Ann Downer has never lived very far from the ocean. When she was little, her uncle took her to a beach to see horseshoe crabs, and she has been interested in sea creatures ever since. She spent part of her childhood in and around the Pacific Ocean, living first in the Philippine Islands and then in Thailand. Now she lives in Somerville, Massachusetts, not far from the Atlantic Ocean. With her husband and son, she likes to go looking for sea creatures in tide pools in Maine. She used to be scared of sharks (she still is, a little!) but mostly thinks they are some of the most beautiful and fascinating creatures on Earth. Ann helped edit two books about the ocean for grown-ups: *Oceans: Heart of Our Blue Planet* and *Underwater Eden: Saving the Last Coral Wilderness on Earth*. She is the author of five novels for young readers and *Elephant Talk*, a book about the ways elephants communicate. Follow the Shark Baby at facebook.com/sharkbaby2013.

Award-winning children’s book illustrator Shennen Bersani has two million copies of her illustrated books cherished and read by families throughout the world. She works primarily with colored pencils, sometimes using a mixed-media technique of colored pencils, crayon, and paint. Her art delivers a unique blend of realism, heartfelt emotion, love of nature, and life lessons for children of all ages. In addition to *Shark Baby*, *Home in the Cave*, *The Glaciers Are Melting!*, and *Astro: The Steller Sea Lion* for Arbordale, Shennen has illustrated a number of best-selling books, including, *Snakes: Long, Longer, Longest*, *Sharks: Big, Bigger, Biggest*, *Ocean Counting: Odd Numbers*, *Icky Bug Shapes*, and *My Sister, Alicia May*. Shennen lives with her family near Boston. For more information, visit her website at shennenbersani.com.
In a world of stripes and shadows, where the seahorses played, Shark Baby was rocking, rocking in the arms of Mother Ocean, tied fast to a strand of kelp.

For a while he could do somersaults in his egg case. That was fun. But now Shark Baby was too big to turn around. Besides, he wanted to know what was outside in the wide, blue ocean.
What kind of shark am I? he wondered. But squirm as he might, he could only see the tip of his tail. He asked Mother Ocean, but she would only rock him, and say *hush, hush.*
That night Mother Ocean brewed up a storm, and she rocked that baby a little too hard.

*Snap!* The egg case broke loose, and Shark Baby went tumbling and rolling in the rough, wild current.

That current was cold and that current was strong! It whirled Shark Baby and it hurled Shark Baby and it roared in his ears. It bounced him off rough coral and dragged him along the sandy bottom.
But at last the wild, blue current roared itself out, and Shark Baby’s egg case came to rest.

All the tumbling and rolling, whirling and twirling had made a tear in his egg case. Now Shark Baby could see! And he saw . . . spots!
Sharks

Fish come in all different shapes, colors, and sizes. Some fishes have hard bones as we do. Other fishes, like sharks and rays, don’t have any hard bones at all! Their skeletons are made up of cartilage—the same stuff that forms our noses and ears.

Sharks usually live in saltwater (marine) habitats. While some sharks swim up rivers, they do not normally live in lakes.

Many sharks are crepuscular, meaning they hunt at dawn and dusk. If swimming in the ocean, it is best to stay out of the water at that time.

Some sharks eat fish, seals, sea lions, and even whales. Some eat plankton! Others, like the swell sharks, eat clams and crabs.

Contrary to what many people believe, sharks do not hunt humans. Shark attacks are usually sharks “checking out” what food might be available. Or, like many other animals, they may attack people if they feel threatened.

Sharks may be at the top of the ocean food web, but humans are their biggest predators. Because millions of sharks are killed by human fishing, fewer survive to adulthood to have babies of their own.

1. Great white sharks often “test-bite” unfamiliar objects, such as buoys, flotsam, surfboards, or strange prey, in order to identify them.
2. Horn sharks sometimes stand on their heads to pry prey loose from underwater rocks.
3. During the day, nurse sharks can be found resting in groups, tucking themselves into crevices or under overhangs in the reef. They leave the group to hunt alone at night.
4. Hammerhead sharks have a special sensory organ under their “hammer” that can detect electric fields. This helps the shark find prey hiding behind rocks or under sand.
5. To escape danger, swell sharks puff themselves up with water so they are twice their size. This makes it harder for predators to bite or pull swell sharks from rocky holes.
6. Pajama sharks (also called striped catsharks) are dressed for bed. They spend their days sleeping in rock crevices or among kelp and hunt at night.
Birds, most reptiles, many insects, and even sharks and other fish hatch from eggs! Bird mothers build nests and care for their eggs and young. Many other animals lay eggs and leave. The young will hatch and then survive on instinct.

Sharks, skates, and rays are all "cousins." Some sharks hatch from eggs inside their mothers’ bodies. Rays and some sharks give birth to live young. Other sharks and skates lay egg cases that are often found on beaches. The cases, nicknamed “mermaid purses,” remain tough and rubbery long after the pups hatch.

