

Animal Guide

to Lois Hole Centennial Provincial Park,
Alberta



Big Lake Environment Support Society



Credits

Technical information

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Local photographers were approached for good quality images, and where good photographs were not available then freely available images from Wikipedia were used (see page 136 for individual photo credits).

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Park, Alberta



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Location of Lois Hole Centennial Provincial Park, Alberta



Map courtesy of Google, Inc.

There are a great many animals to be seen in Lois Hole Centennial Provincial Park. This Guide features the most commonly seen animals; however, it is not a complete guide to all animals that could be seen at Big Lake. If you are, or become, passionate about wildlife, we recommend a comprehensive guide to the mammals, amphibians and reptiles in Alberta. Nature is continually changing and there may be animals who are expanding their range into this area for a variety of reasons.

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MAMMALIA

Canidae (Wolves, Coyotes and Foxes)

Coyote
Gray Wolf
Red Fox

Coyote *Canis latrans*



Size: The Coyote is smaller and slimmer than the Gray Wolf, but larger than the Red Fox. Adult weight ranges from 10-23 kg (22-50 lb) and body length ranges from 1-1.3 m (3-4 ft) including the tail which measures 30-40 cm (12-16 in). Coyotes stand 58-66 cm (23-26 in) high at the shoulder.

Description: The characteristic features of a Coyote include a gray to red-gray fur coat with black markings on the back and tail and lighter fur underneath, long ears, a slender pointed muzzle and a bushy tail that is usually carried low and close to the hind legs.

Habitat: The Coyote is highly adaptable and can be found in all regions of Alberta, including towns and cities.

Behaviour: Hares and mice are the most important prey species for coyotes, but dead livestock, deer and moose are often the most important winter food. Blueberries and other fruits are heavily used in season. Lately, urban Coyotes have been taking small dogs and cats. They seldom hunt in packs unless hunting large prey. Occasionally they hunt with Badgers chasing down rodents escaping from a digging Badger. For a natal den, the female enlarges a rodent burrow. A litter of 5-7 pups is born in April or May. Predators are wolves, cougars, black bears and lynx.

Conservation Status: Least Concern in AB

Gray Wolf *Canis lupus*



Size: The Gray Wolf measures on average 1-2 m (3-6 ft) in total body length, with the tail comprising a little less than one third of the total. The male weighs about 66 kg (145 lb), while the female weighs about 45 kg (100 lb).

Description: This slender but powerfully built carnivore has long legs enabling speed while hunting and the ability to overcome deep snow. Its fur colour is typically a mix of gray and brown with buff facial markings and underside, which can vary from solid white to brown or black. The Gray Wolf looks like a large German shepherd dog with a long

bushy tail which is held straight back when running.

Habitat: In Alberta, the Gray Wolf inhabits Boreal, Foothills and Mountain regions. It lives in a pack of 5-9 members, which requires a territory ranging from 250-750 sq km (97-282 sq miles). A recent sighting near Big Lake is unusual and may have been a single wolf looking for a pack of its own.

Behaviour: There is a pack hierarchy with the alpha male dominant over the entire pack. The pack will usually hunt in a group, but a single wolf or mated pair are also successful. Deer, elk, moose and sheep are the usual prey but beaver, waterfowl, rabbits and mice are also hunted. The ability of the Gray Wolf to run up to 64 km/hr (40 mph) and to travel 48 km (30 m) per day, enables its success when hunting. Barking is usually a warning and howling is used for long distance communication. Wolves rarely attack humans. In spring to early summer, 4-6 pups are born and grow up in a natural shelter. Predators are few but include cougar, bears and humans.

Conservation Status: Secure in AB

Red Fox *Vulpes vulpes*



Size: The Red Fox is the size of a small dog. Its total body length measures 45-90 cm (18-35"). The height at the shoulder is 35-50 cm (14-20 in) and its weight is 2-14 kg (5-31 lb).

Description: It has a narrow muzzle, an elongated body, relatively short limbs and a tail longer than half the body length. The long, dense and fluffy fur is a reddish-rusty colour on the body, while the chin, throat, chest and tail tip are white. The paws and backs of the ears are black. Other red fox colours include silver/black or brown. The red fox

is lightly built enabling it to have a running speed of 50 km/h.

Habitat: The Red Fox inhabits the entire province of Alberta, living on the edges of wooded areas, prairies and farmlands as well as towns and cities.

Behaviour: These shy, curious animals favour living in the open, usually in densely vegetated areas, though they may enter burrows to escape bad weather. They are great hunters, due to their acute eyesight, hearing and sense of smell. They eat small rodents, birds, insects, porcupines, raccoons, reptiles, fruit, grasses, sedges and tubers. Small dogs and cats are also taken in urban areas. They are largely nocturnal so much of their hunting is done at night but they can often be seen during the day. The vixen gives birth to 4-6 kits in the spring and raises them in a den. Predators include wolves and coyotes, as well as eagles, and large owls will take the kits.

Conservation Status: Secure in AB

Ursidae (Bears)

Black Bear

Black Bear *Ursus americanus*



Size: The adult Black Bear averages 45-200 kg (100-440 lb) in weight and typically measures from 150-180 cm (59-71 in) in head and body length.

Description: This medium sized bear has a broad skull, a narrow muzzle and large jaw hinges. The snout and face form a straight line. The ears are prominent and are set well back on the head. The paws are relatively large 23 cm (5-9 in) and the claws are short, curved and black. Despite being

called a Black Bear the coat colour varies from black to blond.

Habitat: The Black Bear prefers areas with thick vegetation and large quantities of edible material. Although found in the largest numbers in the wild, the Black Bear can adapt to surviving in semi-urban regions and undisturbed rural areas as long as they have accessible food and some vegetative cover.

Behaviour: The Black Bear is highly dexterous with its paws, has great physical strength and is sure-footed and able to run at speeds up to 48 km/hr (25-30 mph). It has an extremely good sense of smell and has a constant need to eat as it hibernates through the winter. It is also a strong swimmer, regularly climbs trees to feed and escape enemies and may be active day or night. The black bear is an omnivore eating plants, berries, insects, fawns, calves and carrion. Sows birth 2-3 cubs in Jan.-Feb. every second year. Predators of cubs include cougars, coyotes, and wolves.

Conservation Status: Secure in AB

Felidae (Cats)

Canada Lynx

Canada Lynx *Lynx canadensis*



Size: This medium-sized wildcat has a height at the shoulder of 48-56 cm (19-22 in), a body length of 80-105 cm (31-41 in) and a weight of 8-14 kg (18-31 lb).

