

# REICHENBACHIA

## Staatliches Museum für Tierkunde Dresden

Band 25

Ausgegeben: 30. Oktober 1987

Nr. 13

### Homopterological Reports IV—V<sup>1)</sup> (Insecta, Homoptera, Auchenorrhyncha)

With 3 Figures and 1 Map

G. A. ANUFRIEV

Gorky

**Abstract.** The paper consists of the following reports. **IV.** Nymphs of *Stiroma* FIEB. and *Eurybregma* SCOTT (Delphacidae). Description of the nymph of *Stiroma lenensis* EM.; *Amorista* subgen. n. is described for it, the description being based on differences in the number and disposition of abdominal sensory pits in nymph as well as in the male genitalia in comparison with *S. affinis* FIEB. and *S. bicarinata* (H.-S.). Additions to the description of nymph of *Eurybregma nigrolineata* SCOTT are made. *Stiroma* (*Amorista*) and *Eurybregma* are included in VILBASTE's (1968) key for the identification of the nymphs of *Delphacidae*. **V.** New synonymy of the Far Eastern Iassinae (Cicadellidae). 1. *Straganiassus* ANUFR. and *Anufrieviella* NAST are junior synonyms of *Trocnadella* PRUTHI. 2. *Iassus ulmi nesaesus* ANUFR. is a junior synonym of *I. matsumurai* Metc., comb. n. (= *Macropsis dorsalis* MATS.)

#### IV. Nymphs of *Stiroma* FIEB. and *Eurybregma* SCOTT (Delphacidae)

The study of the nymphal stage of Palaearctic delphacids contributed to the perfection of the family system as well as to the distinguishing of some natural groups of generic range (VILBASTE, 1968, 1971). Nevertheless, for the present time the nymphs of many representatives of the family are not described yet. Having at my disposal the nymphs of *Stiroma lenensis* EMELJANOV, 1976 and *Eurybregma nigrolineata* SCOTT, 1875 I present descriptions of them below

##### *Stiroma lenensis* EMELJANOV, 1976 (Figs. 1–2)

The nymph is yellowish-white with longitudinal black stripes on the crown and the thorax and transverse ones on the abdomen. The crown has three black stripes on its anterior half and only two lateral ones posteriorly. The prothorax has four longitudinal black stripes, the mesothorax eight, and metathorax six ones. The frons is black, the frontal keels and narrow spaces around them are whitish; the sensory pits lie on the light parts. The abdominal tergites are transversely striped black anteriorly; the hind margins of them are whitish.

The quantity and location of sensory pits on the abdomen is characteristic: on each side the 4th tergite has one pit, the 5th — two pits disposed in transverse row, the 6th and the 7th — three pits in transverse row, the inner one being set apart from the others, the 8th — three pits with two outer pits being disposed in longitudinal row and the inner one set apart from them.

**Materials examined** USSR, Tchita Region: Sokhondo Reserve, Bukukun, sedgy herbs under forest canopy near stream, July 27, 1978, 8 nymphs together with numerous adults, ANUFRIEV coll.

The nymphs of *S. lenensis* essentially differ from those of two other representatives of the genus by the number and disposition of abdominal sensory pits. According to J. VILBASTE's

<sup>1)</sup> Cf. Reichenbachia Mus. Tierkd. Dresden **19**, 28: 159–173, 1981.

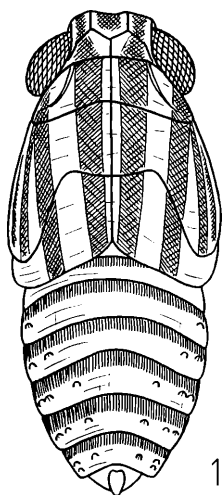


Fig. 1. *Stiroma (Amorista) lenensis* EM., dorsal view of larva.

(1968) key *S. affinis* FIEBER, 1866 and *S. bicarinata* (HERRICH-SCHÄFFER, 1835) have 2 (rare 1) pits on the 4th, 0+3 on the 5th, 1+3 on the 6th on the 7th and 1+2 or 1+3 on the 8th abdominal tergites, whereas *S. lenensis* has 1 pit on the 4th, 2 on the 5th, 1+2 on the 6th, on the 7th and on the 8th abdominal tergites. These distinctions in the number and disposition of sensory pits as well as the essential differences in the structure of male genitalia (wide and plane appendages of anal tube set considerably apart from each other, long and stright aedeagus supplied with only subapical teeth in *S. lenensis*; narrow appendages of anal tube roundish in cross section set close to each other, aedeagus of moderate length, ventrally curved, with teeth along all apical half in *S. affinis* and *S. bicarinata*) give reason for placing *S. lenensis* in special subgenus *Amorista* **subgen. n.** The presence of 1+2 sensory pits on the 6th and the 7th abdominal tergites of nymph in *Amorista* but not 1+3 as in *Stiroma* s. str. brings the new subgenus close to *Stiromella* WAGNER, 1963 and *Eurysa* FIEBER, 1866.

