing and the centre of the posterior wing grey-blue. Anterior wing with five orange spots: two in the cell (that nearest the base obscure), one beyond the end of the cell, and two in a line parallel to the outer margin. Posterior wing with a linear band of grey near the outer margin.

Underside orange-yellow with bands and spots of grey bordered with dark brown.

Exp.  $1_{10}^{1}$  inch.

In the Collection of the British Museum, from Natal.

#### 11. Aphnæus Masinissa.

Cigaritis Masinissa, Lucas, Exp. Algérie, p. 364. Ann. Soc. Ent. France, 2nd ser. vol. viii. pl. 8. figs. 2a, 2b. p. 99 (1850).

From Algeria.

#### 12. Aphnæus Siphax.

Cigaritis Siphax, Lucas, Explor. Algérie, Lép. pl. 1. f. 8. Zeritis Siphax, Westwood in Gen. Diurn. Lep. p. 501.

From Algeria.

## 13. Aphnæus Cilissa.

Cigaritis Cilissa, Lederer, Wien. Ent. Monats. vol. v. pl. 4. f. 1 (1861).

In the Collection of W. C. Hewitson, from Antioch.

#### 14. Aphnæus Zohra.

Cigaritis Zohra, Donzel, Ann. Soc. Ent. France, pl. 8. figs. 5, 6, p. 528 (1847).

# Genus DIPSAS.

DIPSAS, Doubleday.
DIPSAS, part., Westwood.

As I have before stated, the genus Dipsas was intended by Mr. Doubleday to contain two species, D. Sila and D. Ataxus, too closely allied to T. Quercus and T. Betula to be separated from them. With these Mr. Westwood associated those species (of very different character) which now form the genus Deudorix. It was therefore necessary to reject the genus Dipsas as it stands in the 'Genera of Diurnal Lepidoptera.' I have now, however, found it advantageous to adopt it in its original form, and think that it will be found to be a very good genus, and will relieve Thecla of species which are not quite in accordance with it. Dipsas has a third branch from the subcostal nervure wanting in Thecla. It will be seen by comparison how intimately connected the Asiatic and European species are with each other. On the underside D. Sila and D. Quercus scarcely differ, and although the Japanese species seem a little aberrant, D. Lutea and D. Betulæ are also much alike below. The eyes are very small, hairy in some species, smooth in others. The palpi are rather long, the first joint embracing the head and covered with long hair, the terminal joint short, pointed outwards. The antennæ rather thick, many-jointed, the club long.

## 1. Dipsas Sila. Plate XXVI. ♀ fig. 3.

Thecla Sila, Kollar in Hügel's Kaschmir, pl. 4. figs. 7, 8, p. 414.

Q. Amblypodia Euphranor, Doubleday.

Dipsas Sila, Westwood in Doubleday and Hewitson's Gen. Diurn. Lep. p. 480. Horsfield & Moore, Cat. Lep. E. I. C. Mus. p. 30.

In the Collection of W. C. Hewitson, from Northern India.

This species varies considerably in size, in the breadth of the brown margin on the upperside, and in the colour and position of the bands of the underside.



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## 2. Dipeas Ataxus. Plate XXVI. o fig. 6.

Dipeas Ataxas, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 74. Horefield & Moore, Cat. Lep. E. I. C. Mus. p. 31.

In the Collection of W. C. Hewitson, from Northern India.

## 3. Dipeas Absolon. Plate XXX. figs. 11, 12.

Theela Absolon, Boisdweal, MS.

UPPERSIDE. Male.—Gold-green. Anterior wing with the apical half dark brown. Posterior wing with the margins brown.

Underside rufous-brown. Anterior wing with a large triangular space of orange on the inner margin: a pale linear rufous spot at the end of the cell: a transverse linear band of white beyond the middle bounded inwardly by rufous-brown, and a submarginal rufous band terminating beyond the middle in two dark brown spots. Posterior wing crossed obliquely at the middle by a linear band of white, taking the form of a V near the anal angle: crossed beyond the middle by a broad rufous band bordered on both sides with indistinct lunular white spots: the black spots near the base of the tail and at the anal angle bordered with orange: the margin white, the fringe rufous.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of Dr. Boisduval, from India.

This beautiful species, with the brilliant green of *D. Sila* and *D. Ataxus* on the upperside, has on the underside a near resemblance to *D. Betula*. It is from the Collection of Dr. Boisduval, and has, with his usual generosity, been entrusted to my keeping, with other species of great rarity, to enrich the illustrations of this work.

# 4. Dipeas Katura, Hewitson. PLATE XXVI. Q figs. 1, 2.

UPPERSIDE. Female.—Brown. Anterior wing pale blue from the base to the middle, followed by two small spots of orange. Posterior wing rufous-brown.

Underside. Anterior wing pale rufous-brown: an oblong spot at the end of the cell of darker brown, bordered on both sides with white: a broad white transverse band beyond the middle, also bordered with darker brown: a broad submarginal band of white traversed by an indistinct line of pale brown: the margin dark brown. Posterior wing white, with the base pale rufous-brown; crossed before the middle by a broad short band of dark brown, with below it a round spot, and near the abdominal margin a lunular spot of the same colour: a small brown spot between the lunular spot and the base of the wing; crossed beyond the middle by



a broad band of brown marked near the anal angle by lunular white spots: a black spot near the base of the tail, and also at the anal lobe, black bordered with orange: the outer margin and a submarginal band brown.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of the British Museum, from India.

## 5. Dipsas Ziha, Hewitson. Plate XXVI. ♀ figs. 4, 5.

UPPERSIDE. Grey-blue, the nervures black. Anterior wing with the outer half dark brown, marked with two white spots. Posterior wing with the outer margin broadly brown traversed by a line of white: the fringe white.

Underside white. Both wings with a spot at the end of the cell and a transverse band of brown beyond the middle, both with the outer margin and two submarginal bands of brown. Anterior wing with two large spots of brown near the anal angle. Posterior wing with a black spot near the base of the tail, also a black spot at the angle, both bordered with orange.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson (locality unknown).

## 6. Dipsas Odata. Plate XXX. figs. 13, 14.

UPPERSIDE. Male.—With the basal half of both wings violet-blue, the outer half dark brown, paler on the posterior wing: the fringe white.

Underside grey-white. Anterior wing with a pale linear spot at the end of the cell: two small dark brown spots near the middle of the inner margin: a transverse rufous band beyond the middle bordered on both sides with white: and a submarginal band of pale brown terminating near the anal angle in two large black spots. Posterior wing with a spot at the end of the cell; a central transverse rufous band and a submarginal brown band both bordered with white: two lunular orange spots near the base of the tail bordered above and below with black: the outer margin brown.

Female does not differ from the male except that the whole of the posterior wing is rufous-brown.

Exp.  $1\frac{4}{10}$  inch.

In the Collections of W. C. Hewitson and F. Moore, from India (Kunawar).

#### Dipsas Quercus.

Thecla Quercus, Auctorum.

#### 8. Dipsas micans.

Thecla micans, Ménétriés, Cat. Mus. Imp. Acad. Scient. Petropol. pl. 4. f. 3.



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# 9. Dipeas Betule.

Theola Betulæ, Auctorum,

## 10. Dipeas Grunus.

Thecla Grunus, Boisduval, Lépidoptères de la Californie, p. 17.

## 11. Dipeas lutea, Hewitson. PLATE XXVI. figs. 9, 10.

UPPERSIDE. Female.—Orange. Anterior wing with the outer margins brown. Posterior wing with the tail, the outer margin near it, and a spot at the anal angle dark brown.

Underside orange. Anterior wing crossed by two rufous bands bordered with white: a spot of brown near the anal angle. Posterior wing pale rufous-brown crossed by two lines of silvery white: a broad submarginal band of orange bordered inwardly by lunular white spots margined with black, and outwardly by a line of small black spots: a black spot near the base of the tail, and also at the anal angle: the outer margin brown, the fringe white.

Exp.  $1\frac{15}{90}$  inch.

In the Collection of W. C. Hewitson, from Japan.

## 12. Dipeas supestriata, Hewitson. Plate XXVI. figs. 7, 8.

UPPERSIDE. Male.—Orange-yellow (the bands of the underside indistinctly seen through): the outer margins dark brown, narrow: a black spot (marked with a spot of white) at the anal angle.

Underside orange-yellow. Both wings crossed transversely by numerous bands and spots of brown. Posterior wing orange at the base of the tail, marked with two black spots.

Female differs from the male in having the apex of the anterior wing broadly brown; two black spots near the base of the tail; and the outer margin of the posterior wing broader, traversed near the tail by a line of white.

Exp. 1 10 inch.

In the Collection of W. C. Hewitson, from Japan.

# Genus TRICHONIS, Hewitson.

Head rather large; eyes smooth. Palpi short, smooth, slender, embracing the head: the terminal joint short, pointing outwards (of the same length in both sexes). Antennæ rather short, many-jointed, the club long.

Anterior wing with the costal margin rounded near the base; outer margin slightly curved outwards, at a right angle with the costal margin; inner margin curved outwards as in Euplea, and covering a polished surface on the posterior wing. Costal nervure extending to a little beyond the middle of the margin; subcostal nervure at a distance from the margin, with two branches, both before the end of the cell; discoidal cell half the length of the wing, closed obliquely by the disco-cellular nervures, the first short, the second twice as long, the third twice as long as the second, joining the third branch of the median nervure a little beyond its base.

Posterior wing very round, especially in the female, its costal margin projected outwards near its base; the discoidal cell short.

Fore legs of the male of very unusual form, the tibiæ and tarsi of equal length, smooth; the tarsi exarticulate, robust, and broad beyond the middle. Fore legs of female of the usual form, jointed and spined.

#### Trichonis Theanus. Plate XXIX. figs. of 1, 3, 22.

Papilio Theanus, Cramer, pl. 139. f. E. Aricoris Theanus, Westwood, Gen. Diurn. Lep. p. 450.

In the Collection of W. C. Westwood, from Cayenne.

To the kindness of Dr. Boisduval and Dr. Kaden of Dresden I am indebted for the pleasure of figuring this rare and extraordinary insect. Any one judging from appearance only, would reverse the sexes and consider figure 2 as the male, or believe them to be both of that sex, since each of them have the polished surface where the wings meet, peculiar to the males only of other genera.

# Genus THEOREMA, Hewitson.

Theorema seems to stand between Eumæus and Thecla. In form the eye detects in it, with its rounded inner margin, considerable likeness to Callithea Leprieurii.

Head of moderate size; eyes very slightly hairy. Palpi long; the second joint squamose, round, not embracing the head; the terminal joint long, pointing outwards. Antenne slender (much more so than in Eumeus) with few joints, the club long and slender.

Anterior wing with the margins of nearly equal length, all rounded outwardly. Costal nervure two-thirds the length of the wing; subcostal nervure with two branches.

Posterior wing round, with one short tail; the discoidal cell half the length of the wing. Fore legs robust like those of Eumaus.

# Theorema Eumenia, Hewitson. Plate XXVII. & figs. 1, 2.

UPPERSIDE. Male.—Ultramarine blue, greenish towards the outer margin of the anterior wing, more distinctly green on the margin of the posterior wing: the fringe white, broader on the posterior wing. Anterior wing with the apex and outer margin dark brown.

Underside black. Anterior wing with the inner half ultramarine blue, the outer margin broadly irrorated with white. Posterior wing with, beyond the middle, three bands of green-white spots and a submarginal white line: the margin black.

Exp.  $2\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from New Granada.

This species, though resembling Eumeus most in the colouring of the underside, is more nearly related to Thecla than to it.

# Genus THECLA.

Thecla, Auctorum.
Pseudolyczna, Wallengren.

Mr. Westwood has expressed his difficulty in giving a definition to this genus. I have made it somewhat easier by removing from it all those species having a third branch from the subcostal nervure, leaving it to those species only which, with few exceptions, are either American or European and have only two branches from the



said nervure. Thus curtailed, the genus *Thecla* will contain a large number of species of great diversity of form and colour. The species with which I have commenced the genus, amongst them some of the most glorious things in creation, have the anal angle slit into two parts, the terminal joint of the palpi of the males very short, of the females very long. I may not have placed this genus in the best position with regard to the neighbouring genera, but I have been anxious to commence it, having had by me for a long time all the new species from the collections of Mr. Bates and of Mr. W. W. Saunders, whose kindness, together with the stores of the British Museum, will enable me to figure in my next Part upwards of one hundred new species.

## 1. Thecla coronata, Hewitson. Plate XXVII. figs. & 3, 5, 2 4.

UPPERSIDE. Male.—Glossy metallic blue, tinted with green near the base, the outer margins brown. Anterior wing with the base of the costal margin clothed with hair. Posterior wing bicaudate: the anal angle broadly black, and marked with two spots of pale blue.

Underside brilliant glossy green irrorated with black. Both wings crossed near the middle by a band of red-brown, bordered inwardly with lilac. Posterior wing with the band bipartite near the abdominal margin, followed by a broad band of carmine, with its outer half irrorated with white and marked (touching the black band) by a small blue spot: the outer margin and anal spot black, bordered inwardly near the tails by silvery blue.

Female glossy blue, tinted with green near the base of both wings. Anterior wing with the apex very circular: the apical half dark brown. Posterior wing with the apex and outer margin broadly brown: the anal angle broadly black, and marked by two large carmine spots. Underside like the male, except that the green of both wings is without the brilliant gloss, and that the apical half of the anterior wing is rufous-brown, very sparsely irrorated with green.

Exp. of  $2\frac{1}{2}$ ,  $2\frac{3}{10}$ .

In the Collections of the British Museum, from Bogota, and of Osbert Salvin, from Guatemala.

The male of this gorgeous species, which surpasses the *imperialis* and *regalis*, is born with a crown upon its head, the male having between its eyes a remarkable conical projection, highly gilded in front. Its palpi are longer than those of *T. regalis*.

#### 2. Thecla regalis.

Papilio regalis, Cramer, pl. 72. figs. E, F (1779).
Papilio Endymion, Fabricius, Mant. Ins. ii. p. 67 (1787).
Polyommatus Endymion, Godart, Enc. Méth. p. 622.



Endymion regalis, Swainson, Zool. Illust. 2nd ser. pl. 85. Thecla Endymion, Westwood in Gen. Diurn. Lep. p. 483.

In the Collection of W. C. Hewitson, from the Amazon and Rio Janeiro.

The males of this species differ much in size and shape. Some have the apex of the anterior wing much more pointed than others, the brown of the outer margin also differs in breadth.

## 3. Thecla imperialis.

Papilio imperialis, Cramer, pl. 76. figs. E, F (1779). Hesperia Venus, Fabricius, Mant. Ins. ii. p. 67 (1787). Polyommatus Venus, Godart, Enc. Méth. p. 623. Arcas imperialis, Swainson, Zool. Illust. 2nd ser. pl. 88. Thecla Venus, Westwood in Gen. Diurn. Lep. p. 483.

## 4. Thecla ducalis. Plate XXVIII. ♀ fig. 16.

Theela ducalis, Doubleday & Hewitson, Gen. Diurn. Lep. pl. 77. f.1. Westwood in Gen. Diurn. Lep. p. 483.

In the Collection of the British Museum, from Brazil.

# 5. Thecla Cypria.

Q. Theritas Cypria, Hübner, Zuträge, f. 945, 946. Theela Cypria, Westwood in Gen. Diurn. Lep. p. 483.

Hübner's figures of this species do not at all do justice to its great beauty. Nothing can exceed the brilliancy of the underside of the posterior wing. It is of a deep crimson irrorated throughout with golden green, gorgeous from the base to the central band; the inner border of the said band of the outer margin, as well as the fringe of the margin and of the tails, is bright silvery lilac.

In the Collection of Osbert Salvin, from Polochia Valley, Guatemala.

## 6. Theola Tuneta, Hewitson. Plate XXVIII. figs. 14, 15.

UPPERSIDE. Male.—Glossy green. Anterior wing with a spot at the end of the cell, the costal margin from its middle, the apex, and outer margin dark brown. Posterior wing with the outer margin and some spots at the base of the tails dark brown.

Underside bright green irrorated throughout with black: the outer margins and tails redbrown: the fringe silver-green. Anterior wing with the inner margin rufous. Posterior wing crossed at the middle by a band of red-brown, clouded below the middle.

Exp. 113 inch.

In the Collection of W. W. Saunders, from South America.

This very beautiful species stands in the Collection of Dr. Boisduval as T. Cypris of Hübner,

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from which, however, it is very distinct. The wings of *T. Cypria* are of much greater length; the underside of the posterior wing from the base to the transverse band is brilliant copper irrorated with black; the said band is also of very different form, of a regular curve throughout, and without any of the usual angles as it approaches the inner margin.

## 7. Thecla Ganymedes.

Papilio Ganymedes, Cramer, pl. 40. f. C, D. Fabricius, Mant. Ins. ii. p. 66. Polyommatus Ganymedes, Godart, Enc. Méth. p. 623. Thecla Ganymedes, Westwood, Gen. Diurn. Lep. p. 483.

#### 8. Thecla nobilis.

Q. Thecla nobilis, Herrich-Schäffer, Samml. Aussereurop. Schm. figs. 55, 56.

UPPERSIDE. Male.—Ultramarine blue, darkest towards the outer margins, tinted with green near the base. Outer margin narrow, dark brown.

In the Collections of W. C. Hewitson, from New Granada.

#### 9. Thecla Actson.

Hesperia Acteon, Fabricius, Ent. Syst. v. p. 829. Thecla Acteon, Westwood, Gen. Diurn. Lep. p. 483.

#### 10. Thecla Gabriela. Plate XXVII. of fig. 7.

d. Papilio Gabriela, Cramer, pl. 6. f. C, D. Polyommatus Gabrielis, Godart, Enc. Meth. p. 622.

2. Hesperia Gabrielis, Donovan's Nat. Repos. ii. pl. 44. f. 2.

In the Collection of W. C. Hewitson and H. W. Bates, from the Amazon.

In his description of this species Godart has fortunately referred to the large silky spot on the anterior wing of the upperside, blue in one light and scarcely visible, brown in another. Cramer's figure is, I have little doubt, intended for this species, although there is no indication of the silky spot; it appears to me that he has drawn the upperside from a male and the underside from a female. Examples differ considerably between the double angle of the transverse band on the underside of *T. Gabriela* and the single angle of *T. Batesii*.

# 11. Thecla Batesii, Hewitson. Plate XXVII. of fig. 6.

UPPERSIDE. Male.—As in Gabriela, but without the silky spot.

Underside brilliant green. Anterior wing with the lower half grey-blue: crossed beyond the middle by a band of brown bordered outwardly with white, and nearer the margin and

lower on the wing by an obscure band of pale brown. Posterior wing crossed beyond the middle by a broad brick-red band of equal breadth until it approaches the anal angle, slightly signag on its inner border and traversed by a line of white, and ending near the abdominal margin in a single V-like angle, the said band bordered outwardly by two obscure white lines.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

# 12. Thecla Tagyra, Hewitson. PLATE XXVIII. of figs. 20, 21.

UPPERSIDE. Male.—Dull cerulean blue. Anterior wing with the outer margin brown: a large central rufous spot at the base of and between the median nervules, composed of scales differently formed. Posterior wing with the costal margin and apex rufous, an indistinct submarginal line of brown: the margin dark brown: the fringe white: the anal angle brick-red, bordered on both sides with black.

Underside green-blue, paler towards the outer margin of the posterior wing. Anterior wing crossed beyond the middle by two bands of red-brown. Posterior wing crossed by four bands of dark red-brown: the anal spot brick-red.

Female like the male, except that it is of a duller blue with the outer margin of the anterior wing broadly rufous-brown.

Exp. 17 inch.

In the Collections of the British Museum and H. W. Bates, from the Amason.

## 13. Thecla Hyacinthus.

Papilio Hyacinthus, Cramer, pl. 36. f. E. Fabricius, Mant. Ins. ii. p. 67. Polyommatus Hyacinthus, Godart, Enc. Méth. p. 642.

#### 14. Thecla Telemus, Plate XXXI. figs. of 29, 9 30.

Papilio Telemus, Cramer, pl. 4. f. D, E. Fabricius, Mant. Ins. ii. p. 67. Polyommatus Telemus, Godart, Enc. Mtth. p. 641.

Cramer's figure of this species appears to have been made from an insect which had the outer margin cut off.

#### 15. Thecle Pholeus.

d. Papilio Pholeus, Cramer, pl. 163. f. D, E. Fabricius, Mant. Ins. ii. p. 66.

Polyommatus Pholeus, Godart, Enc. Meth. p. 643.

Theela Pholeus, Westwood, Gen. Diurn. Lep. p. 483.

2. Papilio Philanthus, Stoll, Suppl. Cramer, pl. 5. f. 3. p. 23.

In the Collection of W. C. Hewitson, from Pará.



# 16. Thecla Latreillii. Plate XXIX. o figs. 8, 9.

UPPERSIDE. Male.—Metallic blue, the margins rufous-brown. Anterior wing with the base of the costal margin densely clothed with hair. Posterior wing of extraordinary form: the abdominal margin deeply sinuated above the lobe: the lobe grey-brown.

Underside rufous. Anterior wing with a spot at the end of the cell, two transverse bands beyond the middle, and a submarginal line of rufous-brown. Posterior wing with two black spots at its base, a transverse broad angular band before the middle, a band of small irregular dark brown spots beyond the middle, followed by two bands of obscure rufous-brown lunular spots.

Exp.  $1\frac{9}{10}$  inch.

In the Collection of Dr. Boisduval, from Java.

Differing from them as this species does, in form and in the unusual decoration of the underside, I do not at all doubt that it is rightly placed here. It has the very short terminal joint of the palpi common to the males of this group; the singular hirsute base of the costal margin of the anterior wing is equally remarkable in the next two species, T. Satyroides and T. Temathea.

## 17. Thecla Satyroides, Hewitson. Plate XXIX. figs. of 10, 12, ♀ 13.

UPPERSIDE. Male.—Dull cerulean blue, the margins rufous-brown. Anterior wing with the base of the costal margin densely clothed with hair. Posterior wing with a submarginal white line: a brown spot at the anal angle broadly bordered with orange.

Underside lilac- and rufous-grey: the margins dark brown: the fringe white, traversed by a rufous line. Both wings crossed by two rufous-brown bands. Anterior wing with a line at the end of the cell, and two submarginal linear bands. Posterior wing with a broad submarginal band of white bordered inwardly with brown, and enclosing a band of lunular spots, two near the apex black, the rest blue: the two black spots near the anal angle crowned with orange.

Female rufous-brown on both sides, on the upperside darker towards the margins. The bands and spots of the underside like those of the male, but paler.

Exp. of  $1\frac{8}{10}$ ,  $21\frac{5}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

## 18. Thecla Temathea, Hewitson. Plate XXIX. of fig. 11.

UPPERSIDE. Male.—As in T. Satyroides.

Underside. Anterior wing as in T. Satyroides. Posterior wing grey or rufous-white: the base and three transverse equidistant bands (less oblique than in the last species) rufous-brown: the submarginal band broader, enclosing pyramidal bifid spots, the caudal spot larger.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.



This may be only a variety of *T. Satyroides*, from which it differs very much as two species of *Eurygona*, *E. Eutychus* and *E. Phedica*, differ from each other; and unless we are to consider the presence of an extra band as a specific distinction, it will be a very difficult matter to divide into species *Euptychia* and *Neonympha*, to which this species bears such remarkable resemblance.

## 19. Thecla Lisus. PLATE XXX. ♀ fig. 22.

d. Papilio Lisus, Stoll, Suppl. Cramer, pl. 38. f. 2, 2 B. Polyommatus Lisus, Godart, Enc. Méth. p. 624.

Male.—Beautiful ultramarine blue without the spot at the end of the cell.

Female with the upperside dark brown, tinted with green near the base of the wings.

## 20. Thecla Phegeus. PLATE XXX. of figs. 26, 27.

Thecla Phegous, Boisduval, MS.

UPPERSIDE. Male.—Brilliant metallic silvery blue with narrow outer margins of dark brown. Anterior wing with an obscure spot at the end of the cell: the apex dark brown.

UNDERSIDE dark green. Anterior wing with the inner margin blue-grey: crossed beyond the middle by a band of dark brown, marked on its outer border with minute grey spots, followed by two submarginal bands of brown. Posterior wing with a round black spot near the base, bordered inwardly with grey, followed by a curved band of small blue spots; crossed beyond the middle by a band of dark brown, bordered inwardly towards the anal angle with blue: the anal angle and base of the tail irrorated with green.

Exp.  $1\frac{15}{25}$  inch.

In the Collections of Dr. Boisduval and the British Museum, from Bahia and the Amazon.

Very nearly allied to T. Lisus, but differs from it, the male of this species having the spot at the end of the cell.

#### 21. Thecla Gispa, Hewitson. PLATE XXX. & fig. 25.

UPPERSIDE. Male.—Mctallic blue, brightest near the margins, the outer margins very narrow, dark brown. Anterior wing with a spot at the end of the cell.

Underside. Anterior wing dark brown, with an obscure spot and transverse band of darker brown, the inner half brilliant silvery blue. Posterior wing with the basal half dark brown, the outer half green, clouded with brown near the apex, and crossed by a band of dark brown, the green within the band divided into oblong spots: the outer margin and anal angle dark brown.

Exp. 115 inch.

In the Collection of the British Museum, from the Amason.

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# 22. Thecla Mavors. Plate XXXI. 2 fig. 28.

d. Theritas Mavors, Hübner, Zuträge, f. 189, 190.

UPPERSIDE. Female.—Rufous-brown, darker towards the outer margins of the anterior wing. Posterior wing with the anal angle white irrorated with brown: a line at the base of the tails and the fringe white: the outer margin black.

Underside rufous-brown, paler towards the outer margins. Both wings with a line at the end of the cell, both crossed beyond the middle by two bands of dark brown, and a submarginal band of pale brown, both with the outer margins dark brown. Anterior wing with the fringe rufous. Posterior wing with a submarginal line, and the fringe white: the anal lobe with a large black spot.

In the Collection of W. C. Hewitson, from the Amazon.

## 23. Thecla triquetra, Hewitson. Plate XXVIII. figs. ♂ 18, 19, ♀ 17.

UPPERSIDE. Male.—Blue-green. Anterior wing with a rufous spot at the end of the cell, the outer margin broadly brown. Posterior wing with one tail.

Underside dull blue-green, clouded with rufous-brown. Both wings crossed at the middle by a band of brown. Posterior wing crossed by a short brown band before the middle, and after the middle by a linear band bordered on both sides with grey-white.

Female rufous-brown on both sides, crossed on the underside by two bands of rufous-brown: the outer margins brown. Anterior wing with a line of brown at the end of the cell. Posterior wing crossed before the middle by a band of brown.

Exp.  $\sigma 1_{\frac{9}{20}}, ? 1_{\frac{14}{20}}$  inch.

In the Collections of W. C. Hewitson and W. W. Saunders, from Brazil.

# 24. Thecla Havila, Hewitson. Plate XXX. of figs. 23, 24.

UPPERSIDE. Male.—Brilliant ultramarine blue, with an oblong spot at the end of the cell half rufous, half dark brown. Anterior wing with the costal margin brown, the outer margin broadly dark brown. Posterior wing with one tail: the margins dark brown, broad at the apex and anal angle.

Underside brown. Both wings crossed at the middle by a line of grey, both crossed beyond the middle by two bands of grey-brown. Posterior wing with the margin grey-brown.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of the British Museum, from New Granada.



#### 25. Thecla Venulius.

Papilio Venulius, Cramer, pl. 243. f. G.

Polyommatus Venulius, Godart, Enc. Meth. p. 621.

Thecla Venulius, Westwood, Gen. Diurn. Lep. p. 483.

This species ought to have been placed next to T. Telemus.

#### 26. Thecla Acmon.

3. Papilio Acmon, Cramer, pl. 51. f. C, D. Fubricius, Mant. Ins. ii. p. 70.

Polyommatus Acmon, Godart, Enc. Meth. p. 624.

Theela Acmon, Westwood, Gen. Diurn. Lep. p. 484.

Q. Papilio Hemon, Cramer, pl. 20. f. D. E. Fabricius, Mant. Ins. ii. p. 67.

Polyommatus Hemon, Godart, Enc. Meth. p. 624.

Theela Hemon, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

## 27. Thecla Laudonia, Hewitson. Plate XLV. of figs. 191, 192.

UPPERSIDE. Male.—Brilliant glossy blue, the outer margin and fringe dark brown, narrow. Anterior wing with the apex rather broadly brown: the discal spot, which is oval and of the same colour as the wing (with the exception of a few rufous scales), is only seen when in a favourable light. Posterior wing with one tail.

Underside dark green; grey on the inner margin of the anterior wing. Anterior wing crossed beyond the middle by a band of pale green linear spots broadly bordered inwardly with brown: a submarginal band of brown. Posterior wing with two transverse bands: one near the middle, of pale blue-green spots, commencing near the costal margin by a large black spot and bordered with brown; the other brown bordered inwardly near the anal angle with green: the anal angle dark brown, irrorated with green: the lobe black bordered above with blue: the margin black, with a submarginal line of green.

Exp. 11 inch.

In the Collection of H. W. Bates, from the Amazon.

This can scarcely be a variety of *T. Acmon*, from which it does not differ on the underside; whilst *Acmon* is of a dull green-blue with a large undefined discal brown spot, this is as brilliant as a *Morpho*. The apex of this species is brown, *Acmon* is without it.

#### 28. Thecla Nautes.

Papilio Nautes, Cramer, pl. 233. f. F. G.

Polyommatus Nautes, Godart, Enc. Meth. p. 625.

Theela Nautes, Westwood, Gen. Diurn, Lep. p. 484.

Female of a uniform pale brown on both sides. The posterior wing on the underside marked as in the male.

In the Collection of W. C. Hewitson, from the Amazon.

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#### 29. Thecla Sinnis.