Description: The Lynx has a short tail, distinctive tufts of black hair on the tips of the ears, large fur-covered paws for walking on snow and long whiskers on the face. Body colour varies from brown to gold to beige-white and is marked with dark brown spots. It has white fur on its chest, belly and on the inside of its legs. The name Lynx meaning light and brightness refers to the luminescence of its reflective eyes.

Habitat: It inhabits most of Alberta except the south-east corner of the province. It prefers boreal forest with dense cover of shrubs, reeds and tall grass and with a cold, snowy winter.

Behaviour: Lynx make sounds like a very loud house cat. Due to its elusive nature, it is rare to see one. Although this cat hunts on the ground, it can climb trees and swim swiftly. The Lynx feeds almost exclusively on snowshoe hares, however, it will hunt squirrels, rodents, fawns, fish and birds if necessary. It constructs rough shelters under deadfall trees or rocky cavities. The female gives birth to 1-4 kittens. Predators include cougars, wolves and coyotes.

Conservation Status: Sensitive in AB

Mustelidae (Weasels)

Wolverine

Badger

Marten

Mink

Fisher

Least Weasel

Long-tailed Weasel

Short-tailed Weasel

Wolverine *Gulo gulo*



Size: An adult Wolverine is about the size of a medium dog with a length from 65-107 cm (26-42”), a tail of 17-26 cm (7-10”) and a weight of 6-25 kg (12-55 lb).

Description: The Wolverine is stocky and muscular with short legs, a broad, rounded head, small eyes and short rounded ears. Its large five-toed paws have crampon-like claws enabling it to easily climb up trees and steep rocky cliffs. Its thick fur ranges in colour from dark brown to a burnt

orange with its facial mask, legs, back and tail darker than the midsection. There is usually a stripe of blond fur running from the shoulders to the large, bushy tail.

Habitat: Historically found across Alberta, Wolverines now live in the northern boreal half of the province and along the mountains and foothills. They are found in evergreen or mixed forests often interspersed with lakes, streams and bogs. They require a very large home range; the range of a male can be more than 620 km sq. (240 mi sq). There have been two sightings around Big Lake in the last 10 years.

Behaviour: This largest member of the weasel family has a reputation for ferocity and strength out of proportion to its size, with the documented ability to kill prey many times larger than itself. Its feeding style appears voracious (the basis of the scientific name meaning glutton). Carrion is a large part of its diet as well as small to medium mammals and geese, bird eggs, roots, seeds and berries. Female Wolverines burrow into snow in February to provide a den for 2-3 young kits. Predators include wolves and less frequently, bears.

Conservation Status May be at risk in AB

Badger *Taxidea taxus*



Size: The Badger measures 60-75 cm (24-30”) in total length, with a tail 10-16 cm (4-6 in) and a weight of 6-7 kg (14-16 lb).

Description: It has a stocky, low-slung body with short, powerful legs and huge foreclaws. The fur colour is brown, black and white giving a brown-tan appearance. The triangular face shows a black and white pattern with a white stripe extending from the nose to the base of the head and extending the full length of the body to the tail.

Habitat: In Alberta, the Badger is present from the North Saskatchewan River area to the south of the province. Typical habitat is open grasslands such as prairie with sandy loam soil where prey can easily be dug.

Behaviour: The Badger is generally nocturnal, however females may forage during daylight from late March to mid-May. They do not hibernate and will emerge from the burrow with above freezing temperatures. Young are born March-April with litters of 1-5 young. It preys on Northern pocket gophers, Richardson's ground squirrels, moles, mice and snakes. Insects and plants are also eaten. Coyotes have been known to hunt in tandem with badgers, catching prey that try to flee the Badger's underground digging. Predators include golden eagles, coyotes, cougars, bears and wolves.

Conservation Status: Sensitive in AB

Marten *Martes Americana*



Size: The Marten, often called a pine marten, has a total body length of 55-65 cm (22-26 in), a tail length of 14-16 cm (5-6 in) and an average weight of .5-1.4 kg (1-3 lb).

Description: It can be compared to the size of a small house cat, except the Marten has a more slender body, shorter legs, a bushy tail and a foxlike pointed face. Its body fur colour is yellow-brown with a buff-coloured bib under its chin. The tail and legs are dark brown. (It is lighter in colour and smaller than the fisher). Each foot has 5 toes with sharp curved claws. Descent of trees headfirst is possible by rotating its hind limbs. The fur

industry refers to its high value fur as Canadian sable.

Habitat: The Marten is found across the northern half of Alberta. It prefers mature coniferous forest with downed logs and cavities in trees, but is also found in young mixed woods forest.

Behaviour: Ferocious describes this nocturnal little predator, but it can be seen in the daytime as well. During the spring and summer, the male is active for about 16 hrs. a day and the female 6-8 hrs., mostly travelling on the ground. During the winter, the marten may only hunt for a few hours in the warmest part of the day and usually under the snow. Its diet consists of voles, the preferred prey, squirrels, small rodents, snowshoe hares, bird eggs, berries and fish. In summer its den is a leaf-lined nest in a tree cavity, fallen logs or root masses of fallen trees, while in winter only the ground level sites are used. The litter size averages 1-5 young. Predators include fisher, coyote, lynx and great horned owl.

Conservation Status: Secure in AB

Mink *Neovison vison*



Size: The adult weight is about 1 kg (2.2 lb) and total body length ranges from 65-75 cm (25-30in).

Description: The Mink has a long, slender body with short sturdy legs, a long neck and pointed face, small ears and a bushy tail. Distinguishing traits include a dark, brown to black coat, sometimes with white spots on the chin and chest.

Habitat: In Alberta, it can be found in the Boreal, Foothill and Rocky Mountain natural regions. This semi-aquatic weasel is seldom seen far from watercourses.

Behaviour: The scent from the musk gland is used to mark the Mink's territory; although the musk smells worse than that of a skunk, it cannot be sprayed for defence. This nocturnal hunter has a diet of ducks, fish, muskrat and small birds and

rodents. It runs with a bounding gait, climbs trees and swims well. In May, 5-6 kits are born, usually in an abandoned muskrat den. Predators include great horned owls, red foxes, wolves and black bears.

Conservation Status: Secure in AB

Fisher *Martes pennanti*



Size: The Fisher has a body length of 50-70 cm (20-28 in) and a tail 30-42 cm (12-17 in). It weighs from 1.5 -6 kg (3-13 lb).

