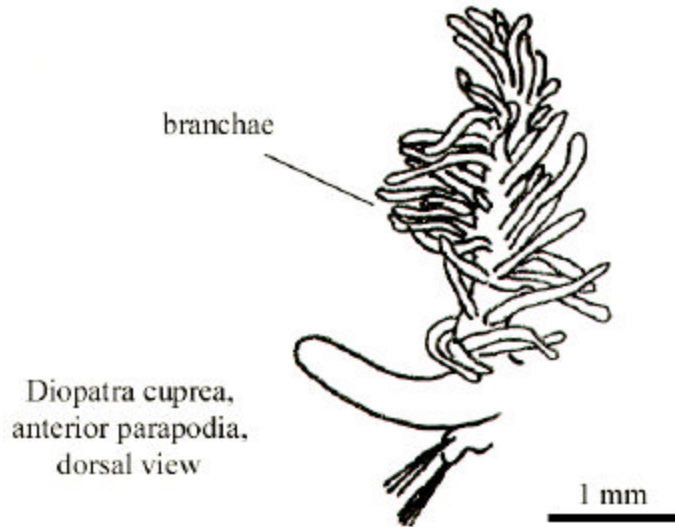
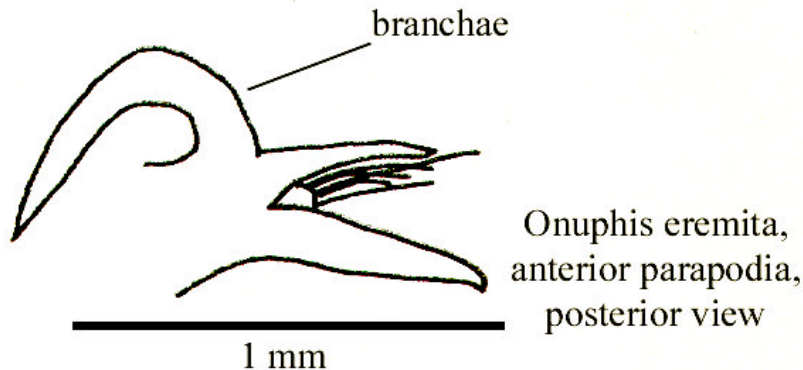


Onuphidae

1a. Branchiae begin on setigers 4 or 5, above dorsal cirri, as bushy, feathery tufts (see below), then gradually become less bushy and prominent posteriorly, until they disappear altogether **Diopatra cuprea**



b. Branchiae begin on setiger 1, above dorsal cirri, as a single long filament (see below), becoming more branched posteriorly, with up to 7 filaments, then becoming less prominent, but continuing to nearly the posterior end..... **Onuphis eremita**



Opheliidae

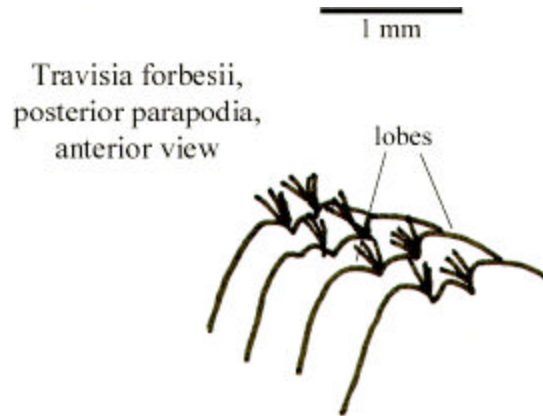
1a. Body without pronounced longitudinal, ventral groove; *helpful hint*: branchiae begin on setiger 2.. **2**

b. Body with pronounced longitudinal ventral groove along the entire length of the body, or along posterior half only; *helpful hint*: branchiae may or may not begin on setiger 2.... **4**

2a. 20 setigers present; *helpful hint*: lateral swellings above and below posterior parapodia present.....**Travisia parva**

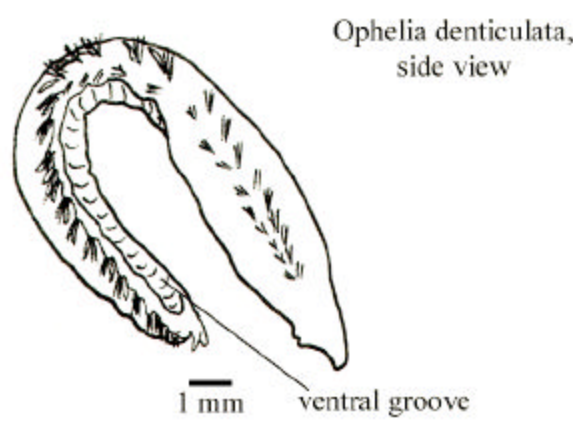
b. 22 or more setigers present; *helpful hint*: lateral swellings above and below posterior parapodia may or may not be present..**3**

