Identification keys for Terebellomorpha (Polychaeta) of the Eastern Atlantic and the North Polar Basin.
II. Ampharetidae

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Ampharetidae

1. 3 or 4 anterior segments with row of minute acicular chaetae, the rest — with normal uncini. Usually there are hooks behind branchiae, paleae absent. Melinninae...2

— There are no segments with rows of minute acicular chaetae anteriorly. Hooks behind branchiae always absent, paleae often present. Ampharetinae...6

2. There are hooks (grey) and membranous fold behind branchiae. Melinna...3

— Hooks and fold behind branchiae absent. Melinopsis arctica

High arctic deep water species, absent even in the Norwegian Sea.

3. 3 anterior segments with minute acicular chaetae. Dorsal hooks stout. Melinna palmata

Lusitanian.

— 4 anterior segments with minute acicular chaetae. Melinna cristata

Shelf, arcto-boreal.

4. Tips of dorsal hooks heavily curved. Melinna albicincta

Low boreal-lusitanian. shelf.

— Tips of dorsal hooks slightly curved. Melinna elisabethae

Shelf, arcto-boreal.
6. Prostomium with two longitudinal ridges protruding anteriorly as horns and two transversal nuchal organs. Paleae well developed, 14 TU .............................. *Amphicteis* ...

— Prostomium without transversal nuchal organs and usually without prominent longitudinal ridges (if present paleae minute or absent), with U-shaped groove.................11

— Prostomium simple lobe without transversal nuchal organs, longitudinal ridges and U-shaped groove............................................................................................................35

7. Tips of paleal chaetae evenly tapering ........................................8
— Tips of paleal chaetae blunt ..........................................................10

8. 15 AU .............................................................................................................9
— 18–20 AU...................................................................................... *Amphicteis sundevalli*  
Upper shelf, high arctic.

9. Longitudinal ridges of prostomium well marked, abdominal neuropodia with short dorsal cirri........................................................................... *Amphicteis gunneri*  
Widely distributed shelf species.
— Longitudinal ridges of prostomium inconspicuous, abdominal neuropodia with long dorsal cirri................................................ *Amphicteis wesenbergae*  
Deep water species, south to Iceland, the Norwegian and the Greenland Seas.

10. Paleal chaetae dark brown; usually more than 10 paleal chaetae (8–16) ........................................ *Amphicteis ninonae*  
Bathyal arctic.
— Paleal chaetae light yellow. Usually (90%) no more than 8 paleal chaetae (up to 10)........ *Amphicteis midas*  
Shallow low boreal-lusitanian.

11. Middle lobe of prostomium anteriorly incised (if buccal tentacles are protruding, icision may be smoothed and prostomium anteriorly become widely rounded) .................................................................11
— Middle lobe of prostomium anteriorly rounded or pointed .....17

12. AU1 with foliaceous rudimental notopodia ................................... *Ymerana pteropoda*  
Deep water arctic.
— All abdominal rudimental notopodia small, never foliaceous........... 13
13. 11 TU..............................................Hypania romijni
   — 13 TU..............................................Boreal brackish water.
   — 14 TU. Four or three pairs of branchiae........Amage adspersa
   — Low boreal – lusitaninan.

14. At least 19 AU, neuropodia of AU-1 of thoracal type, small paleae........Grubianella klugei
   — 8 or 9 AU, all abdominal neuropodia of abdominal type, no paleae....Amage auricula
   — Deep water arctic, deep parts of the North Sea.

15. 8 AU..............................................Amage auricula
   — 9 AU..............................................Amage galassii
   — ? shallow water, low boreal.

16. 3 pairs of branchiae ..................................Amage scotia
   — 4 pairs of branchiae..................................Shallow water (?), low boreal – lusitaninan.

17. Thorax sharply subdivided in two regions: (1) anterior 9–10 TS short with well developed ventral glandular pads, (2) last 5 TU very long, glandular pads not developed.....Amage scotia
   — All thoracic segments remain similar in length; glandular pads may reduce gradually or stop abruptly, but the above characters are not combined ..............................................

18. Prostomium rounded; paleae present (not shown on left); 3 pairs of branchiae ..................................Eclysippe vanelli
   — Prostomium pointed, often even with terminal papilla; paleae absent; 2 pairs of branchiae ..................................Auchenoplax worsfoldi
   — Shallow water (?), low boreal. See description below

19. Notopodia of TU9 or TU10 foliaceous, the rest normal........Sosane
   — Notopodia of TU8 (5th from the end of thorax) slightly shifted dorsally and connected by a low glandular band (sometimes visible only after staining), the rest ones normal........Anobothrus

20. Notopodia of TU9 (last) foliaceous.............................................21
   — Notopodia of TU10 (third from last) foliaceous ..............................22

   — Rudimental (without chaetae) notopodia of AU1 transformed into a double dorsal fan..................................“Amphicteis” vestis
   — Deep water, widely distributed in the Atlantic Ocean.

