A new species of Galeatus Curtis (Heteroptera: Tingidae) from Turkey

by

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Özet

Türkiye'den Galeatus Curtis (Heteroptera: Tingidae) cinsine bağlı yeni bir tür

Bu çalışmada Güney - Doğu Anadolu Bölgesi ayçiçeklerinde (Helianthus annuus L.) zararlı olan Galeatus helianthi n. sp. 'nin orijinal deskripsiyonu yapılmış ve zarar şekline ait resim verilmiştir. Yeni türe ait holotype ve paratype'ler E. Ü. Ziraat Fakültesi Entomoloji ve Zirai Zooloji Kürsüsü'nde saklanmaktadır.

Introduction

During faunistic studies in the southern-east Turkey there have been found a new species of the genus of Galeatus which damages on the leaves of the sunflower. Although some publications on Tingidae (Drake and Davis, 1960; Drake and Ruhoff, 1960, 1962; Kerzhner and Yachewskii, 1964; Stichel, 1960) show that the species of Galeatus feed on Compositae plants but there is no record that feeding and damaging on sunflower. This plant recently introduced in the southern-east Turkey. In Turkey G. helianthi seems to be endemic position at the moment. However it is possible that it might be distributed in Syria and Iraq. This new species though found recently on sunflower, the indication shows that the main host plant seems to be the other Compositae. Because there have been found six specimens in the same area

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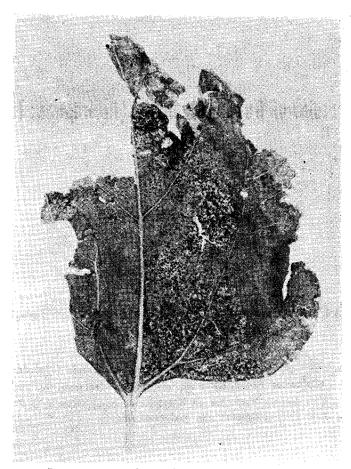


Fig. 1. The damage of G. helianthi on a sunflower leave.

two years ago on the wild Compositae. But later on when sunflower introduced in this area, the new species adapted to this new crop for this region.

At the moment the new species seems to be widespreaded in this region and the adults and nymphs are feeding under the leaves of sunflower by sucking the sap and produce the typical lace-bug feeding symptoms (see Fig. 1).

Galeatus Curtis

Curtis, 1833. Ent. M. Mag. vol. 1, p. 196. Type-species, Tingis spinifrons Fallén 1807 (by monotypy).

Galeatus helianthi n. sp. (Fig. 2 a,b,c)

General shape: almost oval in form with brown colored swollen structures on the pronotum and hemelytra. Body flattened dorso-ventrally. Coloration: head brown with five yellow colored spines of which their tips black; eyes yellow; the first three antennal segments yellow, the fourth brownish; the first rostral segment brown, second yellow, third and fourth black. Anterior part of pronotum blackish, posterior part yellow, punctures on pronotum brown; anterior and posterior vesicular structures of pronotum white, transparent, somewhat brownish; all reticulate parts of pronotum and hemelytra white, transparent, swollen part on the discoidal area brownish, the veins of costal membrane somewhat brownish; prosternum black, coxal area yellow; legs yellowish brown, tarsi black. Venter yellow to brown.

Measurements in millimetres of male and (female): length, 2.88 (3.06); antennae: I,0.15(0.15), II,0.08(0.10), III,0.71(0.69), IV,0.28(0.34); width of hemelytra: 1.59(1.75).

Structure: head bears five long and sharp spines; 3. and 4. antennal segments with long, pale hairs; rostrum reaching the middle coxae. Pronotum deeply punctured; paranota with 5 cells (Fig. 2c) anterior vesicular structure of pronotum oblong with thin hairs downwardly;

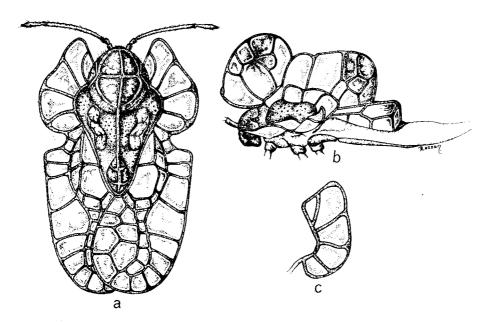


Fig. 2. General view of **G. helianthi** (\circlearrowleft), a) dorsal view, b) lateral view, c) paranota.

posterior vesicular structure of pronotum depressed laterally; pronotum bears three laminiform carinae with thin, pale hairs; lateral ones with three cells, median one with two cells; median carina connected the anterior and posterior vesicular structures of pronotum; the large cells on the costal area with one row; the swollen process on the discoidal area small.

Holotype &, TURKEY: Mardin (Kızıltepe), 13. 8. 1977 (F. Önder) on Helianthus annuus L., deposited in the University of Ege, Faculty of Agriculture, Department of Entomology and Agricultural Zoology, Izmir, Turkey.

Paratypes, Mardin (Kızıltepe), 13. 8. 1977, 10 33, 13 \$\,\text{Q}\$, 18 fifth instar nymphs; Urfa (Viranşehir), 13. 8. 1977, 11 33, 13 \$\,\text{Q}\$, 4 fifth instar nymphs; Urfa, 13.8.1977, 4 \$\,\text{Q}\$; Urfa (Akziyaret), 14.8.1977, 2 \$\,\text{Q}\$. All these specimens were collected by **F. Önder** on **H. annuus** and Mardin (Nusaybin), 17-18.6.1975, 1 \$\,\text{S}\$, 5 \$\,\text{Q}\$ (N. Lodos), on the wild Compositae. All these paratypes deposited in the same institution.

G. helianthi is very close to G. scrophicus Saunders from which it can be easily distinguish by the paranota having 5 cells while G. scrophicus with only 4.

Acknowledegements

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Summary

A new species, Galeatus helianthi n. sp. (Heteroptera: Tingidae) which damages on the leaves of the sunflower in the southern-east Turkey is described and figured. Its damage is shown with a photo. The holotype and paratypes are deposited in the University of Ege, Faculty of Agriculture, Department of Entomology and Agricultural Zoology, Izmir, Turkey.

References

- Drake, C. J. and F. A. Ruhoff, (1962). Taxonomic changes and descriptions of new Tingidae (Hemiptera). Bull. Sth. Calif. Acad. Sci., 61 (3): 133-142.
- Kerzhner, I.M. and T.L. Yachewskii, (1964). "19. Order. Hemiptera (Heteroptera), 851-1118". Keys to the Insects of the European USSR. Vol. 1. Apterygota, Paleoptera, Hemimetabola. Editor: G. Ya. Bei-Bienko. Translated from Russian. Israel Program for Scientific Translations, Jerusalem 1967, 1214 s.
- Stichel, W., (I960). Illustrierte Bestimmungstabellen der Wanzen. II. Europa. **3** (9-10):257-320, **3** (13-14):385-428.