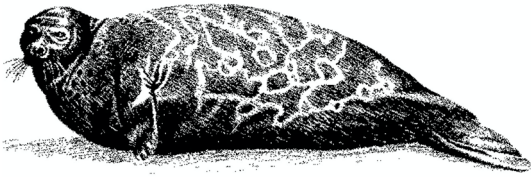


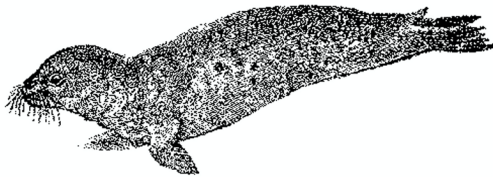
East Coast Wildlife Guide

MARINE MAMMALS



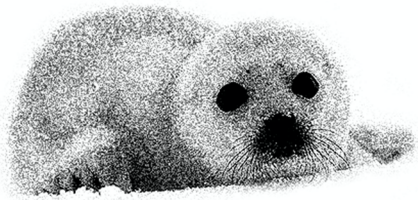
The **ringed seal**, or **natsik** has light rings on the back of its stout grey body. It ranges between 1.2–1.6 metres in length and weighs around 50–110 kilograms. The ringed seal is a year-round Arctic resident. It is found on fast ice in coastal areas where it maintains breathing holes and snow lairs

throughout the winter. It is also found in pack ice, but in lesser density. Females give birth to a single pup every year or so in a snow lair around late March or early April. The pup suckles for about two months or until the ice breaks up. In spring, ringed seals bask in the sun near their breathing holes or at the edge of the ice. Ringed seals are the main prey of polar bears, which break into their winter snow lairs and stalk them on ice. They are also an important food source for the Inuit.



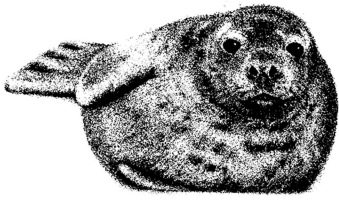
The **bearded seal**, or **udjuk** is often a loner that prefers drifting pack ice and shallow open water. It feeds on anything it can find on the sea floor, like shrimp, clams, crabs, whelks, and small fish. The bearded seal gets its name from its characteristic long white whiskers, which resemble a great moustache. Bearded seals are around 2.1–2.4 metres long and have a mass ranging between 200–250 kilograms. Their long

stalwart body, square flippers, and small head veiled with long white whiskers make the bearded seal quite distinct. Inuit whips and kamik (boot) soles are made of their tough but flexible hides.



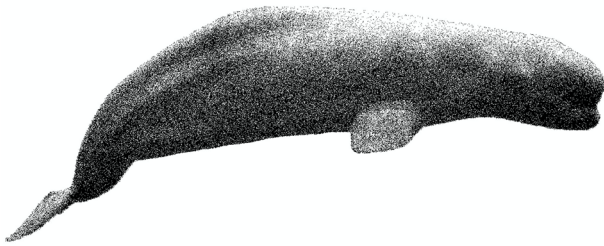
The **harp seal**, or **kaigulik** is a social animal, often seen in large herds in summer in the Arctic, swimming vigorously in relative unison. Dark harp patterns decorate mature seals' light-coloured backs. The Newfoundland/Gulf stock of harp seals travels from their summering area in the Canadian Arctic and Greenland to their breeding grounds in the pack ice

off the north coast of Newfoundland and in the Gulf of St. Lawrence. The pups, which are born on the pack ice in March, are completely white, weigh about 135 kilograms and grow to about 1.7 metres.



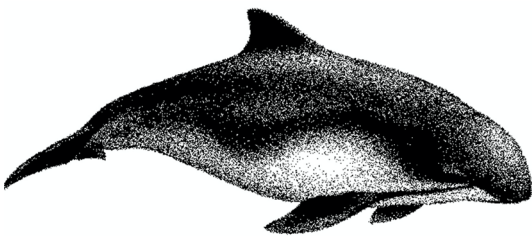
The **harbour seal**, or **kassigiak** has a dog-like face with v-shaped nostrils. Its size and weight averages 1.5 metre and 80 kilograms. Harbour seals can vary from dark grey with white blotches to white with dark spots—and all shades in between. Some harbour seals also look sandy or brown coloured. Harbour seals are more common in sub-Arctic and temperate waters of the North Atlantic and Pacific.

The **grey seal**, or **apa** is a large seal with a pronounced snout, from which it gets its local nickname “horsehead”. Adults range in size between 1.5 and 3 metres, with males being larger than females. They weight between 100 and 450 kilograms. The horsehead is the most common seal year-round around Newfoundland, the Gulf of St. Lawrence, and the Maritimes. The largest colony in the world is at Sable Island, and numbers around 400,000 seals. Grey Seals are also fairly common in the United Kingdom and Iceland. They are relatively sedentary, staying close to their haul-out sites most of the time. Some individuals may travel several hundred kilometres but generally their movements are over shorter distances.



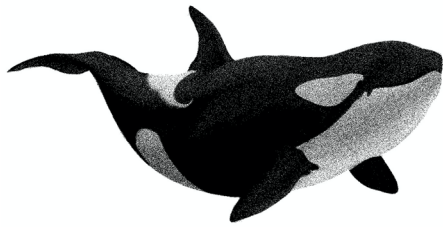
The **beluga**, **white whales**, or **kialugak** grows up to 4 or 5 metres in length and can weigh up to 1–1.4 tons, depending on the population. Belugas from the more southern populations are of smaller size. It has broad flippers, a bendable neck, and a thickset body that lacks a dorsal fin. Young are grey and adults, pure white. The animals are sometimes dubbed sea canaries because of their loud penetrating cries and whistles. In summer,

these gregarious whales cluster together in estuaries, and sometimes up large rivers. During that time, they feed little but, at other times of the year, they prey on schooling fish such as Arctic cod, capelin, and sand lance.



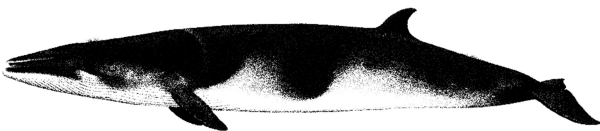
Harbour porpoises are the smallest cetacean species in the North Atlantic and Arctic waters. They measure on average 1.4–1.6 metres and weigh a mere 45 –60 kilograms; the females are larger than males. They have a black back and flippers, grey flanks and a white belly and throat. Their back is topped by a distinctive triangular dorsal fin. They can be seen alone but often form groups of two to twenty and sometimes

herds of a few hundred are seen in areas where prey is aggregated.



