Voucher Sheet

B. Haggin 2017



Species: Leitoscoloplos panamensis (Monro 1933)

Subfamily: Synonyms: *Haploscoloplos panamensis* Monro 1933

Family: Orbiniidae

Order:

Infraclass: Scolecida Subclass: Sedentaria Class: Polychaeta Phylum: Annelida

- Description: 1) Prostomium conical, longer than wide. Eyes absent. Nuchal organs dorso-lateral. Peristomium with 1 achaetous segment (Image 1).
 - 2) Branchiae from setiger 9. Branchiae as small papillae (often overlooked on first few setigers) becoming slender, triangular in abdomen, laterally ciliated.
 - 3) Thorax with 12-17 setigers.
 - 4) 1 5 subpodial lobes present from setigers 10 25 (Image 2). Stomach papillae absent. Intrasegmental ciliary band (ICB) unknown.
 - 5) Thoracic notopodia digitate triangular w/ tapering tips.
 - 6) Thoracic neuropodia mammiform, with a triangular digitate postsetal process (PsP) and a 2nd PsP in posterior thorax (~ chaetiger 10), with crenulate capillaries only (without thoracic neuropodial acicular spines) (Images 3 & 4).
 - 7) Abdominal notopodial postsetal lobe triangular foliose. Interramal cirri present (anterior abdomen) (Images 5 & 6). Notopodia with crenulate capillaries. Flail setae not seen & furcate setae absent.
 - 8) Abdominal neuropodia bilobed, both lobes triangular, inner lobe longer, more robust. Abdominal neurosetae crenulate capillaries with 2 fine, barely emergent acicula (Images 5 & 6).
 - 9) Abdominal subpodial flange short & flat long & rounded with subpodial lobes and a welldeveloped notch (Image 6).
 - 10) Pygidium unknown.
 - 11) Pigmentation absent.

Material Examined:

STN: LH05-569 (1 specimen) (1 m) Specimen from Panama (Caribbean)

Similar Species:

Leitoscoloplos pugettensis (Pettibone 1957). Both species have an overlapping # of thoracic setigers. L. pugettensis has branchiae from setiger 11 that are strap-like in the abdomen. L. pugettensis lacks subpodial lobes in the posterior thorax and anterior abdomen and an interramal cirri in the abdomen that is present in L. panamensis . L. pugettensis has only a single PsP and possesses abdominal notopodial furcate setae. Both are shelf species (<200 m).

Scoloplos armiger (Müller 1776). These species have many similar characteristics. S. armiger has thoracic neuropodial acicular spines that are lacking in L. panamensis . S. armiger is a shelf/shallow slope (<300 m) species complex . L. panamensis is a shelf species (<200 m).

Leitoscoloplos sp LA1 Haggin 2017 §. Both species have an overlapping # of thoracic setigers. L. sp LA1 has branchiae from setiger 11 that are strap-like in the abdomen. L. sp LA1 lacks subpodial lobes in the posterior thorax and anterior abdomen and an interramal cirri in the abdomen. L. panamensis is a shelf species (<200 m). L. sp LA1 is a shallow slope species (>200

Similar Species continued:

Leitoscoloplos sp LA2 Haggin 2017 §. Both species have an overlapping # of thoracic setigers. L. sp LA2 has branchiae from chaetiger 10 that are strap-like in the abdomen. L. sp LA2 lacks subpodial lobes in the posterior thorax and anterior abdomen and an interramal cirri in the abdomen. L. panamensis is a shelf species (<200 m). L. sp LA2 is a bay/estuary species known only from San Diego Bay.

Leitoscoloplos sp LA3 Haggin 2017 §. Both species have an overlapping # of thoracic setigers. *L.* sp LA3 has branchiae from setiger 10 that are strap-like in the abdomen. *L.* sp LA3 lacks a 2nd PsP and subpodial lobes in the posterior thorax and anterior abdomen and an interramal cirri in the abdomen. *L. panamensis* is a shelf species (<200 m). *L.* sp LA3 is a deep shelf/shallow slope species (>150 m).

Leitoscoloplos sp LA4 Haggin 2017 §. Both species have an overlapping # of thoracic setigers. L. sp LA4 has branchiae from setiger 11 that are short & strap-like in the abdomen. Both species have a 2nd PsP and subpodial lobes in the posterior thorax and anterior abdomen (setigers 14 - 24 vs. 13 - 25), however, L. panamensis has an interramal cirri in the abdomen that L. sp LA4 lacks. L. panamensis is a shelf species (<200 m). L. sp LA4 is known only from the intertidal of Washington state.

Distribution: Alaska, USA to Panama

Depth range: 3 - 215 m

Type locality: Pacific coast of Panama

Images: All images from a specimen collected from station LH05-569.

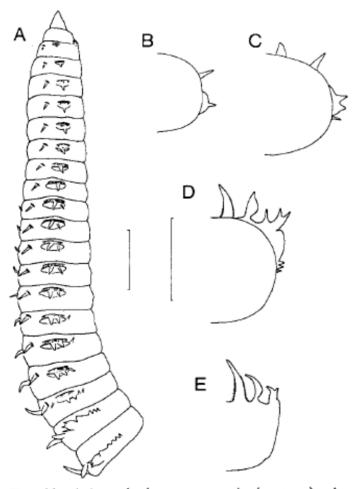


Fig. 20. Leitoscoloplos panamensis (syntype). A. Anterior region, lateral view. B-E. Setiger 6, 15, 23, and 68, posterior view (setae omitted). Scale lines 1 mm.

