Zeitschrift: Mitteilungen der Schweizerischen Entomologischen Gesellschaft =

Bulletin de la Société Entomologique Suisse = Journal of the Swiss

Entomological Society

Herausgeber: Schweizerische Entomologische Gesellschaft

Band: 29 (1956)

Heft: 4

Artikel: A new aphid genus from Syria (Homopt., Aphid.)

Autor: Hille Ris Lambers, D.

DOI: https://doi.org/10.5169/seals-401286

Nutzungsbedingungen

Die ETH-Bibliothek ist die Anbieterin der digitalisierten Zeitschriften. Sie besitzt keine Urheberrechte an den Zeitschriften und ist nicht verantwortlich für deren Inhalte. Die Rechte liegen in der Regel bei den Herausgebern beziehungsweise den externen Rechteinhabern. Siehe Rechtliche Hinweise.

Conditions d'utilisation

L'ETH Library est le fournisseur des revues numérisées. Elle ne détient aucun droit d'auteur sur les revues et n'est pas responsable de leur contenu. En règle générale, les droits sont détenus par les éditeurs ou les détenteurs de droits externes. <u>Voir Informations légales.</u>

Terms of use

The ETH Library is the provider of the digitised journals. It does not own any copyrights to the journals and is not responsible for their content. The rights usually lie with the publishers or the external rights holders. See Legal notice.

Download PDF: 17.05.2025

ETH-Bibliothek Zürich, E-Periodica, https://www.e-periodica.ch

A new aphid genus from Syria

(Homopt., Aphid.)

by

D. HILLE RIS LAMBERS
Bladluisonderzoek T.N.O., Bennekom, Netherlands

Brevicorynaphis nov. gen.

Description. Adults. Head smooth, without frontal tubercles. Most of the tergum membraneous, smooth, with very large, stiff, not capitate hairs placed on pigmented sclerotic plates which sometimes fuse. No spinals tubercles present. Ist and VIIth abd. segment without marginal tubercles. Antennae of 6 segments; processus terminalis much longer than base of VIth segment; IIIrd and sometimes IVth segment with rhinaria on distal half in apterae, with rhinaria over whole length in alatae. Eyes normal. Pronotum in adults with 2 spinal hairs and 4 marginal hairs, without pleural hairs. First tarsal joints in all instars with only 2 hairs. Wings with normal venation, with short sector radii. Stigmata of abd. segments I and II very near each other. Siphunculi very broadly conical or vulcano-shaped, as in Lachnids, but without hairs. Cauda very short, rounded triangular, much wider than long.

First instar larvae with 5-segmented antennae. Pronotum with the same chaetotaxy as in adults. Pleural hairs present from mesonotum to Vth abd. tergite. Cauda with 2 hairs. Hind tibiae, as in later instars, without spinules between the hairs.

Typus generis: Brevicorynaphis schneideri nov. spec.

Discussion. No aphid genus with similar siphunculi has been described in what BÖRNER (1952) terms the family Aphididae, what PALMER (1952) called the tribe Aphini. Besides, the chaetotaxy of the cauda in adults, in which 3 hairs appear as a rule to be present is highly exceptional in this group of aphids. The last rostral segment is rather like that known from several aphid genera living on Anthemideae, both in structure and in chaetotaxy.

Brevicorynaphis schneideri n. sp.

Apterous viviparous female (fig. 1)

Morphological characters. Body rather shortly oval, about 1.25—1.50 mm long. Head dark sclerotic, frontally and caudally darker; VIIth and VIIIth abd. tergite dark sclerotic; besides at the bases of all the primary hairs (=hairs present from the first instar) blackish sclerotic plates (scleroites) present which increase in size laterad and caudad; pronotum with paler scleroites which partly fuse. Small semiglobular

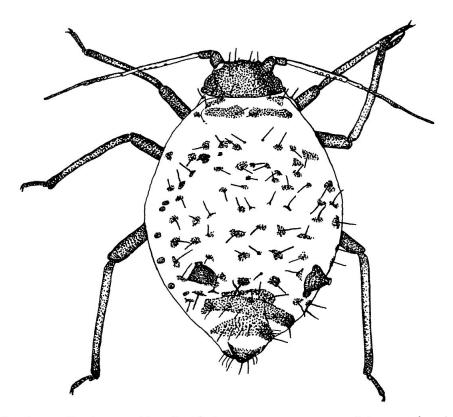


Fig. 1. — Brevicorynaphis schneideri nov. spec., apterous viviparous female.

marginal tubercles on pronotum and on some or all of abd. tergites III-V. Small very dark pleural intersegmental sclerites present. Integumentum smooth. Dorsal hairs thick and very stiff, with rounded faintly incrassate apices, placed on stout bases; their length is about 3 times the diameter of IIIrd ant. segment in the middle; on each of abd. tergites II—IV about 9—12 hairs in a transverse row; VIIIth abd. tergite with 6 long hairs along posterior margin, and often 1—3 hairs slightly more cephalad. Front wavy, with more or less acute hairs, without distinct antenniferous tubercles, slightly protruding. Antennae about 4/7—3/4 length of body, with the basal segments dark like the head, the flagellum pale, from distal half or the apex of IVth segment gradually