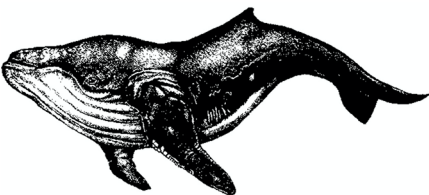
The **orca**, **killer whale**, or **aarluk** is the largest species of the dolphin family. It is stocky, with highly contrasted white patches over an otherwise black or dark grey body. Killer whales have large, erect dorsal fins, particularly the males. They measure on average between 7–8 metres and weigh 3.5–5.7 tonnes, with adult males larger than the females. Killer whales are social animals that travel in pods of two to twenty-

five individuals. They are found in all oceans of the world but, being a top predator of the seas, they generally occur in lower numbers than other dolphins. Some orcas are fish-eaters and other hunt marine mammals. They have occasionally been seen in the Canadian high Arctic and they are regularly seen near west Iceland.



Minke Whales from the Northern Hemisphere are the smallest of the rorqual whales (Balaenopteridae): whales with expanding throats. They reach 7–8 metres in length and weigh only 5–6 tonnes. Their back is dark grey to black, while their sides and stomach have white shadings. They have a distinct

falcate dorsal fin seen immediately after it blows when surfacing. Minkes feed mainly on capelin, but take also other small schooling fish (such as cod, sand lance, and herring). They are often seen alone or in groups of two. The killer whale is their main predator.



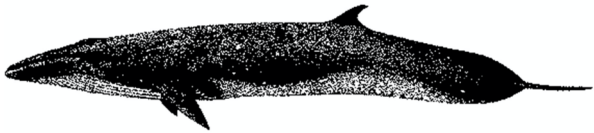
Humpback whales, also rorqual whales, have a dark grey 13-metre body that weighs 25–30 tonnes. The throat, flukes, and flippers have white colourings, and their flippers and rostrum are covered in knobs. Set back towards the tail are long flippers and a humped dorsal fin. Humpbacks are often seen alone or in groups of up to ten, but have been seen in much

larger groups (up to one hundred animals) during migrations. They feed mostly on schooling fish like capelin, sand lance, and herring, but also like to take krill. When feeding, they can form a 'net' of bubbles around their soon-to-be meal before their kill. They summer in Greenland, Iceland, Norway, and Baffin Island, migrating to spend their winters in the tropics. Humpback whales have been protected since 1964 and are making a slow but steady comeback; their relatively slow travelling speed and tendency to follow coastal waters made them an easy target for early whalers.



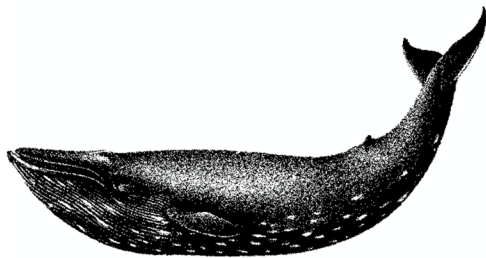
The **fin whale**, the second largest of the rorquals, has a characteristic black left jaw, and a white right jaw, lip and baleen. The long slim dark grey to brown 17–18 metre body

has shades of grey or white on the underside of the flukes and belly. There is often a grey chevron behind the head. Capelin and small herring schools are the main dishes of the fin whale's menu in some areas, while in other areas, it feeds mostly on krill. These whales are often seen alone but travel in small pods of two to three. They may be seen in larger groups in feeding areas.



Sei whales, or **tikaagulliusaaq** are long, slim rorquals. They can easily be confused with fin whales from a distance—but seen up close, they lack the white on the lower right lip and baleen. Also, unlike the fin whale, their dorsal fin, which is less curved, is usually visible almost immediately after the first

surface blow. Sei whales are also smaller. Adults measure about 13–14 metres and weigh around 12–15 tonnes with females being larger than the males. They have a pale grey belly and a dark steel-grey body, which is sometimes covered in pale oval markings from lamprey bites. Sei whales usually form in groups of two to five but may herd in larger numbers in feeding areas. There are probably only a few thousand sei whales in the North Atlantic presently. They are not commonly seen but, on occasion they have been spotted along Greenland coasts and around Iceland in summer or fall.



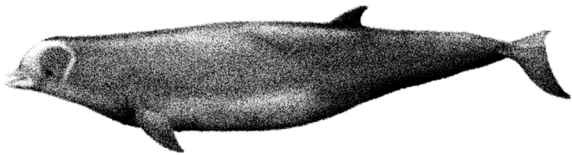
Blue whales are the largest of the rorqual whales. They are also the largest of any known animal, living or extinct, on the planet. In the northern hemisphere, they grow to a length of about 25 metres and weigh between 80–120 tonnes. Towards the end of the back is a triangular dorsal fin, which can be easily missed because of its small size (and because it appears only towards the end when the whale rolls at the surface). The

blue whale has a wide and flat head with black baleen. Its blow is slim and very high, reaching up to 9 metres. Their diet consists almost solely of krill, and they can consume up to six tonnes of it per day during the feeding season. There are only a few hundred blue whales in the north Atlantic.



The sperm whale is a large-toothed whale, brownish-grey to dark brown. Females grow to about 11 metres and males to 15 metres; they weigh 15 to 30 tonnes. The sperm whale has a single blowhole towards the front left of its distinctive square head. Approximately two-thirds down the body from the head is a triangular dorsal hump. Sperm whales are deep divers and can remain submerged for almost an hour. After long dives,

they may stay at the surface to breathe for an hour or more. Squid comprise the majority of the sperm whale's diet. There is mounting evidence that they even prey on the giant squids, *Architeuthis*. They also take schooling fish. In summer, large males migrate to sub-polar and polar latitudes while females and young remain in temperate and tropical waters. These bull males generally are found alone. Sperm whales were hunted commercially in previous centuries, mainly for their spermaceti oil, which was used for oiling fine machinery. Ambergris, which is found in the lower intestine and stomach, was also used in perfume composition.



Northern bottlenose whales are large-beaked whales with a pronounced fatty forehead and a beak shaped like that of a bottlenose dolphin. Their colouring is brown to grey, with their head colour lighter in mature males. The bottlenose's forehead or "melon" is high and blunt and the male has two

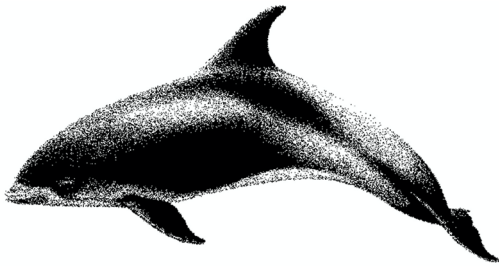
protruding teeth near the tip of the lower jaw, while the female's teeth remain implanted in the gums. These lower jaw teeth and long beaks are distinguishing feature of the Beaked whale family (Ziphiidae). Adults measure about 7–8 metres and weigh 4-6 tonnes. The Northern Bottlenose Whale ranges in sub-Arctic and Arctic waters of the North Atlantic, including Baffin Bay, Davis Strait, the Labrador Sea, the Norwegian Sea and the Greenland Sea. They are occasionally spotted near The Gully of Nova Scotia, in Davis Strait, and around Iceland.

