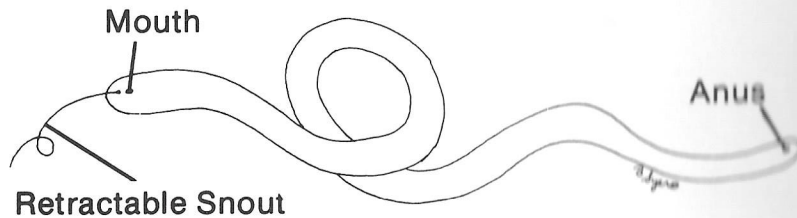


UNSEGMENTED WORMS

Phylum: Rhynchocoela

The members of this phylum are leech-like worms known as Nemertean. They are unsegmented and have no appendages. The gut possesses both a mouth and an anus, neither of which can be clearly seen. Some species possess eye spots (ocelli) and various types of sensory grooves (often hidden) on the head (anterior) region. Located in front of the mouth is a tiny pore through which a completely retractable snout is thrust to catch prey. This proboscis is not used to bite fingers, so they are safe to handle. These species are fragile and break apart easily if handled roughly.

There are usually both male and female individuals, although some members can reproduce asexually by fission. Some species bear live young while others lay eggs that either develop directly into worms or produce planktonic larvae.



Ventral View

Milky Ribbon Worm

Family: Lineidae

Cerebratulus lacteus

Description

Size: 3' or less (when found around Sandy Hook), can grow up to 30' long.

Characteristics: Long, firm, ribbon-like body; flattened in the intestinal region with thin lateral margins adapted for swimming; large, elongated mouth; no eye spots; tail portion has a small hook-like structure (cirrus).

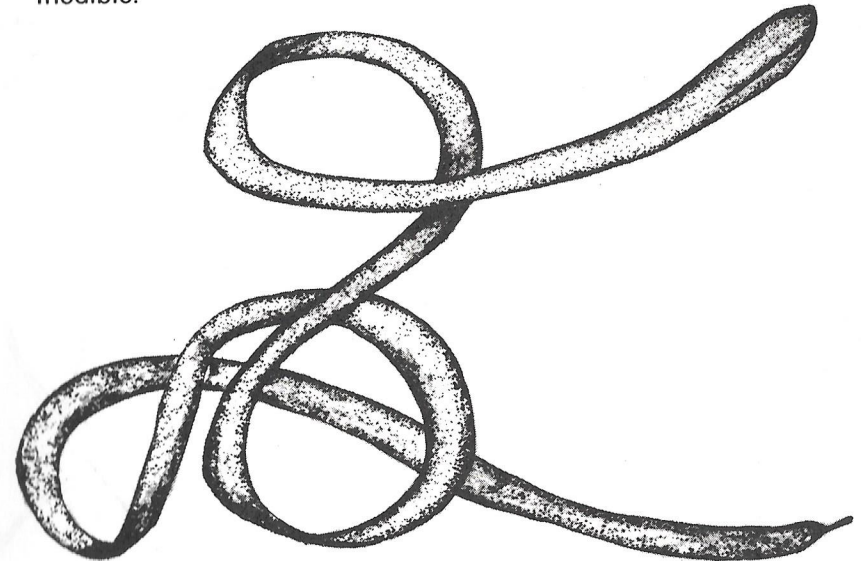
Color: White, tan or tinted pink.

Habitat

Lives in shallow water beneath shells, stones or among algae; can be found burrowed in mud or sandy substrates near Sandy Hook marsh areas.

Edibility

Inedible.