   — No thoracic or abdominal modified notopodia .........................24
21. 8 AU ................................................................. *Sosane wahrbergi*  
Shallow water low boreal.  
— 12 AU ............................................................... *Sosane bathyalis*  
Deep water arctic.  

22. Paleae small ...................................................... *Sosane sulcata*  
Low boreal.  
— Paleae totally absent ........................................ *Sosane wireni*  
Widely boreal.  

23. Circular band anterior to notopodia of TU2. 3 pairs of branchiae  
................................................................................. *Anobothrus laubieri*  
Deep water arctic.  
— Circular band anterior to notopodia of TU3. 4 pairs of branchiae.......  
................................................................................. *Anobothrus gracilis*  
Shelf, widely distributed.  

24. Lower lip enlarged, longitudinally folded .............................. *Lysippe*...25  
— Lower lip not enlarged, longitudinally not folded ..........................26  

25. 16 TC, 13 TU, 14–15 AU, 4 pairs of branchiae........... *Lysippe labiata*  
Shelf, arctic-high boreal.  
— 17 TC, 14 TU, 13 AU, 3 pairs of branchiae ............ *Lysippe sexcirrata*  
Shelf, widely boreal.  
— 17 TC, 14 TU, 8 AU, 4 pairs of branchiae ............... *Lysippe fragilis*  
Shelf, not completely known, probably boreal.  

26. Paleal chaetae huge, their tips sharply tapering, number 8–23. 13 or 16–18 AU ..............................................agg. *Ampharete finmarchica*...27  
— Paleal chaetae huge, their tips sharply tapering, number 8–23 .  
— Paleal chaetae of different size or absent, their tips, if present slowly tapering. 12 or 26–28 AU .........................................................28
27. 13 AU .................................................. *Ampharete finmarchica*
Shelf, boreo-arctic
— 16–18 AU .................................................. *Ampharete goeesi*
Shelf, high boreo-arctic

28. Rudimental notopodia of first two AU enlarged ..........29
— All rudimental notopodia of similar size ..................30

29. Gap between branchial groups as wide as width of the group; 12 AU ......................
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*Ampharete falcata*
Shelf, boreal
— Gap between branchial groups narrow or absent; 26–28 AU ...........*Ampharete vega*
Upper shelf, arctic, often in brackish waters

30. Palea well visible, paleal chaetae large, their length is near equal to the body width .............31
— Palea well visible, paleal chaetae large, their length several times less than the body width ...........32

31. Neuropodia of last 14 (usually) chaetigers (all abdominal and two last thoracal) with long cirri ..........................................................................
*Ampharete acutifrons*
Shelf, widely distributed.

*Ampharete grubei* Malmgren, 1866, according to the original description cannot be synonym of *Ampharete acutifrons*, because it lacks long neuropodial cirri.
— Neuropodial cirri (if present) reduced ......................agg. *Ampharete lindstroemi*
 Widely distributed group of species with unclear taxonomic relations, besides *A. lindstroemi* it includes *A. grubei*, *A. baltica* and 2–3 undescribed species
33. 11 TU .................................................. 
— 12 TU ..................................................
*Ampharete petersenae*
Uncompletely know, probably boreal shelf.

32. Abdominal neuropodia besides two anterior with very long neuropodial cirri ...34
— Neuropodial cirri short or absent ..................................
*Amythasides macroglossus*
Shelf, low (?) boreal.

34. Branchiae and nephridial papillae as shown; 12 AU ..............*Ampharete borealis*
Shelf, arctic.
— Branchiae and nephridial papillae as shown; 15–17 AU ............*Ampharete octocirrata*
Shelf, boreal-lusitanian.
35. Tube muddy with transversal ridges; prostomium with lateral glandular shields

\textit{Glyphanostomum pallescens}
Mainly slope, widely distributed

— Tube otherwise, prostomium without lateral glandular shields

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36. 2 pairs of branchiae; 10 TU, TU9 with \textit{Anobothrus}-type modified notopodia

\textit{Zatsepinia rittichae}
Shelf, boreal (?).

— 3 pairs of branchiae; 11–12 TU, modified notopodia absent

\textit{Samythella elongata}
Almost exclusively slope and abyssal, widely distributed