The **northern right whale** is a large baleen whale that has a rotund black (or dark brown) finless body, with a large head covered in light patches of rough skin, called "callosities". Its head is about one quarter of its total length. Adults average 15 metres in length and weigh around 55 tonnes. Adult females are generally larger than males. These whales are rare and endangered. There are fewer than five hundred left in the Northwest Atlantic. They are usually seen in the Bay of Fundy and offshore of southern and eastern Nova Scotia, but they have recently been seen to reoccupy part of their historic range in the Gulf of St. Lawrence. Observations have been recorded between the Gaspé Peninsula, Prince-Edward Island, and the Magdalen Islands. They ranged on the European side of the North Atlantic, but sightings are exceptionally rare nowadays. They were named "right" whales by past whalers because they were the right ones to hunt; they were slow and they yielded a lot of fat that was rendered into valuable oil. They were also known as Biscayan right whales, after the Bay of Biscay of France and Spain, where they once roamed.



Long-finned pilot whales are also oddly-shaped dolphins. They have a long robust body with a wide falcate dorsal fin set one third down the body length. It has long tapering pectoral fins and a bulbous melon (fatty forehead), from which they get their nickname, "potheads". They have a bulbous forehead, a wide falcate dorsal fin and long pointed

flippers. Adults measure about 4–5.5 m (13-18 ft.) and weigh about 1–2 tonnes, males being larger and heavier than females. They are almost always in large groups ranging from a dozen to over a hundred individuals and sometimes form herds of over a thousand. They sometimes associate with other dolphins, such as the white-beaked or white-sided dolphins. They are a deep-water species, but will chase their fish or squid prey inshore from mid-summer to early fall. They are regularly seen in eastern Newfoundland, Labrador, southern Greenland, Ireland, the UK, the Faroe Islands and southern Iceland.

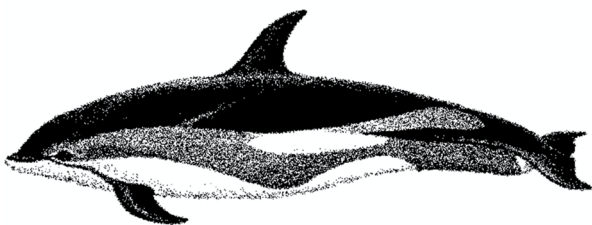


White-beaked dolphins are decorated by a black body with a grey saddle behind the tall curved dorsal fin and a light grey or white stomach. They also have a blaze of greyish streaks starting in front of the dorsal fin and running along the flanks. They grow up to about 2.75 metres. Despite their name, the beak of that species is grey coloured in North American waters. The European ones, on the other hand, have a white

beak. Octopus, squid, cod, haddock, herring, and capelin crustaceans are its main prey. This dolphin is often in pods of several tens of individuals; herds of several hundred are sometimes observed.

Short-beaked common dolphins have a dark grey back and fin and an hourglass pattern on their sides, formed by a long yellowish patch from head to mid-body and a light grey patch further back. Adults measure about 2 metres in length and weigh about 120 kilograms. In the North Atlantic, common dolphins are most abundant in warm temperate waters of the Gulf Stream, reaching as far as north as southeast Norway. They are occasionally seen offshore southeast of Newfoundland and Nova Scotia in summer. They are quite common in the Celtic Sea. Common dolphins often travel in pods of 10–30 animals but can form herds that number in the hundreds, or even thousands.

The **striped dolphin** is an oceanic dolphin of a similar size to common dolphins, easily distinguished by the forward-pointed dark blue blaze below the dorsal fin and thin stripes across its clear flanks. It is an offshore species common to temperate and tropical waters. Adults measure about 2.5 metres in length and weigh about 155 kilograms. It forms large groups of 25–100 individuals and may be seen in larger groups of several hundreds to thousands of individuals. The striped dolphin is abundant in the North Atlantic, but its densities are much lower in the northern parts of its range. It is only rarely seen offshore of Nova Scotia and of Ireland and the British Isles.



Atlantic white-sided dolphins have a sharply contrasted body with black back, flippers, upper jaw, and tail, a white stomach and lower jaw and sides with sharp stripes of white, pale grey,

and ochre. They are about 2.3 metres long and are usually found in pods of three to ten; these pods often merge to form herds of several tens to several hundreds. They may be found amongst fin and pilot whales in feeding areas. Squid, shrimp, and schooling fish such as capelin, herring, and sand lance are the main components of their diet. They are usually found offshore but in summer they may follow their prey inshore and even enter bays.

The **bottlenose dolphin** is a large dolphin that is widely known for aquarium displays and the TV show *Flipper*. Compared to other dolphins, it is relatively uniform in colour, with a smooth transition from a darker back to lighter underparts. It harbours its signature “bottle nose”, a short, thick beak protruding in front of its fatty forehead. Adults measure about 3 metres and weigh around 400 kilograms. Bottlenose dolphins are a common offshore species in temperate and tropical waters. They can be found off of Nova Scotia and in Irish and U.K. waters. In addition, there are several coastal populations in Ireland and the U.K. Two well-studied populations occupy the estuaries of the Shannon River in Ireland and the Moray Firth in Scotland.

Risso’s Dolphin, a.k.a. **Grampus**, is an odd-shaped dolphin with a robust body, a large fatty forehead and an indistinguishable beak. Adults are grey with numerous white scars all over the body, presumed to be the result of social interactions. They measure about 3 metres and weigh around 400 kilograms. These oceanic dolphins are more numerous in warm waters, such as the Gulf Stream, and they prefer deep water. They are only occasionally seen off Nova Scotia and are uncommon around Ireland and the U.K in summer.

LAND MAMMALS



The George River **caribou** herd moves between the boreal forest and the tundra in Quebec and Labrador. It is the largest herd in Canada, numbering approximately 500,000 animals. The caribou’s main food source is lichens, plentiful in the tundra.

The caribou is the only member of the deer family in which both sexes are antlered. Females found on Newfoundland’s Avalon Peninsula are an exception, however.

Black bears in Newfoundland eat more meat—especially moose and caribou—and less plant material than black bears in other parts of North America. This is due to the relative lack of nutritious plants in Newfoundland and Labrador.

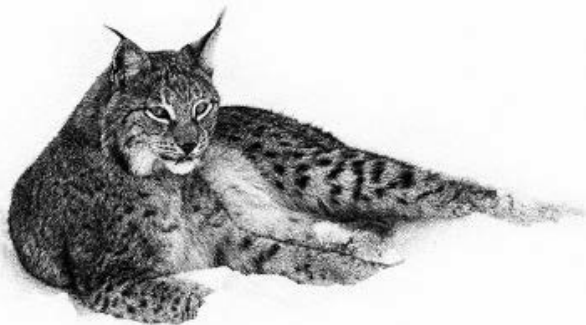
Labrador's black bears tend to be smaller than their southern relatives. Those found north of Nain struggle against a harsh climate and a short summer season, growing slower and reproducing less frequently than other black bear populations. They eat a variety of foods including leaves, berries, grass, fish, insects, and small mammals.