Description: It is a house cat sized member of the weasel family with a long slender body, short legs, a bushy tail and rounded ears set close to its head. Its large feet with hairy soles have 5 toes and sharp partially retractable claws enabling it to move easily in trees. Its hind ankle joints, which can rotate almost 180 degrees, enable it to descend a tree headfirst. Its fur colour is medium to dark brown, sometimes with a cream chest patch. While

the Fisher is a close relative of the marten, it is almost twice as large and 4 times as heavy.

Habitat: In Alberta, it lives in mature forests of the Boreal and Rocky Mountain regions and sometimes in the Parkland region. It spends most of its time on the forest floor where there is continuous overhead cover.

Behaviour: The Fisher is a carnivore and a skilled hunter being one of the few animals to regularly kill porcupine. It also preys on birds, rodents, squirrels and hares, but does not eat fish. Primarily nocturnal, it usually spends the day sleeping in hollow trees or logs but also may be spotted during the day. In winter, it uses a snow den or burrow under the snow for shelter. It does not hibernate. The female gives birth to 1-4 kits. Predators include bears, coyotes, lynx and wolverine.

Conservation Status: Sensitive in AB

Least Weasel *Mustela nivalis*



Size: The Least Weasel is a small carnivore, with a body length, including the tail of 20 cm (8”) and a weight of 70 g (3 oz).

Description: It has a small head with short oval ears, black beady eyes and a pointed nose. Its body is long and slender turning brown in summer with white on the belly and white in winter, with a few black hairs on the tip of its tail.

Habitat: The Least Weasel is found in all natural regions of Alberta, particularly in fields, meadows, riverbanks and parkland.

Behaviour: The least weasel does not dig its own den, but nests in an abandoned burrow. The nest chamber is lined with straw and skins from its prey. Its diet includes mice, shrews and pocket gophers captured in their burrows and snow tunnels. It also eats insects. This fierce hunter is capable of killing a rabbit 5-10 times its own weight. There are 3-6 kits in a litter. Predators include red foxes, and owls. This weasel is very agile and not often seen.

Conservation Status: Secure in AB

Long-tailed Weasel *Neogale frenata*



Size: The Long-tailed Weasel has a total body length averaging 45 cm (16”), a tail length 15 cm (6 in) and a weight of 340 g (12 oz).

Description: It has a small head with short oval ears, black beady eyes and a pointed nose. Its body is long and slender turning brown in summer with white on the belly and white in winter, with a few black hairs on the tip of its tail.

Habitat: Preferring open country, the Long-tailed Weasel inhabits the Parkland and Grassland natural regions of Alberta.

Behaviour: The Long-tailed Weasel dens in ground burrows, under stumps or beneath rock

piles. The nest chamber is lined with straw and the fur of prey. It is a fearless and aggressive hunter. When stalking, it waves its head from side to side to pick up the scent. This carnivore eats mice, rats, squirrels, chipmunks, shrews, moles, rabbits, small birds, reptiles, amphibians, fish and insects. In late April, 4-8 kits are born. Predators include large owls, coyotes, foxes and snakes. Its population has experienced dramatic declines as a result of habitat loss and fragmentation.

Predators include large owls, coyotes, foxes and snakes This weasel is very agile and not often seen.

Conservation Status: May Be at Risk in AB

Short-tailed Weasel *Mustela erminea*



Size: The body length of the Short-tailed Weasel or Stoat is on average 33 cm (13”), its tail length is 9 cm (3 in) and its weight is 170 g (6 oz).

Description: It has a long body, short legs and a long neck. Its head is bluntly pointed and its ears are small and rounded. In summer, its fur is brown with white underparts, white feet and a black tip on the tail. They molt to white in winter with a black-tipped tail. Its smaller size and white feet distinguish this species from the long-tailed weasel. The fur was considered a luxury fur in Europe, where it was called ermine and stoat.

Habitat: Alberta’s most common weasel is found in all natural regions, except the Grassland. Brushy

or wooded areas, usually not far from water, are preferred.

Behaviour: Even though this weasel is small, it is a fierce predator and skilled hunter. With great speed and agility, it preys on mice, voles, shrews, rabbits, chipmunks, and nesting birds. It sometimes uses the burrows and nest chambers of the rodents it kills or it builds a nest under rocks, logs, tree roots or haystacks. It is primarily nocturnal; however, it can be seen during the daytime. In April-May, 4-8 young are born. Predators include foxes, raptors and badgers.

Conservation Status: Secure in AB

Mephitidae (Skunks)

Striped Skunk

Striped Skunk *Mephitis mephitis hudsonica*



Size: The Striped Skunk measures 52-77 cm (21-30") in total body length and usually weighs 2-6 kg (4-10 lb). It is similar to the size of a large domestic cat. The western Canadian subspecies is larger than the eastern subspecies, with a heavily furred, medium-sized tail.

Description: It is stout, short limbed and has a small, conical head and a long heavily furred tail. The fur colour generally consists of a black base with a white stripe from the head along each side of the back to the rump and tail. The sharp claws on its front feet aid in digging for insects and worms. It possesses 2 scent glands on each side of the anus.

Habitat: The Skunk is most common in the central and southern parts of Alberta. It inhabits mixed woodlands, brushy corners and open fields interspersed with wooded ravines and rocky outcrops. It is also quite at home in urban areas with some brush or ravines.

Behaviour: The Skunk is nocturnal with slow and deliberate behaviour enabled by its ability to spray its foul-smelling fluid 4-5 m, 6 times in succession. While primarily an insectivore (grasshoppers, beetles, crickets and caterpillars), it will also eat mice, voles, eggs, bird chicks, berries and corn. It lives in abandoned dens, stumps, rock piles or under buildings and decks in urban areas. It does not truly hibernate, but generally remains inactive during winter surviving on its fat stores. In winter, the striped skunk will forage for short periods. Litters consist of 2-12 kits born in mid-May to June. The Skunk has few natural enemies (except for Great Horned Owls) but if starving, cougars, coyotes, bobcats, badgers, foxes, and eagles will attack them. These skunks can carry rabies, but there are very few rabid skunks in Alberta.

Conservation Status: Secure in AB

Procyonidae (Racoons)

Racoon

Raccoon *Procyon lotor*



Size: Raccoons have a body length of 40-70 cm (16-28 in) not including the tail, which on average measures 25 cm (10 in). They weigh 5-12 kg (10-30 lb).

Description: This stout, short legged animal has a distinctive mask formed by black fur around the eyes contrasting with its white face. As well, its bushy tail has 5-6 alternating light and dark rings. The body fur is grizzly gray coloured with some brown. The front paws have 5 digits with claws and no webbing and are very agile, almost like fingers.

