

CDF Checklist of Galapagos Springtails

Stewart B. Peck, J. Jacquemart

Last updated: 16 Jan 2013

Abstract

This Checklist of Galapagos Springtails includes a total of all 46 taxa reported from the Galapagos Islands.

For each name, detailed information is provided: its Galapagos distribution in islands groups or bioregions generated from the specimen records, comments about the taxonomy (especially synonyms), the origin (native and introduced), taxon status (accepted vs. rejected records) and relevant literature references.

Introduction

This publication lists all species of Galapagos Springtails currently known.

Collembola, or springtails, are small hexapods that live in concealment and feed as scavengers or decomposers in leaf litter, decaying wood, soil, or on fungi.

Surprisingly, many are now known from the Galapagos, but these species mostly occur in low densities, possibly because of the harsh arid habitats of the island lowlands.

Methods

This checklist of all known Galapagos Springtails is automatically generated using the online database of the Charles Darwin Foundation Galapagos Species Checklist.

All CDF Galapagos Species Checklists represent the synthesis of many different records: literature citations, data from previously unpublished reports (grey literature), specimen records of natural history collections located in Galapagos and all over the world. To the best of their knowledge authors of the individual checklists revised all available data. When new information becomes available, the taxonomy of a group changes or new species are discovered, the CDF online database and thus this publication becomes updated.

For many poorly known species groups the higher taxonomic classification still regularly changes according to how our knowledge about species being related changes. In many well known groups the phylogeny is somewhat stable, but to avoid confusion, in particular for groups where taxonomic changes are frequent, all checklists presented here are sorted alphabetical according to genus name and specific epithet. Please refer to the website for the currently accepted taxonomic hierarchy of each group.

Please be aware that the distribution presented here is automatically generated from specimen records and does not always accurately reflect the known distribution for all species.

For marine species, the distribution generally refers to the five main bioregions of the archipelago (Far Northern, Northern, Western, South Eastern and the Elisabeth Bay Bioregion). For the terrestrial species more than 120 islands, islets and small rocks have been aggregated into Islands Groups, thus, for example, the island group "Santa Cruz" includes smaller islands like Santa Fé, Plaza Norte,

Plaza Sur, Baltra, Daphne Mayor, Daphne Minor, and others.

IUCN red-list assessments presented here may deviate from the global IUCN list for the following reasons:

- for well known species groups like vascular plants or vertebrates updates proposed to the IUCN are shown instead of the outdated, but currently accepted status;
- for poorly known species groups (e.g., lichenized fungi) a general assessment is currently not possible and the list presented here is a regional red-list list for Galapagos archipelago.

Numbers of the species included in this list are auto-generated. Adding up the number of species in each category will not always equal the total number indicated. Some species have insufficient data to be categorized while others (e.g., category eradicated) will not be included in the total.

Results

Names of taxa included in this checklist: 46 (42 accepted, 1 unidentified taxon, 3 doubtful).

Origin of the taxa included: 1 accidental, 3 questionable accidental, 20 questionable native, 9 endemic, 1 indigenous, 1 questionable endemic.

1. *Americaneura interrogator* Cassagnau & Palacios-Vargas

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Floreana, San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

2. *Anurida marchena* Najt, Thibaud & Jacquemart, 1991

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Endemic.

Galapagos Distribution: Marchena, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

3. *Anurida maritima* (Guérin-Méneville, 1836)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Floreana, Marchena.

References: Linsley, E.G. et al. (1966), Peck, S.B. et al. (2001), Stach, J. et al. (1932).

4. *Arlesia albipes* (Folsom, 1927)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Accidental.

Galapagos Distribution: Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

5. *Axelsonia littoralis* (Moniez, 1890)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Santa Cruz.

References: Peck, S.B. et al. (2001).