Polyommatus Sinnis, Godart, Enc. Méth. p. 625. Thecla Sinnis, Westwood, Gen. Diurn. Lep. p. 484.

## 30. Thecla Polybe. Plate XXXI. of fig. 38.

Papilio Polybe, Linnœus, Syst. N. ii. p. 787. Polyommatus Polybe, Godart, Enc. Méth. p. 626. S. Papilio Atys, Cramer, pl. 259. f. E, F.

In the Collection of the British Museum, from Rio de Janeiro.

## 31. Thecla Atys. Plate XXXI. of fig. 37.

Q. Papilio Atys, Cramer, pl. 259. f. G, H. Fabricius, Ent. Syst. iii. p. 267. Thecla Polybe, Westwood, Gen. Diurn. Lep. p. 483.

In the Collection of W. C. Hewitson, from the Amazon.

# 32. Thecla Cosa, Hewitson. Plate XXXI. of fig. 38.

UPPERSIDE. Male.—Blue, with the outer margins broadly brown. Anterior wing with the costal margin brown: an oblong pale brown discoidal spot.

UNDERSIDE pale brown, the nervures dark brown. Anterior wing with a scarlet spot near the base of the costal margin: the centre of the wing and a short band near the apex dark brown. Posterior wing with one tail: the costal margin broadly ochreous: a line at the end of the cell and a submarginal line of dark brown: the anal angle brown, with two spots of white.

Exp. 11 inch.

In the Collection of W. C. Hewitson.

Nearly allied to the last, from which it differs in the position of the dark brown of the anterior wing, and in having a line at the end of the cell and another near the outer margin.

#### 33. Thecla Torfrida, Hewitson. Plate XXXI. of figs. 34, 35.

UPPERSIDE. Male.—Rufous-brown. Anterior wing with the base and inner margin blue. Posterior wing blue near the anal angle which is marked by two spots of pale blue.

Underside yellow-white, with the nervures dark brown. Anterior wing with the base (which is marked with three spots of carmine and three of silvery white), a band at the end of the cell, the apex, and outer margin dark brown. Posterior wing with two tails: the base (which is marked by a spot of carmine), a band at the end of the cell, and the anal angle dark brown: the anal angle marked by five spots of pale blue.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon (Tapajos).

## 34. Thecla Mazurka, Hewitson. Plate XXXI. 2 fig. 83.

UPPERSIDE. Male.—Brown, slightly tinted with blue.

Underside pale brown. Anterior wing with the cell, a ray from it towards the outer margin, several oblong spots near the costal and outer margins, a submarginal line, and the outer margin, dark brown. Posterior wing with one tail: a large bilobed black spot near the base, bordered below with, and marked by, two pale blue spots: a band from the black spot to the apex, two transverse bands, and the anal angle (which is irrorated with white) dark brown.

Female like the male, except that it is rufous-brown (darker near the margin) on the upperside, and that the two pale blue spots near the base of the posterior wing are nearer together.

Exp.  $1\frac{\pi}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon.

### 35. Thecla Atesa, Hewitson. Plate XXXI. of figs. 31, 32.

UPPERSIDE. Male.—Dark brown, with a small pale brown discoidal spot: the inner margin near the base blue. Posterior wing with its centre blue.

Underside pale brown. Anterior wing with a spot at the base, a band at the end of the cell with a ray from it to the apex, and a spot below it all rufous-brown. Posterior wing with one tail, a black spot near the base bordered with orange-yellow, a band from it to the apex, and an oblique central band, rufous-brown: the apex broadly rufous-brown crossed by a line of pale blue and irrorated below it with the same colour.

Exp. 11 inch.

In the Collection of H. W. Bates, from the Amazon (Tapajos).

#### 36. Thecla viridicans.

Psoudolycena viridicans, Felder, Reise der Novara, pl. 28. f. 10, 11.

In the Collection of W. C. Hewitson, from New Granada.

This species must be subject to very great variety, in colour especially, but also in the breadth and formation of the outer margins, judging by the figure in the 'Voyage of the Novara.' All the examples which I have seen are of a dull green-blue, with the margins of the posterior wing very narrow. The underside of Felder's figure agrees exactly with my specimens.

#### 37. Thecla Desdemona, Hewitson. Plate XLV. of figs. 189, 190.

UPPERSIDE. Male.—Brilliant glossy blue. Anterior wing with the costal and outer margins dark brown, broad at the apex: the inner margin curved outwardly. Posterior wing with two tails: the costal margin broadly rufous, smooth and polished, as in Leptalis: the outer margin dark brown, narrow: the anal angle and lobe dark brown, crossed by a white line.

Underside rufous-brown, grey near the inner margin of the anterior wing. Both wings

crossed by four rather broad bands of white (one band submarginal): the fringe white. Posterior wing with the inner margin and four bands near it white: the outer band, which is near the anal angle, is short: the inner band, which is a prolongation of the first two transverse bands, connects them in one: anal angle with a spot (bordered above with dull orange) and the lobe black.

Exp.  $1\frac{15}{20}$  inch.

In the Collections of Messrs. Salvin and Godman, from Guatemala (Polochic Valley).

## 38. Thecla Tityrus.

Pseudolycæna Tityrus, Felder, Reise der Novara, pl. 31. f. 1, 2.

### 39. Thecla Cadmus.

Pseudolycæna Cadmus, Felder, Reise der Novara, pl. 31. f. 5.

In the Collection of W. C. Hewitson, from New Granada.

## 40. Thecla Danaus.

Pseudolycæna Danaus, Felder, Reise der Novara, pl. 31. f. 6, 7.

In the Collections of W. C. Hewitson and the British Museum, from Quito and Venezuela.

## 41. Thecla Ægides.

Pseudolycæna Ægides, Felder, Reise der Novara, pl. 31. f. 3, 4.

In the Collection of W. C. Hewitson, from New Granada.

#### 42. Thecla Tolmides.

Pseudolycæna Tolmides, Felder, Reise der Novara, pl. 31. f. 13, 14.

In the Collection of W. C. Hewitson, from Mexico.

#### 43. Thecla Loxurina.

Thecla Loxurina, Felder, Reise der Novara, pl. 32. f. 21, 22.

In the Collection of Mr. W. C. Hewitson, from New Granada.

#### 44. Thecla Timæus.

Pseudolycæna Timæus, Felder, Reise der Novara, pl. 31. f. 8, 9.

#### 45. Thecla Monica, Hewitson. Plate XXXII. 2 figs. 89, 40.

UPPERSIDE. Female.—Green. Anterior wing with the outer half dark brown. Posterior wing with the outer margin dark brown: the anal angle with two lunules of white and one broad tail.

UNDERSIDE dark brown. Anterior wing with the outer half paler, and crossed by two indistinct bands of still paler colour. Posterior wing with one broad tail, two oblique bands and the outer margin dark brown: the centre of the wing crossed by a curved band of indistinct white spots: an indistinct submarginal white line.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of the British Museum, from Venezuela.

# 46. Thecla undulata, Hewitson. PLATE XXXII. 2 figs. 41, 42.

UPPERSIDE. Female.—Both wings from the base to the middle glossy blue, the outer half dark brown. Posterior wing with two tails: a line of white at the anal angle.

Underside rufous-brown, with a submarginal band of dark brown. Both wings undulated with white. Anterior wing crossed by two bands of white.

Exp. 1 to inch.

In the Collection of the British Museum, from New Granada.

# 47. Thecla Auda, Hewitson. PLATE XXXV. 2 figs. 78, 79.

UPPERSIDE. Female.—Dull lilac-blue, the outer margins broadly brown.

Underside rufous-brown. Anterior wing crossed by three lines of white. Posterior wing with one broad tail: crossed by two irregular broken lines of white, followed by a broad band irrorated with white: a submarginal band of dark brown bordered inwardly with white: anal angle with one broad tail, marked at its base by three lunular scarlet spots bordered with black.

Exp. 1 o inch.

In the Collection of W. C. Hewitson, from New Granada.

### 48. Thecla Sala, Hewitson. PLATE XXXV. Q figs. 71, 72.

UPPERSIDE. Male.—Dull lilac-blue. Anterior wing with the margins broadly brown. Posterior wing with the outer margin narrow: anal angle with two tails: the fringe (which is very long) traversed near the base of the tails by a line of white.

Underside rufous-brown. Each wing crossed by two lines of white, beyond the middle on the anterior wing, before and after the middle on the posterior wing. Posterior wing with two tails (one very short): the anal angle marked by three lunular spots of orange bordered with black: an indistinct submarginal line of white.

Female like the male, except that it is violet-blue.

Exp. 170 inch.

In the Collection of W. C. Hewitson, from New Granada.



## 49. Thecla Ahola, Hewitson. Plate XXXV. of figs. 73, 74.

UPPERSIDE. Male.—Glossy blue. Anterior wing with the apical half dark brown. Posterior wing with the apex rufous-brown.

Underside pale brown. Anterior wing crossed beyond the middle by two lines of white. Posterior wing marked near the base and at the end of the cell by lines of white: crossed at the middle by a zigzag line, near the margin by several spots, and at the outer margin by a line all white: anal angle with one tail, marked (at the lobe and outside of the lobe) by two spots of orange bordered with black.

Exp.  $1\frac{3}{10}$  inch.

In the Collections of the British Museum and W. C. Hewitson, from Mexico and New Granada.

## 50. Thecla Aholiba, Hewitson. Plate XXXV. of figs. 76, 77.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the apical half dark brown. Posterior wing with the outer margin brown: the anal angle with two tails (one very short) marked at their base by two black spots.

Underside dark rufous-brown. Anterior wing with a line at the end of the cell and a transverse line beyond the middle, white. Posterior wing crossed at and beyond the middle by three broken lines of white: the anal angle marked by three lunular scarlet spots bordered with black.

Exp.  $1\frac{3}{10}$  inch.

In the collection of W. C. Hewitson, from New Granada.

## 51. Thecla Tema, Hewitson. Plate XXXV. of fig. 75.

UPPERSIDE. Male.—Dark brown. Anterior wing irrorated with blue near its inner margin. Posterior wing with its centre blue.

Underside dark brown. Each wing crossed by two lines of white: on the anterior wing straight at and beyond the middle, on the posterior wing zigzag before and after the middle. Both wings with two submarginal indistinct white lines. Posterior wing with one tail: the anal angle marked by two spots of scarlet bordered with black.

Exp.  $\frac{19}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 52. Thecla Halesus.

- d. Papilio Halesus, Cramer, pl. 98. f. B, C. Fabricius, Mant. Ins. ii. p. 67.
- ♂, ♀. Polyommatus Halesus, Godart, Enc. Méth. p. 626.
- 3, Q. Thecla Halesus, Boisduval & Leconte, Lép. Amér. Sept. pl. 25. f. 1, 2, 3. Westwood, Gen. Diurn. Lep. p. 483.
- 2. Atlides Dolichos, Hübner, Zutr. f. 219, 220.

In the Collection of W. C. Hewitson, from Mexico.

## 53. Thecla Platyptera.

Pseudolycena Platyptera, Felder, Reise der Novara, pl. 28. f. 6, 7.

# 54. Thecla gigantea, Hewitson. Plate XXXII. of figs. 43, 44.

UPPERSIDE. Male.—Cerulean blue: the nervures brown. Anterior wing with the costal and outer margins dark brown: the discal spot very large. Posterior wing with one tail: the apex rufous-brown.

UNDERSIDE rufous. Both wings with an oblong spot at the end of the cell, both crossed beyond the middle by a continuous zigzag band of brown bordered outwardly only on the anterior wing, but on both sides of the posterior wing, with white. Anterior wing with a submarginal band of brown. Posterior wing with a submarginal band of lunular spots bordered inwardly with white: anal angle with two scarlet spots, one with a centre of black.

Exp.  $2\frac{4}{10}$  inches.

In the Collections of W. C. Hewitson and H. W. Bates, from Pará.

## 55. Thecla Marsyas.

Papilio Marsyas, Linnœus, Syst. Nat. p. 788. Clerck, Icones, pl. 41. Cramer, pl. 332. f. A, B. Fabricius, Ent. Syst. iii. p. 272.

Polyommatus Marsyas, Godart, Enc. Meth. p. 620.

Thecla Marsyas, Westwood, Gen. Diurn. Lep. p. 482.

Pseudolycana Marsyas, Wallengren, Kon. Vetensk. Akad. 1858, p. 80.

Wallengren, who has made a new genus, to contain, I suppose, some of the larger species of Thecla, is singularly unfortunate in the selection of his type. The palpi, which form one of the chief characters of his genus, are described as "brevissimi." This description would apply to such species as T. regalis and Gabriela (imperialis has the palpi long), but to the males only, the females of which have the palpi very long; and I should scarcely think it desirable to establish a genus upon characters which would be applicable to one sex only. T. Rustan of Stoll is the only species of the group that I can call to mind which has the palpi of both sexes very short. Wallengren's type, P. Marsyas of Linnaeus, has the palpi of both sexes long, of the female very long. If the type of a genus should be as unlike all its neighbours as possible, then P. Marsyas is an excellent type. The Felders have adopted this genus.

# 56. Thecla Thara, Hewitson. Plate XXXII. of figs. 45, 46.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal and outer margins broadly brown. Posterior wing with the outer margin brown: the anal angle with two tails (one very short).

Underside rufous-grey. Both wings with a line at the end of the cell, both crossed beyond the middle by two zigzag bands of white; the inner band bordered inwardly with



brown, the outer band bordered outwardly with the same colour: the anal angle with a small indistinct scarlet spot with its centre black: the lobe black.

Exp.  $1\frac{13}{20}$  inch.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

## 57. Thecla Erybathis. Plate XXXIV. of figs. 58, 59.

Thecla Erybathis, Boisduval, MS.

UPPERSIDE. Male.—Blue-green. Both wings broadly bordered with dark brown. Posterior wing with two tails.

Underside rufous-brown, tinted with lilac from the middle to the inner margin of the anterior wing. Both wings crossed by three broad bands of white, short on the anterior wing. Posterior wing with the inner margin, two lines parallel to it, and a band near the outer margin white: the anal angle black, marked by a large T-formed spot of orange.

Exp.  $1\frac{11}{20}$  inch.

In the Collections of W. C. Hewitson and Dr. Boisduval, from Mexico.

This beautiful species scarcely differs from T. Battus on the underside.

## 58. Thecla Battus.

Papilio Battus, Cramer, pl. 51. f. F, G.

Hesperia Bathis, Fabricius, Ent. Syst. iii. p. 272.

Polyommatus Bathis, Godart, Enc. Méth. p. 628.

Thecla Battus, Westwood, Gen. Diurn. Lep. p. 483.

Q. Pseudolycæna Bathildis, Felder, Reise der Novara, pl. 31. f. 19, 20.

In the Collection of W. C. Hewitson, from Nicaragua.

#### 59. Thecla Phydela, Hewitson. Plate XXXIII. figs. o 56, ♀ 54, 55.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal and outer margins broadly dark brown. Posterior wing with the outer margin broadly white traversed by a band of grey: anal angle grey, with two tails marked near their base by two brown spots; above these two indistinct rays of white having their origin near the middle of the wing.

Underside grey, crossed by numerous bands of white. Anterior wing with three broad bands at and below the middle and a submarginal line of the same colour. Posterior wing crossed by eight bands of white, converging at the anal angle, one linear from near the base, three broad as on the anterior wing, followed by a narrow submarginal band, and three linear bands near the inner margin: the apex broadly orange, marked by three black spots: the space which separates the second and third broad bands of each wing is traversed by a line of grey-white.

Female like the male, except that it is without any blue.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of W. C. Hewitson, from Rio de Janeiro.



# 60. Thecla gibberosa, Hewitson. PLATE XXXIII. of figs. 48, 49.

UPPERSIDE. Male.—White. Anterior wing with the base and a short band at the middle blue: the outer margin broadly brown traversed by an indistinct band of paler colour. Posterior wing blue near the base: the bands of the underside seen through: the outer margin broadly brown traversed by a line of white: the anal angle with two tails.

Underside brown. Anterior wing with a spot near the base and four transverse bands of white. Posterior wing with seven white bands converging at the apex: five from the costal margin, two near the inner margin: the apex dark brown, marked by a spot of orange between the tails.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of W. C. Hewitson, from New Granada.

## 61. Thecla Leucogyna.

Pseudolycena Leucogyna, Felder, Reise der Novara, pl. 31. f. 16, 17, 18.

In the Collection of W. C. Hewitson.

# 62. Thecla paupera.

Pseudolycena paupara, Felder, Reise der Novara, pl. 31. f. 15.

This species bears a singular resemblance to the female of T. triquetra on the underside.

#### 63. Thecla Phaleros.

Papilio Phaleros, Linnaus, Syst. Nat. ii. p. 796.

Papilio Silenus, Cramer, pl. 282. f. E.

Papilio Agis, Drury, iii. pl. 26. f. 3, 4.

Hesperia Chiton, Fubricius, Ent. Syst. iii. p. 262. Donovan, Ins. Ind. pl. 39. f. 1, 1 a.

Polyommatus Phaleros, Godart, Enc. Meth. p. 628.

Thecla Phaleros, Westwood, Gen. Diurn. Lep. p. 483.

#### 64. Thecla Lincus, var. PLATE XXXIII. of figs. 50, 51.

Hesperia Lincus, Fabricius, Ent. Syst. iii. p. 289.

Papilio Lincus, Herbst, pl. 304. f. 7, 8.

Papilio Ætolus, Cramer, pl. 340. f. F, G, H. Hübner, Samml. avot. Schm. f. 1-4.

Polyommatus Lincus, Godart, Enc. Meth. p. 645.

Papilio Amelia, Herbst, pl. 300. f. 3, 4.

Theela Lineus, Westwood, Gen. Diurn. Lep. p. 483.

In the Collection of W. C. Hewitson, from New Granada, the Amason, and Venesuela.

#### 65. Thecla Togarna, Hewitson. Plate XXXIII. & figs. 52, 58.

UPPERSIDE. Male.—White. Anterior wing with the outer margin and the triangular discoidal spot (which in this species is intersected by a white nervure) dark brown. Posterior

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wing with a narrow margin of brown: the anal angle, which has two tails, is marked by a brown spot irrorated with white.

Underside white. Both wings with the outer margins brown; both crossed by four bands of brown. Posterior wing with a linear band of brown near the inner margin divided into two bands below its middle: a band of orange near the outer and abdominal margins.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

Very nearly allied to the last species, differing from it only in having the discal spot traversed by a white nervure, in having the bands much narrower, and in being (as in the variety of *Lincus* which I have figured) without the submarginal band on the underside of the posterior wing.

## 66. Thecla Palegon.

Papilio Palegon, Cramer, pl. 282. f. C, D. Polyommatus Palegon, Godart, Enc. Méth. p. 629. Thecla Palegon, Westwood, Gen. Diurn. Lep. p. 483. Papilio Myrtillus, Cramer, pl. 380. f. B, C.

In the Collection of W. C. Hewitson, from Pará and Rio de Janeiro.

# 67. Thecla Æthesa. 'PLATE XXXIII. ♀ fig. 57.

Thecla Æthesa, Boisduval, MS.

UPPERSIDE. Female.—Rufous-brown, the margins broadly dark brown. Posterior wing with one tail: the anal angle near its base marked with a submarginal white line.

Underside rufous. Both wings with the outer margins brown. Anterior wing with three bands of dark brown: the outer margin orange near the anal angle. Posterior wing with four bands of brown: two lines of brown between the second and third band: the third band bordered inwardly with white and traversed by a line of white: a linear band (divided into two below the middle) near the inner margin: the space between the first and second and third and fourth bands pale yellow: a band of orange near the outer and abdominal margins.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of Dr. Boisduval, from Bahia.

#### 68. Thecla Melibous.

Hesperia Melibœus, Fabricius, Ent. Syst. iii. p. 271. Polyommatus Melibœus, Godart, Enc. Méth. p. 629. Papilio Melibœus, Donovan, Insects of India, pl. 41. f. 1. Thecla Melibœus, Westwood, Gen. Diurn. Lep. p. 483. Iolaus Eurysides, Hübner, Zutr. f. 297, 298.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

## 69. Thecla Sito. Plate XLV. ♀ figs. 193, 194, 195.

Thecla Sito, Boisduval, Spec. Gén. Lép. pl. 22. f. 5. Westwood, Gen. Diurn. Lep. p. 483.

In the Collection of W. C. Hewitson.

## 70. Thecla Pedusa, Hewitson. Plate XXXIV. of figs. 60, 61.

UPPERSIDE. Male.—Dark brown. Anterior wing with the discoidal spot small and round. Posterior wing with the centre blue: with one tail: the anal angle with an orange spot.

UNDERSIDE dark brown. Anterior wing with three short bands of silvery white and a submarginal band of pale brown. Posterior wing with seven bands and the outer and abdominal margins white: four bands from the costal margin, three parallel to the inner margin: the anal angle with a large orange spot: the lobe black.

Female like the male, except that the upperside is rufous and grey-brown.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 71. Thecla Azaria, Hewitson. Plate XXXIV. of figs. 65, 66.

UPPERSIDE. Male.—Dark brown. Anterior wing crossed at the middle by a short band of white, tinted with blue from the base to below the band. Posterior wing slightly blue at the centre: anal angle with two tails.

Underside. Anterior wing with the central band longer: crossed beyond it by three narrow bands of white. Posterior wing with seven bands: four from the costal margin, and three parallel to the inner margin: the anal angle broadly orange, marked by two black spots.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson.

## 72. Thecla Meton.

Papilio Meton, Cramer, pl. 201. f. D, E. Fabricius, Ent. Syst. iii. p. 274. Polyommatus Meton, Godart, Enc. Méth. p. 630.

Thecla Meton, Westwood, Gen. Diurn. Lep. p. 483.

# 73. Thecla Jada, Hewitson. PLATE XXXIV. of figs. 67, 68.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal margin and apical



half rufous-brown: a black spot at the end of the cell. Posterior wing with one tail: the outer margin dark brown: the fringe broad and white.

Underside white. Anterior wing crossed by three bands of pale rufous-brown. Posterior wing with the base, four bands, and the outer margin pale rufous-brown.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. W. Saunders, from Mexico.

## 74. Thecla Spurius.

Pseudolycæna Spurius, Felder, Reise der Novara, pl. 31. f. 23, 24.

## 75. Thecla Dolylas.

Papilio Dolylas, Cramer, pl. 111. f. B, C.

Polyommatus Dolylas, Godart, Enc. Méth. p. 630.

Thecla Dolylas, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of H. W. Bates, from the Amazon (Tapajos).

# 76. Thecla Ellida, Hewitson. Plate XXXIV. figs. of 62, 63, \$\times 64.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the costal margin and apical half dark brown: a black spot at the end of the cell. Posterior wing with the outer margin and three spots near the base of the one tail dark brown.

Underside. Anterior wing white, with the outer margin broadly rufous: crossed by four bands of dark rufous-brown: the third band with its centre white. Posterior wing rufous, irrorated near the costal margin with white: the base dark brown bordered with white: crossed beyond the middle by two linear bands of brown: a line of white at the middle of the inner margin.

Female like the male, except that the upperside is thickly irrorated with pale blue towards the inner margin of both wings and that the base of the posterior wing on the underside is marked by a rufous band instead of the basal triangular spot.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

#### 77. Thecla Malina, Hewitson. Plate XXXIV. of figs. 69, 70.

UPPERSIDE. Male.—Cerulean blue, the margins broadly brown. Anterior wing with a large dark brown discoidal spot. Posterior wing with one tail.

Underside rufous. Anterior wing with three bands and a spot at the end of the cell rufous-brown. Posterior wing crossed by four rufous-brown bands.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. W. Saunders, from Brazil.



#### 78. Thecla Jebus.

Sithon Jebus, Hübner, Samml. exot. Schm. f. 1, 2, 3, 4. Polyommatus Jebus, Godart, Enc. Méth. p. 639. Thecla Jebus, Westwood, Gen. Diurn. Lep. p. 486.

#### 79. Thecla umbratus.

Sithon umbratus, Hübner, Zutr. f. 955, 956.

Thecla umbratus, Westwood, Gen. Diurn. Lep. p. 485.

# 80. Thecla Thordesa, Hewitson. PLATE XXXV. of fig. 80.

UPPERSIDE. Male.—Glossy blue, the margins brown. Anterior wing with the discoidal spot oblong, rufous. Posterior wing with one tail.

Underside. Anterior wing rufous, tinted with pale blue towards its inner margin: crossed beyond the middle by a rufous-brown band bordered outwardly with white. Posterior wing rufous-brown, crossed at the middle by a broad band variegated and bordered with white: the outer margin broadly white traversed by a band of brown and marked by some indistinct lunular spots: anal angle with the lobe and a small spot outside the tail black, crowned with scarlet.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

## 81. Thecla Mulucha, Hewitson. Plate XXXVIII. of fig. 117.

UPPERSIDE. Male.—Dark brown, the outer margins black: the fringe white. Posterior wing with one tail: marked at the anal angle by two black spots bordered below with white.

Underside grey-brown. Anterior wing with a white line at the end of the cell: crossed beyond the middle by an irregular band of grey-white bordered inwardly with black: a submarginal band of spots bordered with white. Posterior wing with a broad white band before the middle: crossed at the middle by an undulated black line bordered outwardly with white: the outer margin and a submarginal band of lunular spots white: the anal angle with two black spots, crowned with orange.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

This species and T. Thordesa, although very much alike in general appearance, are very distinct: whilst the male of one is of a brilliant blue, the other is brown.

# 82. Thecla Ira, Hewitson. Plate XXXV. of figs. 81, 82.

UPPERSIDE. Male.—Dull steel-blue. Anterior wing with the apical half brown: the



discoidal spot small, pale brown. Posterior wing with the margin broadly pale brown: anal angle with one tail.

Underside grey-brown, rufous towards the outer margins. Posterior wing with, beyond the middle, a curved band of brown spots bordered outwardly with white: anal angle with two spots of brick-red.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of W. W. Saunders, from Mexico.

# 83. Thecla Silumena, Hewitson. PLATE XLV. of figs. 196, 197.

UPPERSIDE. Male.—Green-blue: the outer margins brown, narrow. Posterior wing with one tail.

Underside sanguineous, darkest near the base. Both wings crossed at the middle by a band of linear white spots, four in number on the anterior wing. Anterior wing with the inner margin blue: marked near the base with four white spots, posterior wing with five: anal angle irrorated with white.

Female.—Rufous-brown, dark brown at the outer margins, grey near the base: the fringe orange.

Exp.  $\delta l_{10}^4$ ,  $\mathfrak{P} l_{10}^6$  inch.

In the Collection of W. C. Hewitson.

#### 84. Thecla Caranus.

Papilio Caranus, Cramer, pl. 332. f. C, D. Fabricius, Ent. Syst. iii. p. 276.

Polyommatus Ceranus, Godart, Enc. Méth. p. 627.

Papilio Pelops, Cramer, pl. 341. f. A.

Hesperia Petus, Fabricius, Ent. Syst. iii. p. 264.

Papilio Getus, Fabricius, Mant. Ins. p. 66.

Thecla Getus, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of W. C. Hewitson, from the Amazon.

#### 85. Thecla Didymaon.

Papilio Didymaon, Cramer, pl. 134. f. A. Fabricius, Ent. Syst. iii. p. 266.

Polyommatus Didymaon, Godart, Enc. Méth. p. 627.

Thecla Didymaon, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

## 86. Thecla Neora, Hewitson. Plate XXXVIII. ♀ fig. 110.

UPPERSIDE. Female.—Brown, darker towards the outer margin: the fringe orange. Posterior wing with one tail: the outer margin black.

Underside rufous-brown: the base of both wings scarlet marked with spots of white. Anterior wing crossed at the middle by a band of linear white spots. Posterior wing crossed before the middle by a similar band: the outer margin and a submarginal band black: anal angle with two black spots, one on the lobe, the other irrorated with white.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala.

## 87. Thecla Minyia, Hewitson. Plate XXXVIII. of figs. 115, 116.

UPPERSIDE. Male.—Glossy blue, with the margins dark brown. Anterior wing with the costal margin and apical half dark brown: the discoidal spot small and pale brown. Posterior wing with one tail: the costal margin and apex broadly brown.

Underside rufous, with a scarlet spot at the base of both wings. Anterior wing with two small white spots touching the scarlet spot and a linear band of the same colour at the middle: the costal margin grey-white. Posterior wing with a black and white spot touching the scarlet spot: a curved white band above the anal angle bordered inwardly with brown: the anal angle black marked with a white spot and above it a short band of black irrorated with white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 88. Thecla Rocena, Hewitson. Plate XXXVII. of figs. 96, 97.

UPPERSIDE. Male.—Dark brown, with a large common central space of glossy blue. Posterior wing with two tails.

Underside rufous, with a scarlet spot at the base of both wings. Anterior wing with a short band of white at the middle of the costal margin: a linear short band of two lunular white spots between the median nervules beyond the middle. Posterior wing with a black and white curved spot touching the scarlet at the base: a spot at the middle of the inner margin and a linear band beyond the middle, both bordered inwardly with brown: a linear spot of white near the inner margin bordered outwardly with brown: the anal angle broadly brown irrorated with green: the lobe and a spot between the tails dark brown, crowned with orange.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 89. Thecla Narbal.

Papilio Narbal, Stoll, Suppl. Cramer, pl. 38. f. 6, 6 F.
Polyommatus Narbal, Godart, Enc. Méth. p. 627. Lucas, Lép. Exot. pl. 44. f. 2.
Thecla Narbal, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of H. W. Bates, from the Amazon (Tapajos).



# 90. Thecla Atena, Hewitson. Plates XXXVI. XXXVII. of figs. 93, 101.

UPPERSIDE. Male.—Very brilliant glossy blue, with the margins dark brown. Anterior wing with the discoidal spot small, dark brown. Posterior wing with one tail.

