ON DR. WM. DIETZ'S REVISION OF THE TINEIDÆ
(HEINEMANN).

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The long-expected paper by Dr. Wm Dietz, entitled : "Revision of the Tineid Subfamilies, *Amydriinæ* and *Tineinæ*, inhabiting North America,"¹ appeared during the writer's absence in Europe, and a subsequent summer's expedition to the West Indies made it impossible to give this important contribution to the knowledge of our American Tineidæ the attention it deserved before early this year. Since then I have gone carefully over all Dr. Dietz's material with him in his hospitable home in Hazelton, Pa., and have had another fruitful sojourn with him in my own home, which has resulted in complete agreement between us on nearly every point of difference in opinion which had arisen during my studies of his paper. Thus I am very gratified that the following corrections of that paper (with a few minor exceptions specially noted) are all seconded by Dr. Dietz, who has shown during our sometimes quite animated discussion a rare scientific spirit in the effort to get at the true facts, regardless of his expressed opinions, which cannot be too highly commended ; in fact, Dr Dietz might as well have published the following notes himself, but has preferred that I should do it.

Dr. Dietz deserves very much credit for his painstaking work, which is one of the largest and most important single contributions ever published on our American Microlepidoptera, and which deals with one of the most difficult groups.

When in the following remarks I mainly give attention to the mistakes in the paper, it is not for lack of appreciation of the good work done or of the many difficulties conquered ; but the mistakes should, of course, be corrected ; these arise mainly from the lack of sufficient material, and are quite excusable, considering Dr. Dietz's disadvantages in working away from the type collections, and without an adequate library.

One very serious drawback to the paper, which Dr. Dietz cannot be held responsible for, is the fearful amount of typographical errors, worse than in any scientific paper I have met with, which cause much annoyance in study, and result in several unintentional additions to the synonymy.

Dr. Dietz's paper covers a group of moths, which may be shortly defined by our popular name for the paper, "Tinea and allies," and which is equivalent to Heinemann's old family *Tineidæ* ; but the limits are rather

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1. Trans. Amer. Ent. Soc. Phil., XXXI, pp. 1-95, 1905.

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arbitrarily drawn, as, for example, by the exclusion of the genera *Prodoxus* and *Tegeticula*, which naturally belong to this group.

Dr. Dietz divides these insects into two subfamilies: the *Amydriinae* and the *Tineinae*; it would, in my opinion, have proved more rational and profitable to have carried through Lord Walsingham's suggested three divisions of the group: *Setomorphinae*, *Euplacaminae* and *Tineinae*,² and I believe these groups will eventually stand; but there is at least a question of the propriety of substituting the new name *Amydriinae* for Lord Walsingham's name, instead of enlarging the conception of the already established subfamily so as to include *Amydria*.

Dr. Dietz says: "These two subfamilies are distinct and sharply defined," but not one nor any combination of the characters given by him hold good; on the contrary, the differences given in the synoptic table are very vague indeed, when critically examined:

1. <i>Head</i> rough-haired or almost entirely smooth-scaled.	1. <i>Head</i> entirely rough-haired.
2. <i>Tongue</i> and <i>maxillary palpi</i> rudimentary.	2. Maxillary palpi well developed, very rarely rudimentary. (Tongue not mentioned.)
3. Labial palpi strongly developed, porrect and more or less ascending; second joint with a brush, more or less developed, or simply thickened with scales beneath; terminal joint pointed, erect, or rarely obtuse and depressed.	3. (Labial palpi not mentioned.)
4. Vein 7 of fore wing to costa or rarely to apex.	4. Vein 7 of fore wing to costa.
5. Vein 1 <i>b</i> furcate at base.	5. (Vein 1 <i>b</i> not mentioned.)
6. Hind wings as wide as fore wings.	6. (Width of wings not mentioned.)
7. Vein 1 <i>b</i> more or less distinctly furcate at base.	7. Vein 1 <i>b</i> simple at base (except <i>Brackenridgia</i>).
8. Vein 1 <i>e</i> always distinct.	8. Vein 1 <i>e</i> often absent.

In other words, he separates the two subfamilies "on one character apparently overlooked" (sic!), namely, the furcation of vein 1*b* of the

2. Trans. Ent. Soc. Lond., p. 81, 1891.

hind wings, which he himself admits occurs in one genus of *Tineina* (*Brackenridgia*),³ and which I find also in *Greya* and in *Cyane*, which belong to *Tineina*, according to Dietz.

