PHYLUM ENTOPROCTA

By Mary D. Rogick

Entoprocta and Ectoprocta are zoologically distinct but because they bear superficial resemblance to each other they have been treated together by systematists, as "moss animals", Polyzoa, or Bryozoa (sensu lato).

Entoprocts are minute, less than one centimeter tall. They are usually sessile, pseudocoelomate, and generally of soft texture. Their anus is within the ring of tentacles, which number 8 to 36, depending on the species. Tentacle number and stalk flexibility are important, so should be noted in living specimens wherever possible. The "heads" or calyces of some nod constantly. Some species are solitary, others colonial. Entoprocts may be found attached to rocks, algae, shells, or growing on various organisms as hydroids, sponges, crustacea, ectoprocts and worms.

KEY TO LOCAL ENTOPROCTA (partly after Osburn) (Figure references are to Plate 23)

1.	Individuals solitary, not colonial or stolonate, provided with a contractile stalk and enlarged basal disc (fig. 1); characteristically found on bodies of tube dwelling annelid or sipunculid worms
2.	Stalks of individuals with distinct muscular dilations at bases, near junction with stolons, and sometimes elsewhere along stalk; stalks spineless
3.3.	Stalk thin walled and muscular, its distal end very flexible, actively curling into a loose spiral (fig. 3)
4.	Stalk wall appears as if punctured by irregularly spaced minute, cone shaped pores. Colony delicate, small <u>Barentsia discreta</u> Stalk wall without pores <u>Barentsia major</u>

LIST OF LOCAL ENTOPROCTA

Family Loxosomatidae

- Loxosoma davenporti Nickerson, 1901. Reported (Nickerson) associated with the polychaete "Clymene producta". It is not clear what maldanid is meant, possibly Maldane.
- ${\color{red} \underline{Loxosoma}}$ ${\color{red} \underline{minuta}}$ Osburn, 1912. May possibly be a ${\color{red} \underline{Loxosomella}}$? Reported on ${\color{red} \underline{Phasco-lion}}$ ${\color{red} \underline{strombi}}$ (Sipunculoidea).

Family Pedicellinidae

- Barentsia discreta (Busk, 1886). Inconspicuous but of world wide distribution. Found on algae, stones, hydroids, ectoprocts. See Rogick (1956).
- <u>Barentsia</u> <u>laxa</u> Kirkpatrick, 1890. Forms furry patches to half an inch high on <u>Mercenaria</u> shells which had been bored by the sponge <u>Cliona</u>. See Rogick (1948).

- <u>Barentsia</u> <u>major</u> Hincks, 1888. Found on pilings, stones, shells, and around leg bases of spider crabs and <u>Limulus</u>.
- <u>Pedicellina cernua</u> (Pallas, 1771). On pilings and elsewhere, among bryozoans and other creeping growths.

REFERENCES ON ENTOPROCTA

- Atkins, D., 1932. The Loxosomatidae of the Plymouth area, including \underline{L} . \underline{obesum} , sp. nov. Quart. J. Micr. Sci., $\underline{75}$: 321-391.
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- Rogick, M., 1948. Studies on marine Bryozoa. II. <u>Barentsia laxa Kirkpatrick 1890</u>. Biol. Bull., <u>94</u>: 128-142.
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180 Ectoprocts

Soule, J. D., 1957. Two species of Bryozoa Ctenostomata from the Salton Sea. Bull.
So. Calif. Acad. Sci., 56(1): 21-30. Adult Nolella blakei and Victorella pavida.
Zoological Record: Bryozoa (Polyzoa) Section. An annual publication dating from
1864 to the present; indispensable for any worker in the group.

Plate 23

ENTOPROCTA AND ECTOPROCTA

Figures 1, 7, and 11 after Osburn 1912; figs. 2, 4-6, 8-10 after Rogick and Croasdale 1949; figs. 3 and 12-13 after Rogick 1949; all redrawn by Mrs. Emily Reid

Fig. 1. Loxosoma davenporti.

- 2. Pedicellina cernua.
- 3. Barentsia laxa.
- 4. Crisia eburnea: note inflated ovicell and joints or nodes.
- 5. Disporella hispida, a complete small colony.
- 6. <u>Flustrellidra hispida</u>, portion of colony; note spines and slit-like closure of orifices.
- Alcyonidium verrilli, portion of colony; note puckered closure of orifices.
- 8. Bowerbankia gracilis, zoids with retracted tentacles.
- 9. <u>Aeverrillia</u> <u>armata</u>, portion of colony; note paired zooecia on short peduncles, and the 4 terminal spines on each zooecium.
- 10. Single polypide of <u>Bowerbankia imbricata</u> with tentacles extended; note setigerous collar directly below the tentacles, here constricting the tentacle sheath.
- 11. Amathia vidovici; note close-set spiral bands of zoids.
- 12. <u>Nolella blakei</u>, retracted individual, very young, with squared orifice.
- 13. Nolella blakei, very young zoid, with tentacles extended. The four basal extensions are "false" stolons. The bottom right represents the attenuated proximal end of the shown zoid. The other three are cut off by septa from the base of the shown zoid and likewise represent the proximal extensions of their own zoids.

Plate 23