Black bears mate in the summer. After mating season, they build up a thick layer of fat in preparation for the winter. The bears choose sheltered dens such as caves, large hollow logs, and wind-fall for overwintering. Black bears are not true hibernators; their body temperature remains high and they can be fairly easily roused from their winter sleep.

In late January or early February, the mother gives birth to one to three (usually two) tiny cubs. In late March or April, the cubs, each weighing about three kilograms, emerge from the den with their mother. They remain together until early fall, when the young are weaned. The bears then lead solitary lives, with the young reaching adult size at the age of five or six. Black bears are found throughout the province, except for the Avalon Peninsula.

The **lynx** is a member of the cat family, with a short body and long legs, and is often distinguished by its tufted ears and short, black-tipped tail. It is well-adapted for snowy habitats with a thick coat and large, snowshoe-like feet. In the winter,



the snowshoe hare makes up most of the lynx's diet. One lynx may consume up to two hundred hare in one year. Until the introduction of the snowshoe hare in the lynx supplements its diet with various rodents and birds such as voles, squirrels, grouse and sparrows. The lynx is nocturnal, and will often hunt at night, using its sight and hearing to silently stalk and ambush its prey.

Populations will peak approximately every ten years, shortly after hare populations cycle to a maximum. When hare numbers are low, the lynx supplements its diet with various rodents and birds such as voles, squirrels, grouse and sparrows. The lynx is nocturnal, and will often hunt at night, using its sight and hearing to silently stalk and ambush its prey.



The **red fox** (**kajuqtuq** in Inuktitut, **kajuk** in Inuttut), as its common name indicates, is often red in colour, but there are colour variants, such as the silver, grey, and dark brown morphs. Nevertheless, they all have a distinctive white-tipped bushy tail. Adults measure 1 to 1.2 metres and weigh 2.7 to 7.2 kilograms; males are slightly bigger than females. Red foxes have long ranged over much of the continental northern hemisphere in both North America and Eurasia and is also found in the U.K and Ireland. About fifty years ago, they arrived on Baffin Island and have expanded northward up the island. They are secretive and generally stay hidden from view. They are more likely to be seen in early morning or at dusk,

especially when they are hunting rodents in open areas.

Grey wolves, or **amaruq** are large and powerful canids that live in groups (packs) which may contain from 2–16 members, although 4–7 is the most common. Large groups of 30–40 wolves have been recorded. Adults measure average 1.5–1.7 metres and weigh between 18–40 kilograms; males are bigger than females. The largest wolves in Canada live in the northwest, and the smallest are found on the Arctic islands. Wolf colour varies from pure white to black, with accompanying shades of cream and brown. White is the most common colour on the Arctic islands, while on the mainland the majority of the wolves are grey or darker. Their range once covered the whole of Canada, most of the U.S.A and Eurasia and the Middle East, but it is now limited to less populated and mountainous areas of mainland Canada, the Arctic Islands, North Greenland and Northern and Central Asia. There are some recovery successes in parts of Europe, with in parts of Europe, but they are absent from Ireland and the U.K. They are occasionally spotted during cruises in the barren grounds of Nunavut or in the Arctic Islands.



The **marten** is a part of the Mustelidae family, which also includes otter, skunk, mink and weasel (among others). The pine marten found in Newfoundland is a unique subspecies, isolated from the rest of the population in Canada and the northeastern range of the United States. It is suspected that they have resided on the island since the last glaciation, over ten thousand years ago. The Newfoundland pine marten is listed as threatened; perhaps as few as three hundred remain on the island. The marten is about the size of a house cat—45-65 centimetres in length—with a long,

slender body; small head; pointed muzzle; large, rounded ears; and dark brown eyes. In Labrador and northern Ontario, where marten are still relatively common, they are trapped for their valuable pelts.



The **river otter** is native to both Newfoundland and Labrador. Found in deep, clear lakes, rivers, marshes, and ocean bays, otters are free from most predators, but will occasionally be prey for wolves or coyotes if they are on land. Their characteristic motions of extending their necks high above the surface while treading water, and their famous playful nature make them a delight to observe.

The largest rodent in North America, the **beaver** has been one of Canada's national symbols since the early days of European exploration, when their thick, warm pelts were coveted for hats. An excellent engineer, the beaver makes its home "lodge" and dams out of sticks and mud. The dams are built across slow-moving streams and rivers to create bodies of water deep enough to prevent freezing, allowing year-round access to stored food and the family dwelling. They feed on the bark, leaves, twigs, and buds of deciduous trees, as well as aquatic vegetation, and lily roots. Before winter, the beaver gathers food to hide in a cache in deep water near the lodge.



Beavers are industrious workers and have been witnessed clearing vast tracts of forest. They boast surprising strength for their size and can drag felled trees many times their own body weight. The beaver is known for its large, iconic tail, which it uses as a rudder while swimming. The tail is also used as an early-warning system against predators; when threatened, the beaver will slap its tail against the surface of the water, producing a sharp report that alerts other beavers to danger.

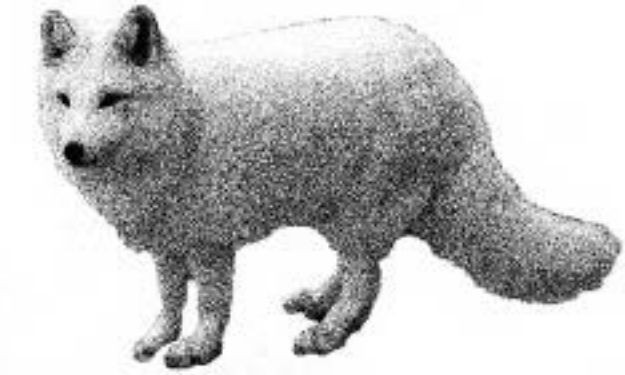
Although **moose** are not indigenous to Newfoundland, since being introduced to the island (in 1894 and 1904) they have thrived and now outnumber caribou, their fellow ungulates, with a population that may exceed 150,000.



The largest member of the deer family, the moose is an iconic animal, with its humped back and enormous size: they may stand up to three metres at the shoulder, and weigh up to eight hundred kilograms. Mature males form fearsome palmate antlers (often called a 'rack')

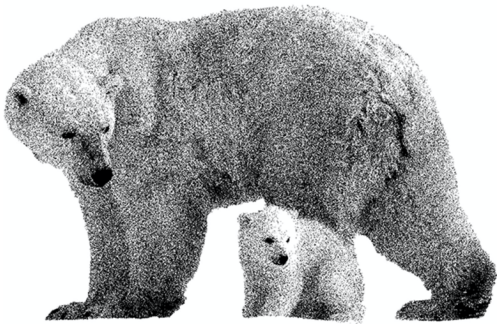
annually, which can spread up to six feet. These are shed in the fall. Female moose do not grow antlers.