Underside rufous. Anterior wing crossed by a linear white band at the middle. Posterior wing with a white spot near the base: a white band below the middle bordered inwardly with brown: a submarginal band beginning at the apex by two white spots: the anal angle brown irrorated with green: the lobe black, crowned with ochreous-yellow.

Female like the male, except that the anterior wing is dark brown above, with a small space of blue near the inner margin.

Exp.  $1_{10}^4$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

There is in the Collection of Mr. Bates a variety of this species of a brilliant lilac-blue, unequalled by any other butterfly which I have seen; the nervures of the posterior wing, which are clearly defined by some darker colour between them, add to its beauty.

#### 91. Thecla Sista, Hewitson. Plate XXXVII. of figs. 98, 99.

UPPERSIDE. Male.—Brilliant glossy blue, with the margins dark brown. Anterior wing blue near the inner margin: a large space round the end of the cell of a peculiar dull redbrown, as if accidentally stained: the outer margin broadly brown. Posterior wing with two tails.

Underside green-grey. Anterior wing crossed by two linear bands of white: the first at the middle bordered inwardly with brown, the second composed of spots bordered outwardly with brown. Posterior wing with a spot near the base and a band near the middle, both white, bordered inwardly with brown: a submarginal band of four white spots: a line of white above the anal lobe: the anal angle and outer margins near it green: the lobe black: a black spot between the tails crowned with orange.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 92. Thecla Athymbra, Hewitson. Plate XXXVI. o figs. 91, 92.

UPPERSIDE. Male.—Glossy blue. Anterior wing with the costal margin and apical half dark brown: the discal spot large and of two parts, inwardly dark brown, outwardly pale rufous. Posterior wing with one tail: the costal margin broad rufous-brown; the outer margin dark brown, narrow.

Underside rufous-grey: the base of both wings tinted with carmine. Posterior wing



crossed beyond the middle by a linear band of white spots: the anal angle variegated with brown and white: the lobe black.

Female like the male, except that it is rufous-brown above darker towards the margins.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 93. Thecla malvina, Hewitson. Plate XXXVII. of figs. 102, 103.

UPPERSIDE. Male.—Violet-blue, with the margins dark brown. Anterior wing with the apical half brown: the discoidal spot large and oval, pale brown. Posterior wing with two tails.

UNDERSIDE rufous-brown. Both wings crossed by two bands of linear white spots, converging on the anterior wing towards the inner margin. Posterior wing with a white spot near the base, margined, sometimes on one side only, sometimes on both sides, with brown: anal angle green: the lobe and a spot between the tails black bordered above with orange.

Female like the male, except that the margins on the upperside are broader and rufous brown and that the underside is much paler.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

## 94. Thecla janthina, Hewitson. Plate XXXVII. of figs. 104, 105.

UPPERSIDE. Male.—Brilliant glossy blue, the margins brown. Anterior wing with the costal margin and apical half dark brown. Posterior wing with two tails: the brown of the outer margin very narrow.

Underside rufous and grey. Both wings crossed by two linear bands of white bordered with brown. Posterior wing with a white spot near the base: the anal angle green: the lobe and a spot between the tails black bordered above with orange.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of Messrs. Salvin and Godman, from Vera Paz.

The last three species, though very much alike on the underside (where the relative position of the bands of the upper wing form the chief distinction) differ much in the contour of the wings. *T. janthina*, with its much longer fore wing, can scarcely be a variety of *T. Sista* with its peculiar colour at the end of the cell, although they are precisely alike on the underside.

# 95. Thecla myrtea, Hewitson. Plate XXXVIII. & fig. 112.

UPPERSIDE. Male.—Glossy blue. Anterior wing with the costal margin and apical half dark brown. Posterior wing with two tails: the outer margin dark brown.

Underside rufous-grey. Both wings crossed beyond the middle by two bands of white:

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the outer band of the anterior wing short and near its anal angle. Posterior wing with the shoulder projecting: a spot of white near the middle of the costal margin, and a submarginal line of white: a large orange spot marked with black between the tails.

Exp.  $1_{10}^2$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 96. Thecla Mutina, Hewitson. Plate XXXVIII. & figs. 113, 114.

UPPERSIDE. Male.—Anterior wing dark brown, with the inner margin broadly blue. Posterior wing blue, with two tails: the costal margin broadly brown.

Underside rufous-grey. Both wings crossed at the middle by a band of white, both with a submarginal band of brown. Posterior wing with a white spot near the base and a brown spot at the anal angle irrorated with white: the lobe black.

Female like the male, except that the upperside is brown darker towards the margins.

Exp.  $1_{T_0}^2$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

## 97. Thecla Mecrida, Hewitson. Plate XXXVIII. & figs. 108, 109.

UPPERSIDE. Male.—Anterior wing dark brown, with a band of blue near the inner margin. Posterior wing blue, with two tails: the costal margin broadly brown.

UNDERSIDE rufous-grey. Anterior wing with a white band at the middle and a submarginal band of brown spots. Posterior wing crossed by a band of two spots near the base and by two bands of white at and beyond the middle, the inner band commencing at the costal margin by a large white spot: anal angle with the lobe black, and a brown spot irrorated with white.

Exp.  $1_{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 98. Thecla Damon. Plate XXXVII. fig. 100.

Papilio Damon, Cramer, pl. 390, f. C. D.

Polyommatus Damastus, Godart, Enc. Méth. p. 640.

Thecla Smilacis, Boisduval & Leconte, Icon. Lép. Am. Sept. pl. 33. f. 1, 2.

Thecla Damon, Westwood, Gen. Diurn. Lep. p. 486.

Thecla Auburniana, Harris, Insects injurious to Vegetation, new edit. p. 277.

In the Collection of W. C. Hewitson, from the United States.

# 99. Thecla Spinetorum. Plate XLV. figs. 198, 199.

Thecla Spinetorum, Boisduval, MS.

UPPERSIDE dark brown. Both wings grey-blue near the base.

Underside rufous-brown. Both wings crossed beyond the middle by a white band bordered inwardly with brown. Posterior wing with two tails: a submarginal band of brown spots: anal angle with the lobe brown, crowned with white: a brown spot between the tails bordered above with orange, and a brown spot between it and the lobe irrorated with white.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of Dr. Boisduval, from California.

# 100. Thecla Myrtusa, Hewitson. Plate XXXVIII. ♀ fig. 111.

UPPERSIDE. Female.—Dull grey-blue. Anterior wing with more than the outer half brown. Posterior wing with two tails: the outer margins broadly rufous-brown.

Underside rufous. Anterior wing with a submarginal band of white spots bordered inwardly with brown. Posterior wing with a large white spot near the middle of the costal margin: crossed beyond the middle by two closely approximating bands of white spots, the inner band bordered inwardly, the outer band outwardly, with dark brown: anal angle with the lobe black, a brown spot near it irrorated with white and a scarlet spot (marked with a small black spot) between the tails: a submarginal white line except near the apex.

Exp.  $1^{1\overline{v}}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 101. Thecla Malvania, Hewitson. Plate XXXVIII. of figs. 106, 107.

Upperside. Male.—Brilliant ultramarine blue. Anterior wing dark brown, with one-third near the base blue. Posterior wing with two tails: the costal margin broadly rufous-brown: the outer margin narrow, dark brown.

Underside rufous-grey. Anterior wing crossed beyond the middle by a very narrow linear band of white. Posterior wing crossed beyond the middle by two bands of white: the inner band, which commences near the costal margin by a large round spot, is bordered inwardly with brown: the outer band, which is indistinct, is bordered outwardly with brown: the outer margin black, a submarginal line and the fringe white: anal angle with the lobe black, a brown spot near it irrorated with white, and an orange spot (marked with black) between the tails.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson.

# 102. Thecla Metanira, Hewitson. PLATE XLVI. of figs. 200, 201.

UPPERSIDE. Male.—Glossy green-blue. Anterior wing with the costal margin and more than the apical half dark brown: the discal spot of two colours, rufous and dark brown. Posterior wing with one tail: the costal margin broad, rufous: the outer margin dark brown, narrow.

Underside rufous-grey. Posterior wing crossed near the middle by a band of white spots bordered with brown, commencing on the costal margin by a large white spot: a submarginal band of brown spots bordered on both sides with white: anal angle with a scarlet spot marked at its base with black: the lobe black, and the space between them brown, irrorated with white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon (St. Paulo).

This species scarcely differs on the upperside from T. Ostia and Ophelia; on the underside it resembles T. Malvania very closely, but is of a very different blue above.

# 103. Thecla Avoca, Hewitson. PLATE XXXVII. of figs. 94, 95.

UPPERSIDE. Male.—Brilliant glossy blue, slightly tinted with green, with the margins dark brown. Anterior wing with the discoidal spot small and round, rufous. Posterior wing with two tails (one very short).

Underside rufous-brown, tinted with lilac, darkest on the posterior wing. Anterior wing crossed beyond the middle by a linear band of white, and nearer the margin by a band irrorated with white. Posterior wing dark lilac-brown near the base crossed by a white line, a linear band of white at the middle broadly bordered on both sides with grey from the inner margin to the middle: the remainder of the wing white, with a submarginal band of brown spots, and an orange spot between the tails: the lobe black.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

### 104. Thecla Falerina, Hewitson. Plate XLIII. of figs. 168, 169.

UPPERSIDE. Male.—Brilliant glossy blue: the outer margins black. Anterior wing with the costal margin and apical half black. Posterior wing of peculiar form, with two tails (one very short).

Underside grey. Anterior wing crossed beyond the middle by a linear band of white margined inwardly with brown: a band of two or three indistinct brown spots near the anal angle. Posterior wing with the shoulder projected: a small black spot near the base bordered below with black: a large black spot near the middle of the costal margin: two linear bands of white beyond the middle bordered with brown: anal angle with two brick-red spots: the lobe black: a submarginal white line: the margin black.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

All the examples of this species which I have seen are much smaller than the figure and with the two black spots on the underside of the posterior wing very indistinct.

105. Thecla olbia, Hewitson. Plate XXXVI. figs. & 85, ♀ 86.

Var. Thecla phallica, Pl. XL. Q fig. 136.

UPPERSIDE. Male.—Cerulean blue. Anterior wing dark brown except near the inner margin: the discoidal spot oblong, half dark brown, half rufous. Posterior wing with one tail: the apex rufous-brown.

Underside. Anterior wing rufous, with a white line at the end of the cell: the outer margin broadly white, variegated with minute rufous spots. Posterior wing silvery white, clouded with rufous spots, chiefly near the base: crossed at the middle by an indistinct band of white bordered inwardly with brown: anal angle with two scarlet spots (one at the lobe).

Female like the male, except that it is rufous-brown above, with the base of both wings grey-blue.

Var. 2, fig. 136, with much less white at the outer margin of the anterior wing, as well as throughout the posterior wing.

Exp.  $\sigma l_{10}^2$ ,  $\Omega l_{10}^2$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 106. Thecla Lausus.

J. Papilio Lausus, Cramer, pl. 233. f. E.

Polyommatus Lausus, Godart, Enc. Meth. p. 630.

Q. Papilio Libanius, Cramer, pl. 379. f. H, I.

Thecla Lausus, Westwood, Gen. Diurn. Lep. p. 484.

UPPERSIDE. Male.—Anterior wing rufous-brown, slightly tinted with lilac-blue near the inner margin and round the discoidal spot: the discoidal spot large, of two colours, its lower half dark brown, the other half rufous. Posterior wing pale lilac-brown, with the costal margin rufous-brown: the outer margin dark brown: the fringe part rufous, part white.

In the Collection of W. C. Hewitson, from the Amason.

### 107. Thecla Comana, Hewitson. Plate XXXVI. of figs. 86, 87.

UPPERSIDE. Male.—Dull grey-blue (as if washed over the brown): the base of the costal margin and apex rufous-brown: the discoidal spot of two colours, dark brown below, rufous above. Posterior wing cerulean blue in the centre, dull grey-blue near the costal margin: the outer margin dark brown, with one tail.

UNDERSIDE rufous. Anterior wing crossed at the middle by a linear white band, and beyond it by an indistinct waved band of white. Posterior wing crossed before the middle by a band of white having above its middle an oval circle also white: the outer half nearly all white, crossed by a band of spots, one of which, above the tail, is scarlet: the lobe scarlet and black.



Female like the male, except that it is of a uniform rufous brown above, with the lobe of the posterior wing orange.

Exp.  $1\frac{3}{20}$  inch.

In the Collection of W. W. Saunders and H. W. Bates, from the Amazon (Tapajos).

## 108. Thecla Cupentus.

Papilio Cupentus, Cramer, pl. 337. f. F, G.

Polyommatus Cupentus, Godart, Enc. Méth. p. 631.

Thecla Cupentus, Westwood, Gen. Diurn. Lep. p. 485.

Female like the male, except that the anterior wing is rufous-brown above, irrorated with pale blue near the base and costal margin, and that the posterior wing is cerulean blue, with the costal and outer margins, some submarginal spots, and the nervures brown.

In the Collection of W. C. Hewitson, from the Amazon.

### 109. Thecla Thales.

Hesperia Thales, Fabricius, Ent. Syst. iii. p. 268. Donovan, Ins. Ind. pl. 40.

Polyommatus Thales, Godart, Enc. Méth. p. 625.

Thecla Thales, Westwood, Gen. Diurn. Lep. p. 485.

Brangas Thrasyllus, Hübner, Zutr. 965, 966.

In the Collection of W. C. Hewitson, from the Amazon.

## 110. Thecla Thalesa, Hewitson. Plate XLV. 2 fig. 200.

UPPERSIDE. Female.—Dark rufous-brown. Posterior wing with two tails.

Underside dark carmine-brown. Anterior wing with the inner margin pale rufous: crossed on the costal margin by five distinct short bands of white, the fifth near the apex: marked below the middle band by two or three small pale blue spots. Posterior wing with a blue spot before the middle and a band at the middle of pale blue spots: anal angle with a broad band and lines above it of brilliant gold-green.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

I have hesitated much before considering this as more than a variety of *Thales*. The bands on the costal margin of the anterior wing are much more distinctly defined, and the last is nearer to the apex. All the examples of *Thales* which I have examined have hairy eyes, whilst in this, though fresh and unworn, the eyes are quite smooth.

### 111. Thecla Ortygnus.

Papilio Ortygnus, Cramer, pl. 243. f. B.

Polyommatus Ortygnus, Godart, Enc. Méth. p. 621.

Thecla Ortygnus, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

### 112. Thecla Rustan.

Papilio Rustan, Stoll, Suppl. Cramer, pl. 38, f. 1, 1 A.

Polyommatus Rustan, Godart. Enc. Méth. p. 621.

Thecla Rustan, Westwood, Gen. Diurn. Lep. p. 484.

Thecla Macaria, Swainson, Zool. Illus. 1st ser. pl. 133.

In the Collection of W. C. Hewitson, from the Amazon and Rio de Janeiro.

#### 113. Thecla Ematheon.

Papilio Ematheon, Cramer, pl. 163. f. F, G. Fabricius, Mant. Ins. ii. p. 66.

Polyommatus Ematheon, Godart, Enc. Méth. p. 623.

Thecla Ematheon, Westwood, Gen. Diurn. Lep. p. 484.

# 114. Thecla Polibetes. Plate XXXII. 2 fig. 47.

Papilio Polibetes, Cramer, pl. 341. f. B. C.

Polyommatus Polibetes, Godart, Enc. Méth. p. 624.

Thecla Polibetes, Westwood, Gen. Diurn. Lep. p. 484.

In the Collection of W. C. Hewitson, from Mexico.

A variety in the Collection of Mr. Bates from Pará has a very different aspect from the usual appearance of this species. It is of a much more beautiful lilac-blue, with the discal spot and the margins so pale as to give it the appearance of a picture without a frame.

# 115. Thecla Thyrea. Plate XXXVI. of figs. 83, 84.

Theela Thyrea, Boisduval, MS.

UPPERSIDE. Male.—Glossy blue: the margins broadly brown. Anterior wing with a small pale brown discoidal spot. Posterior wing with two tails (one very short).

Underside rufous-brown. Anterior wing with a line at the end of the cell and a band of six small brown spots beyond the middle. Posterior wing with a black spot near the base of the costal margin: a line at the end of the cell, an irregular band of brown spots bordered below with white, and a submarginal band of linear spots irrorated inwardly with blue: anal angle with the lobe black.

Female like the male, except that the upperside is of a pale grey brown with the margins broadly rufous-brown, and that the underside is of a pale orange-grey.

Exp.  $\delta l_{10}^6$ ,  $\mathfrak{P} l_{10}^9$  inch.

In the Collections of Dr. Boisduval and H. W. Bates, from Cayenne and the Amazon.

### 116. Thecla Sylea, Hewitson. Plate XXXIX. & figs. 118, 119.

UPPERSIDE. Male.—Dull blue. Anterior wing with more than the apical half dark brown. Posterior wing with the costal margin brown: with two tails (one very short): the anal angle with the lobe scarlet.



Underside pale orange-grey. Both wings crossed beyond the middle by a band of white bordered inwardly on both wings with brick-red: both with a submarginal band of brown spots. Posterior wing with two large brick-red spots at the anal angle.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of the British Museum, from the Amazon (Pará).

# 117. Thecla Phonissa, Hewitson. Plate XL. & figs. 139, 140.

UPPERSIDE. Male.—Anterior wing blue, with the costal margin and outer half dark brown: the discoidal spot very pale brown. Posterior wing rufous-brown, the centre blue: anal angle with two tails (one very short).

Underside with the basal half dark brown, the outer half rufous. Both wings crossed at the middle by a band of white. Anterior wing with two white spots beyond the middle. Posterior wing with a white spot near the base, a band of white beyond the middle and a submarginal band of white near the anal angle: anal angle with the lobe black and a black spot bordered above with scarlet.

Female like the male, except that the upperside is pale rufous-brown darker towards the margin.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

### 118. Thecla Sichæus.

Q. Papilio Sichæus, Cramer, pl. 144. f. C, D. Polyommatus Sichæus, Godart, Enc. Méth. p. 632. Thecla Sichæus, Westwood, Gen. Diurn. Lep. p. 485.

In the Collection of W. C. Hewitson, from the Amazon.

### 119. Thecla Thallus.

♂. Papilio Thallus, Cramer, pl. 259. f. C, D.
Hesperia Æolus, Fabricius, Ent. Syst. iii. p. 284.
Papilio Æolus, Donovan, Ins. Ind. pl. 42. f. 1.
Polyommatus Æolus, Godart, Enc. Méth. p. 628.
Thecla Æolus, Westwood, Gen. Diurn. Lep. p. 483.
♀. Papilio Pelion, Cramer, pl. 6. f. E, F.
Hesperia Pelion, Fabricius, Ent. Syst. iii. p. 263.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

### 120. Thecla Paphlagon.

Pseudolycæna Paphlagon, Felder, Reise der Novara, pl. 31. f. 10, 11.

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#### 121. Thecla Boreas.

Pseudolycæna Boreas, Felder, Reise der Novara, pl. 31. f. 12.

In the Collection of W. C. Hewitson, from the Amazon.

# 122. Thecla Ambrax. Plate XLI. & fig. 150.

Thecla Ambrax, Westwood, Gen. Diurn. Lep. pl. 75. f. 7. p. 485.

This species has a small pale discoidal spot.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

# 123. Thecla Elika, Hewitson. Plate XLI. o figs. 143, 144.

UPPERSIDE brilliant green-blue. Anterior wing with the costal margin and apical half dark brown. Posterior wing with two tails (one very short): the outer margin dark brown, narrow.

Underside grey-white. Both wings crossed beyond the middle by a linear band of white bordered outwardly with brown, both with a submarginal brown line scarcely seen on the anterior wing: anal angle of posterior wing with two brick-red spots, one touching the lobe which is black, the other marked with a black spot.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of W. C. Hewitson, from Rio Grande.

This species scarcely differs from T. Ambrax, except in its not having any discoidal spot.

## 124. Thecla Acameda, Hewitson. Plate XLI. & figs. 151, 152.

UPPERSIDE. Male.—Brilliant blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with the costal margin broadly rufous-brown, polished where the wings meet, and green in a bright light: the outer margin dark brown, narrow: anal angle with two tails (one very short) and a red spot on the lobe.

Underside. Grey-white, rufous at the base of both wings. Both wings crossed beyond the middle by an undulated linear band of white bordered inwardly with brown: both with a submarginal brown line scarcely seen on the anterior wing. Posterior wing with the shoulder much projected: anal angle with two brick-red spots.

Exp.  $1\frac{13}{20}$  inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

This species is very nearly allied to the last two but differs from both in the brown base of the underside. Like *T. Elika* it is without the discoidal spot and differs from it in the greater extent of brown on the upperside of the anterior wing, and in the position of the band of the posterior wing which is lower down at the costal margin.

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## 125. Thecla Cyllarus.

Papilio Cyllarus, Cramer, pl. 27. f. C, D.

Papilio Strephon, Fabricius, Mant. Ins. ii. p. 69. Godart, Enc. Meth. p. 632.

Thecla Cyllarus, Westwood, Gen. Diurn. Lep. p. 485.

In the Collection of W. C. Hewitson, from Surinam.

## 126. Thecla Orgia. Plates XLI. & XLIII. figs. of 176, ♀ 148, 149.

Thecla Orgia, Boisduval, MS.

UPPERSIDE. Male.—Brilliant blue: the outer margins of both wings dark brown. Anterior wing with a small pale discoidal spot. Posterior wing with one tail.

Underside rufous. Anterior wing with a broad dark brown band at the middle bordered outwardly with white and a submarginal brown line. Posterior wing with a black spot near the base and a central zigzag brown band, both bordered below with white: a submarginal brown band and a spot at the anal angle irrorated with white: anal angle with a spot and the lobe black, each crowned with scarlet: a submarginal white line near the tail.

Female like the male, except that it is cerulean blue above, with the margins broadly dark brown.

Exp.  $1\frac{1}{2}$  inch.

In the Collections of the British Museum and Dr. Boisduval, from Venezuela and Cayenne.

### 127. Thecla Spurina, Hewitson. Plate XXXIX. ♀ figs. 122, 123.

UPPERSIDE. Female.—Rufous-brown darker towards the margins. Posterior wing with two tails: anal angle with two spots of orange (one at the lobe) and a submarginal white line.

Underside rufous- or grey-white. Both wings crossed beyond the middle by a linear band of white bordered inwardly with rufous-brown, both with a very pale submarginal band: the anal angle marked on the lobe by a large black spot crowned with orange: a large orange spot between the tails marked on its lower border by a small black spot.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

There is a variety of this species in the collection of Mr. Bates which is without the orange spot at the anal angle between the tails on the upperside, having in its place two brown spots.

### 128. Thecla Erix. Plate XLVI. of figs. 203, 204.

Papilio Erix, Cramer, pl. 82. f. B.

Thecla Erix, Westwood, Gen. Diurn. Lep. p. 485.

UPPERSIDE. Male.—Brilliant violet-blue. Anterior wing with the costal and outer

margins dark brown, rather broad: the discal spot dark brown near the base. Posterior wing with two tails: the costal margin broadly rufous-brown: the outer margin dark brown, narrow: the lobe black marked by a spot of scarlet.

UNDERSIDE dark brown. Both wings crossed near the middle by a band of black slightly bordered outwardly with white, both with a submarginal brown band. Posterior wing with two spots of scarlet at the anal angle: one between the tails marked at its base with black, the other touching the lobe, which is black.

Female like the male, except that it is rufous- and grey-brown on the upperside, broadly brown at the costal and outer margins of the anterior wing, and that the underside is rufous.

In the Collection of W. C. Hewitson, from the Amazon.

Cramer's figure, though no doubt intended to represent this species, is so little like it that I have repeated the figure of the species here.

## 129. Thecla Orobia, Hewitson. Plate XL. of figs. 134, 135.

UPPERSIDE. Male.—Green-blue, with the margins and a submarginal indistinct band dark brown. Anterior wing with the outer margin broadly brown: a black line at the end of the cell. Posterior wing with the costal margin broadly rufous-brown: anal angle with one tail.

UNDERSIDE dark brown. Anterior wing crossed at the middle by a band of white and pale blue spots: an indistinct spot of white near the apex: a band of blue above the median nervure: the inner margin rufous. Posterior wing with a small spot near the base and a band of minute white spots and lines at the middle, all blue bordered with black: the anal angle gold-green.

Female like the male, except that it is of a uniform rufous brown above.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

## 130. Thecla Orobiana, Hewitson. Plate XLVI. of figs. 205, 206.

UPPERSIDE. Male.—Dark blue, with the margins of both wings broadly dark brown. Anterior wing with a black line at the end of the cell. Posterior wing with one tail.

Underside dark red-brown. Both wings crossed at the middle by a band of minute pale blue spots, both with an indistinct submarginal brown band. Anterior wing rufous at the inner margin. Posterior wing with the anal angle broadly irrorated with gold-green.

Female like the male, except that it has the upperside of a uniform rufous brown, and that there are some white spots on the costal margin at the commencement of the band of blue on the underside of the anterior wing and that the apex is irrorated with grey.

Exp.  $1\frac{11}{20}$  inch.

In the Collection of H. W. Bates, from the Amazon (Ega).

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These things vary so little except occasionally in colour, that, though this is very closely allied to *T. Orobia*, I have preferred to consider it as a distinct species. It is larger, has both wings broadly margined with brown on the upperside, and on the underside is without the white spots which commence the transverse band on the costal margin of the anterior wing, and is also without the white spot near the apex and the band of blue which borders the median nervure on the wing of *T. Orobia*. The females of the two species do not differ except in size.

## 131. Thecla Erema, Hewitson. Plate XLIV. of figs. 179, 180.

UPPERSIDE. Anterior wing dark brown with cerulean blue on the inner margin: the discoidal spot and nearly the whole of the cell (which is filled with the same kind of scales) rufous. Posterior wing cerulean blue with the costal margin rufous-brown: the anal angle with two tails (one very short).

Underside rufous-brown. Both wings crossed near the middle by a band of white spots. Posterior wing with a small white spot near the base, a white circular spot before the middle, and three parallel short white linear spots at the middle of the band: outer margin broadly white marked above the anal angle by a band of black: the lobe and a spot between the tails black.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala (Vera Paz).

# 132. Thecla Hebræus. Plate XLIII. of figs. 165, 166.

Thecla Hebræus, Boisduval, MS.

UPPERSIDE. Male.—Brilliant morpho-blue, the outer margins dark brown, narrow. Anterior wing with the discoidal spot small and round, rufous. Posterior wing with one tail.

UNDERSIDE rufous clouded with darker colour. Both wings with some spots near the base and a band of dark brown spots, both with a submarginal band of less distinct spots. Posterior wing with the anal angle irrorated with pale blue: the lobe and a spot near it bordered above and below with white.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of Dr. Boisduval, from Bahia.

### 133. Thecla Ericeta, Hewitson. Plate XLIV. & figs. 177, 178.

UPPERSIDE. Male.—Brilliant glossy blue. Anterior wing with the costal margin and apical half dark brown. Posterior wing with one tail: the margin dark brown, narrow.

Underside rufous. Both wings crossed at the middle by a linear white band, both with a submarginal double band also white: the anal angle with a scarlet spot: the lobe black: a submarginal line of white: the margin brown.

Exp.  $1\frac{1}{2}$  inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala (Vera Paz).

#### 134. Thecla M album.

Thecla M album, Boisduval & Leconte, Lép. Amér. Sept. pl. 26. Westwood, Gen. Diurn. Lep. p. 486. In the Collection of W. C. Hewitson, from Mexico.

# 135. Thecla Aphaca, Hewitson. PLATE XXXVI. ♀ fig. 90.

UPPERSIDE. Female.—Dull grey, with the margins brown, broad on the anterior wing. Posterior wing with two tails.

Underside pale rufous-grey. Both wings with three linear bands and also a submarginal band of white. Posterior wing with a scarlet spot marked with black between the tails.

Exp. 15 inch.

In the Collection of W. W. Saunders, from Brazil.

I should have believed this to be the female of *M album* if Dr. Boisduval had not described and figured the female of that species as only slightly less blue than the male. In the species which I am now describing there is no blue and no distinct outer margin, the dull grey near the base blending with the brown towards the margins. It has, too, a third white band on the underside and is without the white spot near the base.

### 136. Thecla Daraba, Hewitson. Plate XXXVI. of fig. 89.

UPPERSIDE. Male.—Brown. Posterior wing with one tail: the lobe and a spot near it dark brown with a white line below them.

Underside pale rufous-grey. Both wings with a white line at the end of the cell, both crossed by several bands of white, one of which, more distinct than the others, is bordered inwardly with brown. Anterior wing with three bands beyond the middle. Posterior wing with four bands: anal angle with a black spot crowned with orange.

Exp.  $\frac{19}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

## 137. Thecla Ergina, Hewitson. Plate XLIII. of figs. 170, 171.

UPPERSIDE. Male.—Blue, with the apical margin of both wings broadly brown. Anterior wing with the discoidal spot round, rufous. Posterior wing with two tails (one very short).

Underside rufous-grey. Posterior wing with two bands of white spots near the outer margin bordered with brown, also a submarginal white line: anal angle with two large orange spots: one at the lobe, the other which is marked with black, between the tails.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Jamaica.



## 138. Thecla tephræus.

Thecla Faventia, Hewitson. PLATE XLIII. 3 figs. 172, 173. Bithys tephræus, Hübner, Zutr. f. 959, 960.

Thecla tephræus, Westwood, Gen. Diurn. Lep. p. 484.

UPPERSIDE. Male.—Glossy blue. Anterior wing with the apical half dark brown: the discal spot large, round, rufous. Posterior wing with two tails (one very short): the costal margin broad, rufous-brown: the outer margin dark brown, narrow.