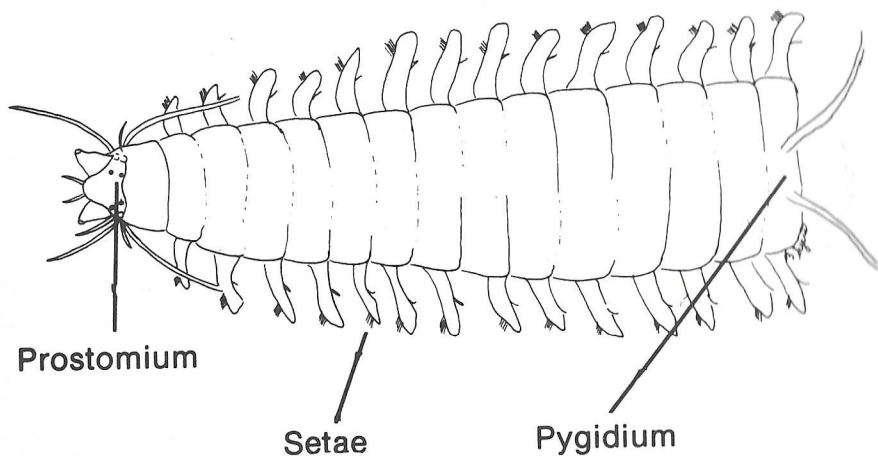
Milky Ribbon Worm

SEGMENTED WORMS

Phylum: Annelida

This phylum encompasses worms which are segmented and possess bristles or fleshy hair-like projections known as setae. Some worms burrow into the bottom, while others live above the bottom on seaweeds, debris, or other organisms. There are three annelid classes composing this phylum; a small group which are parasitic or live together with echinoderms (myzostomidas); aquatic earthworms (oligochaetes); and bristle worms (polychaetes). The last two classes contain the most numerous marine forms.

Annelids may grow to the largest size of any of the worm-like invertebrates and exhibit the greatest structural differentiation. New growth appears at the tail end of the individual so that the segmented portion of the body is always limited to the trunk. The prostomium (head) contains the brain, the pygidium (the tail end) is where the anus is located. Neither of these are considered segments of the worm.



Capitellid Thread Worm

Family: Capitellidae

Capitella capitata

Description

Size: Up to 1" long.

Characteristics: Resembles an earthworm; body regions are weakly defined; small, rudimentary limbs (parapodia).

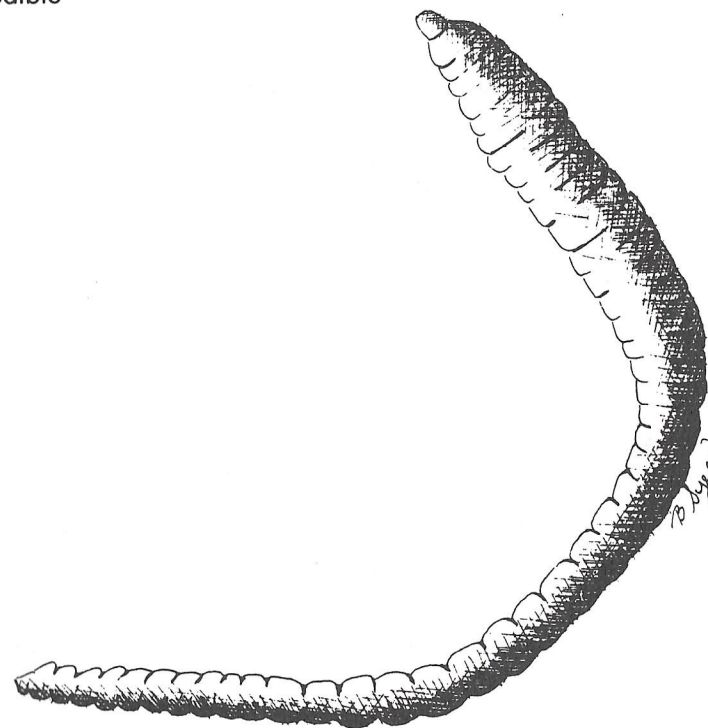
Color: Dark red or purplish at the head to yellow at the tail.

Habitat

Lives on or in muddy bottoms in water less than 25' deep. Thrives in polluted waters; found at Sandy Hook on the surface of, or by digging into, subtidal mud flats.

Edibility

Inedible



Thread Worm

Blood Worm

Family: Glyceridae

Glycera americana

Description

Size: 1/2" wide, up to 15" long; more commonly half that size.

Characteristics: Tapered head region with a cone-like head and long snout with four black fangs; blunt, finger-like gills above and below each rudimentary limb.

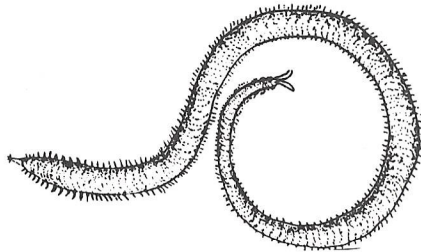
Color: Skin is translucent, allowing the red body fluid to show through and giving the worm a reddish color.