*Amorista* may be included in the key for the identification of the nymphs of Delphacidae compiled by J. VILBASTE (1968) in the following way:

11 (4) Head as long as width between the eyes or wider than long.

12a (12b) Nymphs yellowish-white from above, with black longitudinal stripes on head and thorax and with black basal halves of abdominal tergites.

***Stiroma (Amorista subgen. n.)***  
[***S. (A.) lenensis* EM.**]

12b (12a) The colour and the pattern are different.

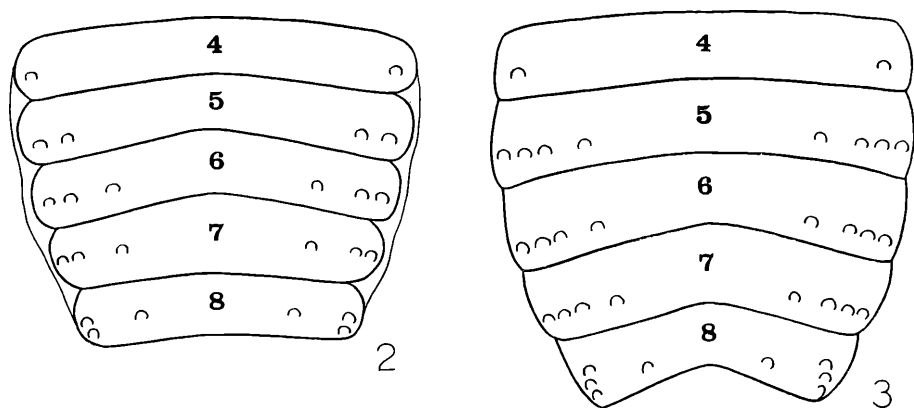
12 (13) and subsequent items according to J. VILBASTE (1968).

#### ***Eurybregma nigrolineata* SCOTT, 1875 (Fig. 3)**

The outward appearance and coloration of the nymph were described by A. I. HASSAN (1939) but disposition of sensory pits on abdomen, important for taxonomy, was omitted. This gap must be filled up.

On each side the 4th abdominal tergite has one pit, the 5th, 6th and 7th tergites have four pits in transverse row, the inner one being set apart from others; the 8th tergite has four pits on each side with the outhter three being disposed in a longitudinal row and the inner one set apart from it.

**Materials examined** USSR, Vitim River, Ust'-Zaza, May 30, 1969, 2 nymphs, V ZHERIKHIN coll. Some adults were collected at the same localisation in June.



Figs. 2-3. Disposition of sensory pits on the 4-8th abdominal tergites in the last larval stage. - 2: *Stiroma (Amorista) lenensis* EM. - 3: *Eurybregma nigrolineata* SCOTT.

*Eurybregma* may be included in the key for the identification of nymphs of *Delphacidae* compiled by J. VILBASTE (1968) in the following way

38 (37) If frontal keels unite, then only at the clypeal suture. Two pairs of lower sensory pits are always present.

38a (38b) In tergite V the median sensory pit is present (1+3).

***Eurybregma* SCOTT [E. *nigrolineata* SCOTT]**

38b (38a) In tergite V the median sensory pit is missing (0+3), the others are situated in a transverse row or the lateral one is situated somewhat anterior to the others

39 (42) and further items according to J. VILBASTE (1968).

### V. New synonymy of the Far Eastern Iassinæ (Cicadellidae)

The appearance of the C. A. VIRAKTAMATH's (1979) work with the results of reinvestigation of Iassinæ described by Dr. S. MATSUMURA allows to ascertain new synonymy for some Far Eastern leafhoppers of the subfamily

1. ***Trocnadella* PRUTHI, 1930; type species *T. shillongensis* PRUTHI, 1930**

= *Straganiassus* ANUFRIEV, 1971 **syn. n.**; type species *Stragania matsumurai* METCALF, 1955 (= *Macropsis dorsalis* MATSUMURA, 1912, non PROVANCHER, 1899)

= *Anufrieviella* NAST, 1981 **syn. n.**; type species *Macropsis melichari* OSHANIN, 1906 (= *M. scutellaris* MELICHAR, 1902, non FIEBER, 1868; sec. typ.)