Underside grey. Both wings crossed near the outer margin by a band of linear white spots slightly bordered inwardly with brown, both with a submarginal band of less distinct white spots bordered outwardly with brown, short on the anterior wing: the outer margin brown bordered inwardly with white: anal angle with the lobe black, a black spot between the tails crowned with orange.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

When figuring my T. Faventia I had passed over Hübner's figure, not supposing that it could (with the broad border of white on the underside of the posterior wing) be intended for the same species. I now believe that it is: the transverse bands of both (which are, in their want of relief of brown border, different from those of any other species) exactly agree. The submarginal white of Hübner's figure is probably exaggerated. I have found it quite impracticable, with the greatest care, to represent the transverse bands with the truth and delicacy of nature. It is quite necessary to leave some trace upon the paper for the guidance of the colourer instead of trusting to the accuracy of his eye alone; and this is of necessity often too strongly defined. My aim has been as much as possible to give the position of each spot in relation to its neighbour.

# 139. Thecla Empusa, Hewitson. Plate XLII. & figs. 158, 159.

UPPERSIDE. Male.—Blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with one tail: the costal margin rufous-brown, the outer margin dark brown, narrow.

Underside pale grey. Both wings crossed beyond the middle by a linear band of white bordered with brown, both with a submarginal band of brown spots: anal angle with two spots: one marked at its base with black, the other touching the lobe which is black.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon (Pará).

Nearly allied to T. tephræus, but differs from it in being without the discal spot, and also in having the transverse band on the underside of the anterior wing much shorter.



### 140. Thecla leucophæus. Plate XXXIX. of fig. 125.

Bithys leucophæus, Hübner, Zutr. f. 87, 88.

Thecla leucophæus, Westwood, Gen. Diurn. Lep. p. 485.

In the Collection of W. C. Hewitson, from the Amazon.

# 141. Thecla Dindymus. Plate XXXIX. & fig. 126.

Papilio Dindymus, Cramer, pl. 46. f. E, G.

Thecla Dindymus, Westwood, Gen. Diurn. Lep. p. 485.

In the Collection of W. C. Hewitson, from the Amazon.

## 142. Thecla Sphinx. PLATE XXXIX. ♀ fig. 124.

Bithys Sphinx, Hübner, Zutr. f. 635, 636.

Thecla Dindymus Q, Westwood, Gen. Diurn. Lep. p. 485.

UPPERSIDE. Male.—Anterior wing dark brown, with a band of blue near the inner margin: the discal spot unusually large, rufous near the base. Posterior wing blue: the costal margin and apex broadly brown, the outer margin narrow.

Female like the male, except that it is of a rufous brown above with the blue dull and pale.

In the Collection of W. C. Hewitson, from Brazil.

I have omitted any reference to the descriptions of Fabricius and Godart, since they would be applicable to any of the four species which I have put together on the plate in order to compare the peculiar arrangement of the band of spots by which each of them is crossed. I believe them to be distinct species. Hübner's figure, which, he says, is that of a female, has the brighter colouring of the male, but without the discal spot. A female in the British Museum has the centre of the anterior wing pale rufous, and the underside of a pure white.

### 143. Thecla Stilbia, Hewitson. Plate XXXIX. & fig. 127.

UPPERSIDE. Male.—Blue. Anterior wing with the costal margin and apical half dark brown. Posterior wing with two tails (one very short): the costal margin broadly rufous-brown: the outer margin dark brown, narrow.

Underside grey, paler towards the outer margins. Both wings crossed beyond the middle by a band of white spots bordered inwardly with brown, both with a submarginal band of brown spots: anal angle of the posterior wing with the lobe black, and a small scarlet spot between the tails marked with black.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson.



# 144. Thecla Syedra, Hewitson. Plates XXXIX. & XLI. figs. & 128, 129, var. 145.

UPPERSIDE. Male.—Blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with one tail: the costal margin broadly rufous-brown, the outer margin dark brown, narrow.

Underside rufous. Both wings crossed by a rather broad band of white bordered inwardly with brown. Posterior wing with a submarginal brown band bordered inwardly with white, commencing near the apex by two brown spots: anal angle with a large spot of scarlet and a smaller one touching the lobe, which is black.

Female like the male, except that it is larger and rufous-brown above and that the posterior wing has the lobe of the anal angle orange.

Var. Male (fig. 145).—The underside paler, the band of the posterior wing commencing at the costal margin in a separate white spot.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

# 145. Thecla Enenia, Hewitson. Plate XLI. & figs. 146, 147.

UPPERSIDE. Male.—Green-blue. Anterior wing with the costal and apical half dark brown. Posterior wing with two tails (one very short): the costal margin broadly rufous-brown, the outer margin dark brown, narrow: the anal angle with the lobe slightly spotted with scarlet.

Underside pale grey, rufous near the apex of the anterior wing. Anterior wing crossed by a linear band of white bordered inwardly with brown, and by a submarginal band of brown spots. Posterior wing crossed at the middle by a rather broad linear band of white, and near the outer margin, which is broadly white, by a band of brown spots, one of which, near the apex, is large: anal angle with a spot of scarlet marked at its base with black: the lobe black.

Female like the male, except that it is rufous-brown on the upperside darker near the outer margin of the anterior wing.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. C. Hewitson.

# 146. Thecla Eribera, Hewitson. Plate XLII. of figs. 154, 155.

UPPERSIDE. Male.—Brilliant violet-blue: the costal and outer margins dark brown, broadest at the apex of the anterior wing. Anterior wing with the discal spot small, rufous, nearer the base than usual. Posterior wing with one tail.

Underside rufous. Anterior wing brown from the base to the middle, where it is crossed by a band of dark brown followed by irrorations of white. Posterior wing with a broad sub-

marginal band of pale blue divided by the nervures: the lobe and a spot near it dark brown bordered above with pink, bordered below and between them with pale blue.

Exp. 13 inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

# 147. Thecla Syncellus. Plate XLVI. & figs. 207, 208.

Papilio Syncellus, *Cramer*, pl. 334. f. A, B. Polyommatus Syncellus, *Godart*, *Enc. Méth.* p. 626.

Thecla Syncellus, Westwood, Gen. Diurn. Lep. p. 484.

Female.—Sometimes much larger than the male and of a much paler blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with the costal and outer margin rufous-brown, on the underside rufous. Anterior wing crossed at the middle by a band of brown bordered outwardly with white. Posterior wing with a linear band of white beyond the middle bordered inwardly with brown: a submarginal band of brown very indistinct, except near the anal angle, where it is broadly bordered above with blue-white: the lobe, a spot between the tails, and the space between them (which is irrorated with white) dark brown, all bordered above with orange.

In the Collection of W. C. Hewitson, from the Amazon.

If Godart's description had not fixed the identity of this species, Cramer's figure, which is not at all like it, would not have been legible.

#### 148. Thecla Bitias.

Papilio Bitias, Cramer, pl. 104. f. E. Thecla Syncellus, var., of Godart and Westwood.

If this is a variety of Syncellus, T. Eribæa must also be one.

### 149. Thecla Essus.

Thecla Essus, Herrich-Schäffer, Samml. aussereurop. Schmet. f. 59, 60.

In the Collection of W. C. Hewitson, from the Amazon.

# 150. Thecla punctum. Plate XL. & figs. 132, 133.

Q. Thecla punctum, Herrich-Schäffer, Samml. aussereurop. Schmet. f. 57, 58.

In the Collection of H. W. Bates, from the Amazon.

The male is without the small white spot which marks the underside of the posterior wing of the female before the middle.

# 151. Thecla Echelta, Hewitson. PLATE XLIV. & figs. 187, 188.

UPPERSIDE. Male.—Lilac-blue. Both wings crossed by a very broad central band of

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dark brown: the outer margins dark brown. Anterior wing with the costal margin brown: the discal spot small, round, rufous. Posterior wing with one tail.

Underside rufous and grey. Both wings crossed beyond the middle by a linear band of small indistinct white spots bordered with brown. Posterior wing with a small indistinct spot of white and brown near the middle of the costal margin, and some submarginal brown spots near the anal angle which has the lobe black crowned with scarlet, and a scarlet spot marked at its base with black.

Exp. 12 inch.

In the Collection of H. W. Bates, from the Amazon (Tapajos).

## 152. Thecla Ophelia, Hewitson. Plate XLVI. of figs. 209, 210.

UPPERSIDE. Male.—Brilliant glossy blue. Anterior wing with the costal margin and apical half dark brown: the discal spot small, round, rufous. Posterior wing with one tail: the costal and outer margin brown, rather broad.

Underside rufous, spotless, except near the anal angle of the posterior wing, where it is crossed by two short bands of white spots bordered with brown: the lobe, the space between it and the tail black.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon.

Probably only a variety of *T. punctum*, with a very slight trace of the transverse bands of white spots, and no trace of the spots at the anal angle. In this species there is a black spot between the lobe and the tail, which does not occur in *T. punctum*.

# 153. Thecla Ostia, Hewitson. Plate XL. of figs. 130, 131.

UPPERSIDE. Male.—Green-blue. Anterior wing with the costal margin and outer half dark brown: the discal spot small, round, rufous. Posterior wing with one tail: the apex and outer margin dark brown.

Underside dark rufous and grey. Anterior wing crossed near the outer margin by a linear band of five white spots bordered inwardly with brown. Posterior wing with a white line before the middle: crossed beyond the middle by two bands of linear white spots bordered with brown: anal angle with the lobe and a spot near it brick-red marked below with black, the space between them irrorated with grey: a submarginal white line.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Rio de Janeiro.

This is nearly allied to *T. punctum*, but of different form; the white spots on the underside of the posterior wing are differently placed, and the male has the white spot below the base which is only on the female of *T. punctum*.

## 154. Thecla Genena, Hewitson. PLATE XLIV. of figs. 185, 186.

UPPERSIDE. Male.—Green. Anterior wing with the costal margin and apical half dark brown: the discal spot small, rufous. Posterior wing with one tail; the costal and inner margins broadly rufous-brown: the outer margin dark brown, narrow: the anal lobe carmine.

Underside rufous-brown. Both wings crossed by a linear band beyond the middle, brown on the anterior wing bordered outwardly by paler colour: white on the posterior wing and bordered inwardly with brown. Posterior wing with some indistinct brown spots near the outer margin and a submarginal white line: anal angle with a large scarlet spot marked at its base with black: the lobe black bordered above with scarlet.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

### 155. Thecla Endera, Hewitson. PLATE XLII. of figs. 156, 157.

UPPERSIDE. Male.—Green. Anterior wing with the outer half brown, the discal spot oval, rufous. Posterior wing with one tail: the costal margin broadly rufous-brown, the outer margin dark brown.

Underside rufous-brown. Anterior wing crossed beyond the middle by a linear band of white margined inwardly with brown, and by a submarginal band of brown. Posterior wing crossed beyond the middle by two bands of white bordered with brown: anal angle with two scarlet spots: one large, cordate and bordered with black, the other smaller, touching the lobe which is black.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of the British Museum, from the Amazon (Ega).

This species is very closely allied to *T. Genena*, but differs from it chiefly in the different form of the inner band on the underside of the posterior wing, which in this species is slightly out of a straight line between the scarlet spot and the inner margin, whilst in *T. Genena* it forms a semicircle.

### 156. Thecla Emessa, Hewitson. Plate XLII. of figs. 160, 161.

UPPERSIDE. Male.—Green. Anterior wing with the costal margin and apical half dark brown: the discal spot large, dark brown. Posterior wing with two tails: the costal margin and apex broadly brown, the outer margin dark brown, narrow: anal angle with the lobe black marked with a spot of scarlet.

Underside orange-grey. Both wings crossed beyond the middle by a linear band of white bordered with brown, both with a submarginal band of brown spots: anal angle with a pale scarlet spot between the tails: the lobe black bordered above with scarlet.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. W. Saunders, from the Amazon.

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## 157. Thecla Eliatha, Hewitson. Plate XLI. of figs. 141, 142.

UPPERSIDE. Male.—Green-blue. Anterior wing with the margins dark brown: the discal spot large, of two colours, rufous-orange and grey-brown. Posterior wing with two tails (one very short).

Underside rufous and grey-brown. Anterior wing crossed beyond the middle by a band of five brown spots bordered outwardly with dull white: some scarcely seen brown spots near the outer margin. Posterior wing crossed beyond the middle by two bands of white spots: the first band of linear spots bordered inwardly with dark brown, the outer band of conical spots bordered below with brown: a submarginal white line: the anal angle with a scarlet spot marked at its base with black, the lobe black, and the space between irrorated with white.

Female like the male, except that it is of a dull grey blue on the upperside.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson, from Brazil.

# 158. Thecla Perola, Hewitson. Plates XL. & XLVI. figs. ≥ 211, 212, ♀ 137, 138.

UPPERSIDE. Male.—Brilliant blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with two tails: the costal margin broadly rufous, the outer margin dark brown, narrow.

Underside rufous and grey. Both wings crossed by a linear band of white spots bordered with brown, and a submarginal band of brown bordered on both sides with white on the posterior wing. Posterior wing with the shoulder projected; the anal angle with two scarlet spots: one at the lobe which is black, the other marked with black at its base, between the tails. Anterior wing dark brown where the wings meet.

Female like the male, except that it is of a paler blue above, that the underside is paler and the central transverse band of the posterior wing less curved at its commencement on the costal margin.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. W. Saunders and H. W. Bates, from the Amazon (St. Paulo).

### 159. Thecla Fidena, Hewitson. Plate XLIV. of figs. 183, 184.

UPPERSIDE. Male.—Dark brown. Anterior wing marked with blue at the base of the inner margin. Posterior wing with one tail: its centre blue.

Underside rufous. Anterior wing crossed beyond the middle by a linear band of brown spots. Posterior wing crossed at the middle by a linear band of white spots bordered inwardly with brown, commencing at the costal margin by a spot of larger size: a submarginal band of brown spots: the anal angle brown, marked with dull brick-red and irrorated with white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson.

# 160. Thecla Gadira, Hewitson. PLATE XLIV. Q figs. 181, 182.

UPPERSIDE. Female.—Blue. Anterior wing with the costal margin which is slightly sinuated, and the apical half dark brown. Posterior wing with the margins broadly brown.

Underside grey. Anterior wing crossed beyond the middle by three or four linear white spots without a border of brown. Posterior wing with a spot near the middle of the costal margin, and beyond the middle two bands of white spots, indistinct because without the usual border of brown: anal angle with a scarlet spot marked at its base with black: the lobe black.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala (Polochic Valley).

This species which is of peculiar form, having the costal margin sinuated as in Symmachia, is apparently without a tail. I have only seen one example, and the tail does not appear to have been broken off.

# 161. Thecla Stagira, Hewitson. Plates XXXIX. & XLIII. d figs. 120, 121, 167.

Var. Thecla Erenea. Plate XLII. of figs. 163, 164.

UPPERSIDE. Male.—Glossy steel-blue, the outer margins brown, narrow. Anterior wing with the discal spot rather large, oblong, of two colours, dark brown and rufous. Posterior wing with two tails.

Underside rufous. Both wings crossed beyond the middle by a linear band of spots, brown on the anterior wing, white bordered inwardly with brown on the posterior wing. Posterior wing with a submarginal band of brown spots: anal angle with the lobe black, and a scarlet spot marked at its base with black.

Var. a. Male (figs. 163, 164).—With the brown on the outer margin of the anterior wing narrower; the band on the underside of the posterior wing less curved.

Var. b. Male (fig. 167).—Smaller, with the band on the underside of the anterior wing nearer the outer margin.

Exp. 11, var. b. 12 inch.

In the Collections of the British Museum and H. W. Bates, from the Amason (Santarem), and of W. C. Hewitson (variety b), from Rio de Janeiro.

This species differs considerably both in the position and curve of the band of the underside, so much so in the variety to which I had given the name of *Erenea* as at first to lead me to suppose that it might be another species.

### 162. Thecla Ericusa, Hewitson. PLATE XLII. 2 fig. 162.

UPPERSIDE. Female.—Rufous-brown. Posterior wing with one tail: a submarginal band of dark brown spots bordered below by a white line, and above by pyramidal white spots.

Underside rufous and grey. Anterior wing crossed beyond the middle by a linear band

of brown, slightly bordered outwardly with white. Posterior wing crossed at the middle by a band of brown spots bordered outwardly with white, and by a submarginal band of rufous-brown lunular spots: anal angle with a small orange spot marked at its base with black, the space between it and the lobe (which is black) brown, irrorated with pale blue.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. W. Saunders, from Brazil.

### 163. Thecla Eretria, Hewitson. Plate XLII. ♀ fig. 153.

UPPERSIDE. Female.—Dark brown. Posterior wing with two tails (one very short): the outer margin dark brown, with a submarginal line and the fringe white: three or four brown spots near the anal angle: the lobe black, marked by a small scarlet spot.

Underside rufous. Both wings crossed beyond the middle by a linear white band bordered inwardly with brown: both wings with a band of dark brown spots bordered on both sides with white, bisected on the posterior wing by bands of orange: a large space of orange at the anal angle marked with a large black spot between the tails, the lobe black, the space between them brown, irrorated with white: both wings with the margin brown: a submarginal line and the fringe white.

Exp. 17 inch.

In the Collection of the British Museum, from Northern China.

## 164. Thecla Dinus. Plate XLIII. ♀ figs. 174, 175.

Thecla Dinus, Boisdwal, MS.

UPPERSIDE. Female.—Blue. Anterior wing with the costal and outer margins broadly dark brown. Posterior wing without tails: with the apex and outer margin broad rufous-brown.

Underside rufous. Anterior wing with a large spot of brown at the middle of the costal margin and a submarginal band of brown spots from the apex to the middle. Posterior wing clouded with dark brown: a spot of brown near the base and two bands of brown spots: the anal angle which is dark brown, and the band above it irrorated with white: the lobe black.

Exp. 14 inch.

In the Collection of Dr. Boisduval, from Brazil.

#### 165. Thecla Ematheon.

Papilio Ematheon, Cramer, pl. 163. f. F, G; Fubricius, Species Ins. ii. p. 114. Polyommatus Ematheon, Godart, Enc. Méth. p. 624. Theela Ematheon, Westwood, Gen. Diurn. Lep. p. 484.

I omitted to enter this and the following species where they ought to have come earlier in the work, because I had hopes of receiving specimens from Cayenne by which to identify Cramer's figures. I find it, however, impracticable, from the acquisition of new species, to keep any order in their arrangement as I proceed with the work.

### 166. Thecla Phalanthus.

Papilio Phalanthus, Cramer, pl. 333. f. C, D. Polyommatus Ismarus Q, Godart, Enc. Méth. p. 631. Thecla Ismarus Q, Westwood, Gen. Diurn. Lep. p. 484.

### 167. Thecla Ismarus.

Papilio Ismarus, Cramer, pl. 176. f. E. Polyommatus Ismarus, Godart, Enc. Meth. p. 631. Theela Ismarus, Westwood, Gen. Diurn. Lep. p. 484.

This and the two preceding species, which are unlike anything I have seen, will come best near Polybe and Atys.

### 168. Thecla Arogeus.

Papilio Arogeus, Cramer, pl. 333. f. A, B. Polyommatus Arogeus, Godart, Enc. Méth. p. 623. Theela Arogeus, Westwood, Gen. Diurn. Lep p. 484.

This species ought to come next to T. Acmon.

### 169. Thecla Elis.

Papilio Elis, Cramer, pl. 233. f. D. Polyommatus Elis, Godart, Enc. Meth. p. 625. Thecla Elis, Westwood, Gen. Diurn. Lep. p. 484.

#### 170. Thecla Inachus.

Papilio Inachus, Cramer, pl. 36. f. D. Polyommatus Inachus, Godart, Enc. Meth. p. 627. Thecla Inachus, Wastwood, Gen. Diurn. Lep. p. 484.

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## 171. Thecla Carpasia, Hewitson. Plate XLVII. figs. 223, 224.

Thecla Carpasia, Hewitson, Descr. of Thecla, p. 15. no. 35.

UPPERSIDE blue-green: the nervures black. Anterior wing with the outer half dark brown. Posterior wing with two tails: the apex broadly dark brown: the outer margin and anal angle black, marked by a band of silver-blue spots.

Underside olive-brown, with the nervures of the posterior wing black. Anterior wing with two spots of scarlet and three of silver-green at the base. Posterior wing with the base, the inner margin, and anal angle black, marked by five spots of scarlet and by several spots of silver-green and white, three near the base of the costal margin, one below these, four on the inner margin, and eight at the anal angle.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of W. C. Hewitson, from Mexico.

This beautiful species comes near to T. Atys.

## 172. Thecla Carpophora, Hewitson. Plate XLVII. & figs. 221, 222.

Thecla Carpophora, Hewitson, Descr. of Thecla, p. 16. no. 36.

UPPERSIDE. Male.—Blue: the margins dark brown, rather narrow. Anterior wing with an oblong discal spot of two parts, half in the cell, half beyond it: anal angle of the posterior wing (which has one tail) irrorated with white.

Underside red-brown: the base of the costal margin of both wings crimson. Anterior wing with a minute white spot at the base, a line from the costal margin, and two spots below it between the median nervures white. Posterior wing with two or three minute spots at the base, a spot near the base of the costal margin, a circular spot, four spots at the middle, two linear spots near the inner margin, a subanal band, two spots above the lobe, a line at the base of the tail, and part of the fringe white: the lobe and the usual spot black.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Mexico.

### 173. Thecla Carthea, Hewitson. Plate XLVII. & figs. 215, 216.

Thecla Carthæa, Hewitson, Descr. of Thecla, p. 15. no. 34.

UPPERSIDE. Male.—Violet-blue, tinted with green towards the margins. Anterior wing with the apex dark brown. Posterior wing with one tail and three or four spots of gold-green at the anal angle.

Underside olive-brown: the nervures black. Anterior wing with three spots of scarlet and three spots of gold-green near the base: a trifid spot of gold-green near the middle of the

costal margin. Posterior wing with one spot of scarlet and one spot of gold-green at the base: anal angle with six or seven gold-green spots.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from Mexico.

Near T. Halesus.

# 174. Thecla Aufidena, Hewitson. PLATE XLVII. of figs. 213, 214.

UPPERSIDE. Male.—Brilliant lilac-blue, with the margins (which are very narrow) dark brown. Posterior wing with two tails: the lobe orange.

UNDERSIDE dark brown. Both wings crossed obliquely by three equidistant bands of white. Anterior wing with a small spot of orange at its base. Posterior wing with a double band of white near its inner margin: a large conical orange spot between the tails, the lobe black broadly bordered with orange.

Exp.  $1_{20}^{9}$  inch.

In the Collection of W. C. Hewitson, from Nicaragua.

Nearly allied to T. Battus. On the underside it scarcely differs from Erybathis.

## 175. Thecla Bassania, Hewitson. Plate XLVII. of figs. 217, 218.

Thecla Bassania, Hewitson, Descr. of Thecla, p. 14. no. 33.

UPPERSIDE. Male.—Brilliant blue. Anterior wing with the costal margin and more than the apical half dark brown. Posterior wing with two tails: the costal and inner margins broadly rufous-brown: the outer margin narrow, dark brown.

Underside rufous-grey or stone-colour. Both wings with two lines of white at the end of the cell: both crossed by a band of rufous-brown bordered on both sides with undulated white lines: both with two submarginal bands of irregular white spots and a line of white. Posterior wing with a band near the base bordered on both sides with white: the lobe and black spot between the tails bordered above with orange.

Exp.  $1_{10}^3$  inch.

In the Collection of W. C. Hewitson, from Mexico.

### 176. Thecla Catadupa, Hewitson. Plate XLVII. of figs. 219, 220.

UPPERSIDE. Male.—Brilliant blue, with the outer margins very broadly dark brown. Posterior wing with one broad tail, the anal lobe large.

Underside grey-brown, darker on the posterior wing. Anterior wing crossed beyond

the middle by a broad band of brown and a submarginal narrow band both bordered on each side with white. Posterior wing crossed by three equidistant brown bands.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. C. Hewitson, from Ecuador.

Nearest to T. umbratus.

### 177. Thecla Selina, Hewitson. Plate L. 9 fig. 255.

UPPERSIDE. Female.—Rufous-brown. Posterior wing with two tails: the lobe black, with a small spot of white above it.

Underside. Anterior wing rufous-brown with two indistinct submarginal brown lines: the anal angle grey. Posterior wing rufous-brown, crossed before the middle by a band of yellow, followed by a broad band of black, traversed by a band of pale-blue spots and a scarcely-seen band of paler colour, succeeded near the outer margin by an ochreous band and by a band at the anal angle of silvery green.

Exp.  $1\frac{8}{10}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

I believed this, the Amazon insect, to be a variety only of *T. Pholeus* of Cramer, until I had received specimens of that species from Cayenne. I now believe them to be distinct, and, though the males scarcely differ, the females, as will be seen by the figures, are not much like each other.

### 178. Thecla Bactriana, Hewitson. Plate L. of figs. 252, 253.

Thecla Bactriana, Hewitson, Descr. of Thecla, p. 11. no. 26.

UPPERSIDE. Male.—Dark brown. The base and inner margin of the anterior wing and the whole of the posterior wing (except the costal margin, which is rufous-brown) blue. Anterior wing with the discal spot before the middle, large, oval, and red-brown.

Underside pale ochreous. Anterior wing with the costal half (which is marked by a linear spot at the base, a trifid spot at the middle, and two small white spots near the apex) dark brown. Posterior wing with two tails; a broad band near the base, and a band at the middle (which is marked by several small pale-blue spots) dark brown: two subanal bands of black and a submarginal line of white at the base of the tails.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of H. W. Bates, from Amazon.

### 179. Thecla Bebrycia, Hewitson. Plate L. 9 figs. 258, 259.

Thecla Bebrycia, Hewitson, Descr. of Thecla, p. 13. no. 30.

UPPERSIDE. Male.—Dark grey-brown. Anterior wing with a dark brown discal spot within the cell. Posterior wing with one tail: a conspicuous black spot crowned with orange at the base of the tail, the lobe rufous, the space between them brown, all bordered below with white: the fringe white.

Underside rufous-grey or stone-colour, slightly tinted with lilac on the posterior wing. Both wings crossed beyond the middle by a band of scarlet, slightly bordered outwardly with brown, and more distinctly with white. Posterior wing with the lobe, a spot near it, and the spot at the base of the tail black, bordered above with scarlet: a submarginal line of white: the margin black below these spots.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Mexico.

## 180. Thecla Brescia, Hewitson. Plate L. of figs. 260, 261.

Thecla Brescia, Hewitson, Descr. of Thecla, p. 13. no. 31.

UPPERSIDE. Male.—Blue. Anterior wing with the discal spot small, round, pale brown, placed beyond the cell: the costal and outer margins brown. Posterior wing with two tails: costal and inner margins broadly rufous-brown: the outer margin narrow, black: the lobe orange: a small spot of brown between the tails.

Underside grey or stone-colour, tinted with lilac. Both wings crossed beyond the middle by a band of dark brown bordered outwardly with white: both with a submarginal band of brown, very indistinct on the anterior wing, bordered inwardly with white on the posterior wing: the lobe, the spot between the tails, and part of the space between them black, bordered above with scarlet.

Exp. 13 inch.

In the Collection of W. C. Hewitson, from Mexico.

Very like the last described on the underside, but quite different above. I fear that this is only another variety of *T. Stagira*, a species which has given me a good deal of trouble.

## 181. Thech. Vibidia, Hewitson. Plate XLIX. & figs. 242, 243.

UPPERSIDE. Male.—Blue. Anterior wing with the costal and outer margins broadly brown: the discal spot which is within the cell, rufous, oval. Posterior wing with two tails: the outer margin dark brown.

Underside rufous-brown, darker on the posterior wing. Anterior wing crossed near the apex by a band of very indistinct brown spots bordered with paler colour. Posterior wing



crossed beyond the middle by a band of white spots bordered inwardly with white, commencing on the costal margin by a round spot lower down than the rest: a submarginal band of white spots bordered outwardly with brown: the lobe black, bordered above with scarlet and white: a small orange spot marked with black between the tails, at a distance from the outer margin: a submarginal line of white above the tails.

Exp.  $1_{\frac{4}{10}}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

Near to T. punctum, but of different form and colour.

## 182. Thecla Voconia, Hewitson. Plate XLIX. of figs. 244, 245.

UPPERSIDE. Male.—Glossy steel-blue, with the outer margins brown. Anterior wing with a round discal brown spot. Posterior wing with two tails.

Underside rufous-brown, tinted with lilac. Both wings crossed beyond the middle by a band of distinct round dark brown spots, curved on the anterior wing, and composed of six spots bordered with paler colour, bordered on the posterior wing with white: both with a submarginal band of brown spots scarcely seen on the anterior wing. Posterior wing with the anal angle irrorated with white, the lobe black, the spot between the tails small, scarlet marked with black, the space between them irrorated with blue.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. C. Hewitson.

Of the same peculiar colour as T. Stagira, and a good deal like figure 167, but can hardly be another variety of that variable species. I do not know the locality.

### 183. Thecla Zebina, Hewitson. Plate XLIX. of figs. 237, 238.

UPPERSIDE. Male.—Dark brown, with the base of both wings grey. Posterior wing with two tails: the lobe (which has an orange spot), a spot between the tails, two or three spots outside of this, and the spot between it and the lobe dark brown: a submarginal white line.

Underside rufous, tinted with lilac. Both wings crossed beyond the middle by a band of white bordered inwardly with brown: both with an indistinct submarginal band: the lobe and a spot near it black bordered above with orange: a lunular orange spot between the tails (at a distance from the outer margin) marked with black.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Nicaragua.



## 184. Thecla Orcynia, Hewitson. Plate L. figs. 3 262, 264, ♀ 263, 265.

Thecla Orcynia, Howitson, Descr. of Thecla, p. 11. no. 25.

UPPERSIDE. Male.—Dark brown. Anterior wing with the basal half nearly (except the costal margin) brilliant blue. Posterior wing (except the base and margins, which are rufous-brown) brilliant blue: the outer margin dark brown.