Figure 1 from Mackie, 1987

Images continued:



Image 1. Dorsal view, anterior showing pointed prostomium.

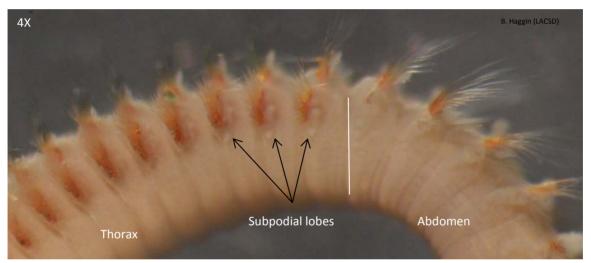


Image 2. Posterior thorax showing subpodial lobes

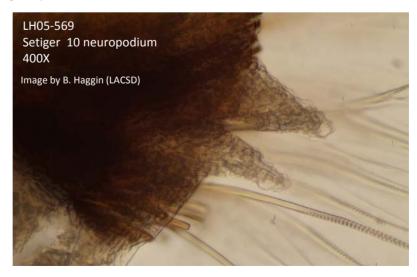


Image 3. Middle thoracic neuropodia showing second postsetal process.

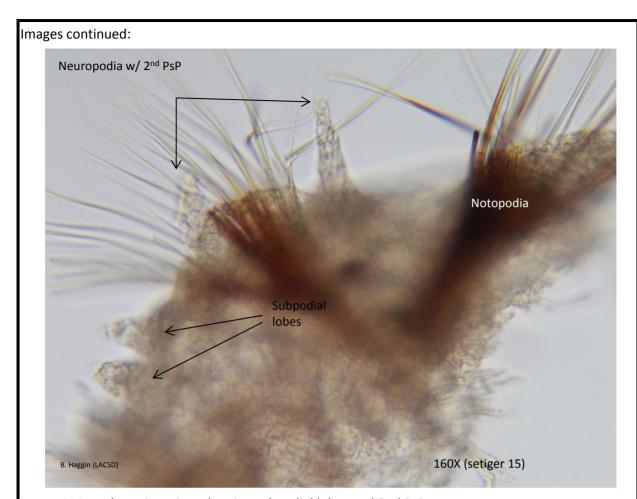


Image 4. Last thoracic setiger showing subpodial lobes and 2nd PsP.

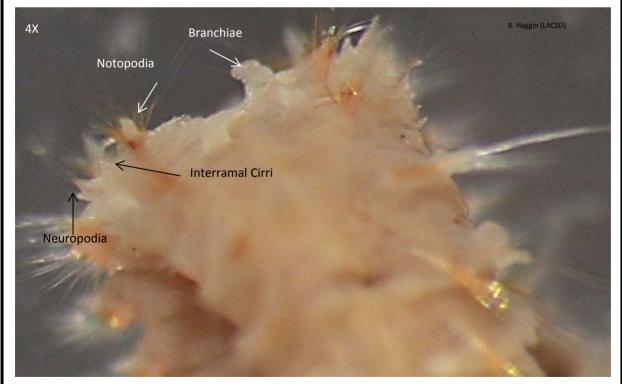


Image 5. Antero-dorsal view of anterior abdominal setigers showing triangular IRC.

Images continued:

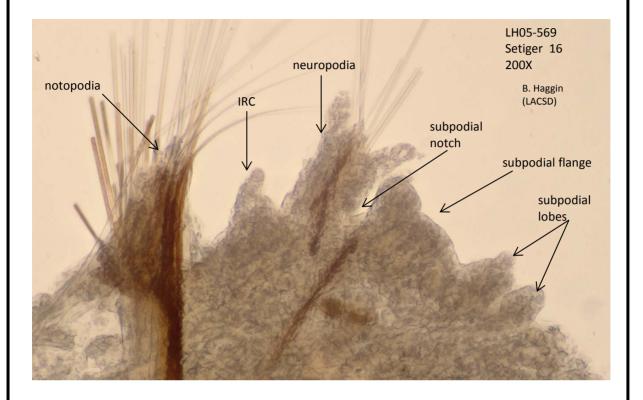


Image 6. 1st abdominal setiger showing IRC, neuropodia and subpodial flange & lobes.

Literature reviewed:

Blake, J. A. 1996: *Family Orbiniidae Hartman, 1942*. Taxonomic Atlas of the Benthic Fauna of the Santa Maria Basin and Western Santa Barbara Channel. Volume 6. The Annelida Part 3 - Polychaeta: Orbiniidae to Cossuridae. 418 pp (9-10).

Dean, H. K. & Blake, J. A. 2015. The Orbiniidae (Annelida: Polychaeta) of Pacific Costa Rica. *Zootaxa* 3956(2): 183-198.

Hartman, O. 1969. Atlas of the Sedentariate Polychaetous Annelids from California. Los Angeles, Ca, Allan Hancock Foundation, University Of Southern California. 812 pp (19-20).

Mackie, A. S. Y. 1987. A review of species currently assigned to the genus *Leitoscoloplos* Day, 1977 (Polychaeta: Orbiniidae), with descriptions of species newly referred to *Scoloplos* Blainville, 1828. *Sarsia* 72: 1-28.

Pettibone, M. H. 1957. North American genera of the family Orbiniidae (Annelida: Polychaeta), with descriptions of new species. *Journal of the Washington Academy of Science* 47(5): 159-167.