3a. Lateral swellings or fleshy lobes above and below posterior parapodia present (see below)**Travisia forbesii**



b. Lateral swellings or fleshy lobes above and below posterior parapodia absent**Travisia carnea**

4a. Pronounced ventral groove present only in posterior half of body (see below); branchiae begin on setigers 10, 11 or 12; *helpful hint*: groove starts around setiger 10.....**5**

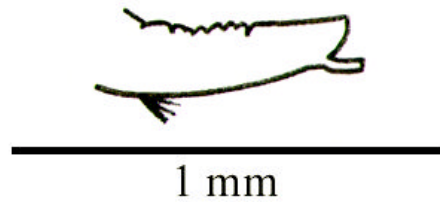


b. Pronounced ventral groove present along the entire length of the body; branchiae begin on setiger 2..**6**

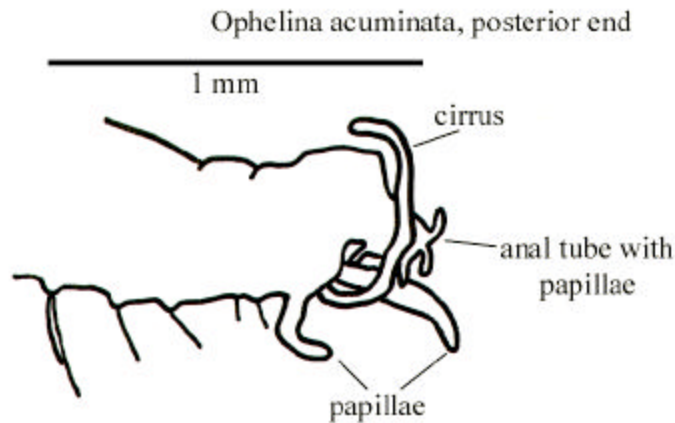
5a. Branchiae begin on setiger 10; 18 pairs of branchiae present**Ophelia denticulata**

- b. Branchiae begin on setiger 11 or 12; 11 to 15 pairs of branchiae present ..
.....**Ophelia bicornis**
- 6a. Small, lateral eyespots present between parapodia, starting from setiger 7.....**7**
- b. Small, lateral eyespots absent between parapodia.....**8**
- 7a. Body with 29 or fewer setigers; anterior parapodia with short presetal lobes; *helpful hint*: prostomium conical, but usually not particularly long or acute.
.....**Armandia maculata**
- b. Body with 35 or more setigers; anterior parapodia with long, pointed presetal lobes; *helpful hint*: prostomium conical, long and acute.....**Armandia agilis**
- 8a. 27 to 28 setigers present; anal tube at posteriormost end is simple and cylindrical (see below)**Ophelia cylindricaudata**

Ophelia cylindricaudata,
posterior end



- b. 35 to 43 setigers present; anal tube at posteriormost end is hood-like, with a papillose margin, and with a long, articulated midventral cirrus, flanked by two elongated papillae (see below)**Ophelia acuminata**

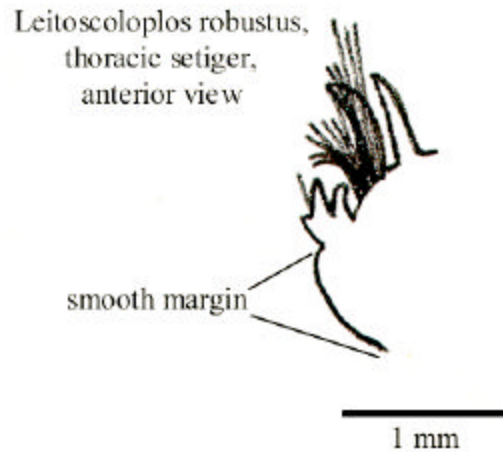


Orbiniidae

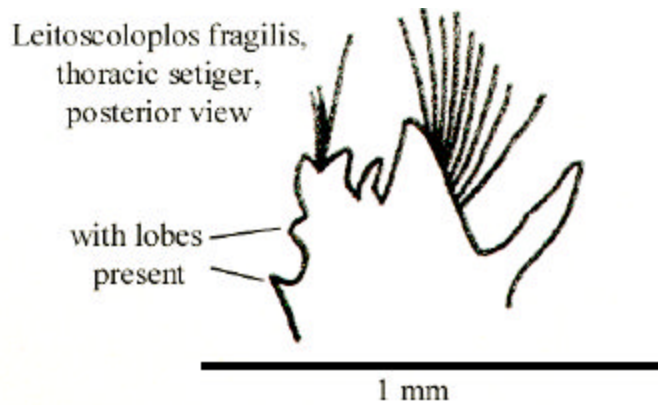
1a. Thoracic neurosetae are crenulated capillary setae only.2

b. Thoracic neurosetae are crenulated capillary setae, and one or more rows of other setal types, in the form of blunt hooks or spines.3

