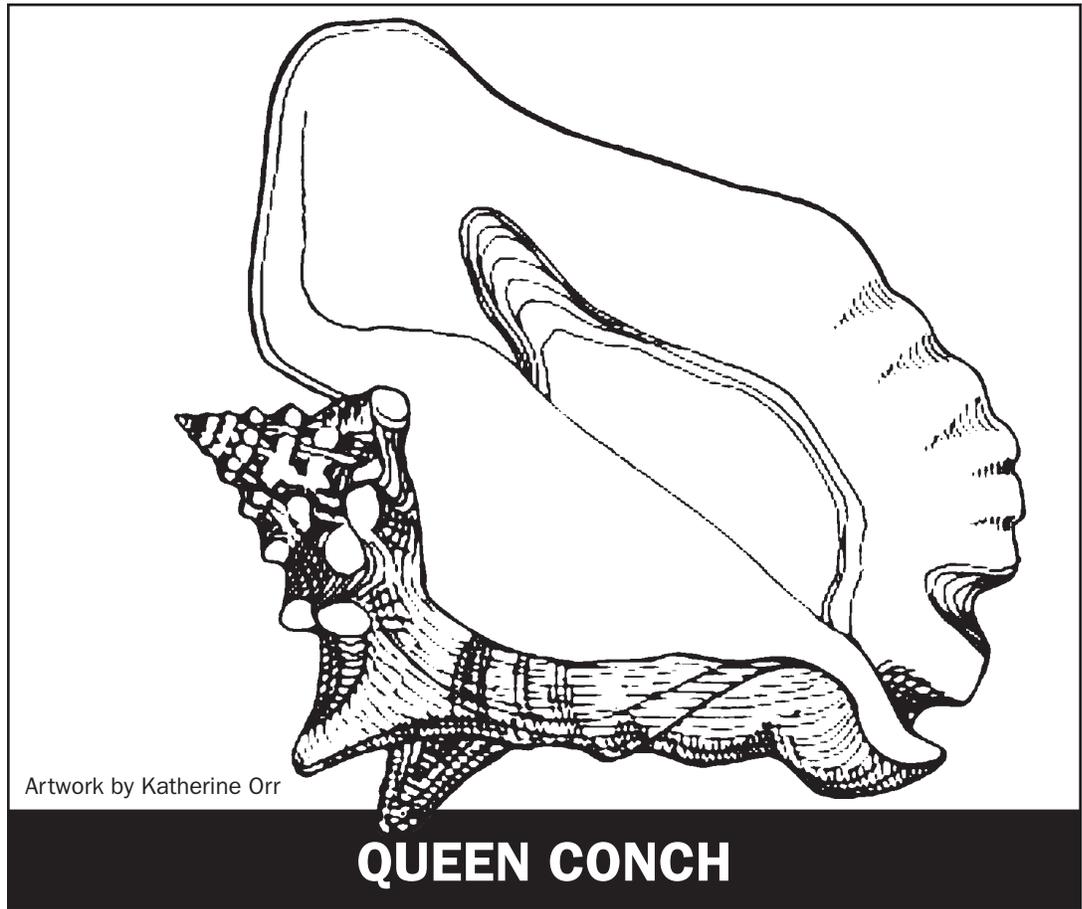




## Marine Life of The Bahamas



#### SCIENTIFIC NAME

*Strombus gigas*

#### DESCRIPTION

The Queen Conch is a large sea snail. It has a large shell with a short conical spire with blunt spikes. The shell's exterior is orangeish (not always apparent because of algal growth; the aperture (opening to the inside of the shell) is a shiny rosy pink colour. The mollusk itself has a mottled gray head with a large proboscis (like a nose or beak) and long eye stalks with eyes at the end. Beneath the shell is a strong foot with a "claw" like a pointed toenail. Conchs are either male or female just like people. The male has a black arm over his right eye. The female conch has a groove that runs down the right side of her foot.

#### DIET

The conch is a slow moving grazing herbivore. It eats plants or epiphytic algae.

#### REPRODUCTION/LIFE CYCLE

Conchs breed all months of the year except November to January. When conchs mate they sit close together with the male behind the female and their two shells touching. If one could look underneath their shells one can see the male's arm reach to the female passing sperm to fertilize the eggs. After mating, the female deposits an egg mass, which although only two or three inches long, contains up to half a million eggs! The mass is actually a tightly folded egg-filled tube up to ninety feet long made sticky by mucus. The eggs are laid in water ten to seventy feet deep on loose sand or in beds of turtle grass. Sand grains soon adhere to the mucus hiding the eggs from predators.

After about three days, the eggs hatch into tiny free-swimming larvae. Ten baby conch can fit into one drop of water. These new baby conch do not look like conch at all. Their bodies have two round lobes like the ears of an elephant. Each lobe is rimmed with fine hairs, which beat back and forth very fast. These hairs help the conch swim and move food into its mouth. These baby conch are known as “veligers”. Baby conchs drift on the sea feeding on tiny plants.

After about 2 months, the baby conch sinks to the sea bottom. It is only a fraction of an inch long and its shell is very fragile. It now goes through a process called “metamorphosis”. Metamorphosis is when a body changes from one form to another – as when a caterpillar turns into a butterfly. During metamorphosis, the conch’s lobes disappear. It develops a long snout with a mouth at the end and a foot with a claw. It begins to look like the conch that we know. The baby conch buries itself in the sand and hides for about a year. It becomes nocturnal, meaning that it only comes out to feed in the night.

A conch grows its own shell and makes the shell larger as its body grows. When a conch is a few months old its shell is white, but by the time a conch is five or six months old its shell is white with streaks of dark brown. As the conch grows, we call it a “roller” because its shell is like a round spiral. As it grows it makes the spiral bigger. When the conch is nearly three years old it has reached full shell size. Now it grows a broad lip on its shell. This new broad lip is a sign that the conch will soon reach maturity.

## **VALUE**

Conch is an important part of the marine food chain. Juvenile conch are eaten by crawfish, crabs, hermit crabs, sea snails, hogfish and queen triggerfish. Large conchs are eaten by sea turtles, octopus, stingrays and leopard rays.

Queen Conch has been a staple food in the diet of Bahamians for hundreds of years as well as an important fishery resource. Conch is a food product with status as a “Cultural symbol”. Popular food dishes include cracked conch, conch fritters, conch chowder, conch salad and scorched conch. Almost one million dollars is earned annually from catching and selling conch.

## **CONSERVATION**

The harvesting and possession of conch with a shell that does not possess a well-formed lip is prohibited. Various researchers have concluded that Queen Conch are locally depleted in The Bahamas. The Department of Fisheries is very concerned about the status of conch fisheries and given that the status is not well known, export of conch has been limited.

Conch is listed in the Convention on the International Trade in Endangered Species (CITES) as Appendix II. This listing refers to the species as threatened and standing to become endangered. All international trade is prohibited among CITES signatory nations.