In his first group Dr. Dietz places nine genera, of which, however, his genus *Semiota* is established on the male forms of Zeller's genus, *Setomorpha*, as shown by the writer,⁴ and his genus *Apotomia* is likewise (Dietz concurring) only the male form of *Setomorpha*; both must consequently fall as synonyms of Zeller's genus.

This leaves seven genera, of which the first three, *Amydria*, *Hypoplesia*⁵ (*Paraplesia*, Dietz, preoccupied) and *Paraneura* form one group (the *Euplacaminae* of Walsingham), in which the two last genera, *Epicheta* and *Apreta*, probably should be included,⁶ while the two remaining *Epilegis* and *Setomorpha* form another group (the *Setomorphinae* of Walsingham).

Coming down to the species, I believe, from my examination of the too scant type material, that *Amydria curvistrigella*, *pandurella* and *confusella* are only slight variations of *apachella*, and should go into the synonymy.⁷ The species described as *Setomorpha sigmoidella* is not a true *Setomorpha*, but may be retained in that genus until more material is on hand; it will form a new genus. *Setomorpha majorella* is a good female *Setomorpha* species, and evidently (Dietz concurring) the same as *Semiota transversostrigella*, described from the male; the latter name will thus fall as a synonym.

In the second subfamily *Tineina*, Dr. Dietz includes twenty-two genera, of which six are new; all will probably prove valid.⁸ Much credit is due Dr. Dietz for bringing order out of the chaos in which our American species of this group were found.

I am able to make the following corrections and additions:

In *Xylesthia* Dr. Dietz has rightly adopted my conclusion⁹ that the three names given by Clemens, Zeller and Chambers all apply to the same

3. *Paraclemensia*, Busck, Journ. N. Y. Ent. Soc., XII, No. 3, 1904.

4. Proc. U. S. N. Mus., Vol. 30, p. 734, 1905.

5. Proc. U. S. N. Mus., Vol. 30, p. 735, 1906.

6. The material at present available is too scant to express absolute opinions on.

7. Dr. Dietz does not think so.

8. I have not yet, however, had opportunity to critically compare the new genera with existing exotic genera.

9. Proc. Wash. Ent. Soc., 5, p. 186, 1903.

species in various conditions of imperfection, but he nevertheless makes a fourth name for what is in my opinion undoubtedly¹⁰ the same insect in another degree of imperfection, and calls it "very distinct"; his *Kearfottella* is nothing but *pruniramiella*, Clemens.

Abacobia carbonella, Dietz, is the species described by Walker as *Tinea Martinella*, as my examination of Walker's type in the British Museum proved, and this very interesting form, which has a wide distribution, should be known as *Dietzia Martinella*, Walker, Dr. Dietz's generic name being preoccupied.¹¹ *Tinea afflictella*, Walker, is the female of this same species, as the unique type in the British Museum shows.

The present American conception of the genus *Incurvaria*, as expressed in our list and in Dr. Dietz's paper, is not equivalent to the European conception as defined by Meyrick,¹² but is rather *Lampronia*, Stephens; much more abundant material than at present at our command is required to properly straighten out this group.

Incurvaria rheumapterella, Dietz, is the well-known *Prodoxus coloradensis*, Riley, as is at once evident from Dietz's figure alone, and examination of the type verifies this.

Brackenridgia, Busck, should be *Paraclemensia*, Busck.¹³

The venation of the hind wing of the genus *Isocorypha* is wrongly given, both in the text and in the figure; the hind wing is quite normal, and has eight veins all separate, vein 8 *not* connected with the cell.

In describing his new species, *crysocomella*, and in including it in this genus, Dr. Dietz has been inexplicably careless; the species has but the most superficial resemblance to the type-species, and does not even belong to the same family, but is an *Ethmia*, and the same as the species described by Lord Walsingham as *albistrigella*; Dr. Dietz's type is in very poor condition, but amply proves the synonymy.

The preoccupied name *Progona* has been substituted by *Mea*, Busck.¹⁴

Tinea costitristrigella, Chambers, seems to be omitted altogether.

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10. Dr. Dietz not concurring.

11. Busck, Proc. U. S. N. Mus., Vol. 30, p. 735, 1906.

12. Handbook Br. Lep., p. 779, 1895.

13. Journ. N. Y. Ent. Soc., Vol. XII, No. 3, 1904.

14. Proc. U. S. N. Mus., Vol. 30, p. 735, 1906.