Habitat

Lives in mud or sandy substrates by burrowing below the surface; found in intertidal mud flats on Sandy Hook's bay side.

Edibility

Inedible; can be used as bait.



Blood Worm

Lumbrinerid Thread Worm

Family Lumbrineridae

Lumbrineris fragilis

Description

Size: Thread-like, earthworm-like proportions (up to 15" long and 1/2" wide).

Characteristics: Pointed head region; no feelers or antennae.

Color: Red or pink to tan or yellow, with iridescent stripes across its body.

Habitat

Lives in mucus-lined worm tubes; found in muddy or sandy bottoms in Sandy Hook's intertidal zone.

Edibility

Inedible.

Bamboo Worm

Family: Maldanidae

Clymenella torquata

Description

Size: to 6"

Characteristics: Segmented body that resembles a bamboo plant; blunt, hood-like head; short, rudimentary limbs; collar on the fourth segment; crown-shaped tail.

Color: Pale tan or pink with red or green joints.

Habitat

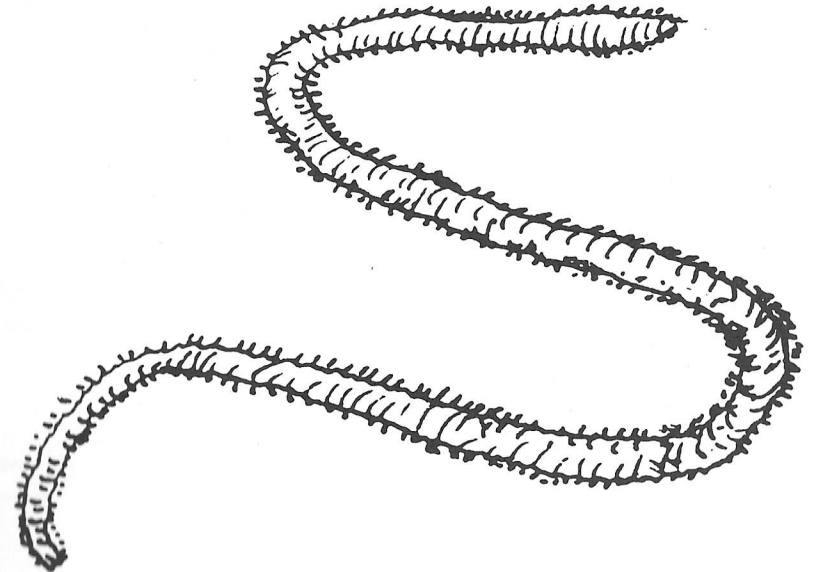
Found in Sandy Hook's intertidal zone.

Edibility

Inedible.



Bamboo Worm



Lumbrinerid Thread Worm

Rosy Magelonas

Family: Magelonidae

Magelona rosea

Description

Size: 1/16" wide, up to 2" long.

Characteristics: Long, slender body; spade-like head region with two long side tentacles; the body has a short thorax (between the neck and abdomen) separate from the tapered abdomen but linked by a modified segment; one pair of long palps used in feeding; classified as secondary burrowers.