The **white-tailed deer** is a medium-size reddish-brown deer with white eye-rings, throat, and belly. The underside of its tail is also a bright white; it holds that tail high when it runs away, hence the name. Males have multi-spiked antlers which are covered in skin, termed velvet, in summer while these antlers grow. Adults measure about 1.6-2.2 m (5.3-7.2 ft) and weigh about 57-170 kg (126-375 lb); the males are larger than the females. White-tailed deer are quite common in Eastern Quebec and the Maritimes, particularly in agricultural areas, but they are hunted so they will often remain hidden in woodlands during the day, preferring to come out to feed in the open at dusk.



Arctic foxes live year-round on tundra throughout the Arctic region and south into Labrador, but not on the island of Newfoundland. Their fur grows grey-brown in summer, blending well with tundra rocks and vegetation; blue-grey or white winter fur blends into the snow. Arctic foxes prey mainly on hares, birds and lemmings. They breed in April and produce litters of up to five or six. In good seasons, they may go on to raise a second litter before the end of the summer.

Arctic foxes live by their wits, foraging singly or in pairs and taking a variety of foods. Birds and their nests, voles, mice or lemmings dug from the snow, soil beetles, worms, and carrion are all acceptable. On the coast, they scramble on bird cliffs, eat seal droppings and placentae, and patrol the shores for whatever the sea washes in, from plankton to dead fish. They scavenge after larger predators— especially polar bears and wolves—picking over the carcasses they have left and storing away surplus food for later sustenance. Readily drawn to trap lines baited with carrion, Arctic foxes are the prized by trappers for their white winter pelts.



Polar bears are the largest living land-based carnivore in the world. The hide of an adult male can reach nearly 3.5 metres in length—about the same as a compact car. The largest males can weigh up to 800 kilograms. Its shape, with a streamlined head and body, reflects its adaptation to swimming, and accounts for its Latin name, *Ursus maritimus*, 'bear of the sea'. The front legs and paws do the paddling, and the hind legs serve as a rudder. In fact, the polar bear is so much a creature of the sea that, in the

United States, it is protected by marine mammal legislation, which also covers whales and seals.

Polar bears are also built for the cold. Their coarse outer fur is made up of translucent hairs, which allow ultraviolet radiation in. The fur also serves as a wetsuit, trapping heat while the bear swims. Thick, insulating hairs surround their paws, and small, rounded ears minimize heat loss. A dense, woolly underfur provides added insulation to the body, as does a layer of fat up to 10 centimetres thick.

All these features work perfectly in the winter, but in the summer they become problematic: overheated bears may die of heat exhaustion, especially if they overexert themselves. To compensate, polar bears pant like dogs, losing heat through the black skin of their tongue and lips, and through their ears, footpads, and snouts.

Polar bears have a relatively low reproductive rate: females do not reach sexual maturity until 4–6 years of age, and then breed only every third or fourth year. Males reach sexual maturity between the ages of five and ten. The common litter size is two cubs, but only 30–50% reach the age of two, and by certain estimates, only one bear in ten will live twenty-five years and fulfill its life expectancy.

Polar bear mating season is in May. At that time, the egg implanted in the female is fertilized, but does not in fact begin to form a foetus until September, and then only if the bear is healthy. A pregnant polar bear will dig a maternity den in a heavy snow bank on land towards the end of October in anticipation of her cubs' arrival in December. Young females often build their dens in the area in which they themselves were born.

Other male or female adults occasionally build dens for shelter during the worst of the winter weather. During pregnancy the bears fast for up to eight months, absorbing the nutrients from their own body fat. By March, the polar bear family emerges from its den and moves onto the sea ice. The cubs will stay with their mother for at least two and a half years, until they have learned to fend for themselves—but some stay as long as four.

The spring is the polar bears' most active time, and it is largely devoted to the seal hunt. By far the most important prey for polar bears is the ringed seal, although they will also eat bearded, harp and hooded seals, as well as walruses, beluga whales and narwhals. They often catch the seals by "still" huntin", which involves lying next to a seal's breathing hole in the ice, waiting for a seal to emerge. Once the victim pops its head out, the bear uses its massive canine teeth and large, well-clawed forepaws to grab it. Or they might swim underwater close to the edge of open leads, surfacing at the spot where they think a seal might be poised to dive in. They also use their keen sense of smell to stalk seals across the ice and sniff out seal dens ('aglus') to kill the pups within. Bears have even been observed using chunks of ice as a tool to kill seals or even walruses.

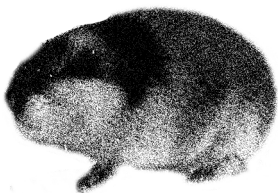
The most nutritionally valuable part of the seal to the polar bear is the blubber (fat). So much so that the bears sometimes leave the rest of the seal carcass uneaten. These are generally promptly devoured by the Arctic foxes which trail the bears for this very reason. Polar bears can eat as much as 4.5 kilograms of seal fat and meat a day, though they need at least 2 kilograms to survive. The polar bear's stomach can hold a gargantuan 20% of their total body weight, allowing them to store up food reserves in times of plenty. They can travel great distances over land or ice, and can swim up to 135 kilometres at a time. Bears with their cubs have been seen on the offshore pack ice in the middle of Baffin Bay, 335 kilometres off the coast of Baffin Island.

Polar bears spend their summers on the fast ice or they may land at traditional retreats to den in the remaining snow banks or loaf about on shore. With a successful spring hunt, they have a good stock of fat and generally don't need much to eat. They may fast or may occasionally eat sea birds (mainly waterfowl), eggs, small rodents, grasses, berries, mosses, algae, and even seaweed. They will also eat carrion—particularly whale carcasses—and garbage in camps or settlements. The one thing they do not usually eat is fish.

In the fall, as the ice forms, the bears will move off the land and onto the ice, leaving the pregnant females to dig their dens. The seal hunt begins again and continues through the winter.

Polar bears are not naturally aggressive against humans, but will attack if they feel threatened. Worldwide, there are an estimated 30,000 polar bears, half of which live in Canadian territory. Theirs is not an endangered species, but is nonetheless highly protected by wildlife conservation legislation. In Canada, only Inuit and Indians are legally allowed to hunt polar bears, and they do so within an overall quota system. In the Northwest Territories, a limited number of hunting tags are distributed to communities each year. Native hunters may allow some of their tags to be used by a non-native person on an Inuit-guided polar bear hunt. The price for polar bear hides is \$1,000–\$2,500, whereas the guided hunts can fetch \$18,000–\$20,000 each for the resident with the polar bear tag.