Habitat: Traditionally it has resided largely in Alberta's southeast area, however, in recent years its territory has expanded to include the central part of the province. The original habitat was deciduous, mixed forests and wetlands, but they are also now found in mountainous and urban areas.

Behaviour: The Raccoon is nocturnal, but is sometimes seen in daylight. It walks slowly but can climb a tree quickly and has the ability to descend headfirst by rotating its hind feet. In the wild, they are omnivorous feeding on crayfish, fish, birds eggs and hatchlings, fruits, nuts, insects and berries. They are known for washing their food but really, it is dabbling in the water looking for food, then it uses its front paws to rub the item and remove unwanted parts. Tree hollows, rock crevices or burrows dug by other mammals, are used for a den. A litter size is 2-5 kits. Predators are few because the raccoon is fierce in defence, but include black bears, wolves, lynx and bald eagles.

Conservation Status: Secure in AB

Cervidae (Deer)

Moose

White-tailed Deer

Mule Deer

Moose *Alces alces*



Size: Moose are the largest members of the deer family. Bulls can weigh on average 550 kg (1200 lb) and stand 2 m (6-7 ft) at the shoulder. Cows average 350 kg (770 lb). Body length varies from 2-3 m (7-10 ft).

Description: Moose have dark colouration which varies from dark brown to black. Other features of both sexes are: broad muzzle, shoulder hump, and a loose fold of skin under the chin called a “bell”. Bulls have broad, palm-like antlers that can measure 2 m (6 ft) from tip to tip and can weigh up to 40 kg (88 lb).

Habitat: In Alberta, Moose are common in most eco-regions except for the prairie and parkland. They prefer muskegs, brushy meadows and small

groves of aspen or coniferous trees particularly near lakes, ponds or streams.

Behaviour: They are most active in the day, feeding on aquatic plants and the tender shoots of willow, birch and poplar as well as aspen bark and minerals from natural salt licks. All deer are ruminants meaning they ferment plant material before digesting it. They often bed down in the afternoon to digest their food. They will move and feed at night as well. Moose have acute senses of smelling and hearing, however, their sight is poor. When alarmed, Moose will often trot away with long smooth strides. In spite of their large size, moose can move through underbrush very quietly. One or two calves are born in the spring. Predators include wolves, black bears and grizzly bears.

Conservation Status: Least concern in AB

White-tailed Deer *Odocoileus virginianus*



Size: White-tailed Deer have a shoulder height of 53-120 cm (21-47 in). The average weight for bucks is 113-125 kg (250-275 lb.), while does weigh about 73-82 kg (160-180 lb.).

Description: This deer changes from red-brown in summer to gray-brown in winter. The brown tail is broad, fringed with white and white underneath. When running the tail is held erect, hence the name “white-tail”. Antlers on bucks have unbranched tines extending up from single beams.

Habitat: They are Alberta’s most abundant deer found in the prairie, parkland and southern boreal zones. Their range is expanding westward into the foothills and mountains and northward into the boreal zone. Typical habitat includes aspen groves,

wooded river flats and coulees. Brushy patches provide food and good cover, in which even the largest white-tail is difficult to see.

Behaviour: The diet of White-tailed Deer includes grasses, forbs, chokecherry, saskatoon and other shrubs. All deer are ruminants meaning they ferment plant material before digesting it. They often bed down in the afternoon to digest their food. One or two fawns are born to each doe in the spring. Fawns are left for long periods of time alone, however, their camouflage and lack of smell help to protect them. White-tailed Deer are very wary, and when alarmed they move rapidly bounding away in smooth, graceful leaps. Predators include wolves and cougars. Bobcats, lynx, bears, wolverines and packs of coyotes, usually prey mainly on fawns.

Conservation Status: Least Concern in AB

Mule Deer *Odocoileus hemionus*



Size: Mule Deer have a height of 80-106 cm (31-42") at the shoulder and a nose to tail length of 1-2 m (4-7'). Adult bucks weigh 92 kg (203 lb) on average. Does are smaller and typically weigh 68 kg (150 lb).

Description: Their ears are large like those of the mule. The coat ranges from dark brown gray, dark and light gray to brown and even reddish. They

look similar to white-tailed deer except their tails are black tipped and their antlers divide evenly as they grow.

Habitat: Mule Deer are found throughout Alberta primarily in shrub-forest areas of open coniferous forests, aspen parkland, river valleys and steep broken terrain.

Behaviour: Although capable of running, they are often seen “stotting” leaping with all 4 feet coming down together. They eat shrubs and trees, forbes, grasses, nuts, berries and mushrooms. All deer are ruminants meaning they ferment plant material before digesting it. They often bed down in the afternoon to digest their food. Does usually give birth to 2 fawns but their first time usually one. In Alberta, this takes place during June and July. Three main predators are coyotes, wolves and cougars. Bobcats, lynxes, wolverines and black bears attack the fawns.

Conservation Status: Least Concern in AB

Erethizontidae (Porcupines)

North American Porcupine

North American Porcupine *Erethizon dorsatum*



Size: The North American Porcupine is a large, robust rodent, the second largest in Canada next to the beaver. Adult males weigh on average 10 kg (22 lb).

Description: It has a thick, short tail, short powerful legs and long curved claws. The coat is composed of a dense, brown undercoat of fur with yellow-tipped guard hairs, alternating with rows of quills. The estimated 30,000 quills have small barbs on the tip and are hollow, providing buoyancy when the animal swims. There are no quills on the muzzle, legs or underparts. It is the only N. American mammal with antibiotics in its skin,

which prevents infection when the porcupine falls out of a tree and is stuck with its own quills. When tempted to eat succulent buds at the ends of branches, it often falls out of trees. It is able to use its teeth and front paws to pull the quills out.

Habitat: It is found throughout Alberta, usually near stands of woody vegetation, its main source of food.

Behaviour: This quiet, gentle animal is not always easy to see, but noisy chewing, cut twigs and missing bark may advertise its presence. In summer, it is nocturnal and feeds on greens, forbs, shrubs and trees; in winter, the inner bark, twigs and buds of trees are eaten. When in danger, it chatters its teeth, turns its rear to a predator and swings its tail. When a quill comes in contact, it becomes embedded in the attacker's skin. It does not throw the quills; they have to contact the attacker. The Porcupine leads a solitary life but in winter it groups together with others for denning or food. It does not hibernate. One young is born from May to July. Predators include coyotes, bears, cougars and owls.