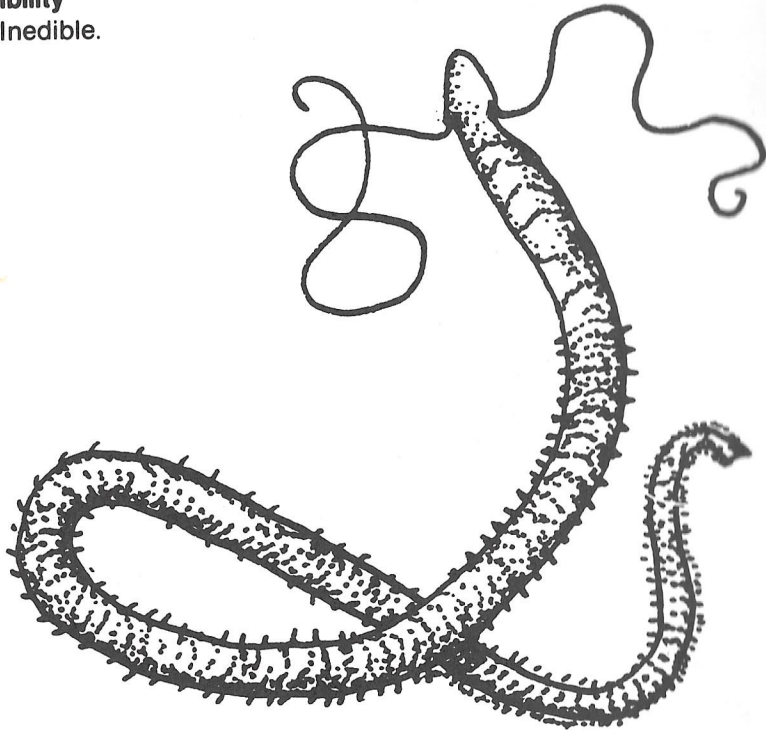
Color: Pink.

Habitat

Found along Sandy Hook's bay and salt marsh region by digging into the mud at low tide.

Edibility

Inedible.



Rosy Magelonas

Clam Worm

Family: Nereidae

Nereis virens

Description

Size: Up to 4" long.

Characteristics: Robust, elongated body; uniform rudimentary limbs throughout the body.

Color: Body is brown with a hint of pink; jaws are blackish.

Habitat

Found on the bottom from the intertidal zone to the outer continental shelf; found near clam beds in Sandy Hook's intertidal zone.

Edibility

Inedible; can be used as bait.

Clam Worm

Family: Nereidae

Nereis succinea

Description

Size: 3-6" long.

Characteristics: Robust, somewhat elongated body; distinguished from other clam worms by its small rudimentary limbs near the head.

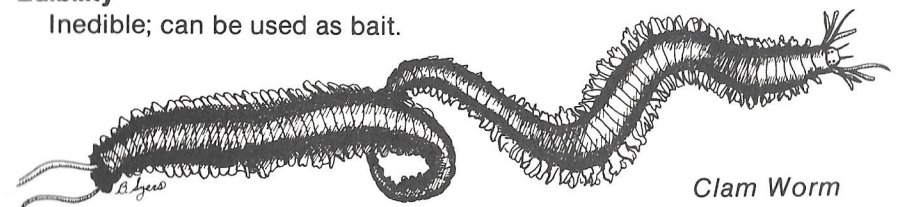
Color: Pinkish; its jaws are pale amber.

Habitat

Lives in shallow waters near and among clam beds; found along Sandy Hook's intertidal zone.

Edibility

Inedible; can be used as bait.



Clam Worm

Nereis succinea and *Nereis virens* are exactly alike except *succinea* has smaller limbs toward the head.

Trumpet Worm

Family: Pectinariidae

Pectinaria gouldii

Description

Size: 2" long.

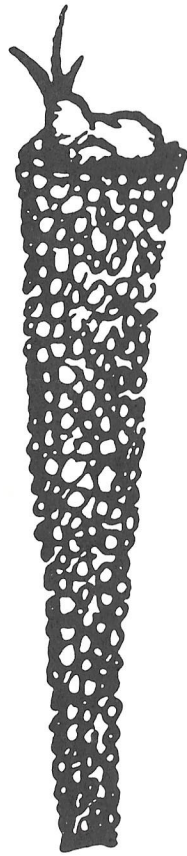
Characteristics: The flat head region has a fan of iridescent golden bristles on it which gather food in sandy substrates; remains buried in the sand most of its life and protrudes from a slender cone-like tube made up of sand grains for breathing and feeding.

Habitat:

Lives in sandy bottoms in shallow estuaries; found around Sandy Hook's salt marsh region.

Edibility

Inedible.



Trumpet Worm

Fan Worm

Family: Sabellaridae

Sabella microphthalma

Description

Size: Up to 1" long, 1/4" wide.