UNDERSIDE pale stone-colour. Both wings crossed beyond the middle by a band of white, slightly bordered inwardly with brown. Anterior wing with a submarginal band of white. Posterior wing with one tail and three submarginal white bands: the lobe and the spot at the base of the tails black bordered above with scarlet and yellow.

Female.—Grey-brown. Anterior wing with the outer half dark brown. Posterior wing with the lobe scarlet: two dark brown spots at the base of the tail: a submarginal line of white. Underside as in the male, except that the white band of the posterior wing is somewhat different in form, and the anal scarlet spots much more distinct.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala (Polochic valley).

I have little doubt that these are sexes of the same species, although they differ considerably (which is very unusual in this genus) in the position of the white spots of the band on the underside.

### 185. Thecla Keila, Hewitson. Plate LII. of figs. 280, 281.

UPPERSIDE. Male.—Dark blue. Anterior wing dark brown, blue below the median nervures: the black discal spot unusually near the base. Posterior wing with two tails: the costal margin brown: the lobe black, slightly crowned with scarlet.

Underside grey or drab. Both wings crossed beyond the middle by a band of white bordered inwardly with brown: both with a submarginal band of white spots bordered below with brown. Posterior wing with the lobe and spot between the tails black, crowned with orange.

Female.—Brown, darker towards the outer margins: the base of the anterior wing and the centre of the posterior wing tinted with blue. Posterior wing with the lobe orange.

Exp. 1 inch.

In the Collection of Messrs. Salvin and Godman, from Guatemala (Polochic valley).

Very near to T. Orcynia, with which I believed it to be identical until I noticed the black discal spot. I have described the female from the collection of Dr. Herrich-Schäffer.

# 186. Thecla Thoria, Hewitson. Plate XLIX. figs. & 240, ♀ 239, 241.

UPPERSIDE. Male.-Lilac-blue. Anterior wing dark brown, lilac-blue from the inner

margin to the first median nervure: the discal spot large and of two colours, black within the cell, rufous beyond it. Posterior wing with one tail, lilac-blue, the apex rufous-brown.

Underside pale rufous-brown. Both wings crossed beyond the middle by an indistinct band of white bordered inwardly with brown. Posterior wing with a submarginal band of very indistinct brown spots bordered on both sides with white: the lobe black bordered above with orange: an orange spot at the base of the tail marked with black.

Female.—Grey. Anterior wing, with the costal margin and more than the outer half rufous-brown. Posterior wing with the outer margin rufous-brown. On the underside like the male, but more rufous.

Exp.  $\vec{\sigma}_{10}^{9}$  to  $1\frac{2}{10}$ ,  $21\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson and W. W. Saunders, from Venezuela.

One of my specimens is without the black part of the discal spot, and has the other half paler and more distinct. It varies much in size.

### 187. Thecla Tiasa, Hewitson. Plate XLVIII. ♀ figs. 229, 230.

UPPERSIDE. Female.—Rufous-brown. Posterior wing with two tails and a submarginal line of white: the lobe scarlet.

Underside rufous. Both wings crossed beyond the middle by a band of brown bordered outwardly with white, with an unusual bend at the middle of the posterior wing, and ending above the anal angle in a semicircle: both with a very indistinct submarginal band of brown: the lobe and a triangular black spot between the tails broadly bordered above with scarlet: a submarginal white line, the margin black.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

# 188. Thecla Thestia, Hewitson. Plate XLVIII. ♀ figs. 231, 232.

UPPERSIDE. Female.—Rufous-brown, with the basal half of both wings grey. Posterior wing with two tails, and a submarginal white line: the lobe scarlet.

Underside rufous. Both wings crossed beyond the middle by two bands of brown: the first band, which is much broken on the posterior wing, bordered outwardly with white, the submarginal band bordered inwardly with white: the lobe bordered above with scarlet: a large conical spot between the tails (which is marked by a triangular black spot), and a large spot outside of this, scarlet, the space between it and the lobe (which is grey) bordered above with scarlet: a submarginal white line.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Amazon.



## 189. Thecla Voltinia, Hewitson. PLATE XLVIII. ♀ figs. 227, 228.

UPPERSIDE. Female.—Rufous-brown: the basal half of the wings blue-grey. Posterior wing with two tails: the lobe scarlet.

Underside rufous, pale. Posterior wing crossed beyond the middle by a band of white spots bordered inwardly with brown: a submarginal band of brown bordered inwardly with white: the lobe black broadly bordered above with scarlet: a large scarlet spot between the tails marked with black: a submarginal line of white.

Exp. 14 inch.

In the Collection of W. W. Saunders, from Amason.

# 190. Theola Volana, Hewitson. Plate XLVIII. Q figs. 225, 226.

UPPERSIDE. Female.—Grey, with the margins broadly rufous-brown. Posterior wing with two tails: the anal angle with two brown spots and a submarginal white line: the lobe orange.

Underside rufous, pale. Both wings crossed beyond the middle by a band of brown bordered outwardly on the anterior wing with paler colour, on the posterior wing with white: both with a submarginal band of pale brown. Posterior wing with a lunular carmine spot between the tails: the lobe and a spot near it black: the margin black: a submarginal line below the tails and the fringe white.

Exp. 12 inch.

In the Collection of W. W. Saunders, from Amazon.

I have not seen any males which I can pair with the four last described species.

#### 191. Thecla Aon.

Thecla Aon, Lucas in Ramon de la Sagra, Hist. Nat. de Cuba, vii. pl. 16. fig. 6, p. 610.

The female of this species is like three of those last described, but does not quite agree with any of them.

# 192. Thecla Ocrisia, Hewitson. Plate XLVIII. figs. of 286, ♀ 235.

Theela Ocrisia, Hewitson, Deser. of Theela, p. 5. no. 12.

UPPERSIDE. Male.—Dark grey-brown. Anterior wing with the basal half smooth: the discal spot pale brown, round, and near the base. Posterior wing with the outer half except the apex cerulean blue: a submarginal series of lunular pale-blue spots.

Underside dark brown. The outer margins of both wings marked with lunular brown spots, bordered with dull white. Anterior wing crossed beyond the middle by two black bands, the inner band bordered outwardly with dull white: the discal spot (which is seen on

Published April 1869.

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this side of the wing) is bordered outwardly with white: the apex grey-white. Posterior wing marked near the centre by several indistinct irregular lunular spots of pale colour: a submarginal band of pale spots: a black spot between the tails crowned with orange: the anal angle grey.

Female.—Dark brown, except the inner half of the posterior wing, which is cerulean blue: the lobe of the anal angle and three spots near it dark brown. The underside is like that of the male.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from Ecuador and Mexico.

A variable species. In some specimens the blue on the posterior wing is confined to the marginal lunular spots.

### 193. Thecla Ocrida, Hewitson. Plate XLVIII. figs. ♂ 233, ♀ 234.

' Thecla Ocrida, Hewitson, Descr. of Thecla, p. 5. no. 11.

UPPERSIDE. Male.—Dark brown. Anterior wing blue from the inner margin to the first median nervure: the discal spot large and of two colours. Posterior wing blue, with two tails: the margins dark brown.

UNDERSIDE grey, clouded with dark brown from the base to beyond the middle. Both wings crossed beyond the middle by a band of dark brown, paler on its outer border. Anterior wing with a submarginal brown band. Posterior wing with the anal angle yellow: the lobe and the spot near it black.

Female with the upperside dark grey-brown: the posterior wing with a line of white above the tails: the underside as in the male, except that the anal angle of the anterior wing is yellow, and the whole outer margin of the posterior wing broadly yellow, marked by small submarginal spots of brown.

Exp.  $1\frac{2}{10}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

### 194. Thecla Thyesta, Hewitson. Plate XLIX, of figs. 248, 249.

UPPERSIDE. Male.—Lilac-blue. Anterior wing with the margins dark brown: the discal spot black. Posterior wing with two tails.

Underside pale, stone-colour. Both wings crossed beyond the middle by a band of white bordered inwardly with brown, both with some scarcely seen submarginal spots: the lobe and the spot between the tails orange, each marked by a black spot bordered above and below with white.

Exp.  $1\frac{1}{20}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

This species is near to T. Tephræus.

### 195. Thecla Celida, PLATE XLIX. & figs. 246, 247.

Thecla Celida, Lucas in Ramon de la Sagra, His. Nat. de Cuba, vii. p. 610.

UPPERSIDE. Male.—Bright cerulean blue. Anterior wing with the apical half dark brown: a large black discal spot. Posterior wing with two tails: the outer margin dark brown, narrow.

Underside pale blue-grey. Both wings with a linear spot at the end of the cell: both crossed at the middle by a band of white spots bordered inwardly with brown: both crossed beyond the middle by a second band of lunular white spots bordered outwardly with brown. Posterior wing with a subbasal band of three white spots: anal angle with the lobe, the spot between the tails (which is crowned with orange), and a spot between them black.

Exp.  $1\frac{1}{20}$  inch.

In the Collections of Dr. Boisduval and W. C. Hewitson, from Cuba.

# 196. Thecla Zigira, Hewitson. PLATE XLIX. of figs. 250, 251.

UPPERSIDE. Male.—Brilliant green-blue. Anterior wing with the inner margin convex: the costal margin, apex, and part of the outer margin dark brown. Posterior wing with two tails: the costal margin rufous-brown, polished where the wings meet: the outer margin brown, very narrow.

Underside white. Both wings crossed beyond the middle by a linear band of brown. Anterior wing black bordering the projecting shoulder of the posterior wing. Posterior wing with the lobe black bordered above with orange-yellow: the spot between the tails orange-yellow, marked by a small triangular black spot.

Female smaller, grey-brown, darker nearer the outer margins. On the underside it does not differ from the male, except in being without the projecting shoulder of the posterior wing and the black which borders it on the anterior wing.

Exp. 15 inch.

In the Collections of H. W. Bates and W. C. Hewitson, from Amazon (Santarem) and Venezuela.

# 197. Thecla Timesa, Hewitson. Plate LI. ♀ figs. 268, 269.

UPPERSIDE. Female.—Rufous-brown, grey near the base. Anterior wing darker towards the outer margin. Posterior wing with two tails and a submarginal band of brown, broken into spots near the anal angle: the lobe scarlet: a submarginal line of white.

Underside rufous, pale. Both wings crossed beyond the middle by a band of brown bordered outwardly with white, straight on the anterior wing and at a right angle with the costal margin: both with a submarginal band of brown bordered on both sides with

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white on the posterior wing: the lobe black, crowned with scarlet: a lunular scarlet spot between the tails marked by a minute black spot.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of H. W. Bates, from Amazon (Pará).

# 198. Thecla Panchea, Hewitson. Plate LI. Q figs. 274, 275.

UPPERSIDE. Female.—Rufous-brown. Anterior wing grey near the inner margin. Posterior wing grey, with the apex rufous-brown: anal angle with two tails: a brown spot between them: the lobe brown bordered above with scarlet.

Underside rufous-grey. Both wings crossed beyond the middle by a band of white bordered inwardly with rufous-brown. Posterior wing tinted with lilac near the base: a submarginal band of lunular brown spots bordered on both sides with white: the lobe and a triangular spot between the tails black, crowned with orange.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

## 199. Thecla Gedrosia, Hewitson. Plate LI. figs. 270, 271.

Thecla Gedrosia, Hewitson, Descr. of Thecla, p. 10. no. 23.

UPPERSIDE. Male.—Dark brown. Anterior wing with the base of the inner margin blue. Posterior wing with two tails: dull blue from the base to the middle: the lobe orange.

Underside rufous-brown. Both wings crossed beyond the middle by a brown band, indistinct on the anterior wing. Posterior wing with the lobe black bordered above by a minute spot of white and a large spot of scarlet: the black spot between the tails broadly bordered above with scarlet, and below and outside of it with white: the space between the spots white.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of H. W. Bates, from Amazon (Tapajos).

## 200. Thecla Villia, Hewitson. Plate LI. 2 figs. 272, 273.

UPPERSIDE. Female.—Rufous-brown. Anterior wing dull blue below the median nervures. Posterior wing with two tails: blue with the apex and outer margins brown: the abdominal fold white: the lobe black, spotted above and below with white.

Underside rufous and lilac-white. Both wings crossed beyond the middle by a band of dark brown bordered outwardly with white, extending on the anterior wing from margin to margin nearly: both wings with a submarginal band of pale brown spots, lunular on the

posterior wing, the lobe black: a large scarlet spot between the tails bordered above with yellow, and marked by a black triangular spot.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from Amazon.

Near to T. Dindymus and T. Empusa. Differs from most of the species with which it is most nearly associated by the unusual length of the transverse band of the anterior wing.

### 201. Thecla Blenina, Hewitson. Plate L. & figs. 256, 257.

Thecla Blenina, Hewitson, Descr. of Thecla, p. 12. no. 29.

UPPERSIDE. Male.—Ochreous, tinted with orange. Anterior wing with the costal and outer margins broadly brown. Posterior wing with two tails: the outer margin dark brown, narrow.

Underside green. Both wings crossed beyond the middle by a band of white, divided into spots on the anterior wing; curved on the posterior wing from the costal margin to the middle, where it forms two unusually acute V-like angles, followed by a series of four black spots bordered with white: the space between them and the tails brown irrorated with white: the lobe black: a submarginal line of white: the fringe silvery white.

Exp. 1, inch.

In the Collection of W. C. Hewitson, from Mexico.

## 202. Thecla Lebena, Hewitson. Plates LI. figs. & 266, 267.

Thecla Lebena, Hewitson, Descr. of Thecla, p. 9. no. 21.

UPPERSIDE. Male.—Brilliant violet-blue. Anterior wing with the apical half dark brown: the discal spot beyond the middle black. Posterior wing with two tails, the outer margin dark brown, narrow.

Underside glossy-green. Both wings crossed beyond the middle by a band of brown bordered outwardly with white: both with an indistinct submarginal band of brown spots. Anterior wing with a large triangular dark brown spot where the wings meet. Posterior wing with the lobe and black spot between the tails crowned with scarlet, which is bordered above with black: the space between these dark brown irrorated with white and bordered above with brown and again with white: a submarginal white line.

Female with the anterior wing dark brown. Posterior wing dull greenblue with the apex broadly brown: the outer margin brown with a white line at the base of the tails. On the underside it is pale stone-colour, with the bands and scarlet spots, and especially the submarginal bands, much more distinct than in the male.

Exp.  $1\frac{1}{10}$  inch.

In the Collections of W. W. Saunders and W. C. Hewitson, from Cayenne.

## 203. Thecla Lidus.

Bithys Lidus, Hübner, Verz. bek. Schmet. no. 753.

Papilio Eryx, Cramer, pl. 143. f. D.

Thecla Lidus, Westwood in Gen. Diurn. Lep. p. 484.

# 204. Thecla Tympania, Hewitson. Plate LI. of figs. 276, 277 (not 278, 279).

UPPERSIDE. Male.—Dark brown. Anterior wing with part of the inner margin lilacblue. Posterior wing with two tails lilac-blue, with the outer margin dark brown, narrow.

Underside grey. Both wings crossed beyond the middle by a band of brown bordered outwardly with white: narrow and indistinct on the anterior wing: commencing on the costal margin of the posterior wing by a spot below the rest: both with two submarginal bands: the inner band of the anterior wing short: both the bands of the posterior wing bordered with white: the lobe brown crowned with orange: a large square orange spot between the tails marked with black.

Female does not differ from the male, except in being smaller, and in having the first spot of the white band of the posterior wing in a line with the rest.

Exp.  $1\frac{1}{20}$  inch.

In the Collection of H. W. Bates, from Amazon (Pará).

### 205. Thecla Bethulia, Hewitson. Plate LI. of figs. 278, 279.

Thecla Tympania, Hewitson, on the Plate.

UPPERSIDE. Male.—Dark brown with the inner margin green-blue. Posterior wing with two tails: green-blue, the outer margin dark brown, narrow.

Underside rufous, the bands exactly as in the last.

Female like the male, except that it is of a uniform brown above, and has (as in the last described species) the first spot of the band on the underside of the posterior wing in a line with the rest.

Exp.  $1\frac{1}{10}$  inch.

In the Collections of H. W. Bates and W. C. Hewitson, from the Amazon (Pará).

Believing the female of T. Tympania to be a male (and it scarcely differs from it), I had

put this and it as varieties of the same species, supposing the difference between them to be one of colour only. I now find, however that whilst the female *T. Tympania* is, like the male, blue, the female of *T. Bethulia* is entirely brown.

## 206. Thecla Teucria, Hewitson. Plate LII. 9 fig. 290.

Thecla Teucria, Hewitson, Descr. of Thecla, p. 3. no. 7.

UPPERSIDE. Female.—Dark brown, with two small white spots and a line of white at the anal angle of the posterior wing.

UNDERSIDE green. Anterior wing brown towards the outer margin: crossed beyond the middle by a band of white bordered inwardly with brown, and by a submarginal band of the same colour from the anal angle to the middle. Posterior wing with two tails; crossed at the middle by a band of white spots: the apex (which is marked by a white spot) and the anal angle (which is irrorated with grey and marked by two black spots) very broadly carmine, the space between them and two conical outline spots white: a submarginal band of white; the margin black.

Exp.  $1\frac{1}{10}$  inch.

In the Collections of W. W. Saunders and W. C. Hewitson, from the Amazon.

## 207. Thecla Tegula, Hewitson. PLATE LII. of figs. 291, 292.

Thecla Tegula, Hewitson, Descr. of Thecla, p. 4. no. 8.

UPPERSIDE. Male.—Dark grey-brown. Anterior wing with an unusually long discal spot. Posterior wing with some grey lunular spots near the anal angle.

Underside rufous-grey. Both wings crossed beyond the middle by a band of white broken into lunular spots on the posterior wing. Anterior wing with some submarginal brown spots bordered on both sides with white. Posterior wing with two tails: a white spot on the middle of the costal margin: the anal angle (which is irrorated with white and marked by two black spots) and the apex (which is bordered on both sides with white) carmine: the space between them irrorated with white.

Exp.  $1_{10}^{9}$  inch.

In the Collection of H. W. Bates, from Amason (Tapajos).

## 208. Thecla Terentia, Hewitson. Plate LII. 9 figs. 282, 283.

Thocla Terentia, Hewitson, Descr. of Thecla, p. 2. no. 4.

UPPERSIDE. Female.—Rufous-brown, darker at the outer margins, slightly tinted with lilac near the base. Posterior wing with a submarginal line of white.

Underside grey-brown. Both wings crossed at and beyond the middle by two pale yel-

low bands: the inner band broad as it approaches the inner margin of the anterior wing, zigzag towards the inner margin of the posterior wing; the outer band of the posterior wing short. Anterior wing with a third band near the outer margin from the middle to the anal angle. Posterior wing with two tails: the outer margin very broadly orange-yellow marked by the two anal black spots and several submarginal spots of brown.

Exp.  $1\frac{1}{20}$  inch.

In the Collections of H. W. Bates and W. C. Hewitson, from the Upper Amazon (Caiçara).

## 209. Thecla Thabena, Hewitson. Plate LII. of figs. 288, 289.

Thecla Thabena, Hewitson, Descr. of Thecla, p. 1. no. 1.

UPPERSIDE. Male.—Brilliant morpho-blue. The outer margins dark brown, broad at the apex of the anterior wing, which has a large brown discal spot.

Underside grey-white or stone-colour, tinted with lilac. Both wings crossed beyond the middle by two rufous-brown bands, the inner band bordered inwardly with orange, outwardly with white. Posterior wing with two tails: a round black spot on the costal margin at the commencement of the inner band: the anal angle broadly orange-yellow, the lobe and a spot between the tails black.

Exp. 1 inch.

In the Collection of W. C. Hewitson, from Amazon.

## 210. Thecla Temesa, Hewitson. Plate LII. of figs. 284, 285.

Thecla Temesa, Hewitson, Descr. of Thecla, p. 1. no. 2.

UPPERSIDE. Male.—Purple, the margins dark brown, narrow. Anterior wing with an oval discal brown spot. Posterior wing with two tails.

UNDERSIDE as in the last described.

Exp. 1 inch.

In the Collection of W. C. Hewitson, from Amazon and Cayenne.

## 211. Thecla Talayra, Hewitson. Plate LII. of figs. 286, 287.

Thecla Talayra, Hewitson, Descr. of Thecla, p. 1. no. 3.

UPPERSIDE. Male.—Brilliant morpho-blue. The margins dark brown, broad at the apex and part of the outer margin of the anterior wing.

Underside white. Both wings crossed beyond the middle by two transverse bands, the

#### 214. Thecla Vesulus. Plate LIV. & fig. 310.

Papilio Vesulus, Cramer, pl. 340. figs. I, K.

UPPERSIDE uniform dark rufous-brown with the fringe white. Posterior wing with two tails.

Underside pale stone-colour. Both wings with a pale line at the end of the cell, both crossed beyond the middle by a band of dark rufous-brown bordered outwardly with white, commencing on the costal margin of the posterior wing by a detached round black spot: anal angle with the lobe black, a spot near it, and two at the base of the tails (which are each marked with brown), brick-red; the spot between these dark brown and irrorated with white, crowned by a triangular red spot.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 215. Thecla Sangala, Hewitson. Plate LIV. 9 figs. 314, 315.

Thecla Sangala, Howitson, Descr. of Thecla, p. 35. no. 75.

UPPERSIDE. Female.—Rufous-brown, pale and tinted with grey at the base of the posterior wing. Anterior wing with the costal margin orange. Posterior wing with two tails: the lobe orange: the usual spot and the spot between them dark brown bordered above with orange: a submarginal line of white.

Underside pale rufous-grey. Both wings crossed beyond the middle by a band of orange bordered outwardly with white, the W very distinct: the lobe black and crowned with white and orange: the spot between the tails large, orange, marked by a black spot: between this spot and the apex an indistinct rufous-brown band.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from Venezuela.

#### 216. Thecla Tarania, Hewitson. Plate LIV. figs. of 312, 313, \$\rightarrow\$ 311.

Thecla Tarania, Hewitson, Descr. of Thecla, p. 3. no. 6.

UPPERSIDE. Male.—Rufous-brown. Posterior wing with two tails: the anal angle broadly orange.

Underside paler, rufous. Anterior wing with two or three indistinct spots beyond the middle. Posterior wing crossed beyond the middle by two bands of white spots, the inner band bordered above with black and broadly by orange: the outer band bordered below with the same colours: a submarginal line of white.

Female.—Like the male, except that it is much larger, and has the bands on the underside of the posterior wing further apart.

Exp.  $d_{10}^{0}$ ,  $\Omega_{10}^{1}$  inch.

In the Collections of W. W. Saunders and W. C. Hewitson, from Minas Geraës.

#### 217. Thecla Cydrara, Hewitson. Plate LIII. & figs. 295, 296.

Thecla Cydrara, Hewitson, Descr. of Thecla, p. 17. no. 38.

UPPERSIDE. Male.—Anterior wing dark brown, the inner margin from the base broadly blue: the discal spot (which is within the cell) dark brown, indistinct. Posterior wing with two tails: green-blue with the costal and inner margins rufous-brown: the outer margin dark brown, narrow: the lobe brown with a fringe of white.

Underside white. Both wings with a submarginal band of rufous spots. Anterior wing with a large triangular rufous spot at the middle of the costal margin: the fringe rufous. Posterior wing with five subbasal brown spots: crossed at the middle by a band of rufous spots: the lobe black very slightly bordered above with orange-yellow.

Exp.  $1\frac{1}{20}$  inch.

In the Collection of W. C. Hewitson, from the Amazon.

#### 218. Theela Ufentina, Hewitson. Plate LIII. of figs. 297, 298.

Thecla Usentina, Hewitson, Descr. of Thecla, p. 17. no. 39.

UPPERSIDE. Male.—Brilliant green-blue. Anterior wing with the costal and outer margins very broad, dark brown: the discal spot within the cell. Posterior wing with one tail: the apex and outer margin, which is narrow, dark brown.

Underside. Anterior wing rufous tinted with lilac: crossed at the middle by a band of white, and by a submarginal band of lunular white spots bordered below with brown. Posterior wing with the base of the costal margin, a spot before its middle, a subbasal band of spots, a band of spots at the middle, and a submarginal band of spots chiefly at the apex, all rufous: the lobe black.

Exp.  $1_{10}^{1}$  inch.

In the Collection of H. W. Bates, from the Amazon (St. Paulo).

#### 219. Thecla Teaten, Hewitson. PLATE LIII. Q fig. 299.

Thecla Teatea, Heuritson, Descr. of Thecla, p. 4. no. 9.

UPPERSIDE. Female.—Rufous-brown tinted with grey near the base. Posterior wing with two tails and an anal orange spot.

Underside rufous. Both wings crossed at and beyond the middle by bands of white:

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the inner band bordered inwardly with black: the outer band bordered outwardly with brown, divided into spots and nearer the other band on the posterior wing than it is on the anterior wing. Posterior wing with two black spots at the anal angle crowned with orange: a submarginal line of white: the margin black.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

#### 220. Thecla Opalia, Hewitson. Plate LIII. of figs. 300, 301.

Thecla Opalia, Hewitson, Descr. of Thecla, p. 6. no. 13.

UPPERSIDE. Male.—Dark brown: the inner margin of the anterior wing from the base to the middle and the whole of the posterior wing (with the exception of the apex and outer margin, which are brown) cerulean blue. Anterior wing with the discal spot pale rufous-brown.

Underside rufous-brown tinted with lilac. Both wings crossed by a band of white spots bordered inwardly with dark brown: posterior wing with one tail: a submarginal band of brown spots bordered inwardly with white: the lobe dark brown: the space near it white irrorated with brown: a submarginal white line above the tail.

Exp. 1 inch.

In the Collections of H. W. Bates and W. W. Saunders, from the Amazon.

#### 221. Thecla Viceta, Hewitson. Plate LIII. & figs. 302, 303.

Thecla Viceta, Hewitson, Descr. of Thecla, p. 18. no. 40.

UPPERSIDE. Male.—Anterior wing dark brown, the inner margin at the base cerulean blue, narrow: the discal spot pale brown, unusually small, within the cell. Posterior wing with one tail: cerulean blue: the costal margin rufous-brown, broad: the outer margin darker brown, narrow.

Underside. Anterior wing rufous-brown tinted with carmine, crossed beyond the middle by a band of white bordered inwardly with brown: a submarginal band of very obscure brown spots. Posterior wing white, with the base rufous-brown marked by a spot of white: two or three spots near the inner margin, a submarginal band of indistinct spots near the anal angle, a spot on the apex, and the outer margin, all rufous-brown.

Exp. 1 inch.

In the Collection of H. W. Bates, from the Amazon (Santarem).

#### 222. Thecla Zora, Hewitson. Plate LIII. Q figs. 304, 305.

UPPERSIDE. Female.—Dark brown, with the fringe white. Posterior wing with two tails.

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Underside grey-brown. Both wings with a white line at the end of the cell: both crossed beyond the middle by a band of white spots, followed by a band of brown bordered inwardly with white spots: both with a submarginal band of lunular brown spots bordered above and below with white. Posterior wing with the black spot between the tails crowned with orange.

Exp. 18 inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

#### 223. Thecla Gargara, Hewitson. PLATE LIII. ♀ figs. 306, 307.

Thecla Gargara, Hewitson, Descr. of Thecla, p. 8. no. 18.

UPPERSIDE. Female.—Dark brown. Anterior wing with the base and inner margin blue. Posterior wing with two tails: the basal half blue.

Underside pale grey, or stone-colour. Anterior wing crossed beyond the middle by an indistinct brown band: the wing beyond it rufous-brown. Posterior wing crossed at the middle by a dark brown band, and nearer the outer margin by a paler brown band: the space between the bands lilac-white: the lobe black bordered above with yellow, the black spot between the tails crowned with orange, which is bordered above by yellow, below with grey.

Exp. 1 inch.

In the Collection of H. W. Bates, from the Amazon (Pará).

#### 224. Thecla Velina, Hewitson. PLATE LIV. Q figs. 316, 317.

Thecla Velina, Hewitson, Descr. of Thecla, p. 18. no. 41.

UPPERSIDE. Female.—Rufous-brown. Posterior wing with two tails: grey from the base to beyond the middle: a submarginal line of white at the base of the tails: the margin dark brown: the lobe rufous.

Underside white. Anterior wing crossed beyond the middle by a rufous-brown band, and near the margin by a band of rufous spots. Posterior wing with two tails: a large spot of dark red-brown before the middle, angular on its outer border which is white; followed by a band of rufous spots, by a spot of red-brown at the apex, and two smaller spots of the same colour near the inner margin: the whole of the anal angle and some submarginal spots rufous: the outer margin dark brown.

Exp. 1 inch.

In the Collection of H. W. Bates, from the Amazon (Tapajos).

This and several species following, beautiful things from the very rich collection of Mr. Bates, form part of the group to which T. Crolus of Cramer belongs.

225. Thecla Besidia, Hewitson. Plate LIV. ♀ figs. 318, 319.

Thecla Besidia, Hewitson, Descr. of Thecla, p. 24. no. 52.

UPPERSIDE. Female.—Rufous-brown: the base of the inner margin of the anterior wing and the posterior wing (except the apex) pale cerulean blue. Posterior wing with two tails: the lobe and two spots at the base of the tails dark brown bordered below with white.

Underside rufous, tinted with lilac. Anterior wing crossed beyond the middle by a brick-red band bordered outwardly with black and white: a submarginal brown band: the fringe rufous. Posterior wing with two tails: crossed at the middle by a broad band of blood-red spots bordered outwardly with black and white: the first spot on the costal margin a little below the rest but not separated: beyond the band clouded with lilac-brown: the apex and part of the outer margin white marked by some pale brown spots: the lobe and spot between the tails black bordered above with scarlet.

Exp. 1 inch.

In the Collection of H. W. Bates, from the Amazon.

226. Thecla Socia. Plate LIV. of figs. 320, 321.

Thecla Socius, Boisduval, MS.

