

## NOTA / NOTE

# *Leptispa filiformis* (Germar, 1842) (Coleoptera: Chrysomelidae) in Portugal

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**Abstract:** *Leptispa filiformis* (Germar, 1842) (Coleoptera: Chrysomelidae), previously reported only on three occasions from Portugal, the most recent one dating back to 1961, has been observed for the fourth time in the country in 2016, with the first Iberian photographic record of a live specimen in its habitat. All the Portuguese records are from the Lisbon district, placing the species among the scarcest and most narrowly distributed leaf beetles in Portugal. A synthesis of the known global distribution of the species is presented, as well as a map of its Iberian distribution.

**Key words:** Coleoptera, Chrysomelidae, *Leptispa filiformis*, new record, Portugal.

**Resumen:** *Leptispa filiformis* (Germar, 1842) (Coleoptera: Chrysomelidae) en Portugal. *Leptispa filiformis* (Germar, 1842) (Coleoptera: Chrysomelidae), previamente sólo citada en tres ocasiones de Portugal, remontándose la más reciente a 1961, ha sido observada por cuarta vez en 2016, con el primer registro fotográfico ibérico de la especie en su hábitat. Todos los registros portugueses son del distrito de Lisboa, lo que sitúa a esta especie entre los crisomélidos más escasos y de distribución más restringida en Portugal. Se presenta una síntesis de la distribución global de la especie y un mapa de su distribución ibérica.

**Palabras clave:** Coleoptera, Chrysomelidae, *Leptispa filiformis*, nuevo registro, Portugal.

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*Leptispa filiformis* (Germar, 1842) (Coleoptera: Chrysomelidae: Cassidinae), described from Sicily, is the sole representative of the leaf beetle tribe Leptispini Fairmaire, 1864 in the Western Palearctic (STAINES, 2015). The known distribution of the species includes southern Europe [France (Corsica), Greece (Crete), Italy (mainland, Sardinia, and Sicily), Portugal (mainland), Spain (mainland), and Turkey], northern Africa (Algeria, Morocco, and Tunisia) and the Near East (Palestine) (WEISE, 1893, 1911; MAULIK, 1939; UHMANN, 1951, 1958; CARVALHO, 1950; BIONDI *et al.*, 1995; BORDONI, 1998; BOROWIEC & SEKERKA, 2010; STAINES, 2015). It must be noted that SAINTE-CLAIRE DEVILLE (1914) considered that the inclusion of Corsica in the species' distribution by WEISE (1893) required confirmation. Furthermore, although UHMANN (1958) also listed the species from Corsica and JOLIVET (1998) mentioned - without stating the source - that it had recently been recorded from that island, we were unable to find any detailed Corsican records.

Similarly to other species of the tribe Leptispini (cf. PRATHAPAN *et al.*, 2009), *L. filiformis* is a herbivorous leaf beetle that feeds on plants of the families Poaceae [*Dactylis glomerata* L. and *Phragmites australis* (Cav.) Trin ex. Steud.] and Cyperaceae (*Carex pendula* Huds. and *Scirpus* sp.) (VELA & FERRER, 1994; BORDONI, 1998; JOLIVET, 1998). Its body size varies between 5 and 6 mm, with the males being slightly smaller (VELA & FERRER, 1994).

In the Iberian Peninsula, *L. filiformis* is recorded from Spain and Portugal, but the knowledge about its distribution is very limited (Map 1). In Spain, it is only known from the provinces of Granada (MAULIK, 1939), Cádiz (VELA & FERRER, 1994), and Málaga (DOGUET *et al.*, 1996). In Portugal, all the previous records are from the Lisbon district: near Paiã [Odivelas municipality, not Loures as stated by GROSSO-SILVA (2019)] in August 1940 and June 1946 (CARVALHO, 1950), and Algueirão (Sintra municipality) in May 1961 (GROSSO-SILVA, 2019).

The present photographic record (Fig. 1) is also from the Lisbon district and the Sintra municipality, from Varge Mondar (38.756361, -9.341889; MGRS 29SMC7089; 120 m a.s.l.) and was obtained by the first author in May 2016. As far as we know, this is the first photographic record of a live specimen in its natural habitat in the Iberian Peninsula. The habitat can be described as suburban bushy scrub dominated by *Quercus coccifera* L. with an abundance of different Poaceae species in the herbaceous stratum. The picture shows *L. filiformis* on a stem of an unidentified Poaceae species and represents the first record in Portugal in 55 years.

The four observations done so far for this species in Portugal seem to demonstrate not only its rarity, but also that its distribution may be limited to a very narrow area on the outskirts of the city of Lisbon, as shown in Map 1.