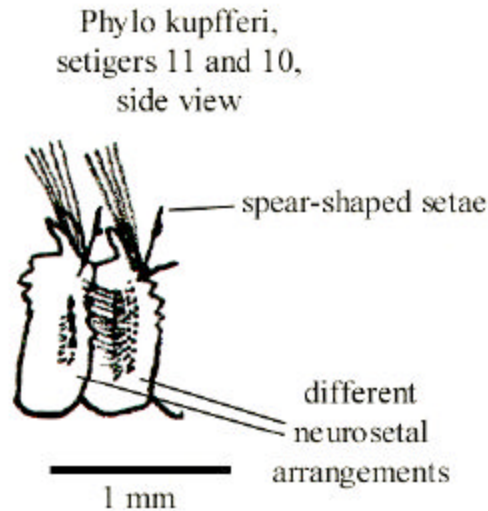
2a. Subpodal neuropodial flanges posterior to thoracic/abdominal transition region are smooth and entire (see below)..**Leitoscoloplos robustus**



b. Subpodal neuropodial flanges posterior to thoracic/abdominal transition region are not smooth and entire, and form two small lobes (see below).....**Leitoscoloplos fragilis**



3a. Posterior thoracic neuropodia with large, spear shaped acicular setae present; abrupt transition between two types of thoracic neurosetal arrangements present (see below); *helpful hints*: spear shaped acicular setae may be broken off; transition between thoracic neuropodial setal types occurs at about setiger 10**4**

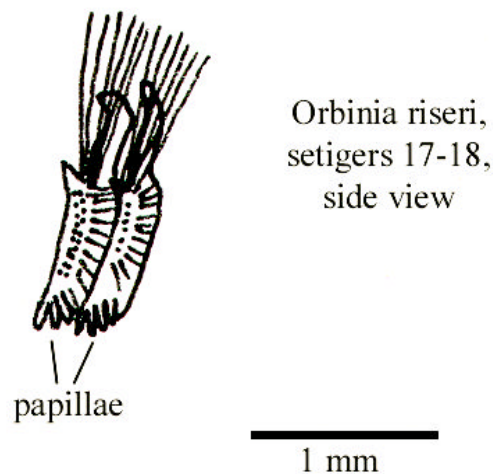


b. Posterior thoracic neuropodia without large, spear shaped acicula; abrupt transition between thoracic neuropodial setal type arrangements absent.....**5**

4a. Single, interramal cirri present, beginning on anterior abdominal setigers**Phylo felix**

b. Interramal cirri absent between abdominal setigers.....**Phylo kupfferi**

5a. Posterior thoracic region with 4 or more papillae on neuropodial post setal lobes and subpodal lobes combined (see below)**6**



- b. Posterior thoracic region with no more than 2 papillae on neuropodial post setal lobes and subpodal lobes combined.....7
- 6a. Interramal cirri present, beginning on posterior thoracic or anterior abdominal regions.....**Orbinia riseri**
- b. Interramal cirri absent from abdominal region.....**Orbinia ornata**
- 7a. Branchiae begin on setiger 6.....**Scoloplos rubra**
- b. Branchiae begin on setiger 14 to 25.....**Scoloplos acmeceps**

Oweniidae

Owenia fusiformis is the only species from Virginia

Paraonidae

- 1a. Modified setae present in notopodia; *helpful hint*: modified setae are furcated (see below)2



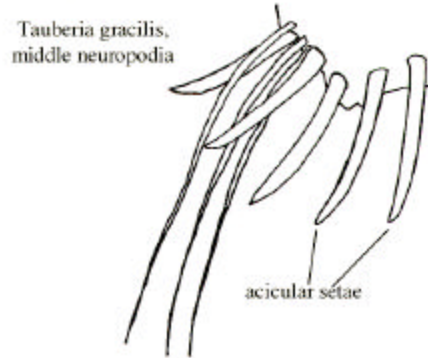
- b. Modified setae, if present, in neuropodia, notopodia are usually all simple capillaries.3
- 2a. Prostomium with a short median antennae present; 29-33 pairs of branchiae present**Cirrophorus lyriformis**
- b. Prostomium without a median antennae; 10-16 pairs of branchiae present**Cirrophorus lyra**
- 3a. Median antennae present on prostomium; *helpful hint*: antennae may be small, or broken off..6

b. Median antennae not present on prostomium..4

4a. 5 or more pre-branchial setigers present; *helpful hint*: 9-19 pairs of branchiae present.
.....5

b. Only 3 pre-branchial setigers present; *helpful hint*: 16-25 pairs of branchiae present..
.....**Paraonis fulgens**