6. *Brachystomella contorta* Denis, 1931
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Native.
Galapagos Distribution: Santa Cruz.
References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).
7. *Brachystomella grottaerti* Najt, Thibaud & Jacquemart, 1991
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Native, Endemic.
Galapagos Distribution: Marchena, San Cristóbal, Santa Cruz.
References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).
8. *Ceratophysella denticulata* (Bagnall, 1941)
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Accidental.
Galapagos Distribution: San Cristóbal, Santa Cruz.
References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).
9. *Ceratophysella guthriei* Folsom, 1916
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.
Galapagos Distribution: Santa Cruz.
References: Folsom, J.W. et al. (1924).
10. *Cryptopygus thermophilus* (Axelson, 1900)
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Native.
Galapagos Distribution: Española, Fernandina, Floreana, Isabela, Marchena, Pinzón, San Cristóbal, Santa Cruz, Santiago.
References: Peck, S.B. et al. (2001).
11. *Cyphoderus dorsti* Jacquemart, 1974
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.
Galapagos Distribution: Isabela, San Cristóbal, Santa Cruz, Santiago.
12. *Cyphoderus galapagoensis* Jacquemart, 1976
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Native, Endemic.
Galapagos Distribution: Isabela, Santa Cruz.
References: Peck, S.B. et al. (2001).
13. *Cyphoderus innominatus* Mills, 1938
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.

Galapagos Distribution: Santa Cruz.

14. *Entomobrya corticola* Jacquemart, 1975

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: No Data.

Galapagos Distribution: Isabela, San Cristóbal, Santa Cruz.

15. *Folsomides centralis* (Denis, 1931)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Floreana, Isabela, San Cristóbal, Santa Cruz, Santiago.

References: Peck, S.B. et al. (2001).

16. *Folsomides delamarei* Thibaud, Najt & Jacquemart, 1994

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Endemic.

Galapagos Distribution: Pinzón, San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

17. *Folsomides parvulus* (Starch, 1922)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Pinzón, San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

18. *Folsomina onychiurina* (Denis, 1931)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Isabela, Pinta, San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

19. *Friesea magnicornis* Dennis, 1931

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

20. *Isotoma galapagoensis* Jacquemart, 1975

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: No Data.

Galapagos Distribution: Santa Cruz.

21. *Isotomiella symetrimucronata* Najt & Thibaud, 1987

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Floreana, San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

22. *Isotomina thermophila galapagoensis* Jacquemart, 1975

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: No Data.

Galapagos Distribution: San Cristóbal, Santa Cruz, Santiago.

23. *Isotomodes denisi* Folsom, 1932

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Floreana, Santa Cruz.

References: Peck, S.B. et al. (2001).

24. *Isotomodes trisetosus* Denis, 1923

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Accidental.

Galapagos Distribution: Floreana, Marchena, Pinzón, Santa Cruz, Santiago.

References: Peck, S.B. et al. (2001).

25. *Isotomurus opala* Christiansen & Bellinger, 1992

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

26. *Lepidocyrtus cf. lanuginosus* Gmelin, 1790

Taxon status: The identification of this taxon or its occurrence in Galapagos is doubtful.

Origin: No Data.

Galapagos Distribution: Floreana.

27. *Lepidocyrtus leleupi* Jacquemart, 1976

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Endemic.

Galapagos Distribution: Floreana, Isabela, San Cristóbal, Santa Cruz.

References: Peck, S.B. et al. (2001).

28. *Mesaphorura yosii* (Rusek, 1867)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: San Cristóbal, Santa Cruz, Santiago.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

29. *Onychiurus hortensis* Gisin, 1949

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: No Data.

Galapagos Distribution: San Cristóbal, Santa Cruz.

30. *Protaphorura armatus* (Tullberg, 1869)

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Questionable Endemic.

Galapagos Distribution: Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

31. *Protaphorura encarpata* (Denis, 1931)

Taxon status: Accepted name; taxon occurs in Galapagos.

Syn.: *Protaphorura pensensillata* Najt, Thibaud & Jacquemart, 1991

Origin: Native, Indigenous.

Galapagos Distribution: San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

32. *Psammisotoma galapagoensis* Thibaud, Najt & Jacquemart, 1994

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Endemic.

Galapagos Distribution: Santa Cruz.

References: Peck, S.B. et al. (2001).

33. *Pseudachorutes cf. castrii* (Rapoport & Rubio, 1963)

Taxon status: The identification of this taxon or its occurrence in Galapagos is doubtful.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

34. *Pseudachorutes cf. murphy* Massoud, 1965

Taxon status: The identification of this taxon or its occurrence in Galapagos is doubtful.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

35. *Pseudachorutes difficilis* Denis, 1931

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Pinta, San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

36. *Pseudachorutes galapagoensis* Najt, Thibaud & Jacquemart, 1991

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Native, Endemic.