Conservation Status: Least Concern in AB

Castoridae (Beavers)

Beaver

Beaver *Castor canadensis*



Size: The Beaver is the largest N. American rodent weighing from 20-35 kg (44-77 lb). The body length varies from 74-90 cm (29-35 in) and the tail measures 20-35 cm (8-14 in).

Description: The fur is a red-brown colour. The flat scaly tail is used as a rudder, as a prop when standing, as a lever when dragging logs and as a warning when slapped on the water. The digits and claws of the forepaws are long and delicate to aid in handling wood and the digits of the hind feet are broad with webbing to propel the animal through the water.

Habitat: The Beaver lives in all natural regions of Alberta except the alpine subregion. The primary habitat is the riparian zone inclusive of stream bed. They are quite at home in urban areas with rivers and streams.

Behaviour: It is largely nocturnal, although it can be active in day. It constructs dams on streams to create ponds, which flood the surrounding area for protection and easy access to fell trees. A lodge is constructed of sticks and mud that provides excellent protection at night and over winter. Some beavers live along rivers and burrow into the bank. The Beaver is active all winter, feeding from the underwater store of twigs and leaves in the Beaver pond. From April to June, often four kits are born. It eats pond weeds, waterlilies, cattails, and the bark of poplar, willow, cottonwood, shrubs and other trees. When the food supply is exhausted, it moves to another area. Predators include coyotes, wolves and bears.

Conservation Status: Secure in AB

Sciuridae (Squirrels)

Red Squirrel

Northern Flying Squirrel

Woodchuck (Groundhog)

Richardson's Ground Squirrel

Thirteen-lined Ground Squirrel

Least Chipmunk

Red Squirrel *Tamiasciurus hudsonicus*



Size: The body length of the Red Squirrel is 28-35 cm (11-14") including the tail, which is half the length of the body. Its weight is 200-250 g (7-9 oz).

Description: It is a small squirrel but somewhat larger than the chipmunk. Its fur can range in colour from rusty red to grey-brown on their backs to stark white on their throats, bellies and rings around their eyes. It has sharp, curved claws which enable it to easily climb and descend trees. The big, bushy tail is used for balance when jumping from

tree to tree and for intimidating a rival with a lot of flicking, as well as chattering and foot stomping.

Habitat: In Alberta, it is abundant where conifers are common, including urban areas.

Behaviour: The Red Squirrel is a feisty and territorial rodent that defends a year-round territory. Its nest is constructed of grass in the branches of trees or in cavities in the trunks of trees. It is an omnivore, consuming conifer seeds (over 50% of its diet), buds, needles, mushrooms, willow leaves, flowers, berries, mice, eggs and small birds. Cone seeds are stored in a cache for winter since it does not hibernate. Females produce one litter per year with 1-5 young. Predators include the lynx, bobcat, coyote, great horned owl, northern goshawk, red-tailed hawk, crow, red fox, wolf and weasel.

Conservation Status: Secure in AB

Northern Flying Squirrel *Glaucomys
sabrinus*



Size: The adult Northern Flying Squirrel measures from 25-37 cm (10-15 in) long and weighs on average 110-230 g (4-8 oz).

Description: It has thick light brown or cinnamon coloured fur on its upper body, gray fur on the flanks and whitish fur on the underparts. It has large eyes, long whiskers and a flat tail.

Habitat: The Northern Flying Squirrel is found in most of Alberta except for the south-east part of the

province. It prefers older coniferous and mixed forests. Good tree cover is important for protection when gliding between trees.

Behaviour: This nocturnal squirrel is a proficient glider but a clumsy walker on the ground. After launching from atop trees, it uses a fold of skin between the front and back legs, to stretch into a square-like shape which enables it to glide. Just before reaching a tree, it raises its tail, points all of its limbs forward and creates a parachute effect to reduce the shock of landing. To avoid predators, it immediately runs to the top or to the other side of the tree. Holes in trees are used for nests. In winter, nests are shared forming aggregations of 4-10 individuals to maintain body temperature. It does not hibernate. It is not often seen by the public as it is active mostly at night.

A major food source is fungi, although it also eats lichens, mushrooms, tree sap, insects, carrion, bird eggs and nestlings, buds and flowers. Predators include owls, hawks, lynx, marten and red fox.

Conservation Status: Secure in AB

Woodchuck *Marmota monax*



Size: The Woodchuck, also known as the groundhog, may measure 42-69 cm (17-27 in) in length, including the tail which is 10-19 cm (4-7 in) long. It typically weighs 2-6 kg (4-14 lb).

Description: It is stout and has a flat head, small ears and short, powerful limbs with curved, thick claws. The fur colour ranges from gray to cinnamon to dark brown. Its four incisor teeth grow 1.5 mm (1/16 in) per week; however, constant usage wears them down.

Habitat: The range of the Woodchuck extends across the central and northern parts of Alberta. It prefers open country and the edges of woodland

and is rarely far from a burrow entrance, which can be identified by a large mound of excavated earth.

Behaviour: This rodent is an excellent burrower constructing a tunnel up to 14 m (46 ft) in length and buried 1.5 m (5'), with a large chamber and 2-5 entrances. Although the Woodchuck can swim and climb trees, it prefers to retreat to its burrow to avoid predators. It often stands erect on its hind legs watching for danger and uses a high-pitched whistle for warning. It eats wild grasses, other vegetation and occasionally grubs, insects and small animals. Instead of storing food, it puts on a lot of fat before hibernation to survive the winter. A litter includes 2-6 young. Predators are coyotes, badger, red foxes, mink, eagles, hawks and large owls.

Conservation Status: Secure in AB

Richardson's Ground Squirrel *Urocitellus richardsonii*



Size: The Richardson's Ground Squirrel, or gopher in western Canada, is about 30 cm (12") long and has an average weight of 750 g (2 lb).

Description: It is dark brown on the upper side and tan underneath. The tail is shorter and less bushy than other ground squirrels and is constantly trembling. It is also called a prairie dog or gopher, although it is neither. The ears are so short as to look more like holes in the animal's head.

Habitat: Native to short grass prairies, the Richardson's Ground Squirrel is found in central and southern Alberta. The range of this squirrel expanded as forests were cleared to create farmland. It is quite at home in urban areas with berms or vacant properties for burrows.

Behaviour: Richardson's Ground Squirrels live communally. Individuals give audible alarm calls when predators approach their colony (a whistle for a terrestrial predator and a chirp for an aerial predator). They can hibernate for up to 8 months from July to March. Each adult female owns a burrow system with 5-7 exits and 2-5 sleeping chambers. These animals are omnivores, eating seeds, nuts, grains, grasses and insects. Their litter averages 6 young per year. Predators include hawks, owls, snakes, weasels, badgers and coyotes.