Thecla Socia, Hewitson, Descr. of Thecla, p. 29. no. 62.

UPPERSIDE. Male.—Dark brown. Anterior wing with the inner margin from the base to beyond its middle cerulean blue: the discal spot small, round, pale, within the cell. Posterior wing with one tail: cerulean blue, with the costal margin and apex brown.

Underside rufous, tinted with carmine. Anterior wing crossed beyond the middle by a continuous carmine band bordered outwardly with white: a submarginal band of red-brown spots. Posterior wing crossed at the middle by a continuous carmine band bordered on both sides with white, projecting outwards in the form of a square spot but not detached from the band: a broad submarginal band irrorated with white, brown, and carmine commences near the costal margin by a carmine spot: the lobe and usual spot carmine: a submarginal white line: the margin black.

Exp.  $1\frac{3}{20}$  inch.

In the Collection of Dr. Boisduval, from Brazil.

### SUPPLEMENT.

#### Genus CORYDON.

CORYDON, Boisduval, MS.

Head of moderate size: eyes smooth. Palpi thickly covered with hair, closely embracing the head, the terminal joint unfortunately broken off. Antennæ gone.

Wings as represented on the plate.

Legs as figured, a fore leg, b hind leg: the tarsi of the fore legs thickly armed with a double row of spines.

I would scarcely have ventured to place this very remarkable Butterfly amongst the Lycsenids without better authority than my own, although I have very little doubt that it belongs to this family. Professor Westwood has, with his usual kindness, examined it for me, and expresses himself quite satisfied that this is its proper position. It has, as most of the African Lycsenids have, four branches from the subcostal nervure, and in no way differs in its neuration from *Epitola Elion*, except that the cell of the posterior wing of that species is closed somewhat more obliquely.

#### Corydon Boisduvalii, Hewitson. Plate I.

UPPERSIDE dark rufous-brown. Anterior wing crossed obliquely beyond the middle by a band of white, divided into five parts by the nervures: the anal angle broadly blue. Posterior wing blue from the discoidal cell to the outer margin: the apex white.

Underside pale yellow. Anterior wing with the basal half, except the costal margin and the anal angle, dark brown, black where it touches the costal margin and marked with three spots of silvery blue: the costal margin and the apex with the nervures and lines between them dark brown. Posterior wing with a large spot of orange-yellow on the costal margin bordered outwardly and on the margin with black and two black spots, and radiating from it five bands of dark brown: two near the base, the third not reaching to the inner margin, the fourth extending to the anal angle, the fifth short; between the third and fourth of these bands there is another short band: some of the nervures towards the outer margin and lines between or on each side of them (some of them united at the top and on the margin) dark brown: a spot of black near the apex.

Exp. 24 inch.

In the Collection of Dr. Boisduval, from the Gaboon.

It is with very great pleasure that I have dedicated this very remarkable species to Dr. Boisduval, mingled, however, with regret that I cannot better express my estimation of the extreme kindness and liberality with which I have always been treated by him.

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#### Genus MYRINA.

(Continued from p. 40.)

#### 43. Myrina Deudorix, Hewitson. Plate II. & figs. 64, 65.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with more than the outer half dark brown. Posterior wing with the apex, the outer margin, and nervures dark brown: two tails: a black spot at the anal angle bordered above with orange, a white line below it.

Underside grey- or rufous-brown. Both wings crossed beyond the middle by an undulated band of white bordered inwardly with brown. Posterior wing irrorated with white at the base of the tails, and marked by two black spots bordered above with orange, the anal spot bordered below with silvery blue.

Exp.  $1\frac{7}{10}$  inch.

In the Collection of Mr. George Semper, from Mindanao.

#### 44. Myrina Mamertina, Hewitson. Plate II. & figs. 66, 67.

UPPERSIDE. Male.—Brilliant green-blue. Anterior wing with the costal and outer margins broadly dark brown. Posterior wing with two tails: the outer margin dark brown, narrow: a white space where the wings meet: a black spot at the anal angle bordered below with scarlet.

Underside bright brick-red. Both wings crossed beyond the middle by two bands of darker colour. Anterior wing with a polished surface and tuft of black hair where the wings meet. Posterior wing with two round black spots, one or two smaller spots, and a black line above them at the anal angle.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of Mr. George Semper, from Mindanao.

#### 45. Myrina Mariaba, Hewitson. Plate II. & figs. 68, 69.

UPPERSIDE. Male.—Brilliant silvery blue. Anterior wing with the costal margin, which is narrow, and outer margin dark brown. Posterior wing with two tails: the apex broadly dark brown: the outer margin dark brown, narrow: the anal black spot bordered above with orange, below with blue.

Underside white. Both wings crossed beyond the middle by a rufous band. Anterior wing with the outer margin rufous-brown. Posterior wing with two black spots at the anal

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angle: the outer spot broadly bordered above with orange, the anal spot bordered above and below with blue: above these a zigzag brown line: submarginal grey spots irrorated with brown.

Exp. 11 inch.

In the Collection of Mr. George Semper, from Mindanao.

Nearest to M. Jalindra.

#### 46. Myrina Martina, Hewitson. Plate II. o figs. 70, 71.

UPPERSIDE. Male.—Dark brown. Anterior wing irrorated with green at the base. Posterior wing green-blue: the base rufous-brown: a large central spot, the outer margin and a spot above the anal angle dark brown: two black spots at the anal angle which is white: a tuft of black hair where the wings meet.

Underside orange-rufous. Anterior wing polished where the wings meet. Posterior wing white at the anal angle: the two spots and a broken line above them black.

Exp.  $1\frac{13}{95}$  inch.

In the Collection of W. C. Hewitson, from Borneo.

This species is so very much like *M. hypoleuca* of Boisduval (Plate XVII. of this work), both above and below, that I would have hesitated in figuring it as distinct did I not believe that it belongs to a different section of the genus. Dr. Boisduval's Butterfly is of different form and more robust (I speak from memory and my figure); and though its anal tail was broken off, I have little doubt that it has (as I have drawn it) a short one, like those of the three preceding species just described. Unlike others which I have examined, this species has a tuft of black hair on the *posterior* wing. In *M. Amrita* of Felder, a nearly allied species, this hair is white and on the anterior wing. I neglected to examine this in *hypoleuca* whilst it was under my care.

#### 47. Myrina Mavortia, Hewitson. Plate II. o fig. 73, 9 72, 74.

UPPERSIDE. Male.—Lilac-blue: the margins and fringe dark brown, narrow. Posterior wing with one tail: the anal angle dark brown enclosing a spot of blue.

Underside white. Both wings with two indistinct submarginal grey bands. Posterior wing with an inner broken band: the two black spots at the anal angle bordered above with orange.

Female dark brown. Anterior wing with the inner half lilac-blue. Posterior wing with its centre and seven spots below it lilac-blue: two white spots near the anal angle. On the underside it does not differ from the male, except that it has a transverse band of grey on the anterior wing beyond its middle.

Exp. 1% inch.

In the Collections of George Semper and W. C. Hewitson, from Mindanso.

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#### 48. Myrina discophora.

Myrina discophora, Felder, Novara Expedition, pl. 30. figs. 1, 2.

Near to M. Mavortia, but differs from it in having a black discal spot on the anterior wing.

#### 49. Myrina Usira.

Myrina Usira, Felder, Novara Expedition, pl. 30. figs. 5, 6.

Very near to *M. Donina* of this work (Plate XVII. figs. 61, 62), but differs from it, according to Felder's figure, in the arrangement of the inner band on the underside of the anterior wing.

#### 50. Myrina Anasuja.

Myrina Anasuja, Felder, Novara Expedition, pl. 30. figs. 3, 4.

A very beautiful species.

#### 51. Myrina Meduana. Plate III. & figs. 75, 76.

UPPERSIDE. Male.—Rufous-brown. Anterior wing slightly tinted with purple near the margins: the discal spot visible only in a favourable light, paler than the rest of the wing. Posterior wing with the anal angle which is marked by four black spots and the tail white.

Underside rufous-orange: the anal angle of the posterior wing as above except that there is a band of black above the spots, and between it and them lunular white spots, and that the outer margin before the fringe is black.

Female does not differ from the male.

Exp.  $1\frac{4}{10}$  inch.

In the Collections of W. C. Hewitson and George Semper, from Mindanao.

The colouring of the male of this species is very unusual, being the same as the female.

#### 52. Myrina Amasa, Hewitson. Plate VI. 2 figs. 89, 90.

UPPERSIDE. Female.—White. Anterior wing with the outer half, nearly, dark brown. Posterior wing with three tails: orange towards the anal angle: the lobe and two spots between the tails black traversed by a white line.

Underside white. Anterior wing crossed by two bands of brown, one at the middle of the cell short, the other beyond the middle of the wing: the outer margin also brown.



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Posterior wing with the lobe and the black spots between the tails irrorated with silver: above the lobe two black lines, one of which is decorated with silver.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from Old Calabar.

#### 53. Myrina Megistia, Hewitson. Plate III. 3 figs. 77, 78.

UPPERSIDE. Male.—Dark brown. Posterior wing with two tails: the costal margin cerulean blue: a black spot at the anal angle irrorated with white: the fringe and a submarginal line at the base of the tails white.

Underside orange. Both wings crossed by a pale rufous band bordered outwardly with white. Posterior wing with the anal angle grey irrorated with black, bordered above with white lunular spots and lines of white at right angles with them: two large black spots at the base of the tail.

Exp.  $1\frac{7}{20}$  inch.

In the Collection of W. C. Hewitson.

Mr. Watson, to whom I am indebted for this beautiful species, does not know from what locality it was brought.

#### 54. Myrina Ravata.

Myrina Ravata, Moore, Proc. Zool. Soc. 1865, pl. 41. f. 11.

Near to M. Megistia, but scarcely likely to be its female, since it is decorated above the anal black spots with "metallic green."

#### 55. Myrina Milionia, Hewitson. Plate III. o figs. 79, 80.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with a large central white spot: the apical half dark brown. Posterior wing with one tail: a large spot of white at the costal margin: the apex and outer margin rufous-brown: the fringe and a submarginal line white.

Underside rufous-brown. Both wings crossed by a common broad band of white: both with conical submarginal spots of white centred with brown. Anterior wing with three dark brown spots at the anal angle. Posterior wing with the anal angle irrorated with white, and marked by three black spots surrounded with orange, the orange bordered above with black and blue.

Exp. 13 inch.

In the Collection of W. C. Hewitson, from Simla.



#### 56. Myrina Micea, Hewitson. Plate III. of fig. 81.

UPPERSIDE. Male.—Violet-blue, with the costal and outer margins broadly dark brown. Posterior wing with one tail: the lobe of the anal angle which is marked by some scales of silvery blue is very singularly prolonged: the base dark brown, thickly clothed with hair.

Underside. Both wings rufous, of two shades of colour, their bases silvery white. Posterior wing with the anal angle beautifully varied: a black spot near the base of the tail crowned with silver: three black spots of different form above the lobe traversed with silver, one in the middle of a space of orange: above these, at the end of the abdomen, a large black spot marked by two spots of white and bordered above with white marked by a smaller spot of black: a submarginal white line.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Borneo.

Much like M. Nedymond, but at the same time very different.

#### 57. Myrina Melisa, Hewitson. Plate III. ♀ figs. 82, 83.

UPPERSIDE. Male.—Dark brown. Posterior wing with two tails: the anal half cerulean blue marked by two lunular black spots: the fringe and a submarginal line at the base of the tails white.

Underside white. Anterior wing with three spots near the base, a large spot beyond the middle of the costal margin, a spot and some lines below it and the apex rufous-brown. Posterior wing with many outline spots of brown: the anal angle silvery blue, with two black spots.

Female does not differ from the male, except in having a central white spot at the middle of the anterior wing.

Exp.  $\vec{\sigma}_{10}^{\theta}$ ,  $\vec{\varsigma}_{10}^{\theta}$  inch.

In the Collection of Mr. W. S. Atkinson of Calcutta, from Maulmain and Darjeeling.

Nearly allied to M. Scæva, Pl. XV., but differs from it in being without the blue central spot of the anterior wing, and in having the spots on the underside in outline only.

#### Myrina Ciniata. Plate III. ♀ var. fig. 84.

Myrina Ciniata, Hewitson, Lycænidæ, pl. 14. ♀ figs. 30, 31.

My former figure, to which I have referred above, was from a female. I have since received the male, which does not differ from it except in its greater size and in the more acute apex of the anterior wing. The variety now figured is of brighter colour on the underside, has the white band of the posterior wing narrower, and the marginal decorations much more beautiful. This species varies considerably in colour, but much more in size. Specimens in my collection vary from  $\frac{1}{10}$  to  $1\frac{1}{10}$  inch.

In the Collection of George Semper, from Mindanao.

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#### 58. Myrina Monala, Hewitson. Plate III. & figs. 85, 86.

UPPERSIDE. Male.—Dark brown. Anterior wing blue at the base. Posterior wing cerulean blue, with three tails: the apex rufous, the outer margin dark brown with a submarginal line of white at the base of the tails.

Underside ochreous. Anterior wing with a small central spot of white. Posterior wing crossed at the middle by a narrow band, white from the costal margin to beyond the middle, blue towards the anal angle which is marked by four black spots and a large grey spot all crowned with brilliant silvery blue: two spots of the same blue above these: the outer margin dark brown: two submarginal bands and the fringe white.

Exp.  $1\frac{3}{10}$  inch.

In the Collection of W. C. Hewitson, from Borneo.

#### 59. Myrina Massyla, Hewitson. Plate III. of figs. 87, 88.

UPPERSIDE. Male.—Violet-blue. Anterior wing with the costal and outer margins and a spot at the end of the cell dark brown. Posterior wing with two tails: the costal margin, which is broad, the outer margin and a submarginal line dark brown: the lobe large and prominent.

Underside. Anterior wing pale yellow-brown clouded with darker brown near the outer margin: a spot at the end of the cell and a band beyond the middle dark brown: a submarginal line of white. Posterior wing broken into spots of different shades of brown: the costal margin and two spots touching it pale yellow: irrorated with white near the outer margin: the margin pale brown: a submarginal line of white.

Exp. 14 inch.

In the Collection of Mr. W. S. Atkinson, from Cherra Punji.

#### 60. Myrina Danis.

Myrina Danis, Folder, Novara Expedition, pl. 30. figs. 12, 13.

#### 61. Myrina Lorquinii.

Myrina Lorquinii, Felder, Novara Expedition, pl. 30. figs. 9, 10, 11.

In the Collection of W. C. Hewitson, from Aru.

#### 62. Myrina Antipha, Hewitson. Plate VI. figs. of 92, 93, 9 91.

UPPERSIDE. Male.—Dark brown. Anterior wing with its centre white: the space below it to the anal angle pale brown: the base and anal angle irrorated with blue. Pos-



terior wing from the base to the middle (except the costal margin which is white) lilac-blue: a submarginal series of conical black spots bordered with blue.

Underside pale brown. Anterior wing with its lower half white: on the outer margin a series of white spots with their centres and borders brown. Posterior wing with one tail: the base and costal margin broadly white: a zigzag band of grey beyond the middle, and the marginal series of brown spots as above, but bordered with white: the spot at the base of the tail (where the wing is projected outwards) large and black, the spot outside of it and the lobe black, all bordered above with silvery blue.

Female with the anterior wing white: the margins (except the costal margin) broadly dark brown: the base blue. Posterior wing like the male except that there is more white near the costal margin. On the underside it does not differ from the male.

Exp.  $1\frac{6}{10}$  inch.

In the Collection of W. C. Hewitson, from Aru.

#### 63. Myrina Ancharia, Hewitson. Plate VI. of figs. 94, 95.

UPPERSIDE. Male.—Cerulean blue. Anterior wing with the centre grey-white: the costal and outer margins dark brown, widest at the apex. Posterior wing with one tail: the costal margin broadly white: the outer margin dark brown, broad, with a submarginal series of black spots encircled with blue.

Underside white. Anterior wing with the costal margin and apex rufous-brown: the outer margin with a series of white spots centred and bordered with brown. Posterior wing with the outer margin broadly rufous-brown: a submarginal series of conical brown spots bordered with white: the spot at the base of the tail large and black bordered with blue: the lobe black bordered above with blue.

Female with the anterior wing white broadly bordered (except on the inner margin) with dark brown: the base and anal angle irrorated with blue. Posterior wing like that of the male, except that the white of the costal margin is broader: the underside does not differ from the male.

Exp.  $1\frac{9}{20}$  inch.

In the Collection of W. C. Hewitson, from Waigiou.

I do not place this and the three preceding species here at all to my satisfaction. The Felders have done so, and I prefer to do so too rather than to make a new genus to contain them. If placed according to their general appearance, they would associate best with the genus Lycæna, but are without the apical branch of the subcostal nervure of the anterior wing. By the form of their palpi they are separated from Iolaus.

Dipsas Westermanii of Felder, Novara Expedition, plate 30. figs. 21, 22, is a variety of Myrina Jangala, of this work, p. 37.



IOLAUS. 9

#### Genus IOLAUS.

(Continued from p. 47.)

Iolans Eurisus, Cramer. PLATE IV. 9 figs. 31, 32.

Iolaus Eurisus, Lycanida, p. 40.

The female of this species has not been figured before.

#### 23. Iolaus Belli, Hewitson. PLATE IV. Q figs. 83, 34.

UPPERSIDE. Female.—Cerulean blue. Anterior wing with the costal margin and more than the outer half of the wing dark brown. Posterior wing with three tails: the apex, a band of brown above the anal angle, and two submarginal spots dark brown: the lobe, the spot between the tails, and the outer margin black: a submarginal line of white.

Underside white. Both wings crossed beyond the middle by two linear rufous-brown bands. Posterior wing with the lobe black, slightly irrorated with silver and crowned with orange: the black spot between the tails at a distance from the margin also crowned with orange.

Exp.  $1_{25}^{9}$  inch.

In the Collection of W. C. Hewitson, from Sherborough Island.

I have named this species after Licutenant Bell, of the 3rd West-India Regiment, who brought it and other very interesting species from Sherborough Island, which is about 130 miles from Sierra Leone.

#### 24. Iolaus Iulus, Hewitson. Plate IV. figs. ♂ 43, ♀ 41, 42.

UPPERSIDE. Male.—Brilliant green-blue. Anterior wing with the apex broadly black, the inner margin (under which there is a large tust of black hair) projecting. Posterior wing with three tails, a large spot of brown on the costal margin: the lobe, which is red-brown, and the inner margin, fringed with white.

Underside white. Posterior wing with an indistinct submarginal linear broken band of black: the spot between the tails and the lobe (which has a black spot and is tinted with lilac) scarlet.

Female grey-blue clouded with brown; the nervures black. The costal margin and spical half of the anterior wing dark brown; the posterior wing crossed beyond the middle by a band of brown bordered below with white: a spot between the inner tails and the lobe (which has a black spot) scarlet: a black spot between the outer tails: a line below these and the fringe white: the underside as in the male, except that the band crosses both wings, is less broken and rufous-brown, and that there is a second brown band nearer the margin.

Exp.  $1_{10}^{\bullet}$  inch.

In the Collection of W. C. Hewitson, from Sherborough Island.

b

This species greatly resembles *Iolaus Iasis*, except in size. It is, however, of a very different blue, has the terminal joints of the palpi shorter, and the space on the costal margin of the posterior wing of a different texture, and not polished as in *I. Iasis*.

#### 25. Iolaus Timon.

Hesperia Timon, Fabr. Ent. Syst. iii. p. 260. Papilio Timon, Don. Nat. Repos. pl. 97. Polyommatus Timon, Godt. Enc. Méth. p. 620. Iolaus Timon, Westwood, Gen. Diurn. Lep. p. 481.

#### 26. Iolaus Illurgis, Hewitson. Plate IV. o figs. 37, 38.

UPPERSIDE. Male.—Dark brown. Anterior wing with a trifid blue and white spot in the middle. Posterior wing with two tails: grey-blue, except the costal margin, which is broadly brown: the outer margin and some submarginal spots dark brown.

Underside white, tinted with lilac. Both wings with a large black spot at the end of the cell: both crossed beyond the middle by a band of linear black spots: both with two submarginal bands of spots. Posterior wing with a black spot at the apex: the spot between the tails and the lobe black, crowned with orange.

Exp.  $1\frac{13}{20}$  inch.

In the Collection of Mr. W. S. Atkinson, from Darjeeling.

#### 27. Iolaus Jalysus.

Myrina Jalysus, Felder, Novara Expedition, p. 239.

#### 28. Iolaus Jalajala.

Myrina Jalajala, Felder, Novara Expedition, pl. 30. figs. 7, 8, p. 238.

Iolaus Ismus, Hewitson. Plate IV. of figs. 35, 36.

Q Iolaus Isæus, Hewitson, pl. 19. figs. 13, 14.

UPPERSIDE blue. Anterior wing rufous-brown with the inner margin broadly blue: a large discal spot as in *Thecla*. Posterior wing with two tails: the outer margin brown, narrow.

Underside pale stone-colour. Both wings crossed at the middle by an indistinct rufous linear band: the anal angle broadly orange, the spot between the tails and the lobe black, the space between them irrorated with silver.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from Borneo (Sarawak).



DEUDORIX.

When I figured the female of this species I believed it to be a male contrary to the evidence of form, from the appearance of its feet, which I had not, however, examined sufficiently.

Iolaus Cippus. Plate IV. & figs. 89, 40.

Hosperia Cippus, Fabr. Ent. Syst. v. Suppl. p. 429. Iolaus Cippus, Lycanida, p. 46.

UPPERSIDE. Male.—Brilliant blue. Anterior wing with the costal margin, the apex, and outer margin black: the inner margin (under which there is a large tust of dark brown hair) slightly projecting. Posterior wing with one tail: the apex dark brown.

Underside grey-white, highly polished. Both wings crossed beyond the middle by an indistinct brown linear band, broken into spots on the posterior wing: the spot near the base of the tail and the lobe black, crowned with orange.

Exp.  $1\frac{4}{10}$  inch.

In the Collection of W. C. Hewitson, from Simla.

#### 29. Iolaus marmoreus.

Aphnæus marmoreus, Butler, Ent. Mon. Mag. ii. p. 169.

In the Collection of the British Museum, from the White Nile.

This is, I think, only a variety of I. Bowkeri of Trimen.

#### Genus DEUDORIX.

(Continued from p. 26.)

#### 30. Dendorix Diopites, Hewitson. Plate V. figs. 3 54, 9 52, 53.

UPPERSIDE. Male.—Lilac-blue. Anterior wing with the costal and outer margins broadly dark brown. Posterior wing with one tail: the costal and outer margins brown: the lobe black irrorated with white.

Underside rufous. Both wings with two lines at the end of the cell: both crossed beyond the middle by a linear band of rufous-brown bordered outwardly with white: both with a submarginal rufous band. Posterior wing with the spot between the tails and the lobe black, the space between them black irrorated with white; a line of white below them.

Female dark brown, tinted with lilac-blue. The lobe of the posterior wing black crowned with orange: the underside as in the male, except that there is a white line above the lobe and that the space between the submarginal band and the margin is orange.

Exp.  $31\frac{1}{2}$ ,  $21\frac{6}{10}$  inch.

In the Collections of George Semper and W. C. Hewitson, from the Philippines.

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#### 31. Deudorix Diocles, Hewitson. Plate V. of figs. 55, 56.

UPPERSIDE. Male.—Anterior wing dark brown with a large triangular orange spot from the middle of the wing to the inner margin. Posterior wing with one tail: orange tinted with carmine, the base broadly brown: the outer margin black, narrow.

Underside grey, the orange of the upperside seen through. Anterior wing with a spot at the end of the cell and a broad band beyond the middle bordered on both sides with white. Posterior wing with numerous short rufous bands: the lobe and the spot near the tail black, crowned with orange.

Exp. 11 inch.

In the Collection of Herbert Druce, from Natal.

Dipsas Epirus of Felder, Novara Expedition, p. 241, has the priority of my Deudorix despana, Lyczenidze, Plate VI. figs. 1, 2, 3. This is evidently a very variable species. A specimen in my own collection agrees with Felder's description, and differs from my figure in having the underside white with two submarginal brown bands on the posterior wing. An example in the collection of Dr. Boisduval has the band of the anterior wing longer and the oblique central band of the posterior wing quite straight and of equal breadth until it reaches the anal angle.

#### Genus HYPOLYCÆNA.

(Continued from p. 53.)

#### 16. Hypolycæna Rabe. Plate V. ♀ figs. 30, 31.

Lycæna Rabe, Boisduval, Faune Entom. Maday. p. 25; Westwood in Doubleday & Hewitson's Gen. Diurn. Lepid. p. 496.

In the Collection of W. C. Hewitson, from Madagascar.

#### 17. Hypolycæna hirundo.

Thecla hirundo, Wallengren, Lep. Caff. p. 35.

Amblypodia hirundo, Trimen, Rhop. Afr. Australis, pl. 4. fig. 11, p. 230.

In the Collection of W. C. Hewitson, from Kaffraria.

I much doubt that this is specifically distinct from H. Rabe. It is much smaller and more suffused with brown on the upperside. The bands and spots are alike on both, and only appear different on this species from being crowded into a smaller space.

#### 18. Hypolycena Lara.

Papilio Lara, Linnœus, Syst. Nat. ii. p. 791; Mus. Lud. Ulr. p. 320; Fabr. Mant. Insec. ii. p. 82.

Papilio Iolaus, Cramer, pl. 270. figs. F, G.

Papilio Gorgias, Stoll, pl. 33. fig. 5.

Polyommatus Lara, Godt. Enc. Meth. p. 675.

Zeritis Lara, Westwood in Gen. Diurn. Lep. p. 501.

Chrysophanus Lara, Trimen, Rhop. Afr. Australis, p. 260.

In the Collection of W. C. Hewitson, from Cape Town.

I shall be very glad if I have found a resting-place for this species, which, from the singularity of its aspect, has been placed in several genera. It cannot, I think, be separated from H. Rabe, and I believe that I am right in placing that species in this genus.

## 19. Hypolycena Kina, Hewitson. Plate V. figs. of 32, ♀ 33, 34.

UPPERSIDE. Male.—Cerulean blue. The base of both wings brown. Anterior wing with a small black discal spot at the end of the cell: the costal and outer margins broadly brown. Posterior wing with two tails: the costal margin brown: the lobe and two small spots at the base of the tails brown.

Underside blue-white. Both wings with two lines at the end of the cell: both with two pale submarginal bands, the outer band broken into spots. Anterior wing crossed beyond the middle by a long twice interrupted band of seven spots. Posterior wing with a black spot near the base: crossed at the middle by several unconnected spots.

Female.—Dark brown, paler on the posterior wing: each wing with a central pale spot. Posterior wing with some marginal spots of dark brown, and below them a line of white. On the underside it does not differ from the male, except in having the bands and spots darker.

E p.  $1 \frac{h}{h}$  inch.

In the Collection of Mr. W. S. Atkinson, from Darjeeling.

#### 20. Hypolycena Ithna, Hewitson. Plate V. o figs. 35, 86.

UPPERSIDE. Male.—Dark brown. Anterior wing pale blue from the middle to near the inner margin. Posterior wing with two tails: pale blue except the costal margin, which is broadly brown: a spot at the end of the cell and a linear band beyond the middle brown: the outer margin dark brown, traversed by a band of five white lunular spots.

Understde white. Both wings crossed beyond the middle by a linear band of rufous spots, commencing on the posterior wing by a large black spot: both with a submarginal band and small spots of brown. Anterior wing with a pale line at the end of the cell.



Posterior wing with a small black spot near the base, and two black spots near the tails bordered above with orange.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of Mr. George Semper, from the Philippines.

#### 21. Hypolycæna Eltola, Hewitson. Plate V. ♀ figs. 37, 38.

UPPERSIDE. Female.—Rufous-brown paler towards the anal angle of the posterior wing. Posterior wing with two tails and some submarginal brown spots and a line of white below them.

Underside white tinted with lilac near the base. Both wings with a submarginal rufous line. Anterior wing with a line at the end of the cell: a short band beyond the middle from the costal margin, a line below it and the apex rufous. Posterior wing with a rufous broken band at the middle commencing near the costal margin in a black spot: the lobe and a spot outside the tails black bordered above with orange-yellow: the space between them irrorated with silver.

Exp.  $\frac{9}{10}$  inch.

In the Collection of Mr. W. S. Atkinson, from the Andaman Islands.

#### 22. Hypolycæna Zela, Hewitson. Plate V. figs. ♂ 43, ♀ 41, 42.

UPPERSIDE. Male.—Dark brown-blue, with the margins brown. Posterior wing with one tail and a submarginal line of pale blue.

Underside grey-brown. Both wings with two lines at the end of the cell, and a linear band of brown spots beyond the middle bordered outwardly with white: both with a submarginal brown band of lunular spots near the anal angle of the posterior wing. Posterior wing with the lobe black crowned with silver and with a silvery white spot above it: the spot near the tail black crowned with scarlet: the space between them irrorated with silver.

Female rufous-brown: like the male on the underside, except that it is much paler and that the bands in consequence are better seen.

Exp.  $1\frac{5}{20}$  inch.

In the Collection of W. C. Hewitson, from Sherborough Island.

Most nearly allied to H. Erylus.

#### 23. Hypolycæna Astyla.

Hypolycena Astyla, Felder, Novara Expedition, pl. 30. of f. 17, 18, p. 243.

Female like the male, except that it has more white on both wings, a large black spot at the end of the cell of the anterior wing, and a linear black spot at the end of the cell of the posterior wing. One example in my collection has the base of both wings brilliant blue.



DIPSAS.

#### 24. Hypolycena Libna, Hewitson. Plate V. 2 figs. 89, 40.

UPPERSIDE. Female dark brown. Anterior wing with a large central spot and a small spot near the costal margin pale blue. Posterior wing with a central band of the same colour.