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## References

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- BIONDI, M., DACCORDI, M., REGALIN, R. & ZAMPETTI, M. 1995. *Coleoptera Polyphaga XV (Chrysomelidae, Bruchidae)*. In: Minelli, A., Ruffo, S. & La Posta, S. (eds.). *Checklist delle specie de la Fauna Italiana*, 60. Calderini, Bologna. 34 pp.
- BORDONI, A. 1998. *Notes on the biology and systematics of Leptispa filiformis (Germar)*, pp. 319-327. In: Biondi, M., Daccordi, M. & Furth, D.G. (eds). *Proceedings of the Fourth International Symposium on the Chrysomelidae*. Museo Regionale di Scienze Naturali, Torino. 327 pp.
- BOROWIEC, L. & SEKERKA, L. 2010. *Subfamily Cassidinae Gyllenhal, 1813*, pp. 368-390. In: Löbl, I. & Smetana, A. (eds.). *Catalogue of Palaearctic Coleoptera. Volume 6. Chrysomeloidea*. Apollo Books, Stenstrup. 924 pp.
- CARVALHO, E.L. 1950. *Notas coleopterológicas (III nota)*. *Actas do XX Congresso Luso-Espanhol para o Progresso das Ciências*, 5: 471-475.
- DOGUET, S., BASTAZO, G., BERGEAL, M. & VELA, J.M. 1996. *Contribution à l'étude des Chrysomelidae d'Andalousie (Coleoptera)*. *Nouvelle Revue d'Entomologie (Nouvelle Série)*, 13(4): 315-323.
- GROSSO-SILVA, J.M. 2019. *New and interesting beetle (Coleoptera) records from Portugal (7th note)*. *Arquivos Entomológicos*, 21: 211-216.
- JOLIVET, P. 1998. *Les nouveaux envahisseurs ou les Chrysomélides voyageurs (Col.)*. *L'Entomologiste*, 54(1): 33-44.
- MAULIK, S. 1939. *The geographic distribution of European Hispine beetles (Coleoptera, Chrysomelidae)*. *Proceedings of the Zoological Society of London, ser. B*, 109: 131-152.

PRATHAPAN, K.D., CHABOO, C.S. & KARTHIKEYAN, K. 2009. Natural History and Leaf Shelter Construction of the Asian Rice Leptispa beetle *Leptispa pygmaea* Baly (Coleoptera: Chrysomelidae: Cassidinae: Leptistini). *Zoological Studies*, **48**(5): 625-631.

SAINTE-CLAIRE DEVILLE, J. 1914. Catalogue critique des Coléoptères de la Corse. Imprimerie Adeline, G. Poisson et Cie, Caen. 573 pp.

STAINES, C.L. 2015. Tribe *Leptispini* Fairmaire 1868. *Catalog of the hispines of the world* (Coleoptera: Chrysomelidae: Cassidinae). Available from <https://naturalhistory.si.edu/sites/default/files/media/file/leptispini2015.pdf>

UHMANN, E. 1951. Austral-asiatische Hispinae aus dem Zoologischen Museum der Universität Berlin. 5. Teil. Leptispini, Eurispini, Pharangispini, Chaeridionini, Coelaenomenoderini, Promecothecini. *Entomologische Blätter*, **47**: 22-39.

UHMANN, E. 1958. *Chrysomelidae: Hispinae. Hispinae Africanae, Euroasiaticae, Australicae*. In: Hincks, W.D. (ed.). *Coleopterorum Catalogus Supplementa, Pars 35, Fasc. 2, Editio Secunda*. W. Junk, Berlin. 243 pp. (= pp. 155-398).

VELA, J.M. & FERRER, J. de. 1994. El hispino *Leptispa filiformis* (Germar, 1842) (Coleoptera, Chrysomelidae) en la fauna ibérica. *Zoologica Baetica*, **5**: 73-77.

WEISE, J. 1893. *Vierte Abtheilung: Cryptostoma. Erste Gruppe: Hispini*, pp. 1059-1065. In: *Naturgeschichte der Insecten Deutschlands begonnen von Dr. W.F. Erichson, fortgesetzt von Prof. Dr. H. Schaum, Dr. G. Kraatz, H. von Kiesenwetter, J. Weise und E. Reitter. Erste Abtheilung. Coleoptera. Sechster Band*. Nicolai, Berlin. XIV + 1161 pp. + 1 pl. [Lieferung, **6**: XIV + pp. 961-1161].

WEISE, J. 1911. *Chrysomelidae: Hispinae*. In: Junk, W. & Schenkling, S. (eds.). *Coleopterorum Catalogus, Pars 35*. W. Junk, Berlin. 94 pp.



Fig. 1.- Specimen of *Leptispa filiformis* (Germar, 1842) photographed in Varge Mondar (Sintra, Portugal) in May 2016. Photo by Fernando Pires.



**Map 1.** - Iberian distribution of *Leptispa filiformis* (Germar, 1842), with the previously known Portuguese district and Spanish provinces in grey, the previously known Portuguese MGRS 100 km<sup>2</sup> squares in blue and the new Portuguese MGRS 100 km<sup>2</sup> square in orange.