Conservation Status: Secure in AB

Thirteen-lined Ground Squirrel *Ictidomys tridecemlineatus*



Size: Its body length is 17-30 cm (7-12”), its tail is 6-13 cm (3-5”) and its weight is 110-270 g (4-10 oz).

Description: The Thirteen-lined Ground Squirrel is brown in colour, with thirteen alternating brown and white lines (sometimes partially broken into spots) on its back and sides. It is also known as the striped gopher or the leopard ground squirrel.

Habitat: It is widely distributed over grasslands and prairies of Alberta.

Behaviour: This burrowing rodent digs a burrow 5-6 m (15-20 ft) long. It is well known for standing upright to survey its domain, for diving down into its burrow when it senses danger, then for poking out its nose and giving a bird-like trill. It is also very quick with a maximum running speed of 13 km/hr (8 mph). Being an omnivore, its diet consists of grass and weed seeds, caterpillars, grasshoppers, mice and shrews. In October, it enters its hibernation nest in a deeper section of the burrow where food has been stored. During hibernation, respiration is decreased from 100-200 breaths/minute to 1 breath every 5 minutes! It emerges in early spring. A litter of 3-14 pups is born once a year. Predators include weasels, raptors, hawks and snakes.

Conservation Status: Undetermined in AB (IUCN Status: Least Concern)

Least Chipmunk *Neotamias minimus*



Size: The Least Chipmunk measures 16-25 cm (6-10 in) in total length, with a tail 10-11 cm (3.9-4.3 in) and a weight of 25-66 g (1-2 oz). It is about the size of a small bird.

Description: This smallest species of chipmunk is gray to reddish-brown on the sides of the body and greyish-white on the underparts. The back is marked with 5 dark brown to black stripes separated by 4 white or cream coloured stripes running from the neck to the tail. Two light and 2 dark stripes mark the face, running from the nose to

the ears. The bushy tail is orange-brown in colour and almost the same length as the body.

Habitat: In Alberta, it lives in all of the province except the south-western region. It is commonly found in sagebrush, coniferous woodland, along rivers, in alpine meadows and on the edges of the northern tundra.

Behaviour: It can often be seen perched on its hind legs holding food in its front paws while it eats. It may also be seen with its stretchy cheek pouches filled with food it collects and stores in its burrow or in small holes it has dug in the ground. It eats seeds, berries, nuts, fruits and insects. In summer, this chipmunk has a nest in a tree, but in winter it uses a burrow with 2-4 entrances. These burrows are very hard to find because they never leave dirt piles at the entrances. The least chipmunk hibernates but wakes to eat food cached in the burrow. Females have a litter of 3-7 young each year. Predators include hawks, owls and weasels.

Conservation Status: Secure in AB

**Cricetidae (Muskrats, Mice, Voles
and Lemmings)**

Muskrat

Deer Mouse

Meadow Jumping Mouse

Western Jumping Mouse

Meadow Vole

Southern Red-backed Vole

Northern Bog Lemming

Muskrat *Ondatra zibethicus*



Size: Muskrat adults weigh about 1.5 kg (3.3 lb) and have a body length about 40-70 cm (16-28 in), with half of that being tail.

Description: These medium sized, semi-aquatic rodents have dense, waterproof, chestnut to dark brown fur. Their tail is narrow and flattened laterally to be used as a rudder and for propulsion by vibrating it side-to-side. When they walk on land, their tail drags which makes tracks easy to recognize. Their legs are short with small forefeet used for grasping objects, while the large hind feet are partially webbed.

Habitat: Muskrats are found in all natural regions of Alberta, except the alpine subregion. They live in a wide range of wetlands in or near rivers, lakes or ponds.

Behaviour: Muskrats spend much of their life in water but do not build dams, although occasionally live in active Beaver lodges. They are most active at night or near dawn or dusk. Muskrats live in a family group and each group has a house, a feeding area and canals through cattails and vegetation. In streams, ponds or lakes, they burrow into the bank and use an underwater entrance. In marshes, push-ups are constructed in late fall from mud, pond weeds and cattails. In winter, push-ups cover a hole in the ice, which is kept open by continually chewing away the ice and pulling up underwater vegetation to build the insulated dome. Muskrats are prolific breeders; females can have 2-3 litters a year of 6-8 young. Their diet consists of 95% plants such as cattails and pond weeds. They also eat freshwater mussels, frogs, salamanders and small fish. Predators are mink, foxes, coyotes, lynx, wolves, bears, eagles, owls and hawks. Large predatory fish, such as northern pike, are known to take young kits.

Conservation Status: Secure in AB

Western Deer Mouse *Peromyscus sonoriensis*



Size: The Western Deer Mouse body is 8-10 cm (3-4 in) long not including the tail, which averages 5-13 cm (2-5 in). It weighs 18-35 g (0.6- 1 oz).

Description: Large beady black eyes and large ears give the Deer Mouse good sight and hearing. The colour of the fur varies from gray to red brown, but all deer mice have a white underside and white feet. The tail is long and multicoloured. They are very similar to the Eastern Deer Mouse.

Habitat: The Western Deer Mouse is found throughout Alberta in forests, prairies and deserts,

but it is not found where the ground is continually wet.

Behaviour: This nocturnal mouse spends the day in its nest in its underground burrow or in brush piles, rocks, stumps or hollow trees. During the winter season, it can be found active on top of snow or beneath logs. Typically, females have 3-5 young in a litter 3-4 times a year. The Deer Mouse is omnivorous and eats seeds, fruits, spiders, caterpillars, leaves, fungi, and insects. Predators include snakes, owls, mink, marten, weasels, skunks, bobcat, coyote and foxes. Deer mice can be carriers of infectious diseases like hantavirus and lyme disease.

Conservation Status: Secure in AB

Meadow Jumping Mouse *Zapus hudsonius*



Size: The Meadow Jumping Mouse has a body length of 18-24 cm (7-9 in), including the tail measuring 11-17 cm (4-7 in) and has hind feet 3-4 cm (1-1.4 in) long. The average adult weight is 18 g (0.6 oz).

Description: This small, slender mouse has fur that is dense and coarse. A broad dark brown stripe is always present on its back, the sides are paler yellow and the underbody and feet are white. Its nose is short and pointy and its eyes are relatively big. The enlarged hind feet and short forefeet are distinctive characteristics.