Underside grey-white. Both wings crowded with small spots with some larger brown spots in the middle, both with two zigzag brown bands beyond the middle and a series of minute black spots between them: both with a submarginal brown band.

Exp.  $1\frac{1}{10}$  inch.

In the Collection of W. C. Hewitson, from Borneo.

This species is singularly different from any other butterfly. In the neuration of the wings and in its palpi and antennæ it agrees with this genus. Its hind wings are unfortunately so broken that I cannot determine whether or not it ever had tails.

Hypolycæna Dictæa of Felder, Novara Expedition, pl. 30. figs. 19, 20, is the female of H. Phorbas, "Lycænidæ," plate 21.

#### Genus DIPSAS.

(Continued from p. 67.)

#### Dipeas smaragdina.

Thecla smaragdina, Bremer, Bulletin de l'Acad. Imp. des Sciences de St. Pétersbourg, iii. p. 470, 1861; Lepid. Ost-Sibiriens, pl. 3. f. 5, p. 25.

#### 14. Dipeas Duma, Hewitson. Plate VI. o fig. 15.

UPPERSIDE. Male.—Brilliant gold-green. Anterior wing with the costal margin near the apex and outer margin dark brown. Posterior wing with one tail, the margins dark brown, rather broad.

Underside grey-brown. Both wings with a linear spot at the end of the cell, both crossed beyond the middle by a broad band of dark brown bordered outwardly with white, and below this a second band of brown. Posterior wing with a linear band of brown bordered inwardly with white near the base: the band at the end of the cell touching the broad central band: the lobe black crowned with orange, the black spot near the base of the tail circled with orange: the space between the lower brown band and the outer margin irrorated with black and white: a submarginal line of white.

Exp. 114 inch.

In the Collection of W. C. Hewitson, from North India.

This may be only a variety of D. smaragdina. It is, however, much larger, and, instead of



having on the underside, as Bremer describes his species, a band of white bordered with brown, this has a broad brown band slightly bordered with white. Mr. Moore has an example which does not agree with either of these, showing that there are either several very closely allied species, or that *D. smaragdina* is subject to much greater variety than is usual in this group.

#### 15. Dipsas Taxila. Plate VI. of figs. 16, 17.

Q. Thecla Taxila, Bremer, Bull. de l'Acad. Imp. des Sci. de St. Pétersb. iii. p. 470, 1861; Lepid. Ost-Sibiriens, pl. 3 & 8. f. 7 & 2.

UPPERSIDE. Male.—Brilliant green, slightly tinted with blue. Anterior wing with the outer margin dark brown, narrow. Posterior wing with the costal margin rufous-brown: the outer margin dark brown, broad.

Underside pale stone-colour. Both wings crossed beyond the middle by a band of white bordered inwardly with rufous-brown. Anterior wing with a dark brown band from the anal angle to beyond the middle: two submarginal lines of dull white. Posterior wing with one tail and three submarginal white lines: a band of orange at the anal angle bordered above with black: the lobe and spot at the base of the tail black, the space between them marked by a brown spot crowned with white.

Exp.  $1_{20}^{9}$  inch.

In the Collection of Herbert Druce, from Japan.

#### 16. Dipsas Attilia.

Thecla Attilia, Bremer, Bull. de l'Acad. Imp. des Sci. de St. Pétersb. iii. p. 469; Lepid. Ost-Sibiriens, pl. 2. Q fig. 3.

If the transverse bands on the underside of Bremer's figure had not been so dark, I should have placed my D. Odata as the male of this species.

#### 17. Dipsas Arata.

Thecla Arata, Bremer, Bull. de l'Acad. Imp. des Sci. de St. Pétersb. iii. p. 470; Lepid. Ost-Sibiriens, pl. 3. fig. 6.

Thecla ichnographia, Butler, Journal Linn. Soc. Zool. ix. p. 57.

In the Collection of W. C. Hewitson, from North Japan.

Dipsas Grunus. Plate VI. figs. 18, 19.

Dipsas Grunus, Lycanida, p. 67.

I now figure this species, having omitted to do so in a former part of this work.

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WILLIAM C. HEWITSON.

VOL. II. PLATES.

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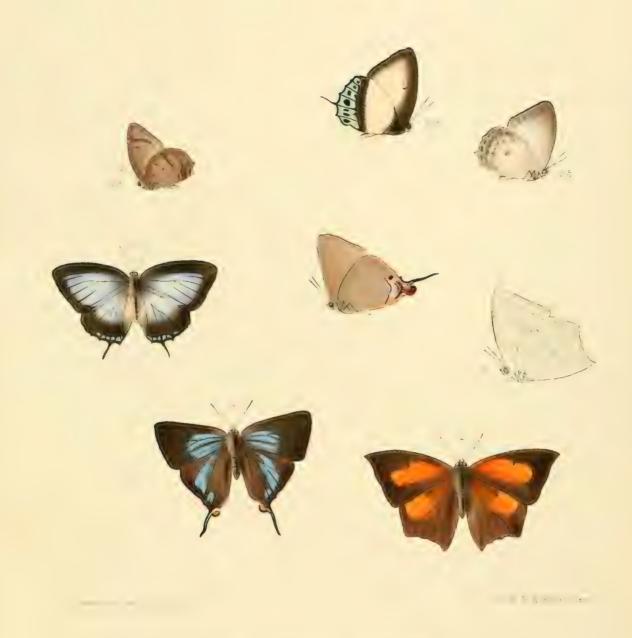


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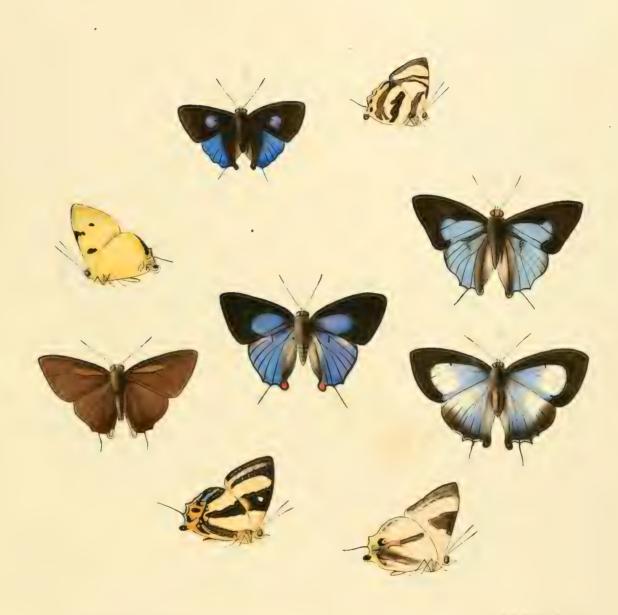
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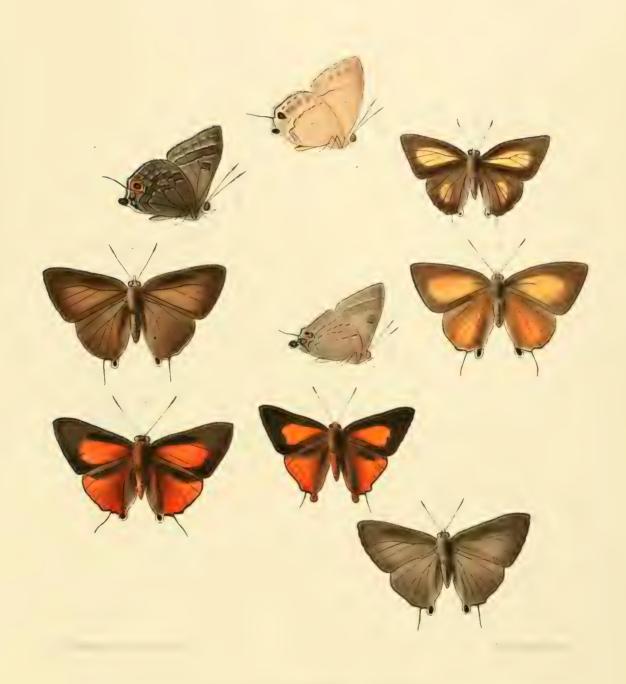




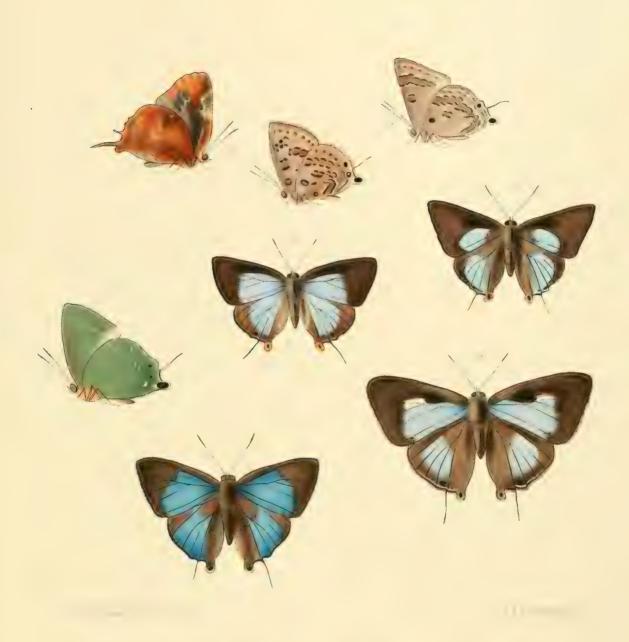






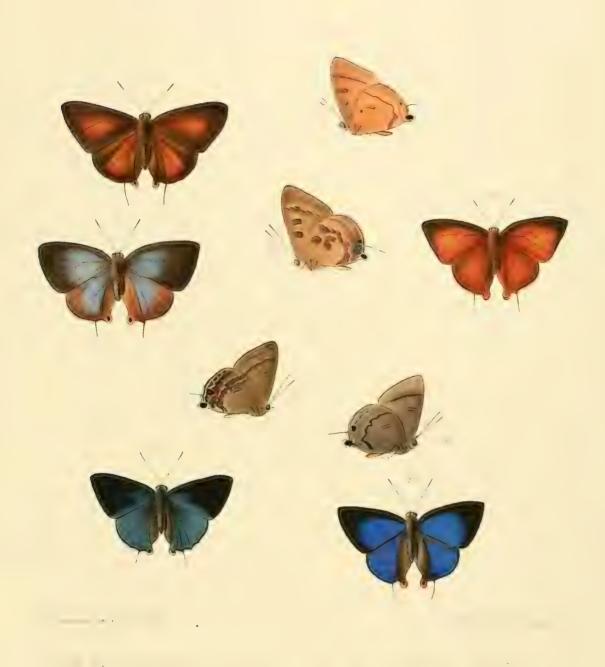








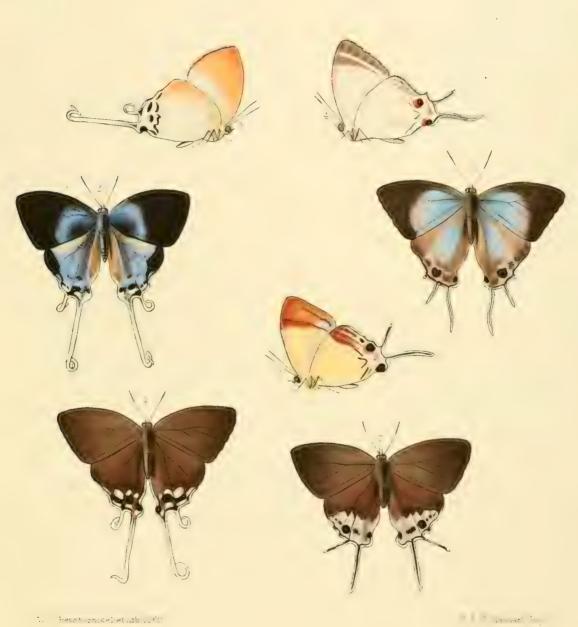




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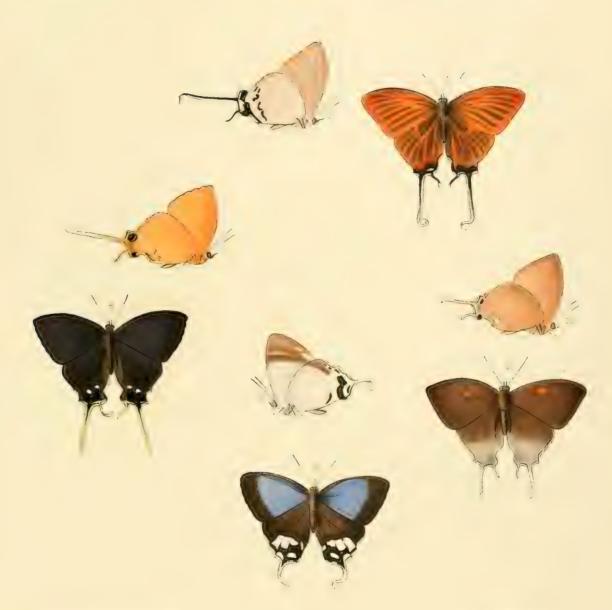






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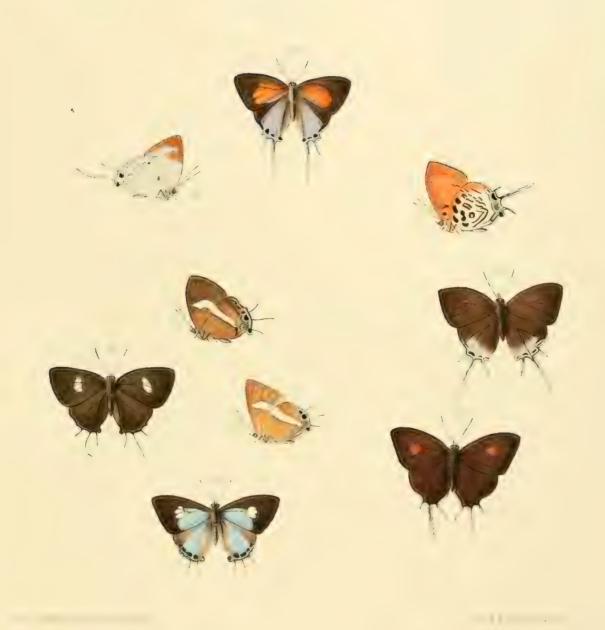


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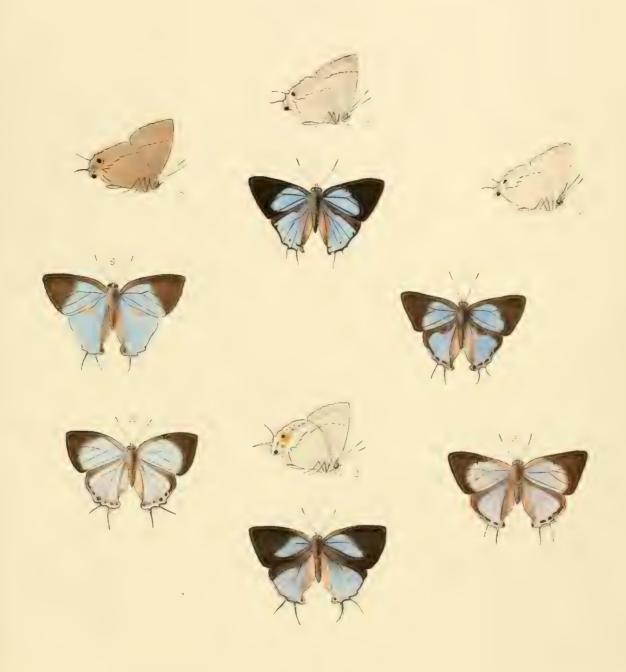






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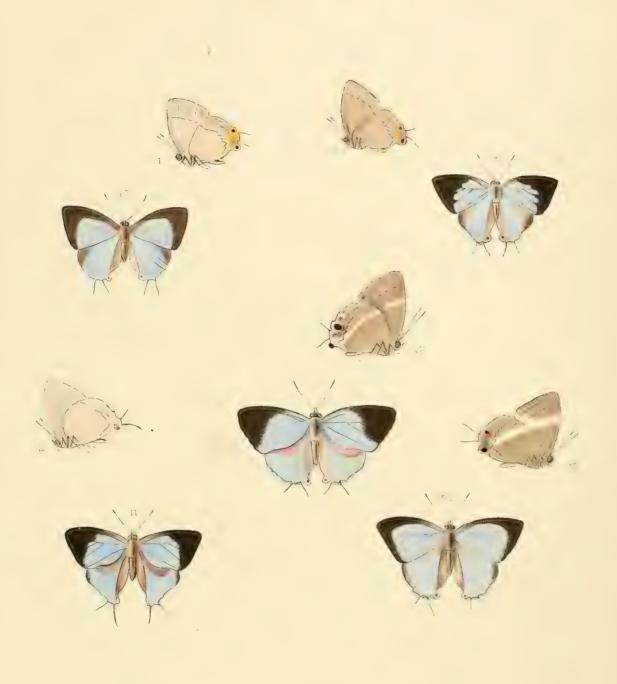
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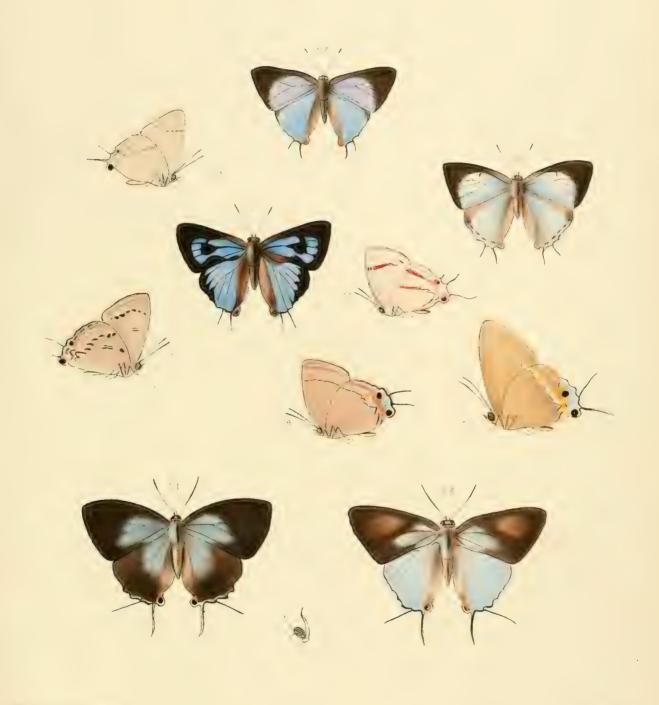
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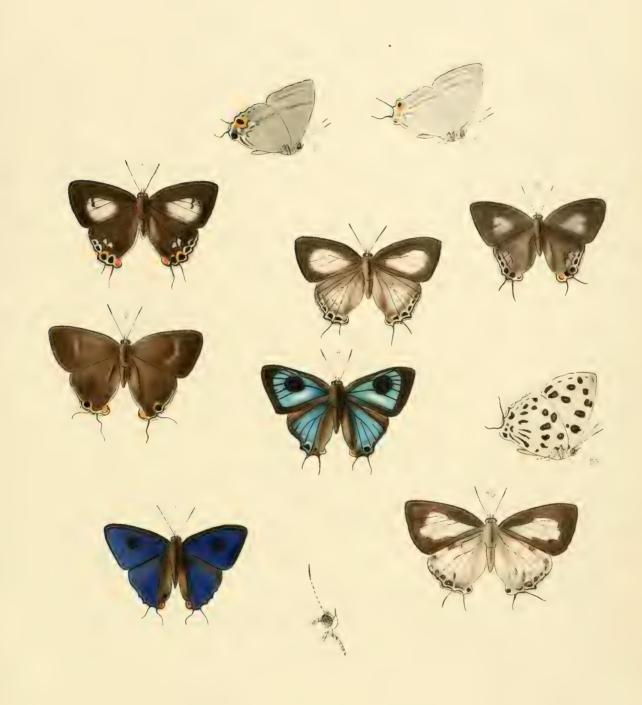




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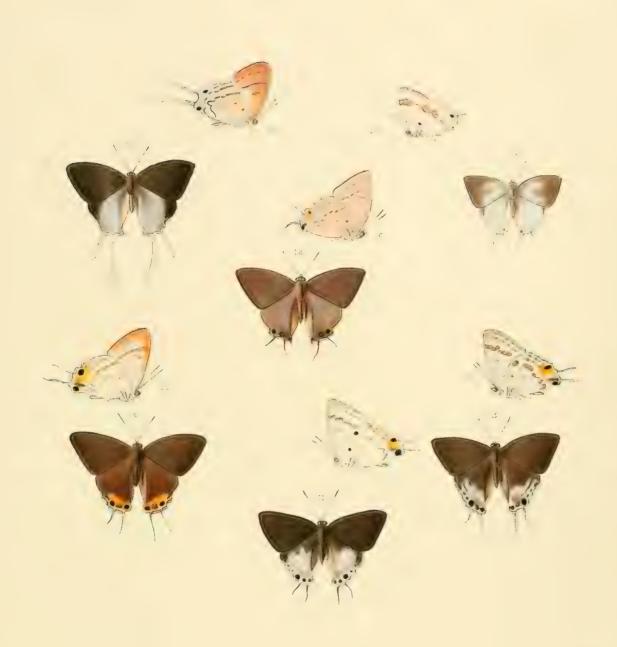


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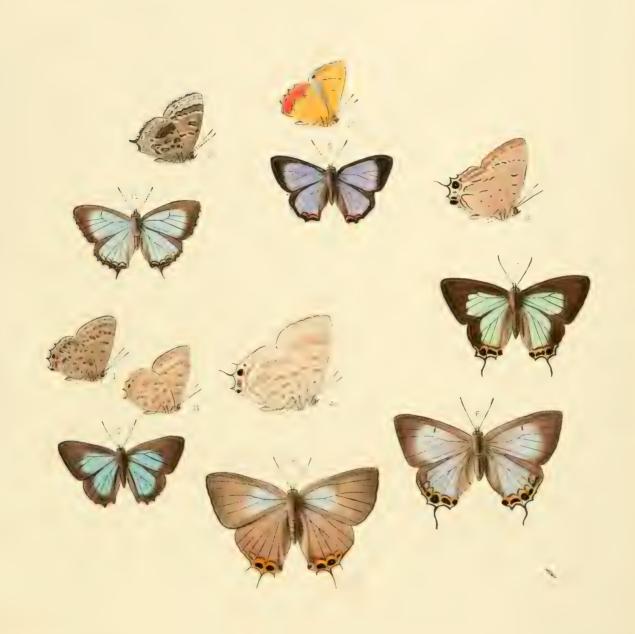








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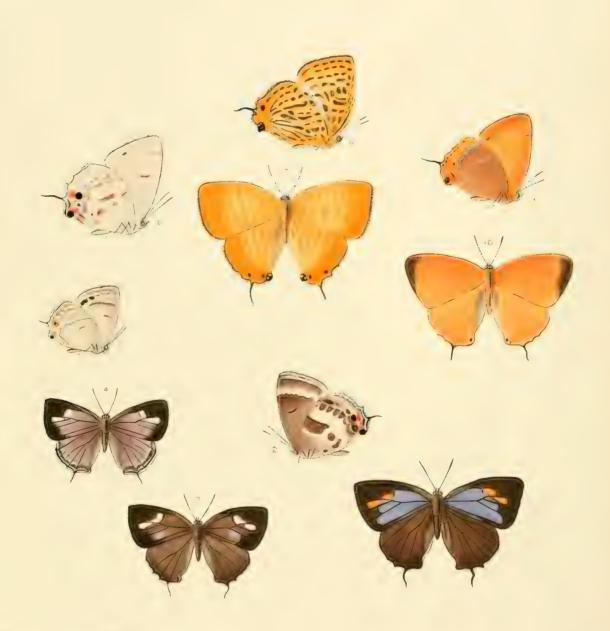
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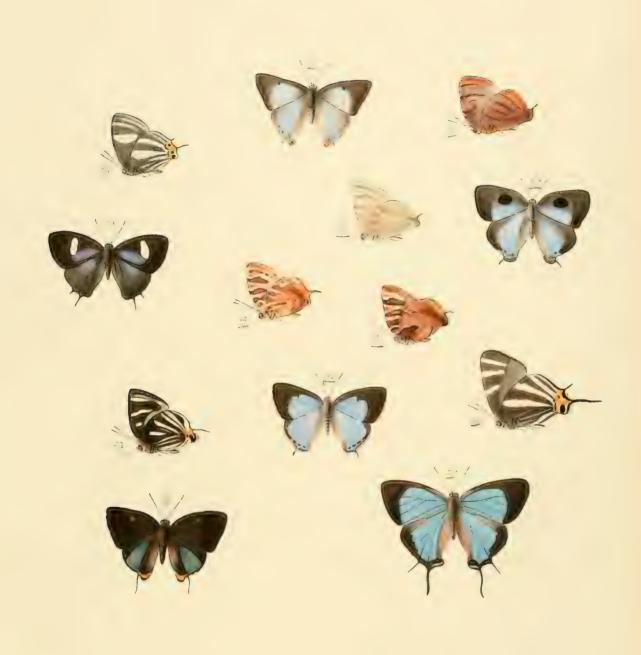
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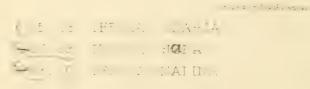
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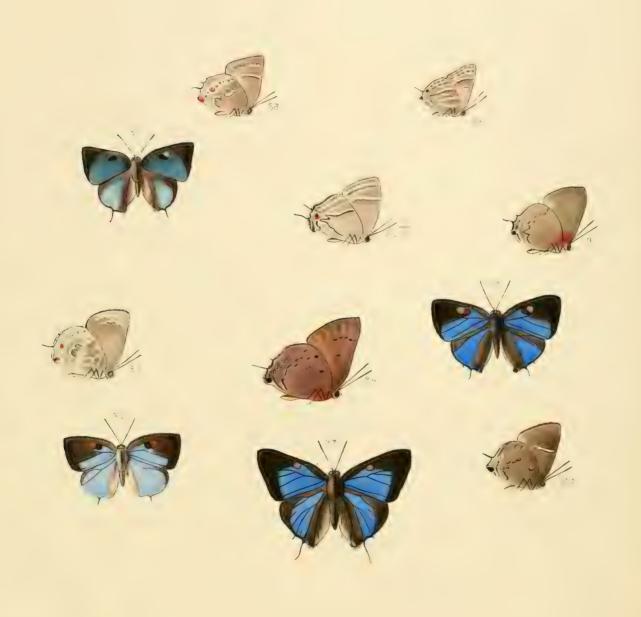












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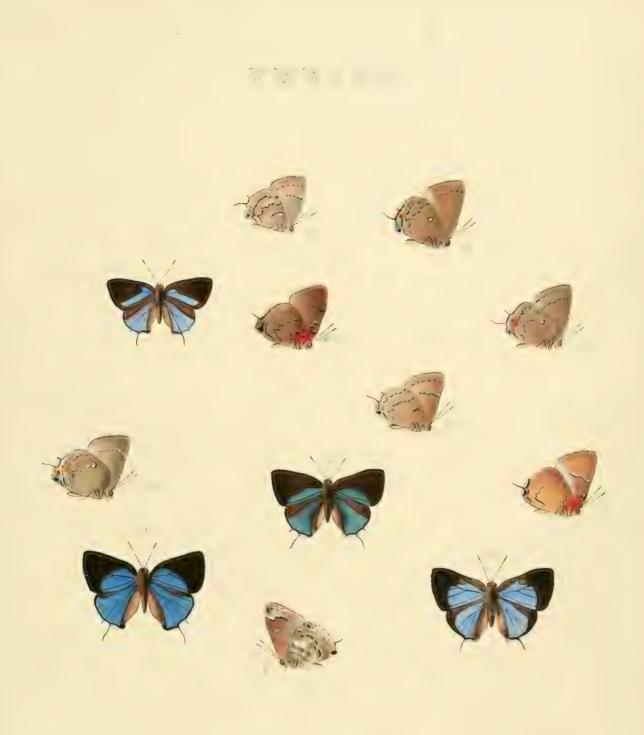
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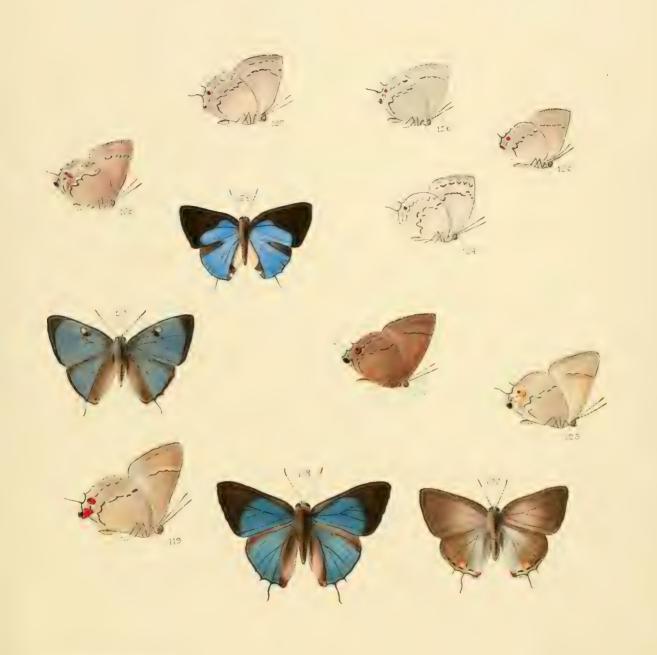