The incentive is obviously there, but there is a good deal of honour and tradition still associated with killing a polar bear, so the practice remains limited. There is a certain irony in that these guided sporting hunts tend to be much less successful than the native hunts, and since the tag cannot be reused after an unsuccessful non-native hunt, the net effect is a reduction of the number of bears killed and a healthy injection of funds into the community.



Lemmings are herbivores the size of small rats which are especially well adapted to life in the tundra. Wintering in the warmth and protection of snow burrows, they breed almost continuously in favourable conditions, producing four or five litters per year, each with up to six young. Two or three years of good weather can cause a population explosion. When their

numbers reach a level where the local food supply is insufficient, the population rapidly collapses. A few lemmings migrate successfully, but most die of starvation and disease. This population cycle tends to repeat itself every four years. Larger mammals, such as Arctic hares, have a similar but longer lasting cycle (eleven years in the case of hares). Their predators include snowy owls and foxes, who naturally gorge themselves during population peaks. Lemmings themselves feed on vegetation of all kinds.

Porcupine (ilâkutsik in Inuttut) are large, dark brown rodents with numerous long quills on their backs. These quills are sharp-tipped and barbed; when they penetrate skin, they are very difficult and painful to remove. Adults measure about 0.63-1 m (2-3 ft) and weigh around 3.3-9.5 kg (7-20 lb); males are larger than females. Porcupine rely on their sharp quills to deter any predator and are therefore relatively unafraid of humans. Unfortunately, their carelessness makes them a common road kill. They are found in quebec, Labrador and the Maritimes and are occasionally seen during landings in those regions, sauntering along trails and roads or feeding in trees.

The **snowshoe hare (ukaliatsiak** in Inuttut) is a medium sized hare with an entirely brown coat in summer, and a white coat in winter. As a result, it is also called “variable hare”. Its wide hind feet give it its “snowshoe hare” name. Adults measure about 38-51 cm (15-20 in) and weigh around 1.3-2.3 kg (2.9-5.5 lb); females are slightly bigger than males. Snowshoe hares are found over a broad range of boreal and deciduous forests from Alaska to Newfoundland, including the Maritime provinces. They are solitary, shy and nocturnal so they are only seen on occasion but signs of their presence, such as browsed saplings and piles of round droppings, are often seen along trails.

NATIVE AND MIGRATORY BIRDS OF THE REGION

GULF OF ST. LAWRENCE

Marine birds are an essential component of the gulf's ecosystem. In this region they consume over 80,000 tonnes of prey every year—the birds that reside here are in the upper ranks of the food chain.

Four different groups of marine birds reside in the gulf of St. Lawrence: inshore birds, offshore (pelagic) birds, waterfowl and shorebirds.

1. **Inshore birds** – These feed in inshore habitats where food is found on or near the bottom of shallow water, and will normally return to land to spend the night. Examples include cormorants, gulls and terns.

2. **Offshore (pelagic) birds** – These spend long periods of time at sea, which provides them with all or most of their food requirements. They are independent of land for both feeding and resting, but return to land to breed, usually on rocky cliffs and islands. Examples are petrels and auks. Together, inshore and offshore birds are also called seabirds. There are approximately eighteen different species of breeding seabirds in the gulf.

3. **Waterfowl** – There are also approximately eighteen different waterfowl species found in the gulf, such as eiders and scoters.

4. **Shorebirds** – The majority of shorebirds are present only for a short time (mostly July through September) during their migration from the Arctic to their wintering grounds in South America. They stop to feed off mud flats, a crucial food source during their long trek.

The gulf is second in importance, after the Bay of Fundy, in Canada for the number of shorebirds using its shores as a refueling station. Some species of shorebirds will also breed in the gulf.

NEWFOUNDLAND

There are over three hundred known seabird breeding sites around Newfoundland. Most are small with a few dozen or few hundred nesting birds. A few colonies are of global significance and number among the planet's largest and most easily accessed. The Labrador coast is less studied, but there are over a thousand breeding sites, including the world's largest razorbill colony.

SEASONS FOR THE SEABIRDS

For twelve months of the year, the province provides great opportunities to watch seabirds. In fact, Newfoundland and Labrador may be the world's seabird capital. The province is home to the hemisphere's largest gatherings of marine birds, and every year some 35 to 40 million seabirds travel to these waters.

During the autumn, millions of northern birds flee the high Arctic winters of Greenland and the Northwest Territories for ice-free feeding grounds along the coast. Loons, a wide variety of ducks, and many other water birds from the province (and continental North America also choose our waters for their overwintering habitat. As the ice from the Arctic travels south and portions of the ocean freeze, these marine birds feed on abundant stocks of plankton and fish that are also attracted to this rich Arctic edge. The south coast of Newfoundland, which remains ice-free, attracts millions of additional seabirds, together with northern whales and seals. Some European birds travel across the ocean to join in this little-known feeding frenzy.

As spring turns to summer, the eagles return to their nests, Arctic terns arrive from the southern hemisphere to breed, while shearwaters from as far away as the Antarctic arrive to pursue the capelin and other marine fish off the coast.

One of the planet's largest gatherings of osprey arrives to breed and fish the rich waters. Over the spring and summer the gannets, murre, gulls, storm-petrels, and other seabirds carry on the serious business of mating and raising a family. This is when most visitors come to photograph the colourful puffins and the other breeding seabirds with their young. Usually both parents share the duties of raising the young, though in most cases it is impossible to tell a male from a female.

The waters are quiet until fall when the Arctic seabirds return to perpetrate a cycle that has endured for thousands of years. A few of these visiting northern seabirds will be making their twentieth or thirtieth winter trip to Newfoundland—this is no surprise, since seabirds are long-lived and hardy creatures, evolved to survive the cold waters of the North Atlantic.

THE AUKS

The auk family, widespread throughout the northern coastal areas of the northern hemisphere, consists of penguin-shaped, black-and-white seabirds, including murrelets, guillemots, razorbills and murres. They are often referred to as the northern hemisphere's version of the penguin; however, they are not actually relatives. The extinct great auk, the only flightless member of the auk family, was the original penguin. European sailors named the southern counterparts after the Newfoundland penguin, despite these families not being related.

Auks typically lay a single, large egg and feed themselves by diving after fish and other marine animals. They use their wings both for flight and underwater propulsion, and are capable of diving to great depths. Common murres have frequently been captured in nets set two hundred metres underwater; they are probably the deepest-diving members of the auk family. Auks are vulnerable to oil pollution—in some parts of the world, tens of thousands have died in a day due to oil spills. This family thrives in Newfoundland and Labrador.

The **razorbill** (or tinker) is roughly forty centimetres long with a thick black bill highlighted by a vertical white stripe. It lays one egg annually, most commonly under boulders or in crevices. It breeds in Newfoundland and Labrador on coastal islands like Baccalieu Island and the Witless Bay Islands, and at sites like Cape St. Mary's. The Gannet Islands off Labrador are home to the largest colony of razorbills in the world.