darker towards the dark VIth segment; flagellum imbricated; IIIrd segment about as long as the next two plus the base of VIth, on distal half with 3-7 very slightly protruding, round rhinaria not in a line along one side; IVth segment sometimes with a small rhinarium near apex; processus terminalis about $2 \frac{1}{2}$ —3 times base of VIth, $\frac{2}{3}$ of IIIrd segment. Antennal hairs rather like those on body but finer and shorter; basal segments with several curved hairs; IIIrd segment on inner side with several stiff, rather acute hairs which are up to 1 1/4 times the diameter of the segment near its middle, on the outer side with a few much shorter and thinner rather acute hairs. Rostrum just reaching the hind coxae; apical segment styletto-shaped, with 2 pairs of subapical hairs at the same level, the third pair almost in the middle of its length and two more pairs on basal one-thirds part. Mesosternal furca about sessile. Femora blackish with only the very bases pale, tibiae pale with dark apices and with the very bases dusky; hairs on the legs rather like those on the flagellum, but the femora ventrally with some spreading longer and finer hairs; first tarsal joints with 2, 2, 2 rather long hairs. Stigmal plates of 1st and IInd abd. segment almost touching or fused, rather large, not encircling the open, oval stigmal pori. Siphunculi dark, darker towards apex, vulcano-shaped, at base just wider than the length of 2nd joint of hind tarsi, about 3/5 times as high as the length of those tarsal joints and at their apex, just below the wide, thin flange with a diameter of just over 1/4 length of those joints; surface almost smooth, with only a few transverse lines, without hairs. Cauda dark, shortly rounded triangular, about twice as wide as long, with 2—6 rather thick, curved, acute hairs, of which one, the stoutest, is placed subapically; 3 hairs were found 7 times, 2 hairs twice, 4 and 6 hairs one time. Subanal and subgenital plate normal, the latter with several hairs parallel to its posterior margin and with two stouter ones on anterior half.

Colour. Blackish, rather shiny (from specimens in alcohol).

Measurements in mm.

No.	Length body	Ant.	Siph.	Cau.	Rhin. on		Ant. segments			
					III	IV	III	IV	v	VI
1 2 3 4 5 6	1.42 1.47 1.46 1.48 1.36 1.29	0.87 0.89 0.99 0.96 0.88 0.90	0.09 0.11 0.09 0.09 0.11 0.09	0.07 0.07 0.07 0.07 0.09 0.09	5 & 7 5 & 5 5 & 5 5 & 6 6 & 7 6 & 6	0 & 0 0 & 0 0 & 1 0 & 0 1 & 1 1 & ?	0.29 0.29 0.32 0.33 0.30 0.30	0.09 0.11 0.11 0.10 0.09 0.09	0.12 0.11 0.13 0.13 0.11 0.12	(0.07 + 0.19) (0.07 + 0.18) (0.07 + 0.22) (0.07 + 0.20) (0.06 + 0.20) (0.07 + 0.21)

(1-6, from Isatis glauca, Lattakia, Syria, 23.V.1955, leg. F. Schneider.)

Alate viviparous female

Morphological characters. Head and thorax black sclerotic; abdominal tergites VI, VII and VIII with dark sclerotic bands and spinal scleroites of tergites III-V enlarged so that they partly coalesce, either into medially interrupted sclerotic spinal bands or into spinal transverse bands; siphuncular cones caudad fused with the sclerotic band across VIth tergite. Dorsal hairs thinner and more acute, shorter, about 1 1/3 to (on VIIIth tergite) 2 1/2 times diameter of IIIrd ant. segment near its middle; VIIIth abd. tergite with 4-7 hairs. Antennae rather as in apterae, up to 6/7 length of body; IIIrd segment over about 1/3 of its circumference with 12—20 rhinaria over its whole length, but more numerous on distal half; IVth segment on distal part with 1-2, rarely 0 rhinaria; Vth segment without rhinaria; processus terminalis 3—4 times base of VIth segment, to 5/6 of IIIrd segment. Antennal hairs shorter, to almost as long as diameter of IIIrd ant. segment near its middle. Siphunculi hardly more slender than in apterae, and also the cauda similar, but slightly narrower at base. Wings slightly dusky; forewings with rather pale stigma, with very short, slightly curved radius and with twice furcated media, hind wings normal; all the veins heavy, dark and rather conspicuously bordered with pale brown. Other characters as in apterous viviparous female.

Colour. Blackish with shiny abdomen (specimens in alcohol).

Measurements in mm.

No.	Length body	Ant.	Siph.	Cau.	Rhin. on		Ant. segments			
					III	IV	III	IV	v	VI
1 2 3 4 5 6	1.45 1.32 1.29 1.39 1.54 1.37	1.20 1.15 1.09 1.06 1.12 1.03	0.09 0.06 0.06 0.09 0.11 0.07	0.07 0.07 0.06 0.06 0.07 0.06	14 & 17 14 & 18 14 & 17 15 & 16 14 & 16 14 & 14	1 & 0 1 & 1 2 & 2 1 & 1 1 & 1 1 & 2	0.39 0.37 0.39 0.39 0.39 0.35	0.13 0.14 0.12 0.14 0.13 0.11	0.15 0.15 0.13 0.13 0.14 0.13	(0.09 + 0.32) (0.08 + 0.29) (0.09 + 0.26) (0.07 + 0.21) (0.09 + 0.26) (0.07 + 0.26)

(1-6, from Isatis glauca, Lattakia, Syria, 23.V.1955, leg. F. Schneider.)

Host plant and locality: *Isatis glauca*, Lattakia (Kessab-pass, 800 m), Syria, collected by Dr. F. Schneider.

Discussion. Numerous apterae, larvae, nymphs and alatae were received with inflorescences of the host plant. The aphids were sitting along apices of the stems and in the inflorescences. I never have seen the plant in its normal condition, but the inflorescences looked as if they had been deformed by the aphids in almost exactly the way in which Lipaphis rossi BÖRNER changes inflorescences of Arabis hirsuta.

Types: in the author's collection and in the collection of Dr. Schneider, Wädenswil.