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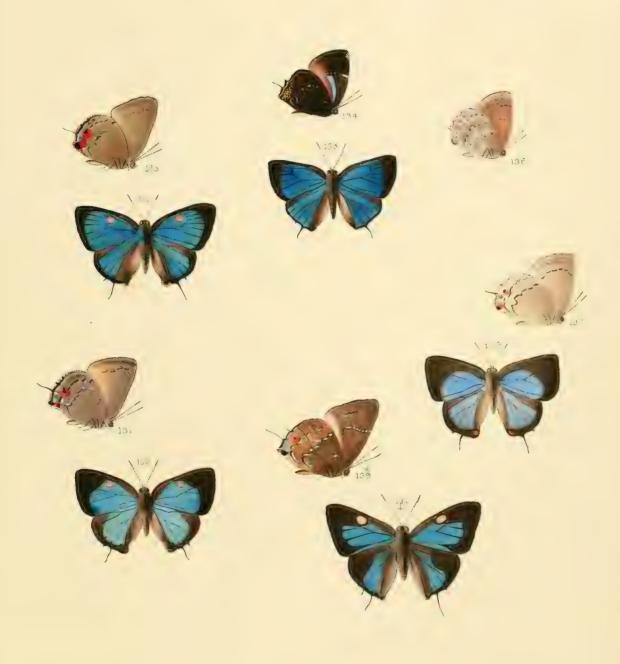
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-127. THECLA STILBIA.
-128-129 THECLA SYEDRA



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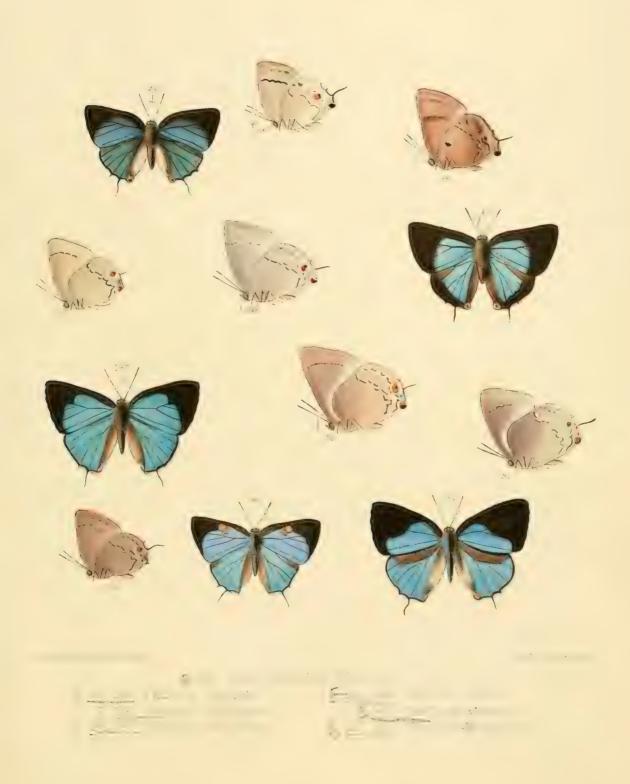


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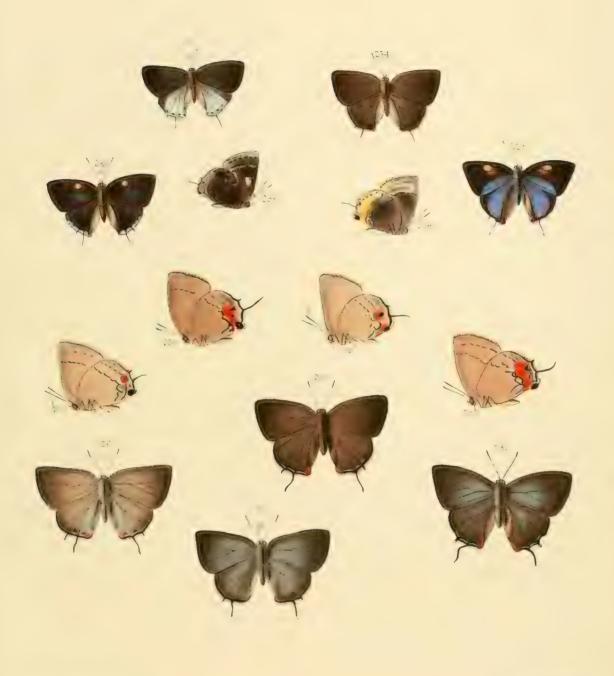
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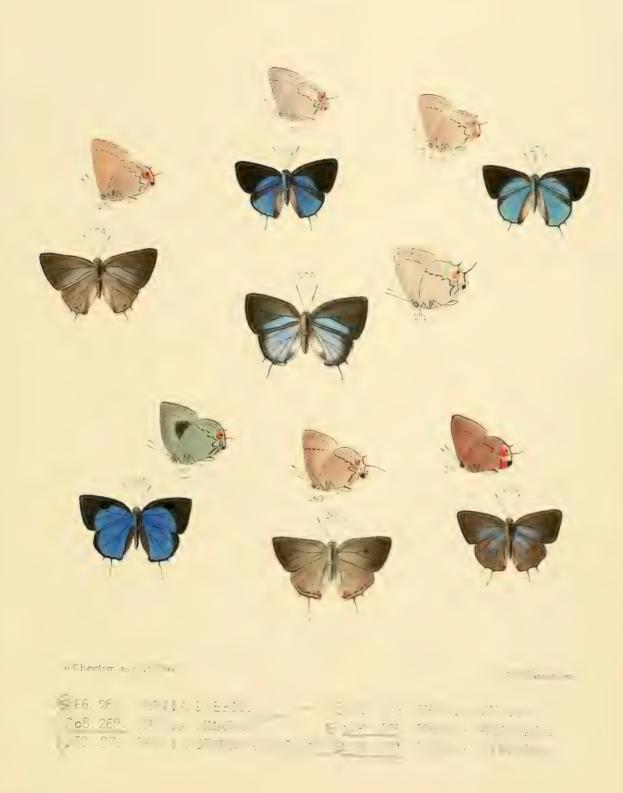
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W.C.Hewitson del et lith. Jany. 1869.

M.& N. Hanhart imp

280 281 THECLA KEILA. 288 289 THECLA THABENA.
282 283 THECLA TERENTIA. 290 THECLA TEUCRIA
281 2-1 1-1 1.1 TEMESA. 291 292 THECLA TEGULA
286 287 THECLA TALAYRA. 293 294 THECLA LEDAEA



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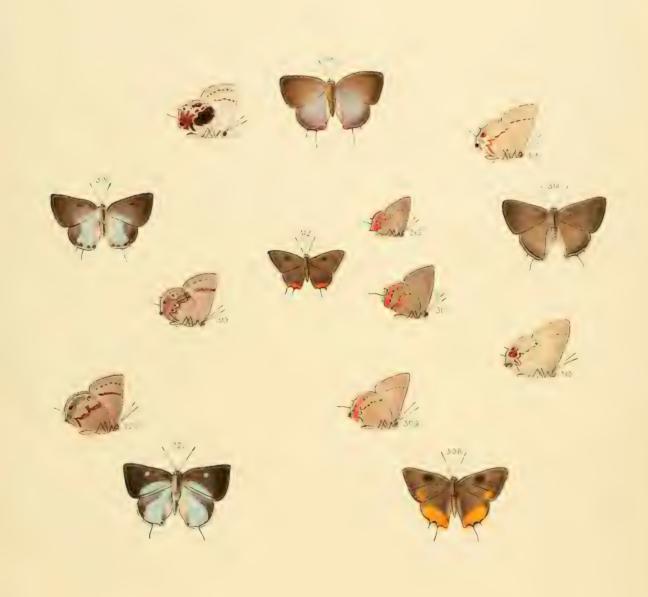


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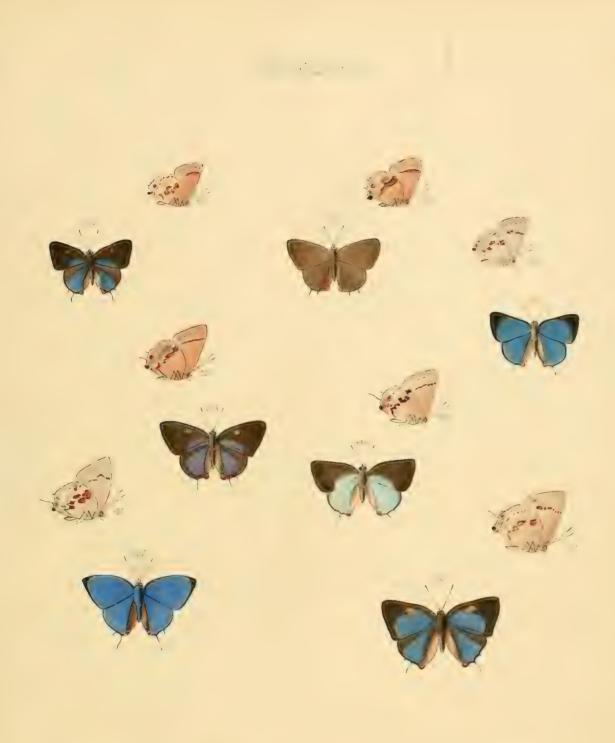
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€308 309. THECLA TEGAEA

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314 315. THECLA SANGALA 320 321 THECLA SOCIA





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. Hewitson del et lith l'eb 1871.

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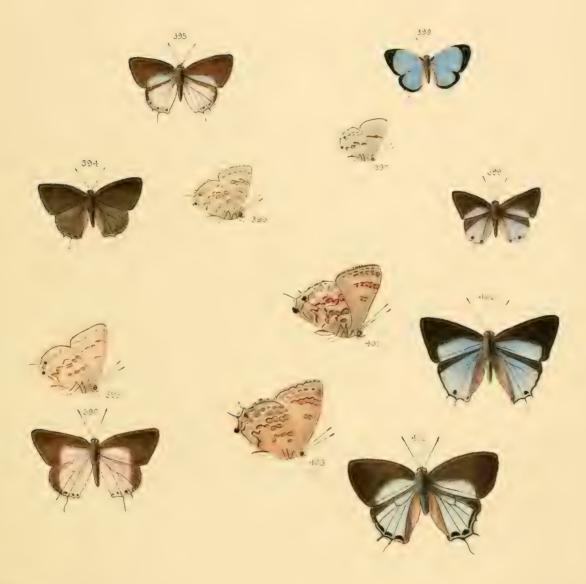
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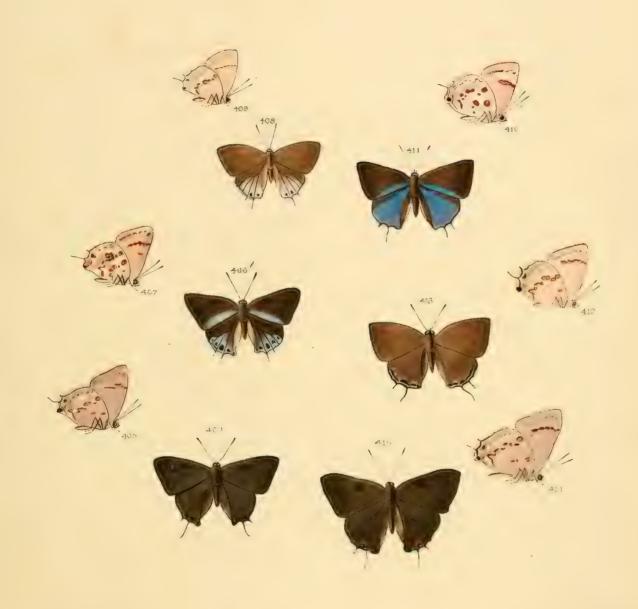




392.393. THECLA AROLA.

M&N Hazhart mq \* 397.398. THE CLA SEUDIGA —399.400.401.402.403. THE CLA OREALA





W.C Hevitson del et lith Jany. 1872.

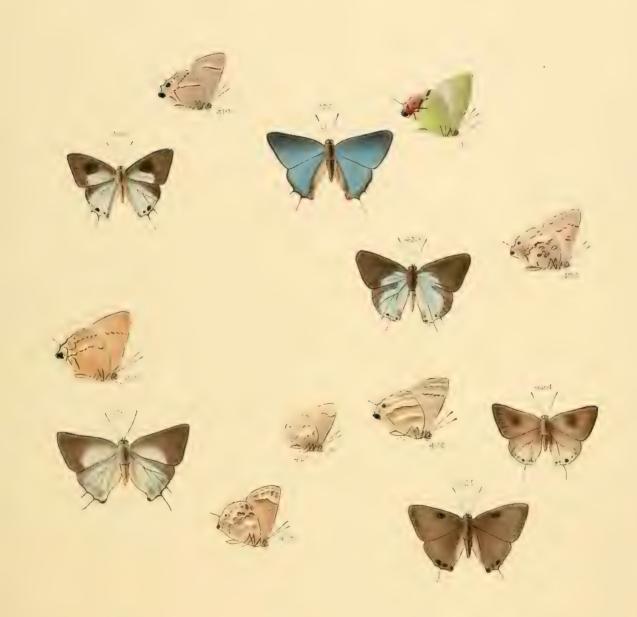
M&W Hanhart imp

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406.407. THEGLA LUCENA 408.409. THEGLA AZUBA

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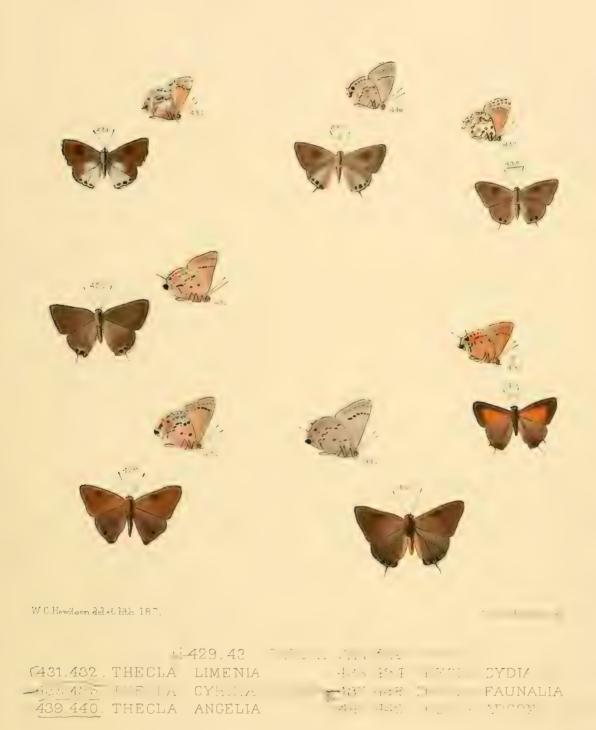
WC Hewitson del et lith 1872

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M & N Hanhart 1990



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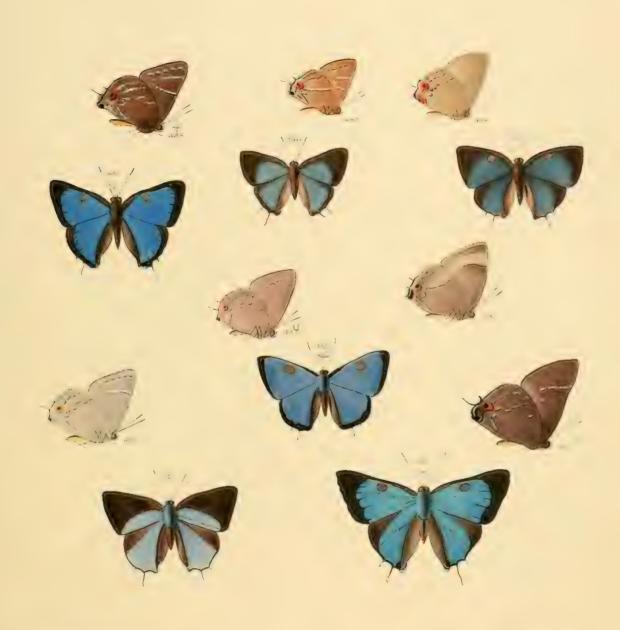




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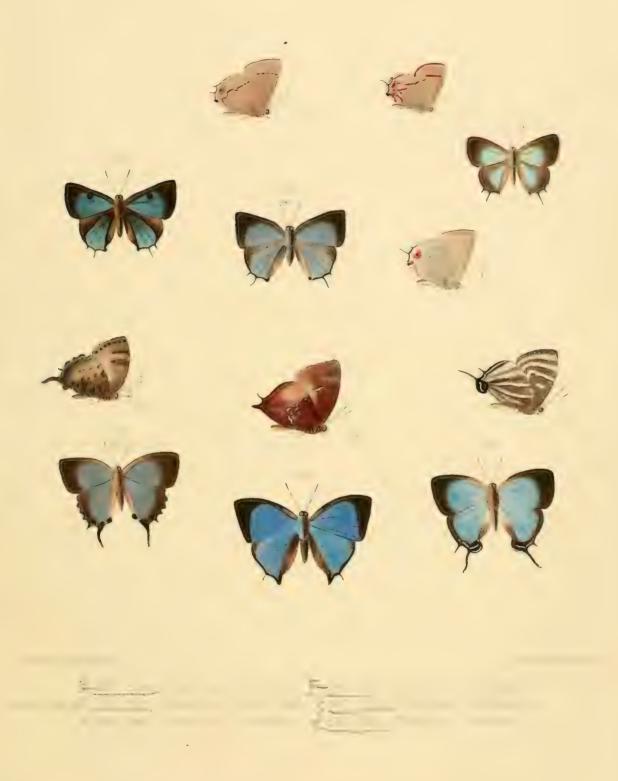
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W.C. Hewitson del et lith Feby 20th 1875

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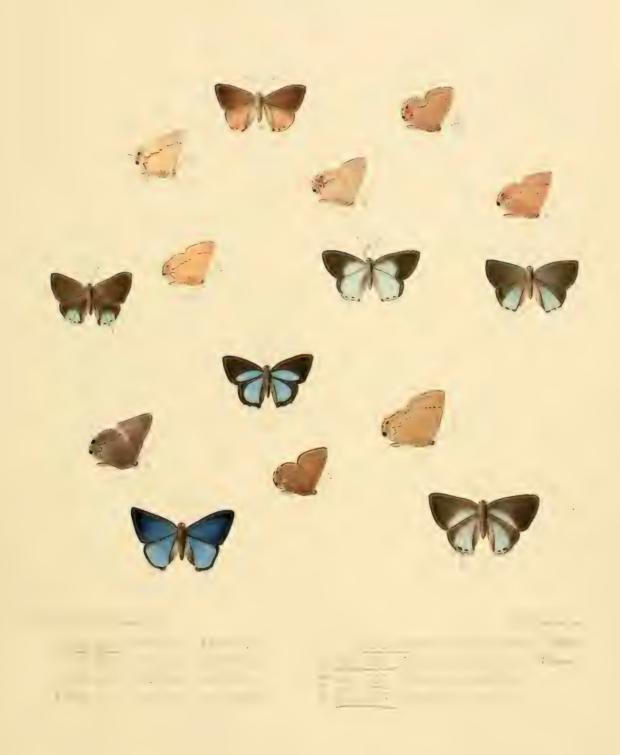
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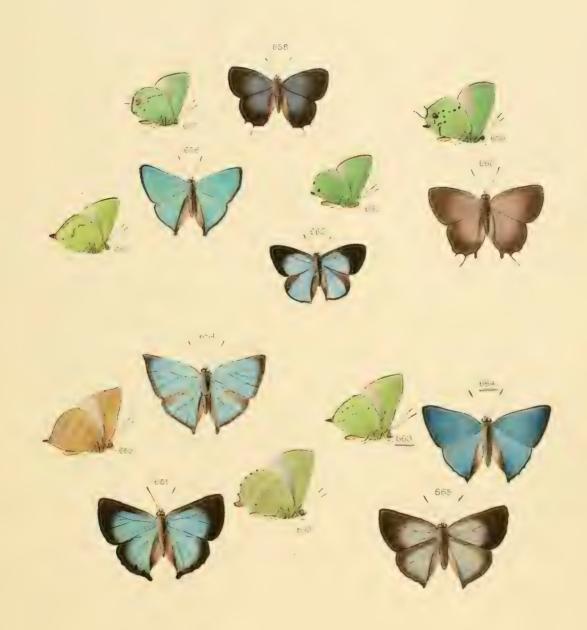












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M&N Hanhart imp

651.652.653.654. THECLA LONGULA. 659.660 THECLA CHLORIS. 661.662. THECLA FACUNA 657.658. THECLA MELBA 663.664.665. THECLA LYCIMNA.





WC Hewitson del et lith. Jany 1876

M & N Hanhart 1mp

666.667. THECLA GOLETA TO BE THECLA NIPONA

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670.671-672. THECLA LIGIA. 678.670 THE MA CRAMBUSA





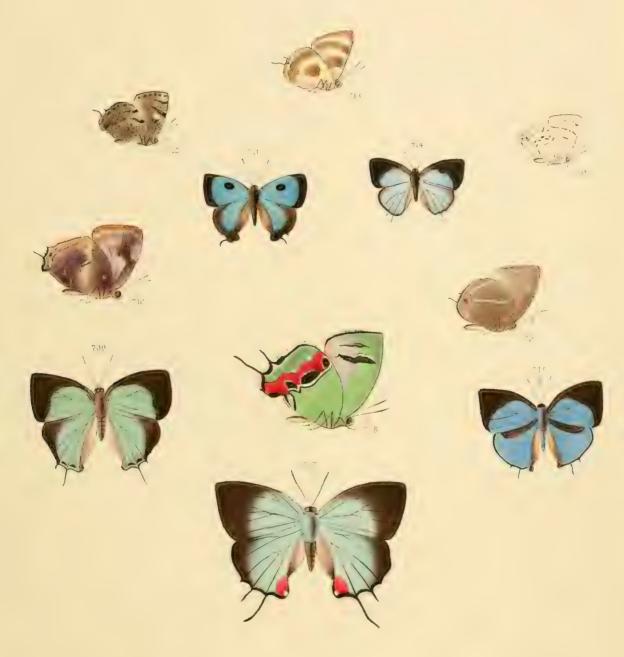
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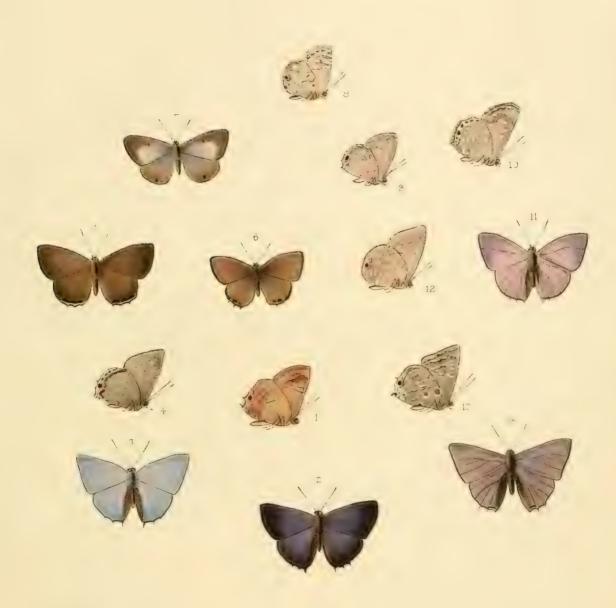
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9.10. EPITOLA CEPHENA

11 12. EPITOLA HYETTA

13 14. EPITOLA GERINA.

15.16. EPITOLA ZELZA

17.18. EPITOLA CARCINA

19.20 EPITOLA CERCENE

M&N Hanhart incp



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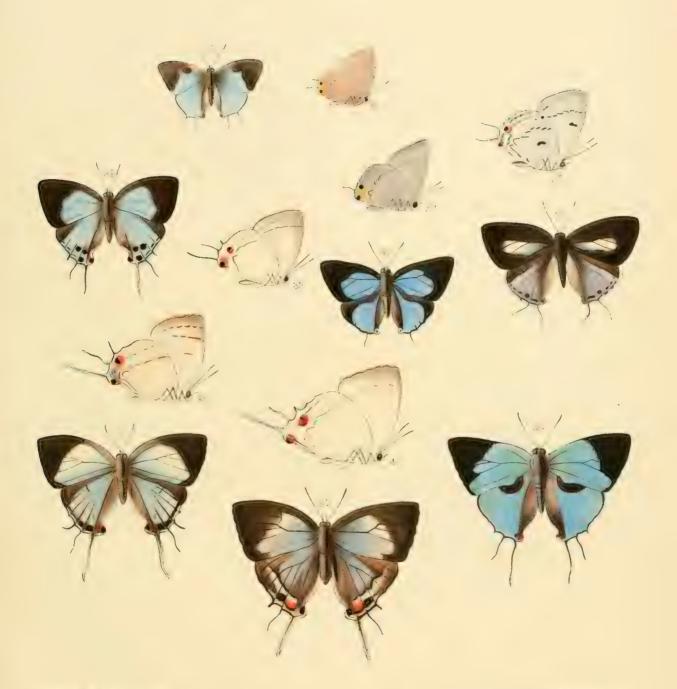








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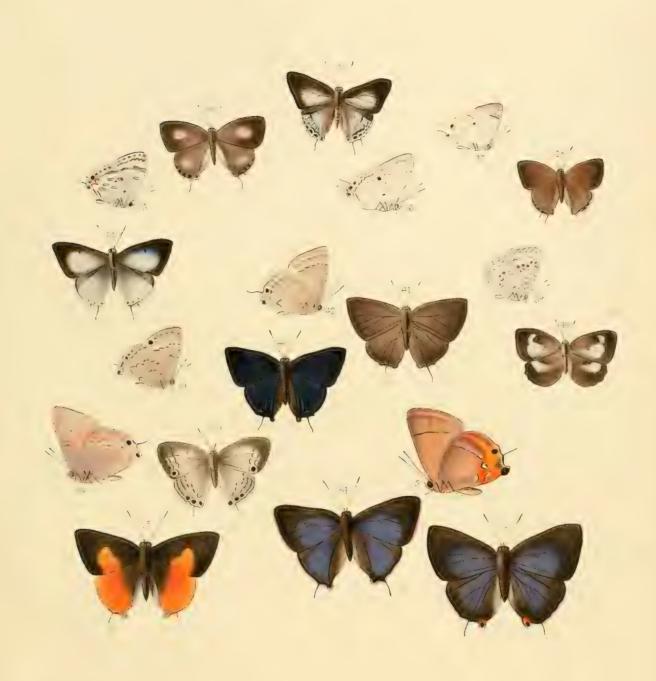
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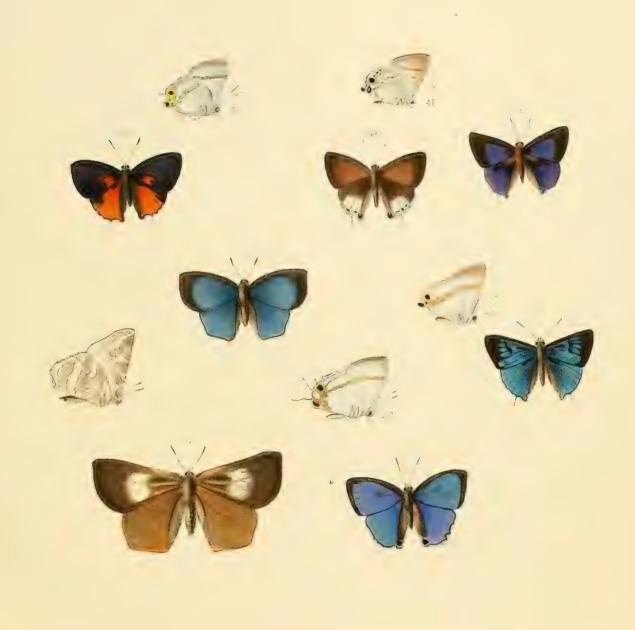
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#### 57. DEUDORIX DIOCLES

60.61,62.DEUDORIX DARIAVES

65,66,67.DEUDORIX DERITAS. 65,66,67.DEUDORIX DIENECES 68.69 DEUDORIX DELIOCHUS 64.DEUDORIX DIOPOLIS. 70.71 DEUDORIX DIYLLUS

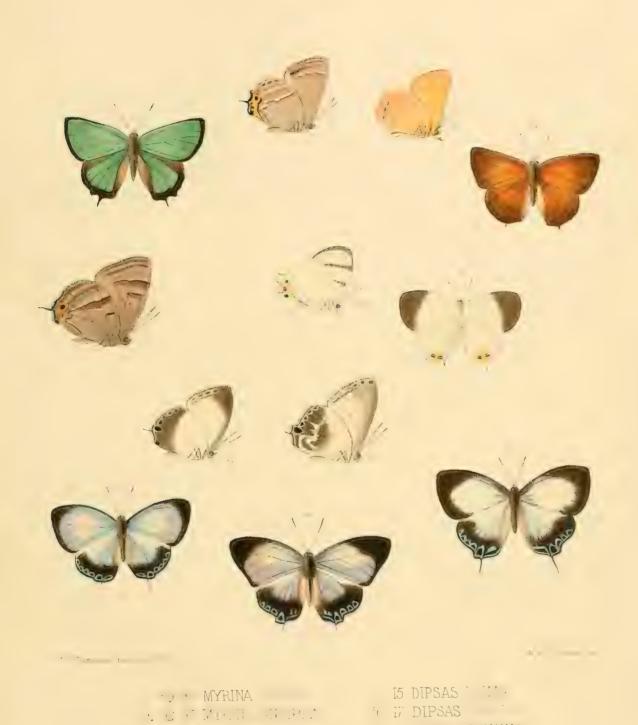




14 45.46.HYPOLYCÆNA AMBA 47.48.HYPOLYCÆNA ARUN... 49 50.HYPOLYCÆNA MERA

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WC Hewitson del.et lith

59.60.AMBLYPODIA GRYNEA.
61.AMBLYPODIA PERIMUTA.

M&N Hanhart ump

62 63. AMBLYPODIA BAZALOIDES 64.65. AMBLYPODIA BUPOLA





WCHewitson del et hth

66.67. AMBLYPODIA OVOMACULATA. 68 69 AMBLYPODIA BUXTONI Welleman re ;

70.71. AMBLYPODIA CAPETA 12.73. AMBLYPODIA AVIDIENA