Habitat: In Alberta it is found in central and northern regions of the province. It prefers moist grasslands with thick vegetated areas usually near

streams, ponds and marshes. It avoids heavily wooded areas.

Behaviour: The Meadow Jumping Mouse can jump 2-3 feet, which is a long distance for its size. It is a decent swimmer and will jump into water when in danger. When constructing its burrow, it is an excellent digger. On average 2-9 young are born in a litter, 2-3 times a year. It eats seeds primarily, but also berries, fruit and insects. Hibernation lasts from fall until spring. Predators include owls, foxes, hawks and weasels.

Conservation Status: Secure in AB

Western Jumping Mouse *Zapus princeps*



Size: The Western Jumping Mouse is 22-25 cm (9-10 in) in total length, the tail is 13-15 cm (5-6 in) long and the hind feet are 3-4 cm (1-2 in) long. It weighs 17-40 g (0.6-1.4 oz).

Description: It has long hind-feet, short forelimbs and a long tail. The fur is coarse dark-gray brown over the the upper body, with a broad yellow to red band along the flanks and pale yellow-white underparts. Some have white spots on the upper body or on the tip of the tail.

Habitat: This species of mouse is found in the central and south regions of Alberta. Mountainous terrain is inhabited as well as meadows and forests

dominated by alder, aspen or willow, where there is dense vegetation close to fresh water.

Behaviour: The Western Jumping Mouse is nocturnal but the feeding ground can be identified by small piles of grass stems stripped of their seeds and by the presence of clear runways strewn with grass clippings. It is an omnivore and eats seeds, herbs, fruits, fungi and insects. It hibernates 8-10 months of the year subsisting on its fat reserves. Although it normally moves by making short hops and leaps, the leaps may reach 72 cm (28 in) along the ground and 30 cm (12 in) into the air. A litter of 4-8 pups is born once a year. Predators include bobcats, coyotes, weasels, skunks, raccoons, snakes and birds of prey.

Conservation Status: Secure in AB

Western Meadow Vole *Microtus Drummondii*



Size: The Western Meadow Vole has an average length of 16 cm (7 in) and weight of 37 g (1 oz).

Description: It is compact and stocky with short legs and tail and a rounded muzzle and head. The fur is dark brown and velvety with a gray-coloured belly. It turns white in winter. Its broad feet have strong claws for digging in soil. These voles have short ears that barely protrude from the fur surrounding them.

Habitat: It is present in all of Alberta but prefers moist, dense grasslands near streams, lakes, ponds and swamps. Overhead grass cover is essential.

Behaviour: The Western Meadow Vole is active year-round, day or night because it has to eat

frequently. It is active the first few hours after dawn and during the 2-4 hour period before sunset. It digs burrows where it stores food for the winter and where females give birth to their young. A litter size is 4-6 pups with up to 4 litters per year. The diet consists of grasses, sedges, forbs, seeds, insects and snails. In winter, it eats green basal portions of grass plants, often hidden under snow. This vole is an important prey, especially in winter, for red foxes, coyotes, hawks, owls, snakes and weasels.

Conservation Status: Secure in AB

Southern Red-backed Vole *Myodes gapperi*



Size: This small, slender vole is 12-17 cm (5-7 in) long, with a tail measuring 4 cm (2 in). It weighs on average 21 g (1 oz).

Description: The Southern Red-backed Vole has a short body with a reddish band along the back and a short, slim tail. The sides of the body and head are gray and the underparts are paler. It has a blunt nose and prominent rounded ears.

Habitat: It is found throughout most of Alberta, excepting the southern region. Its habitat includes coniferous, deciduous and mixed forests, often near

wetlands. Forests, including mossy, rotten logs and stumps are preferred. It can also be found in aspen bluffs and shrubby vegetation.

Behaviour: The Southern Red-backed Vole is active year-round, mostly at night. It uses runways through the surface growth in warm weather and uses tunnels through the snow in winter. Underground burrows made by other small animals are used. Being omnivorous, its diet includes green plants, fungi, seeds, nuts, roots, insects, snails and berries. Roots, bulbs and nuts are stored for later use. This little vole plays a positive role in the coniferous ecosystem since they disperse the native fungi that is necessary for the establishment and successful growth of conifers. Females have 2-4 litters of 2-8 young in a year. Predators include coyotes, red fox, hawks, owls and mustelids, and are an important food source in winter.

Conservation Status: Secure in AB

Northern Bog Lemming *Synaptomys borealis*



Size: The Northern Bog Lemming averages 13 cm (5 in) in length and weighs about 30 g (1 oz). The short tail is only 2 cm (0.8 in) long.

Description: It has a cylindrical shaped body covered with brown grizzled fur with pale gray underparts. A patch of rust coloured hair is seen at the base of the ears. It has small eyes and a blunt snout.

Habitat: The Northern Bog Lemming is found throughout most of Alberta, except in the southeast corner of the province. Wet northern forests, bogs, tundra and meadows are typical of its habitat.

Behaviour: This small rodent is active year-round day and night. It makes runways through the surface vegetation and also digs underground burrows. In winter, it burrows under the snow. The diet for this lemming consists of grasses, sedges, other green vegetation, mosses as well as snails and slugs. Females can have 2-3 litters of 4-6 young in only a 4 month breeding season. Predators include coyotes, red fox, owls, hawks, weasels and snakes.

Conservation Status: Secure in AB

Geomyidae (Pocket Gophers)

Northern Pocket Gopher

Northern Pocket Gopher *Thomomys talpoides*



Size: The Northern Pocket Gopher on average weighs 110 g (4 oz) and has a body length of 20 cm (8 in).

Description: It has a thick body and neck, short fur and small eyes and ears. The fur colour is often rich brown or yellow brown, but also can be gray with white markings under the chin. It is named for its large, external, fur lined cheek pouches used to carry food and nesting materials. Long curved claws on 3 digits of its forepaws are used for digging.

Habitat: It is the most commonly found true gopher in Alberta, using fields, prairie and alpine

meadows with good soil. The animal usually called a gopher in Alberta is Richardson's Ground Squirrel, but it isn't a true gopher.

Behaviour: This nocturnal, burrowing, non-hibernating rodent rarely appears above ground; when it does, it rarely ventures far from a burrow entrance. Underground however, it has tunnels that extend hundreds of feet where it lives, stores food and mates. Food consists of underground plant parts and leaves of forbs. A litter has 5-6 young. Predators include badgers, coyotes, weasels, snakes, skunks and owls. To find where a northern pocket gopher lives, look for the crescent shaped mound of dirt in front of a burrow.