The above-mentioned synonymy is based on redescription of *Trocnadella* by C. A. VIRAKTAMATH. This redescription, based on reinvestigation of *T. arisana* (MATSUMURA, 1912), was the first to include the description of male genitalia of the genus.

When describing *Straganiassus* (ANUFRIEV, 1971) I designated *Stragania matsumurai* METCALF, 1955, which was misidentified, as a type species. Later (ANUFRIEV, 1978) after studying the MELICHAR's types of *M. scutellaris* in the collection of the Leningrad Zoological Institute I identified the same species as *Straganiassus melichari* (OSHANIN, 1906). Comparison of the figures in G. A. ANUFRIEV's (1971, 1978) and C. A. VIRAKTAMATH's (1979) works made it clear that this species is congeneric with *Trocnadella arisana*.

If "a type species is considered to have been misidentified, the case is to be referred to the Commission to designate as the type species which ever nominal species will in its judgment best serve stability and universality of nomenclature, either the nominal species named in the fixation, regardless of misidentification; or, by the use of the plenary power [Art. 79a]" (Article 70 of "International code of zoological nomenclature" 1985). Therefore the action

Table 1. Distribution of representatives of *Trocnadella* PRUTHI list of locations.

N	Locations	Sources of information
		<i>T arisana</i> MATS.
	Formosa: Arisan; Kanshirei	VIRAKTAMATH, 1979 107
		<i>T punctatus</i> PRUTHI
	E. Himalayas Yatung, Sikkim (Tibet frontier)	PRUTHI, 1930 10
		<i>T shillongensis</i> PRUTHI
	Assam Shillong	PRUTHI, 1930 9-10
		<i>T melichari</i> OSH.
1	USSR, Tchita Region Kyra	My collection
2	USSR, Amur Region Zea Reserve	My collection
3-9	USSR, Maritime Territory Anisimovka, Goncharovka, Rudnaya Pristan', Ussuriysk, Ussuriysk Reserve, Frolovka, Lazo Reserve, "Kedrovaya Pad'" Reserve	ANUFRIEV, 1978 47-48; my collection
10	Japan, Hokkaido	ESAKI, ITO, 1954 253-254;
11	Japan, Honshu	NAST, 1972 227
12	Japan, Kyushu	NAST, 1972 227
13	Japan, Shikoku	NAST, 1972: 227
14	China, Szechwan Fluß Fu-bien-ho, Schindlen-Mardan bei Lifan	MELICHAR, 1902: 120 (45)
15	China, Fukien	JACOBI, 1944: 47
		Undescribed species
	Assam	VIRAKTAMATH, 1979: 105
	Nepal	VIRAKTAMATH, 1979: 105

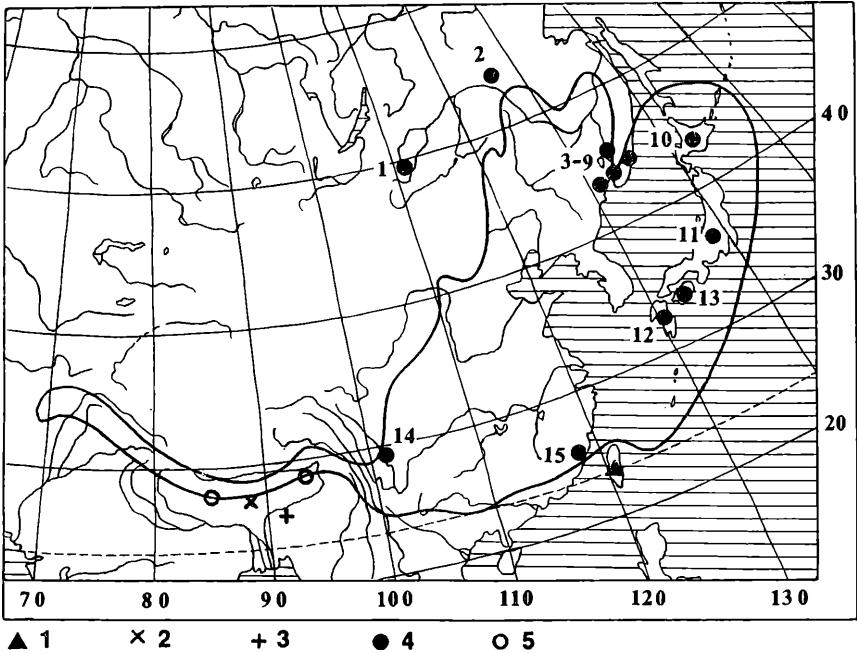


Fig. 4. Distributional map of *Trocnadella* PRUTHI. 1 *T arisana* MATS. - 2: *T punctatus* PRUTHI. - 3: *T shillongensis* PRUTHI. - 4 *T melichari* OSH. (numbers of locations see in the Table) - 5 Undescribed species. Limits of Palaearctic union of biogeographical regions (Stenopaeon + Orthrian) according to A. F EMELJANOV (1974) are outlined.