Some shark egg cases have long, thin structures (tendrils) that attach to an object. Egg cases can be tough and rubbery, like a shark egg case, or rigid and hard, like a bird’s egg shell. Both protect the unhatched animals growing inside.

How are these egg cases alike and how are they different?

Compare and Contrast Egg Cases

Swell shark egg cases measure up to 12.5 cm long. How many inches long is that?

Pajama shark egg cases measure up to 9.5 cm long. How many inches long is that?

Chicken egg cases (shells) measure up to 5.5 cm long. How many inches is that?

Sharks True or False?

Do you think these shark statements are true or false? Answers are upside-down, below.

1. Sharks are bloodthirsty, man-eating killers. 2) False! Humans are not sharks’ natural prey and most accidents are cases of mistaken identity.

2. All sharks are powerful hunters with big, sharp teeth. 2) False! It’s true that many sharks are top predators (animals that prey on animals). But there are many different kinds of sharks, not all of them have big, sharp teeth. The whale shark is a gentle giant that filters tiny plants and animals (plankton) from the ocean. The Port Jackson shark has bony plates in its mouth to crush clams and crabs.

3. Sharks are mindless eating machines. 3) False! While it’s hard to study sharks in the lab, we know they have large brains. Many aquariums have trained their sharks to feed from specific targets. They may need those large brains to cope with life in the ocean and their dealings with other sharks. Scientists are working to learn more about what goes on in shark brains.

4. Sharks have to keep swimming to breathe. 4) True and false! Sharks breathe when oxygen in seawater passes over their gills. Most sharks need to swim to keep water flowing through their gills. But some sharks have special structures that pump water over their gills while resting on the ocean floor.

5. When you see a fin sticking out of the water, it’s a shark. 5) False! Fins above the surface could belong to dolphins, whales, or even sailfish.

6. Sharks have teeth on their skin. 6) True! Sharks are covered in tiny tooth-like scales called denticles. Denticles give their sharkskin its rough, sandpapery feel.

7. Sharks are a serious danger to people. 7) False. Humans kill tens of millions of sharks every year just for their fins to make shark-fin soup. Millions more sharks die when they are caught in fishing nets or when we grind them up into useless pills to “cure” cancer. In 2011, only 75 people around the world were bitten by sharks and 12 died. Sharks have more to fear from us than we have to fear from them!

8. Sharks have superpowers. 8) True! Sharks have senses that we humans don’t share, kind of like shark superpowers. Just as the superhero Spider-Man™ has spider sense, sharks have a special shark sense that helps them detect the faint electrical signals given off by their prey. They have good hearing and a great sense of smell, too.

9. Sharks live in every ocean of the world. 9) True! Sharks are found from tropical reefs to cold, polar oceans. But they tend to be found in special places within each ocean where they find what they need to eat and have baby sharks.

10. Sharks need your help. 10) True! Sharks have been swimming Earth’s oceans for millions of years, but some species are in danger of going extinct due to habitat loss and overfishing. Sharks play an important role in maintaining healthy ocean ecosystems. Losing one shark species can cause problems for other ocean life, too. Sharks eat tiny animals and plants (plankton) and keep the ocean food chain in balance. They also eat fish, which keeps the bigger fish from eating smaller fish. They are predators in the ocean’s food web. Losing sharks would mean losing part of the ocean’s habitat. The Port Jackson shark has bony plates in its mouth to crush clams and crabs.

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To Wren, for her friendship and inspiration. Thanks to Harry Breidahl of the Marine Education Society of Australia for supplying actual shark egg cases for me to examine—AD

While doing research for the illustrations, I visited the New England Aquarium in Boston, MA; swam with the manatees of Crystal River, FL; and visited the Monterey Bay Aquarium in Monterey, CA; the California Academy of Sciences; and the Aquarium of The Bay—both in San Francisco, CA. I especially want to thank Captain Ché Ruble and his wife, Katie, for providing me with their own manatee photos after the water was too murky for me to get my own, Jim Fuller at the Monterey Bay Aquarium, Nan Sincero at the California Academy of Sciences, and Ora Zolan at the Aquarium of The Bay. Once again, none of these adventures would be possible without the support of my loving family. Muchas gracias—SB

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“Shark Baby is a beautifully illustrated and written tale of a brand new baby shark who goes on a search to find out what kind of shark he is. As he’s hurled about on a stormy ocean current, the reader meets other types of sharks and ultimately learns Shark Baby is a swell shark—one who, when feeling threatened, gulps in a great deal of water to swell up to twice his size. Following the story is a wonderful workbook that teaches children various facts about different types of sharks and will encourage some future marine biologists. This will be a great read for any child.”

Gregory S. Stone, Ph.D., Executive Vice President, Global Marine and the Moore Center for Science Conservation International

Includes 4 pages of learning activities.
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