Galapagos Distribution: San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

37. *Pseudachorutes macrochaetus* Najt & Thibaud, 1991
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Native, Endemic.
Galapagos Distribution: San Cristóbal, Santa Cruz.
References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).
38. *Pseudosinella coerulea* Jacquemart, 1975
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.
Galapagos Distribution: Floreana, Marchena, Pinta, Santa Cruz.
39. *Pseudosinella intermixta* (Folsom, 1924)
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Native.
Galapagos Distribution: Santa Cruz.
References: Peck, S.B. et al. (2001).
40. *Rhodanella minos* (Denis, 1928)
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Accidental.
Galapagos Distribution: Santa Cruz.
References: Peck, S.B. et al. (2001).
41. *Seira caheni* Jacquemart, 1976
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Introduced, Questionable Native.
Galapagos Distribution: Marchena, San Cristóbal, Santa Cruz.
References: Peck, S.B. et al. (2001).
42. *Seira coppoisi* Jacquemart, 1975
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.
Galapagos Distribution: Santiago.
43. *Seira devriesi* Jacquemart, 1974
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: No Data.
Galapagos Distribution: Santa Cruz.
44. *Seira galapagoensis* Jacquemart, 1976
Taxon status: Accepted name; taxon occurs in Galapagos.
Origin: Native, Endemic.
Galapagos Distribution: Floreana, Isabela, Pinzón, San Cristóbal, Santa Cruz, Santiago.
References: Peck, S.B. et al. (2001).

45. *Xenylla yucatan* Mills, 1938

Taxon status: Accepted name; taxon occurs in Galapagos.

Origin: Introduced, Questionable Native.

Galapagos Distribution: Isabela, Marchena, Pinta, Pinzón, San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

46. *Xenylloides* sp.

Taxon status: Taxon not identified to species, subspecies, form or variety.

Origin: Introduced, Questionable Native.

Galapagos Distribution: San Cristóbal, Santa Cruz.

References: Najt, J. et al. (1991), Peck, S.B. et al. (2001).

Acknowledgements

We are grateful for the financial report received for this project. Please refer to the website (www.darwinfoundation.org/datazone/checklist/) for a detailed list of all our donors.

This checklist would not be possible without adjunct and collaborating scientists, and volunteers of the Charles Darwin Foundation. The following scientists and volunteers have contributed to the CDF Checklist of Galapagos Springtails: Sandra Abedrabbo, Fabián Bersosa, Ruth Boada, Charlotte Causton, Daniel Cherix, Germania Estévez, Lilian Guzmán, María T. Lasso, Maria Piedad Lincango, E. G. Linsley, Yale Lubin, Alejandro Miele, E. Mockford, Renato Oquendo, Lázaro Roque-Álbelo, Leslie Usinger.

References

1. Folsom, J.W. (1924) *Apterygota of the Williams Galápagos Expedition*. Zoologica 5(5): 67-76. + pls. 3-5.
2. Linsley, E.G., Usinger, R.L. (1966) *Insects of the Galápagos Islands*. Proceedings of the California Academy of Sciences Fourth Series 33(7): 113-196.
3. Najt, J., Thibaud, J.-M., & Jacquemart, S. (1991) *Les Collemboles (Insecta) de l'Archipel des Galápagos. I. Poduromorpha*. Bull. Inst. Roy. Sci. Nat. Belgique, Entomol. 61: 149-166.
4. Peck, S.B. (2001) *Small Orders of Insects of the Galápagos Islands, Ecuador: Evolution, Ecology, and Diversity*. NRC Research Press, Ottawa, Ontario, Canada, 278 pp.
5. Stach, J. (1932) *Die Apterygoten aus den Galapagos-Inseln. The Norwegian Zoological Expedition to the Galapagos Islands 1925, conducted by Alf Wollebaek, vol. 3*. Meddelelser fra det Zoologiske Museum, Oslo 29: 331-346.

Disclaimer

The Charles Darwin Foundation Galapagos Species Checklist is a continuously updated list of all species currently known from the Galapagos Islands and reflects up-to-date knowledge compiled by scientists of the Charles Darwin Foundation (CDF) in collaboration with experts from around the world. CDF shares this data publicly and invites comments, corrections and additions.

Please do not hesitate to contact us; your input is very welcome. However, please understand that additions, changes, and corrections will be posted at periodic intervals after thorough cross-referencing of all new data. As an independent international scientific organization, the Charles Darwin Foundation relies on funding from donors who support our work. Please contact us at datazone@fcdarwin.org.ec if you would like to support the Charles Darwin Foundation Galapagos Species Checklist and help make knowledge of Galapagos biodiversity more widely available.