During the summer, the **common murre** (also called the common guillemot and turr) is the province's most numerous auk. Large numbers of adults crowd together on the flat cliff ledges along many coastal islands. Some of the adults have white rings

around their eyes. The female lays a single, colourful egg, and the pair takes turns warming it and guarding against the ever-opportunistic gulls and ravens. The chick is still quite small when it fledges in mid-to late-summer and swims out to sea with one of its parents. The chick may live on the North Atlantic for two or three years before it returns to the coastal islands and takes its place on the breeding cliffs. Between May and early August, Cape St. Mary's and Baccalieu Island are two prime areas for viewing murres. Green Island of the Witless Bay Ecological Reserve is the continent's second largest colony, while distant Funk Island is the largest colony in the world.

Thick-billed murres (also called Brunnich's guillemots and turrs) are scattered among the narrow cliff edges of most of our large common murre colonies. These are the most southerly thick-billed murres in the world. While their breeding biology and behavior are very close to the common murre, in winter they have different colouring, and in summer the white horizontal stripe on their upper bills allows birdwatchers to distinguish thickbills from common murres.



Newfoundland and Labrador's provincial bird, the **Atlantic puffin**, is slightly smaller and stouter than the murre and is one of our more colourful marine creatures. Its thick orange, yellow, and grey bill makes it one of the world's most famous and distinctive birds. Not only does it fly, and swim underwater, its razor-sharp claws allow it to dig deep burrows into the rich soil of seabird islands. At the bottom of this protective burrow it lays a single egg, which both parents look after until late August or early September when the chick is ready for life at sea. The province is home to about ninety-five percent of the continent's Atlantic puffins. They can be viewed at Witless Bay (the continent's largest colony), Baccalieu (the second largest), and elsewhere.

Although the puffin tends to be a favourite of photographers, the brilliant red legs of the **black guillemot** (or sea pigeon) when combined with its jet-black body and brilliant white wing patches make this auk a very colourful subject. The height of a puffin, the black guillemot is much sleeker and faster, known for its powerful wing beats. The black guillemot is a quick flyer that stays low to the water and nests in inaccessible caves and crevices. While these habits make it one of the most challenging seabirds to photograph, it can usually be seen at a distance skimming the waves all around the northeast coast of the province.

During the winter, the bays and coastline of Newfoundland's northeast and south coasts are filled with millions of **dovekies** (little auks or bull birds). These robin-sized seabirds arrive ahead of the Arctic ice to feed upon plankton and tiny fish. During the spring they return to the north where they breed in huge colonies along the Greenland coast.

THE GULLS

Gulls are among the world's most familiar birds. Although these long-winded soaring birds are often called seagulls, individuals of some varieties travel thousands of kilometres from the ocean. Other gulls, like the kittiwake, are seldom seen near the coast once the breeding season is past.

Young gulls go through a series of colour changes between hatching and adulthood, and some gulls have different winter and summer plumage. Over twenty varieties of gulls and terns have been reported from Newfoundland and Labrador waters. Field guides and field experience are often necessary to make a reliable decision about the varieties of gulls seen in an area.



Herring gull

The most commonly seen varieties are the **herring gull** (they nest all around the province), the **great black-backed gull** (also called the saddle back, the world's largest gull), **black-legged kittiwake** (also called the tickle ace or tickle-ass; Newfoundland has the continent's largest colonies and dozens of smaller ones), **ring-billed gull** (also called the pond gull numerous nesting sites along the coast and in land) **Arctic terns** (dozens of coastal breeding islands), and **common terns** (whom usually share breeding sites with **Arctic terns**). A few **black-headed gulls**, **Caspian terns**, and a few other members of the gull family breed in low numbers on different coastal sites, while over a dozen other varieties of gull and tern visit the province during a year.

THE JAEGERS AND SKUAS

These northern hawk-like seabirds with their slightly hooked beaks are the pirates of the bird world. They are best known for their habit of pursuing large seabirds and forcing them to give up their food. They also sometimes catch and eat smaller seabirds. They do not nest in Newfoundland, but are seen along the headlands and off shore from the northeast coast as they seek out other seabirds to chase and harass. The three



South polar skua

types of jaegers can be differentiated by the shape of their central tail feathers. The **pomarine jaeger** has rounded tail feathers, while **the long-tailed jaeger's** pointed, central tail feathers can project more than twelve centimetres beyond the other tail feathers. The **parasitic jaeger** has pointed central tail feathers projecting just a few centimetres beyond the others. There are other differences in colour, but the variety of colours within each of three types makes it a challenge to distinguish between them without lots of practice.

Two types of skuas, or sea hen, are also found off the province's coast. (In the British Isles the jaegers are commonly called skuas, so care must be taken when naming one of these birds.) Every summer a few **great skuas**, together with some **South Polar skuas**, scavenge and steal from the province's seabirds. During the winter larger numbers of great skuas from the Canadian Arctic travel to the Grand Banks and coastal headlands to feed and wait for the chance to return to their northern feeding grounds. These dark birds are the same size as a herring gull. Look for the white wing patch on the dark brown body. Some South Polar skuas have blond head parts, but it requires experience to distinguish between the two skuas off the coast.



Jaeger

THE DUCKS

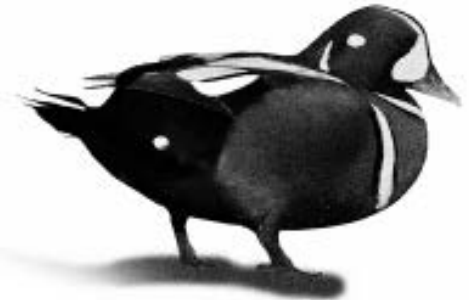
The interior of the province is home to a variety of ducks. Many of these feed on the ocean for most of the year. Many eiders, or "shore ducks", build nests along the coast. The **eider**, the largest duck found in the region, once lived by the tens of thousands along the shore, before hunting and eggging dramatically reduced its numbers. Today it numbers just a few thousand pairs scattered along the northern peninsula, northeast coast, and south coast. During the winter these are joined by tens of thousands of more northerly **nesting eiders** together with the **king eider**. Both varieties of eider feature drab brown juveniles and females together with brilliant black, yellow, green, and white adult males. The king eider has the thickest bill, with a large orange knob-like shield on the forehead of the males of the species. Mussels and small crabs are their favourite foods. Another sea duck resembling the eider was known as the Labrador duck, but it only existed in small numbers before its extinction.



White-winged duck

The eiders are joined on the ocean by a variety of other sea ducks. Three types of **scoter**—surf, black, and white-winged—are seen along the coast, sometimes in flocks of several thousand. Most of these nest north of Newfoundland, but flocks of non-breeders can be seen during the summer. During the fall and winter, they are joined by adults and young from the north. Scoters feed on mussels, as well as a variety of other small saltwater animals.