5a. 5-6 curved, hooked acicular setae in neuropodia, starting at about setiger 20 (see below); *helpful hint*: eyes absent..**Tauberia gracilis**



b. Curved, hooked setae absent from neuropodia; *helpful hint*: small eyes present
.....**Paraonis pygoenigmatica**

6a. Distinct, conical neuropodial post setal lobes present on setigers 1-3; *helpful hint*: 26-30 pairs of branchiae present.**Aricidea albatrossae**

b. Distinct neuropodial lobes absent from setigers 1-3...7

7a. Median antennae articulated (see below, left); modified neurosetae are hooked (see below, right), with a subterminal spine on the concave side; *helpful hint*: median antennae is fairly long, extending to setigers 2-4; subterminal spine can be longer than the hooked neurosetae itself..

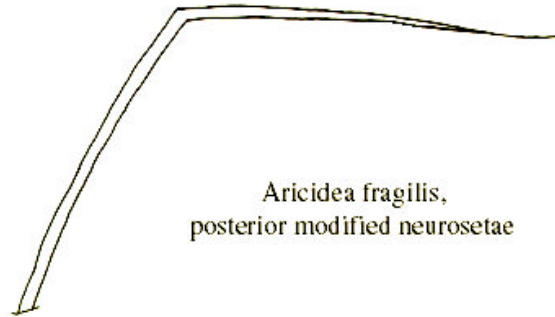
.....**Aricidea wassi**



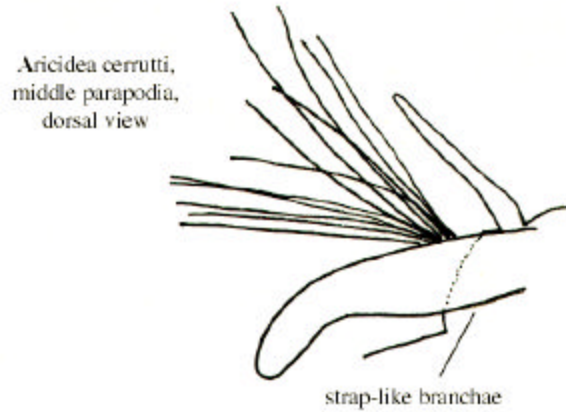
b. Median antennae not articulated; modified neurosetae otherwise; *helpful hint*: median antennae may be long or short.**8**

8a. Modified posterior neurosetae are stout hooks; median antennae is usually short, extending only to setiger 1..**9**

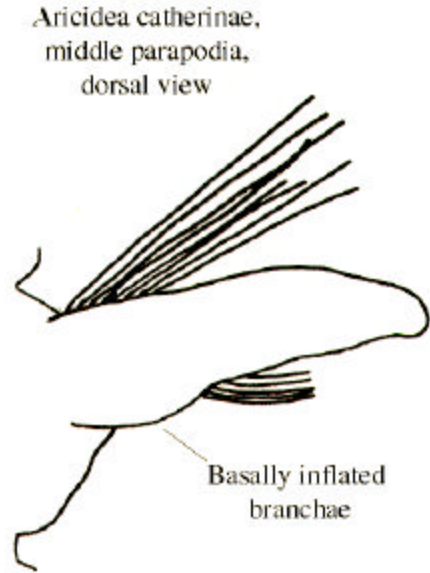
b. Modified posterior neurosetae are bent capillary setae, not stout hooks (see below); median antennae is long, extending to setigers 2-3.**Aricidea fragilis**



9a. Modified posterior neuropodial hooks are hooded; branchiae strap-like (see below)**Aricidea cerrutti**



b. Modified posterior neuropodial hooks are not hooded; branchiae basally inflated (see below), foliaceous..**Aricidea catherinae**



