Common name: American Eel
Scientific name: *Anguilla rostrata*

Taxonomy
Kingdom: Animalia
Phylum: Chordata
Class: Actinopterygii
Order: Anguilliformes
Family: Anguillidae
Genus: *Anguilla*
Species: *Anguilla rostrata*

Animal Description
The American eel *Anguilla rostrata* is a widely distributed, snake-like demersal fish occurring from Greenland south along the Atlantic coast of Canada and the United States to Panama and throughout most of the West Indies south to Trinidad and Tobago. *A. rostrata* is a secretive fish hiding by day in rock recesses, undercut logs, and deep pools, venturing out at night in search of prey. They spend much of their time buried in gravel or mud bottoms or under rocks. Adults vary in color from brownish to blue-black and are usually white or light-colored on ventral side. Younger specimens have some yellow on the edges of the dorsal and anal fins. Their habitats include lakes, streams, estuaries, lagoons, brackish areas and marine environments. Reproduction has not been observed, but believed to occur in the Sargasso Sea. Sexual dimorphism occurs in *A. rostrata* with females noticeably larger than males.

Nutrition
*A. rostrata* are non-specific predators feeding on larvae of many aquatic arthropods including Ephemeroptera, Odonata, Plecoptera, Coleoptera, Trichoptera, and Lepidoptera. *A. rostrata* also feeds on gastropods, oligochaetes, amphipods, isopods, mysids, and fish from the families Percidae, Cyprinidae, Ictaluridae, Catostomidae and Anguillidae. This generalized diet affords *A. rostrata* with a variety of food items; allowing successful colonization of a variety of habitats. Diet at least in terms of specific food items (except is rarely a limiting factor in the distribution of these organisms.

Skeletal system
Osteichthyan (bony fish); ossified endoskeleton but lacks a pelvic girdle and pelvic fins. Its pectoral fins are large, and asymmetrically rounded. This morphology (a converged character in many fish groups) makes it easy for these fishes to move in rocky areas and for burrowing into the substrate.

Importance to environment
Very little long-term monitoring of population trends exists and therefore impacts of population decline are unknown. Extirpation of *A. rostrata* from Lake Ontario would prove another major loss in native species from the Great Lakes, an already heavily altered ecosystem.
Importance to humans
Commercial and recreational fisheries exist for \textit{A. rostrata}. All life stages levels (except eggs and larvae) are marketable and thus targeted. The species is also widely aquacultured for commercial fishery as well as for show aquaria.

Fascinating facts
\textit{Anguilla rostrata} is the only catadromous species in the United States; migrating in autumn to the Sargasso Sea to spawn. After several years of living in freshwater, they migrate downstream to salt water go to breeding grounds south of Bermuda, spawn and die. Eggs hatch and larvae drift with Gulf Stream, eventually finding their way into freshwater streams. Their migration coincides with that of the European eel (\textit{Anguilla anguilla}). Assortment of \textit{A. rostrata} and \textit{A. anguilla} during mating is unknown, however they are considered reproductively isolated species.

References