The **harlequin** is one of the world's most iconic and striking marine creatures. This endangered duck nests along fast-flowing rivers in Newfoundland and Labrador, moving to the coast during the fall, where it can sometimes be seen feeding on small marine animals along the pounding waves of a rocky shoreline. They are nicknamed “lords and ladies” by the locals because of their rich blue-and-white coloration. Wildlife officers and naturalists will appreciate hearing from anybody who spots one of these colourful endangered ducks. Every responsible duck hunter needs to know how to identify them so they can be left undisturbed.



Harlequin duck

Two types of **mergansers** (shell duck, shell bird, fish duck) with their saw-like bills and crested heads are commonly seen along the coastline in winter. The specialized bills of the red-breasted and common mergansers allow them to catch and hold fish and other prey. The old squaw or hound is an attractive sea duck (males have long, pointed tails), which spends its summers in the Arctic, and winters off the province's coast. It is known to dive deeper than 160 metres in search of shrimp, mussels, small fish, and other seafood.

A few other varieties of duck are also found along the coast. The **black duck** is very common although several other varieties—for example, **bufflehead** and **goldeneye**—will also leave the ponds to feed along the seashore. The black duck is our most common pond duck, and many of these birds spend the winter feeding on snails and plants along the coast. Often mixed winter flocks of scoters, eiders, old squaw, mergansers, & goldeneyes are seen.

THE SHEARWATERS



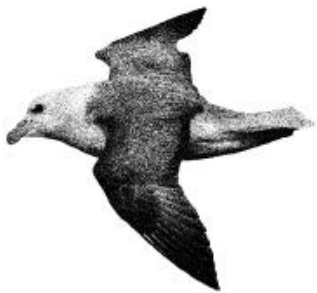
Shearwater

Members of this family of soaring seabirds use their long wings to glide effortlessly over the tops of the waves. **Shearwaters** (also called bawks and hagdowns) have tube-like external nostril. They are

birds of the open sea, seldom seen from the land. The one exception to this rule is during the summer in Newfoundland, when **greater**, **sooty**, and **Manx shearwaters** are often seen from the headlands.

At St. Vincent's on the southern Avalon Peninsula, shearwaters pursue capelin into a freshwater pond. Visitors can stand on the beach between ocean and pond and watch these seabirds soar by. This contrasts dramatically with the six-hour autumn ocean voyages endured by American birdwatchers interested in catching a glimpse of a passing shearwater. The **greater** and **sooty shearwaters** nest in the southern hemisphere, but travel to Newfoundland and Labrador to take advantage of the capelin and other small fish.

Manx shearwaters attracted to the Grand Banks from Europe have established a small colony on Newfoundland's south coast and appear to be prosecuting for new colony sites. Other shearwaters, including the **Cory's shearwater**, are occasionally drawn to the Newfoundland and Labrador coast by the rich feeding or by an ocean storm.



The **Northern fulmar** (or noddy) is a stiff-winged oceanic glider that also belongs to the shearwater family. It resembles a **herring gull** and is often seen associated with flocks of gulls, but is distinguished by its tubed bill and thicker, shorter wings. Although low numbers of fulmar nest in a variety of Newfoundland colonies, they are a common sight far out to sea.

THE STORM PETRELS

While storm petrels are almost unknown to people on shore, sailors have had superstitions about the hoards of these small birds for centuries. These seabirds spend their days feeding far out on the ocean, usually they only approaching land under cover of darkness. They are small, starling-sized seabirds with sooty brown plumage and a white stripe on the tail. They have a tubular nose and clawed, webbed feet that allow them to dig their small burrows in the grass of offshore islands. A storm petrel produces a rich oil from its seafood diet to feed its single chick. Many small islands off the coast of Newfoundland and Labrador are honeycombed with tens of thousands of their burrows.

The common name of "Cary chick" or "Mother Cary's chickens" or "Mother Cary's children" is believed to derive from an ancient Norse tale about a spirit that moved on the water and terrorized Viking sailors. Old Irish legend holds that the

birds are the souls of lost sailors. Their mysterious songs, oily odour, and unfortunate habit of crashing onto ships at sea provide some modern understanding of these ancient superstitions.



The **Wilson's storm petrel** is slightly smaller than its close relative, the **fork-tailed Leach's storm petrel**. The Wilson's storm petrel flies up from the southern hemisphere by the millions to feed off the province's coast. Both storm petrels are among the most abundant birds in the world. The wings, feathers, and bones of storm petrels are often found along headlands and in other areas where gulls land to eat. Storm-petrels are seldom seen except far out at sea and at night around their many colonies. Occasionally summer or fall storms will drive them close to the shore during daylight hours, but it is a lucky birdwatcher that catches a glimpse of this secretive seabird.

THE GANNETS



Northern gannets crown the colonies at Cape St Mary's, Baccalieu, and Funk Island, and they can also be spotted at many locations along the northeast and south coasts. Photographers enjoy capturing their blue eye-rings, bill-fencing and other social behaviours, as well as their graceful flight. The gannet's white wings have coal-black tips, and the wingspan is close to two metres. These birds are plunge divers and will drop into the sea from heights of forty or more metres in pursuit of capelin, herring, mackerel, squid, and other prey. Once underwater, they use their partially extended wings to chase their prey. Gannets arrive in Newfoundland in early spring and depart for warmer weathers as far south as Florida in October. During the summer, black-and-brown juveniles from previous years join the colonies to search for future nest sites. Gannets are the only members of the booby family found in cold climates.

THE BIRDS OF PREY

The presence of large numbers of seabirds always attracts the attention of predators and scavengers. Foxes, ravens, and large gulls take advantage of the constant activity around a seabird colony to take an egg, chick, or unsuspecting adult. Birds of prey are sometimes tempted to attack a seabird colony, but the spirited defense offered by kittiwakes, murres, and large gulls will often deter them. Nevertheless, seabird colonies are interesting places to view birds of prey.



Two birds of prey are often included among lists of seabirds. The **osprey** (or fish hawk) sometimes nests close to the ocean, where it fishes for flounder and other small marine fish. Hovering high above the waves, this masked fishing bird drops from the sky and catches its prey with razor-sharp claws. Osprey may also catch trout and salmon from rivers and ponds. Although the osprey is an endangered species, the province boasts some strong populations. There are places all over Newfoundland and Labrador, including ponds in the heart of St. John's, where it is often possible to watch osprey.



The **bald eagle** is a year-round resident of Newfoundland and Labrador, and rightly earns the designation of seabird. Although it is an occasional predator on gulls, murres, and other prey, most of its food comes from the ocean. Bald eagles use their tremendous eyesight to fish or, more often, scavenge, along the coast. High numbers of eagles can be seen in parts of Placentia Bay and Trinity Bay, but they are found all along the coast of the province.