Pectinariidae

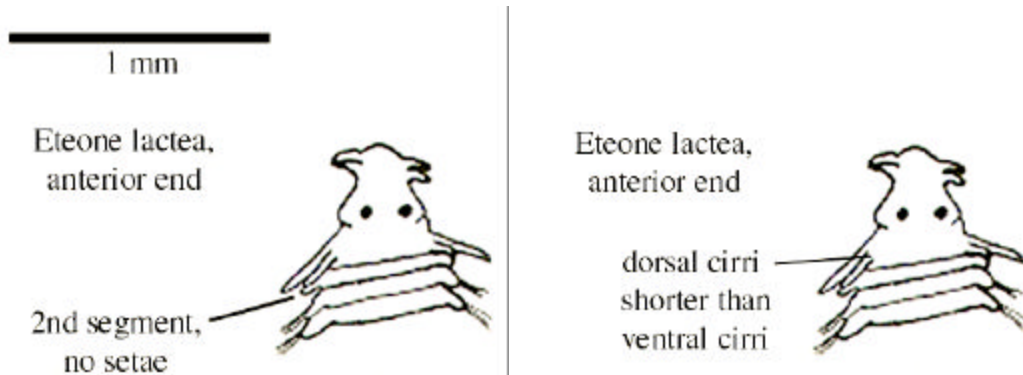
Pectinaria gouldii is the only species from Virginia

Phyllodoceidae

1a. Only two pairs of tentacular cirri present, all are on 1st segment only.....**2**

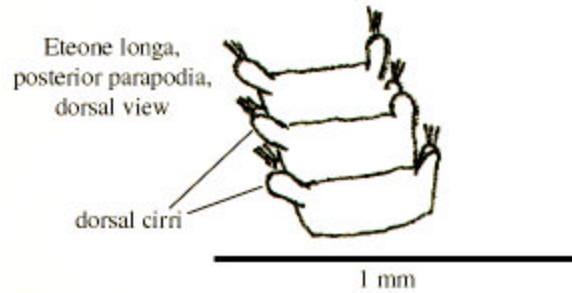
b. More than two pairs of tentacular cirri present, on 2 or 3 anteriormost segments.....**4**

2a. Setae absent from 2nd segment (see below, left); ventral tentacular cirri are longer than dorsal tentacular cirri (see below, right)**Eteone lactea**

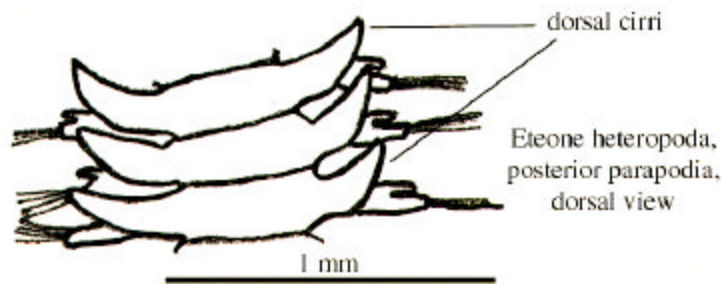


b. Setae present on 2nd segment; dorsal tentacular cirri are longer than, or subequal to, ventral tentacular cirri.....**3**

3a. Posterior dorsal cirri are broad and oval shaped, with rounded edges (see below)**Eteone longa**



b. Posterior dorsal cirri are elongate and triangular or conical in shape, and come to a distinct point (see below).....**Eteone heteropoda**



4a. Only three pairs of tentacular cirri present, on 1st two segments..... **5**

b. Four pairs of tentacular cirri present, on 1st three segments; *helpful hint*: segments may not be clearly distinct.....**6**

5a. Setae absent from 2nd segment; prostomium elongated, about two times longer than wide; eyespots small and indistinct; tentacular cirri are basally filiform..**Hesionura elongata**

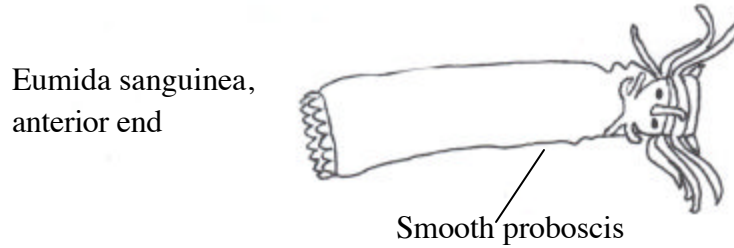
b. Setae present on 2nd segment; prostomium about as long as it is wide; eyes large and distinct; tentacular cirri are basally inflated.....**Mystides borealis**

6a. Median antennae present.**7**

b. Median antennae absent.....**9**

7a. Tentacular cirri appear as follows: one pair originating from a distinct 1st segment, two pair originating from the second segment, and one pair originating from the third segment; proboscis is densely papillated, with large papillae.....**8**

b. 1st segment is not distinct, so the tentacular cirri appear to arise as follows: three pairs originating from the 1st segment (which is really the 1st and 2nd segments combined), and one pair originating from the 2nd segment (which is really the 3rd segment); proboscis is sparsely papillated with small papillae, or is nearly smooth (see below).
.....**Eumida sanguinea**