of J. NAST (1981) who considered *Straganiassus* ANUFRIEV, 1971 and *Iassus* FABRICIUS, 1803 to be subjective synonyms but *Straganiassus* ANUFRIEV, 1971 and *Straganiassus* ANUFRIEV, 1978 to be two separate genera naming the last *Anufrieviella* is invalid.

The genus is distributed in the Palaearctic unit of biogeographic region (Stenopaeic and Orthian) in the sense of A. F. EMELJANOV (1974) (see the table and fig. 4).

## 2. *Iassus matsumurai* METCALF, 1955 **comb. n.**

= *Macropsis dorsalis* MATSUMURA, 1912, non PROVANCHER, 1899

= *Iassus ulmi nesacus* ANUFRIEV, 1977 **syn. n.**

The comparison of our materials and description (ANUFRIEV, 1977) with the redescription of this species made by C. A. VIRAKTAMATH (1979) on the basis of MATSUMURA's type series removes all doubts as to above-mentioned synonymy.

## References

- (ANUFRIEV, G. A., 1971). Ануфриев, Г. А. Страниассус (*Straganiassus*) — новый род цикадок подсемейства Jassinae с Дальнего Востока. — Вестн. зоол. **6**: 87–88.
- (— 1977). — Цикадки (Homoptera, Auchenorrhyncha, Cicadellidae) Курильских островов. — Труды ЗИН АН СССР **70**: 10–36.
- (— 1978). — Цикадки Приморского края (Homoptera, Auchenorrhyncha, Cicadellidae). — Труды Всесоюз. энтомол. общ. **60**: 1–216.
- (EMELJANOV, A. F. 1974). Емельянов, А. Ф. Предложения по классификации номенклатуре ареалов. — Энтомол. обозрен. **53**, 3: 497–522.
- ESAKI, T., ITO, S., 1954: A tentative catalogue of Jassoidea of Japan, and her adjacent territories. Tokyo 1–315.
- HASSAN, A. I., 1939: The biology of some British Delphacidae (Homopt.) and their parasites with special reference to the Strepsiptera. — Trans. R. Ent. Soc. London **89**, 9: 345–384.
- JACOBI, A., 1944 Die Zikadenfauna der Provinz Fukien in Südchina und ihre tiergeographischen Beziehungen. — München. Ent. Gesell. Mitt. **34**: 5–66.
- MELICHAR, L., 1902 Homopteren aus West China, Persien, und dem Süd-Ussuri-Gebiete. — Ann. St. Petersburg Mus. Zool. **7** 76–146 (1–71).
- NAST, J., 1972 Palaearctic Auchenorrhyncha (Homoptera). An annotated check list. Warszawa: 1–550.
- 1981 Homopterological notes XXI–XXV — Ann. Zool. **36**, 14 255–263.
- VILBASTE, J., 1968 Preliminary key for the identification of the nymphs of North European Homoptera Cicadina. I. Delphacidae. — Ann. Ent. Fenn. **34**, 2: 65–74.
- , 1971 Eesti tirdid. Homoptera: Cicadinea I. Tallinn: 1–284.
- VIRAKTAMATH, C. A., 1979 Studies on the Iassinae (Homoptera: Cicadellidae [sic!]) described by Dr S. MATSUMURA. — Orient. Ins. **13**, 1–2: 93–108.
- PRUTHI, S. H., 1930: Studies on Indian Jassidae (Homoptera). Part I. Introduction and description of some new genera and species. — Indian Mus. Mem. **11** 1–68.

Address of the author

Dr. G. A. Anufriev, Kujbysheba ul. 37–27, Gorky M–74, USSR — 603 074

# ZOBODAT - [www.zobodat.at](http://www.zobodat.at)

Zoologisch-Botanische Datenbank/Zoological-Botanical Database

Digitale Literatur/Digital Literature

Zeitschrift/Journal: [Reichenbachia](#)

Jahr/Year: 1987-1988

Band/Volume: [25](#)

Autor(en)/Author(s): Anufriev G. A.

Artikel/Article: [Homopterological Reports IV-V \(Insecta, Homoptera, Auchenorrhyncha\) 59-63](#)