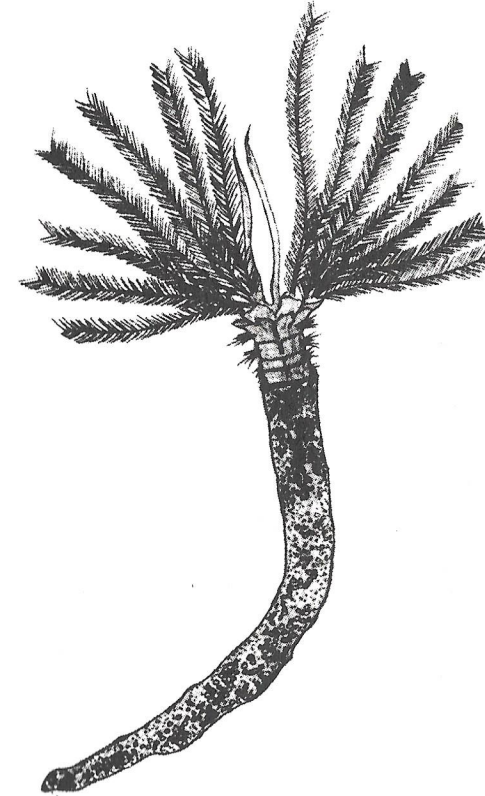
Characteristics: Head region has feathery, crown-like tentacles projecting from a lobe on each side of the mouth, used for respiration and feeding; numerous tentacles and eye spots are on the upper body portion; the outer tube is skin-like and leathery soft; usually covered with sand, mud or other debris when found.

Habitat

Live in tubes they build on a firm bottom or among stationary organisms; found on the ocean and bay sides of Sandy Hook.

Edibility

Inedible.



Fan Worm

Sand Builder Worm

Family: Sabellaridae

Sabellaria vulgaris

Description

Size: 1/8" wide or less, up to 1" long.

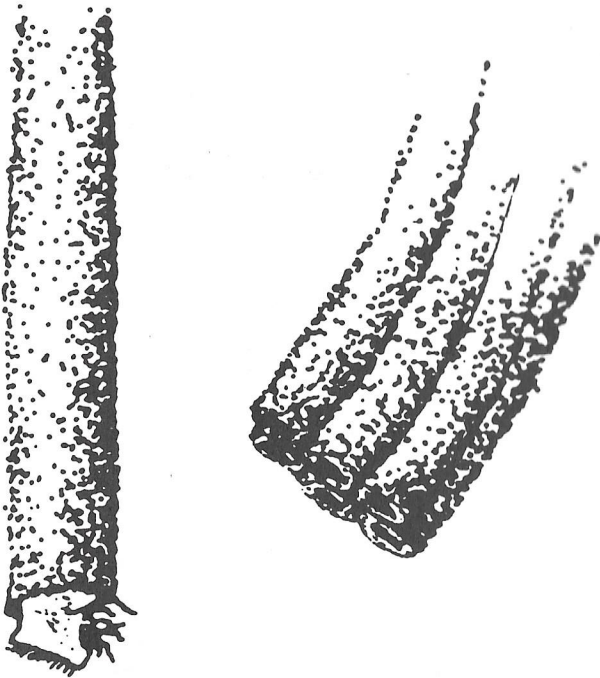
Characteristics: Well-defined head region; heavy conspicuous body bristles.

Habitat

Lives in a tube within a colony of tubes built close enough together to create a honeycomb-like effect; found in sandy bottoms in intertidal and subtidal zones on Sandy Hook's bay side.

Edibility

Inedible



Sand Builder Worm

SNAILS, CLAMS, OYSTERS, MUSSELS AND SCALLOPS

Phylum: Mollusca

The molluscs are second in number of species only to the arthropods with its vast number of insect types. Over 80,000 living species are included in phylum mollusca, and an excess of 35,000 fossil species are known to have existed. Mollusca has a rich geologic history, and the animals' mineral shells have provided a rich fossil record dating back to the Cambrian period (500-600 million years ago).

There are two distinct body structures unique to this phylum — the mantle and the radula. The mantle is a fold in the body wall which secretes a calcareous shell; the radula is a rasping tongue specialized for feeding. The foot of a mollusc, used for creeping, is sole-like in most snails, slugs and chitons, and somewhat hatch-shaped in many bivalves. The head region is usually distinctly defined and various organ systems are contained within its visceral mass. Many members of this phylum lack one or another of these features, but as a group they are easily recognized.