8a. Dorsal cirri are oval shaped, with rounded tips (see below); median antennae is smaller than frontal antennae; *helpful hint*: in fresh specimens there is pigmentation at the bases of the dorsal cirri, which form two longitudinal stripes**Eulalia bilineata**



b. Dorsal cirri are elongated, with pointed tips; median antennae is smaller than frontal antennae; *helpful hint*: longitudinal stripes absent in fresh specimens.....**Eulalia viridis**

9a. Dorsal cirri from midregion are heart-shaped, with a blunt point; *helpful hint*: dorsal cirri are highly pigmented, and when they are preserved in alcohol they have a brownish red, or purplish color.....**10**

b. Dorsal cirri from midregion are shaped otherwise, usually with rounded edges**11**

10a. Anteriormost dorsal cirri are narrow oval shaped, becoming more heart shaped around segment 7; dorsal tentacular cirri are flattened in cross section; *helpful hint*: color in life is greenish-yellow..**Nereiphylla fragilis**

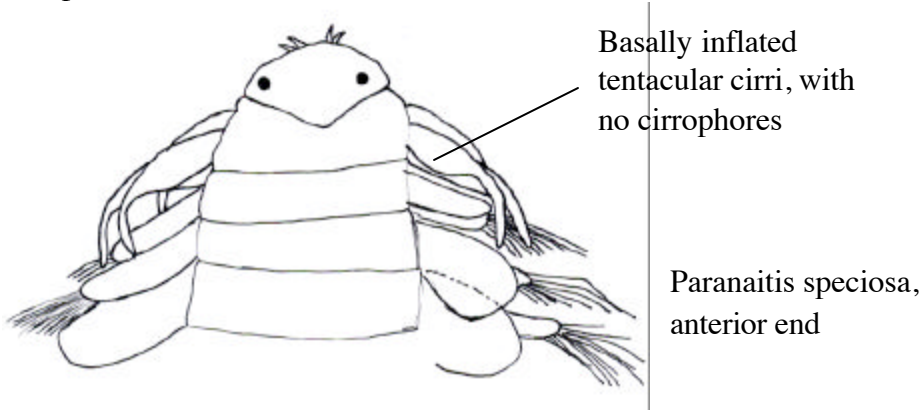
b. Anteriormost dorsal cirri are broadly heart shaped; dorsal tentacular cirri are cylindrical in cross section; *helpful hint*: color in life is red**Genetyllis castanea**

11a. Prostomium heart shaped, with a posterior incision or notch.....**13**

b. Prostomium lacking posterior incision or notch; *helpful hint*: dorsal cirri are large and broad, overlapping each other scale-like on dorsum.....**12**

12a. Small nuchal tubercle present on posterior margin of prostomium; anal cirri are long and tapered; *helpful hint*: tentacular cirri are filiform, with cirrophores..
.....**Paranaitis polynoides**

b. Small nuchal tubercle absent from prostomium; anal cirri short and rounded; *helpful hint*: tentacular cirri are often basally inflated, tapering to fine tips, and without cirrophores (see below).**Paranaitis speciosa**

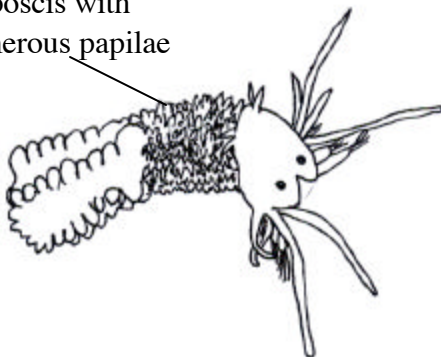


13a. Ventral cirri are distinctly pointed on the ends, and are longer than the parapodial lobes..
.....**14**

b. Ventral cirri are rounded, and are subequal to the parapodial lobes in length.
.....**Anaitides groenlandica**

14a. Setae present on the segment with the third tentacular cirri; basal portion of proboscis has numerous papillae, not in distinct rows (see below).**Phyllodoce arenae**

Basal region of proboscis with numerous papillae



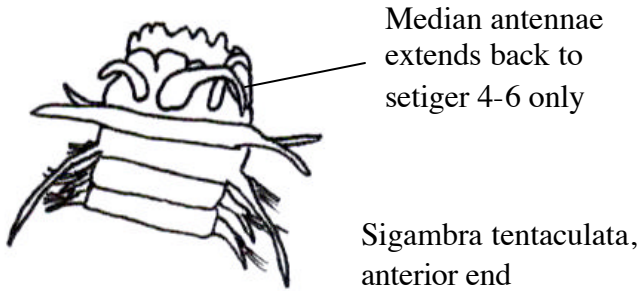
b. Setae absent from the segment with the third tentacular cirri; basal portion of proboscis has papillae in distinct rows.**Anaitides mucosa**

