# **SCDNR Marine Turtle Conservation Program Frequently Asked Questions**

# How long do sea turtles live?

There has not been a turtle followed from emergence to natural death, but based on the information we have it is assumed that sea turtles can live 60 or more years depending on the species. Onset of sexual maturity is also species dependant, but researchers believe that it is around 20-30 years for loggerheads.

#### What do sea turtles eat?

Loggerheads have strong jaw muscles, which they use to eat hard-shelled animals. They are carnivorous and most prefer to eat mollusks such as mussels and clams. Many also eat a variety of crabs including horseshoe crabs.

#### How many eggs do they lay?

It depends on the species, but loggerhead sea turtles lay an average of 120 ping pong sized eggs. Usually females nest every other or every third year and they lay several nests (averaging 4) within each season.

### How long does it take for the eggs to hatch?

On average, it takes about 60 days, but the exact time depends on the sand temperature among other environmental factors. Warmer sand shortens the incubation duration.

#### What are the main predators of the hatchlings?

Birds, mammals and fish are the primary predators. One of the reasons that sea turtles emerge at night is to avoid predation from predators that are diurnal.

## Where do hatchlings go once in the ocean?

It isn't entirely known because there are very few observations of sea turtles between the stages of hatchling and "dinner-plate" size. Once they reach this size, they are seen in the waters around Cape Verde, Canaries, Azores, and Madeira Islands. It is assumed that before arriving there the small turtles float passively along major North Atlantic currents, near the Sargasso Sea.

#### How many of the hatchlings will survive?

Nobody knows for sure, but recent research suggests that about 1 in 1000 hatchlings will make it to adulthood.

#### How can you tell the sex of sea turtles?

As hatchlings or juveniles, you can't tell by looking. As adults, males have a much longer tail than females, and a more pronounced curved claw on each front flipper. Sand temperature affects gender: 29.6°C during the middle third of incubation will produce a 50:50 gender ratio. A couple of degrees higher will produce all females and a couple of degrees cooler will produce all males.

#### Do sea turtles come back to nest in the same region where they hatched?

This phenomenon, called natal homing, is commonly seen in loggerheads. An individual turtle will nest within 5 miles to 35 miles, on average, of where they hatched from and/or nested in the past, based on tagging studies. There's also evidence that the hatchlings can detect variations in the earth's magnetic field and that's how they navigate back.

#### What do I do if I see a sick or injured sea turtle on the beach?

Do not push the sea turtle back into the water. If a sea turtle has stranded is not behaving normally and needs medical attention. Call the SCDNR hotline (1-800-922-5431). An SCDNR biologist will respond by picking up the turtle and transporting it to the nearest rehabilitation facility. It is generally recommended to move the turtle to a shaded area and place wet towels on the carapace to avoid overheating.

#### What do I do if I find a hatchling on the beach during the day?

It is important to get the hatchling into the water as soon as possible since it has limited energy resources, so the best thing to do is place the hatchling back into the water. It can be walked out past the breakers and released. It is against federal and state law to remove the hatchling from the natural environment.

### Can I take home a piece of shell or part of the skeleton?

All sea turtles in the US are protected by federal and state law, and it is against the law to possess any live turtles or their parts.

# If a major storm is coming and a nest may be washed away, can we relocate it to a safer location?

SCDNR guidelines do not allow you to dig up nests to move the eggs or release hatchlings before natural emergence. You can respond to any nests that are washing away by reburying the eggs on the beach (not in buckets or other containers!!) if there is any dry beach left. Please refer to Section 8 of the guidelines that addresses this question in more detail.

#### What can we do to avoid predation by ghost crabs?

Many volunteers use ghost crab traps to reduce ghost crab predation. For more information about how to construct a ghost crab trap, please refer to this link: http://www.dnr.sc.gov/seaturtle/volres/crabtraps.pdf.

### What can we do to avoid fire ant predation?

Please refer to the SCDNR guidelines for further information.

#### Can we inventory a nest early if a storm is coming?

Conducting inventories because a storm is approaching is not permitted. Even though storms may have an impact on nests, sea turtles have adapted to accommodate for natural events such as hurricanes. The real purpose of inventories is to collect data, not to save hatchlings, and excavating a nest early may provide a skewed picture of the hatch and emergence success of the nest.