

## **The Roar of Tides**

*by Jennifer Stevens*

The Bay of Fundy offers one of the most magnificent ecological phenomena of Nova Scotia. A remarkable display of the highest tides on Earth occurs here daily. There is actually more water flowing in and out of the Minas Basin at mid-tide than flows from all the rivers and streams in the world! Although the gravitational pull of the sun and moon significantly affects tides, the extraordinarily high Fundy tides are caused by the geographical

location and unique shape of the Bay as well as by the resonance of the Bay of Fundy-Gulf of Maine system. Approximately 290 kilometres long, the Bay of Fundy is funnel-shaped, gradually narrowing until it splits to form Chignecto Bay and Minas Basin, the western and eastern extremities, respectively. The movement of huge masses of water in this area cause large currents called rip tides that reach over 15 meters high around peninsulas such as Cape Split.



**Low tide in the Bay of Fundy, from the end of Cape Split, exposes algae covered rocks worn smooth by the tidal currents.**

The erosive effect of billions of tonnes of sea water moving in and out of the Bay of Fundy twice every 25 hours has sculpted much of the land in that area into spectacular cliffs and caves. One such structure, Cape Split, provides a spectacular view of one of Nova Scotia's most famous rock formations. Jutting out near the entrance to Minas Basin, the tip of this hook shaped peninsula is only accessible by boat or by following a 16 kilometre hiking trail. It takes approximately four hours to complete the entire trail by foot and for a considerable distance a hollow roar emanates through the forest on the towering cliffs. Referred to as "voice of the moon", this haunting sound is emitted by the turbulent waters surging over the ridges below and is best heard near mid-tide. Regardless of how you choose to reach the pinnacle of Cape Split, the same panoramic scene is revealed; a stunning cliff-top view of the Bay of Fundy, 300 feet above the ocean.

Although there are so many amazing places to visit and marvels to observe in Nova Scotia, the four-storey high tides that fill the Bay of Fundy twice each day have gained a world-renowned reputation.

*Jennifer Stevens has a biology and environmental science background.*

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