Pilargidae

1a. Median antennae present and elongated, much longer than palps; dorsal cirri of setiger 1 are much longer than the subsequent dorsal cirri.....**2**

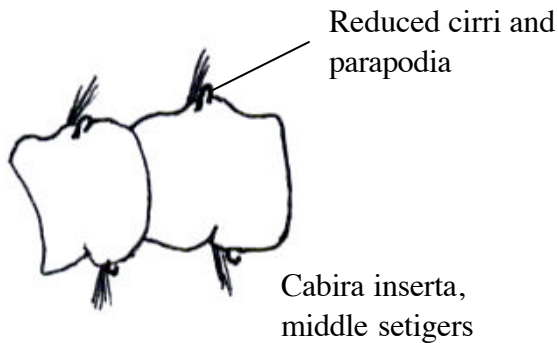
b. Median antennae, if present, is shorter than or subequal to length of the palps; dorsal cirri of setiger one are not more than about two times longer than the subsequent dorsal cirri.....**3**

2a. Hooked notopodial setae begin on setiger 4; median antennae extends posteriorly to about setigers 4-6 (see below); *helpful hint*: occasionally hooked setae begin on setigers 5 or 6.**Sigambra tentaculata**



b. Hooked notopodial setae begin on setigers 10-15; median antennae extends posteriorly up to setiger 12.**Sigambra bassi**

3a. Dorsal and ventral cirri greatly reduced; parapodia greatly reduced, and not distinct from the body (see below); hooked setae begin on setigers 7-9; median antennae completely absent..**Cabira incerta**



b. Dorsal and ventral cirri evident, not greatly reduced; parapodia are distinct from body, and not greatly reduced, hooked setae begin on other setigers; median antennae present, although it may be quite small.....**4**

4a. Hooked notopodial setae begin on setigers 23-35; *helpful hint*: dorsal cirri of setiger 1 about twice as long as subsequent dorsal cirri**Sigambra wassi**

b. Hooked setae begin on setigers 3-6; *helpful hint*: dorsal cirri of setiger 1 may or may not be longer than subsequent dorsal cirri.....**5**

5a. Hooked setae begin on setiger 3.....**Ancistrosyllis hartmanae**

b. Hooked setae begin on setigers 4-6.....**6**

6a. Hooked setae begin on setiger 4 or 5; dorsal cirri of setiger 1 are about two times longer than subsequent dorsal cirri.....**Ancistrosyllis groenlandica**

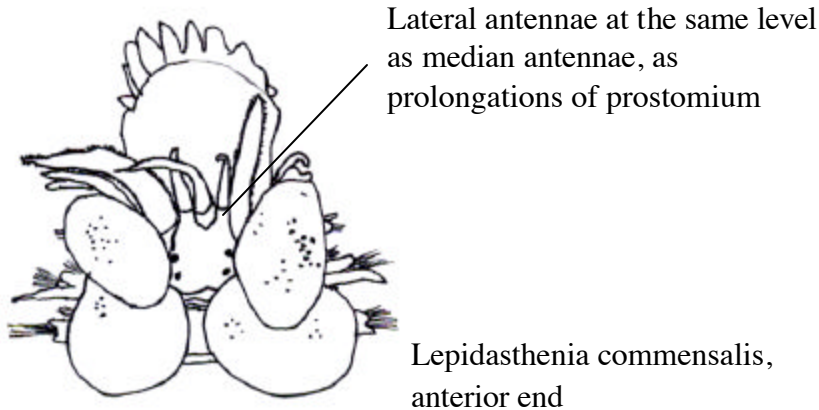
b. Hooked setae begin on setiger 6; dorsal cirri of setiger 1 are slightly longer than, or subequal to dorsal cirri of subsequent setigers.**7**

7a. Ventral cirri begin on setiger 1; parapodia with a distinct notopodial lobe present, which is separated from the neuropodial lobe by a deep notch**Ancistrosyllis commensalis**

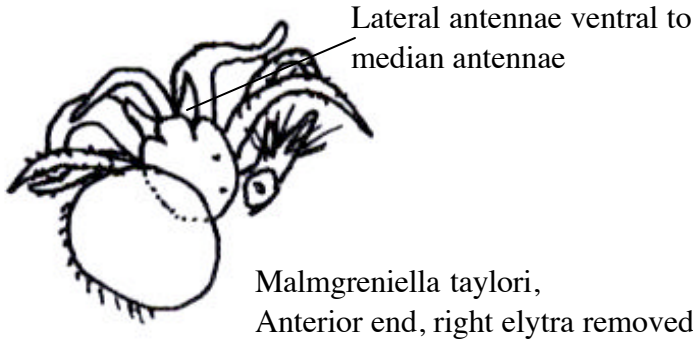
b. Ventral cirri begin on setiger 3; parapodia without a distinct notopodial lobe separated from the neuropodial lobe by a deep notch**Ancistrosyllis jonesi**

Polynoidae

1a. Lateral antennae are inserted terminally on anterior prolongations of the prostomium, at the same level as the median antennae (see below); 12 or numerous (more than 23) pairs of elytra present.....**2**



b. Lateral antennae are inserted ventral to median antennae (see below); 14-15 pairs of elytra present.....5



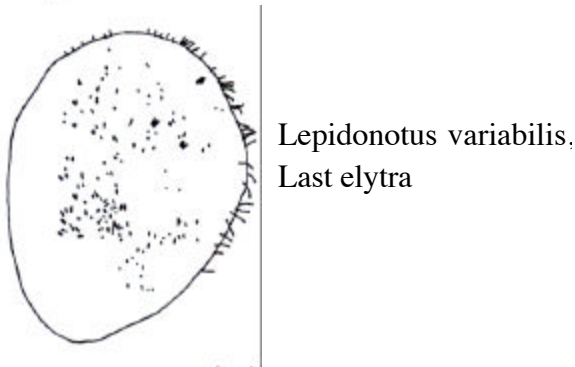
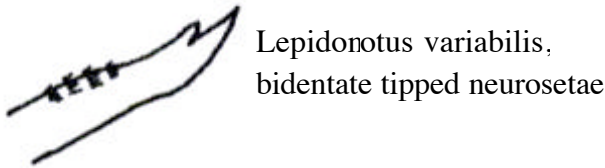
2a. 50 or more segments present; 23 or more pairs of elytra present; *helpful hint*: often found commensal with tube building polychaetes**Lepidasthenia commensalis**

b. 26 segments present; 12 pairs of elytra present.....3

3a. Surface of elytra with small, roughly uniformly sized, conical or rounded microtubules only, that are fairly widely spaced, elytra without macro-tubules.**Lepidonotus sublevis**

b. Surface of elytra with microtubules and macro-tubules of different sizes, micro and macro-tubules are fairly dense on elytra..4

4a. Some neurosetae with distinctly bidentate tips (see below); last pair of elytra are not notched medially (see below)..**Lepidonotus variabilis**

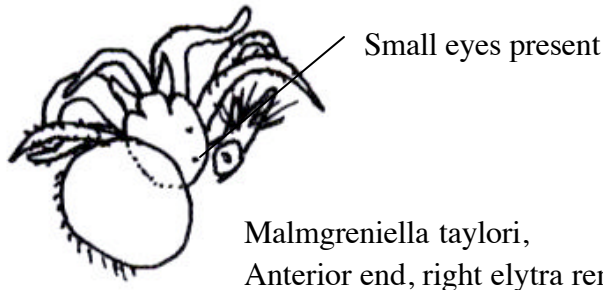


b. No neurosetae with distinctly bidentate tips; last pair of elytra are medially notched.....**Lepidonotus squamatus**

5a. Some neurosetae are slender, with fine, capillary tips, others are bluntly tipped and slightly curved; *helpful hint*: anteriormost pair of eyes are larger than posterior pair.
**Antinoella sarsi**

b. All neurosetae are stout, without fine, capillary tips; *helpful hint*: anteriormost eyes subequal to or larger than posteriormost eyes.**6**

6a. 14 or 15 pairs of elytra present; 31 or less setigers present; elytra without tubercles; *helpful hint*: eyes are quite small (see below); usually found commensal with the brittle star *Micropholis atra*..**Malmgreniella taylori**



b. 15 pairs of elytra present; 34 or more setigers present; elytra with tubercles; *helpful hint*: eyes are not quite small..**7**

7a. 48 or more setigers present; with only a few (4-10) stout notosetae present
**Harmathoe acanellae**

b. 45 or less setigers present; with more numerous notosetae present.....**8**

8a. Some neurosetae are clearly bidentate; anteriormost pair of eyes are on the ventral side of the prostomium, and if visible dorsally, only through the prostomium
**Harmathoe imbricata**

b. Some neurosetae with small, remnant secondary tooth only, not clearly bidentate (see below); anteriormost pair of eyes are on the dorsal side of the prostomium.
**Harmathoe extenuata**