Conservation Status: Secure in AB

Soricidae (Shrews)

Arctic Shrew
Masked Shrew
Pygmy Shrew

Arctic Shrew *Sorex arcticus*



Size: The body length of the Arctic Shrew ranges from 10-12 cm (4-5 in) including a 4 cm (2 in) long tail. It weighs 5-13 g (0.2-0.5 oz).

Description: The Arctic Shrew is most distinctive in its tri-coloured fur. It is dark brown or black on its back, lighter brown on its flanks and lighter still gray-brown on its underside. The fur is grayer in winter. The head is long with a pointed nose and the eyes and ears are very small.

Habitat: The Arctic Shrew is present in the central and northern regions of Alberta. This shrew is found in greatest quantity and density near bodies of water such as lakes, streams, marshes and

wetlands, in dense grasses, alder thickets and in the undergrowth of forest clearings.

Behaviour: The Arctic Shrew is solitary, territorial and active day and night. It has a voracious appetite due to its quick metabolism and eats insects, worms and small invertebrates. The female gives birth to 1-2 litters each year ranging in size from 4-10 offspring. The only known predators are owls.

Conservation Status: Secure in AB

Masked Shrew *Sorex cinereus*



Size: The Masked Shrew, also called the common shrew, is about 9 cm (4 in) in length, including a 4 cm (2 in) long tail. It weighs about 5 g (0.2 oz). It is one of the smallest mammals on earth.

Description: The fur of the Masked Shrew is gray-brown in colour with a light gray underside. It has a pointed elongated snout, small eyes and a long tail.

Habitat: It can be found in all of Alberta and is common in poplar forests and meadows. Moisture determines the abundance of this shrew so it mostly lives in humid areas with high levels of vegetation to hide in.

Behaviour: This small shrew is active day and night, year-round. It digs tunnels but also uses existing tunnels where dry grass is used to make a nest. One litter of 6-7 young is born during the breeding season. The diet consists of insects, worms, snails, small rodents, salamanders and seeds. These shrews have to eat almost constantly because of a very high metabolism. They can only survive a couple of hours without food. Predators include larger shrews, hawks, owls, shrikes, snakes, herons, foxes, leopard frog, bluebird, brown trout and weasels.

Conservation Status: Secure in AB

Pygmy Shrew *Sorex hoyi*



Size: The Pygmy Shrew is tiny. It is the smallest mammal native to N. America with a body about 5 cm (2 in) long including a 2 cm (0.8 in) tail. It weighs about 2-5 g (0.7-0.17 oz).

Description: Its fur is a reddish or grayish brown during the summer and a white-gray colour during the winter. The underside is a lighter gray. It has a narrow head, pointed nose and small eyes that are well hidden.

Habitat: The pygmy shrew is found throughout the boreal areas of Alberta except for the south-east corner of the province. It lives in moist or dry conditions in the grassy opening within the forest, as well as the shrubby borders of bogs and wet meadows.

Behaviour: Due to its fast metabolism, it has an extremely large appetite and is active all year round even burrowing through snow. To stay alive, it has to eat 3 times its body weight daily which means capturing prey every 15-30 min., day and night. With a good sense of smell and hearing, it digs through soil and leaf litter to search for food, mostly insects and insect larvae. A litter of 3-8 young are born once a year. This shrew swims making it a prey for trout. Other predators include hawks, owls and snakes.

Conservation Status: Secure in AB

Leporidae (Hares)

Snowshoe Hare
White-tailed Jackrabbit

Snowshoe Hare *Lepus americanus*



Size: The adult Snowshoe Hare measures 41-52 cm (16-20 in) in total body length with a tail 4-5 cm (1.5-2 in) long. It weighs about 1.5 kg (2-4 lb).

Description: The Snowshoe Hare has very broad hind feet which prevent the animal from sinking into the snow. The feet also have fur on the soles to protect them from freezing temperatures. In summer, the fur colour is grizzled reddish or gray brown, while in winter, its coat turns completely white except for black tips on the ears.

Habitat: It is widely distributed across almost all of Alberta except for the southernmost region. It inhabits boreal forests preferably with a dense shrub layer, as well as treed coulees and river

bottoms of the prairies. It is also found in towns and cities.

Behaviour: This hare is primarily nocturnal and spends most of the day in a form, a shallow depression in the ground. In summer, the snowshoe hare eats grasses and forbs, while in winter, it eats the buds, bark and branches of shrubs and small trees. A litter of about 4 young are born to each doe from April into summer. Does may have as many as 4 litters in a year. Predators include lynx, martens, long-tailed weasels, minks, foxes, coyotes, owls, hawks, eagles, crows, ravens and black bears.

Conservation Status: Secure in AB

White-tailed Jackrabbit *Lepus Townsendii*



Size: White-tailed Jackrabbits measure 56-65 cm (22-26 in) in length, including the tail 7-10 cm (3-4 in). They weigh between 3-4 kg (6-10 lb).

Description: The fur colour of the White-tailed Jackrabbit is dark brown or gray-brown with pale gray underparts. The large ears are distinctive with black tips. The tail is white with a dark central stripe above. They moult in autumn and become white all over except for the ears. They have long, powerful hind legs and are excellent at running.

Habitat: This is Alberta's largest hare and is found throughout the province, including in towns and cities. They live on plains, prairie and in alpine meadows with scattered coniferous trees. The urban environment provides more places to hide and more food with a good variety of plants.

Behaviour: It is nocturnal and lies up during the day in a form, a shallow depression in the ground hidden under vegetation. It feeds on grasses, green plants and cultivated crops. In winter, it feeds on dry grass, twigs and bark on low shrubs. It has good eyesight, excellent hearing and can run up to 55 km/h (34 mph) and leap up to 5 m (16 ft). A litter of 4-5 leverets is born in spring-summer. Predators include foxes, badgers, coyotes, bobcats, snakes, eagles, hawks and owls.

Conservation Status: Secure in AB

Vespertilionidae (Evening bats)

Little Brown Bat

Big Brown Bat

Hoary Bat

Northern Long-eared Bat

Silver-haired Bat

Little Brown Bat *Myotis lucifugus*



Size: The Little Brown Bat is a small species with weight at 6-13 g (0.2-0.4 oz), body length at 8-10 cm (3-4”) and wingspan at 22-27 cm (9-11”).

Description: The fur colour of this bat ranges from pale tan to red or dark brown and is glossy in appearance. The belly fur is a lighter colour. It has a short snout, small eyes and long ears.

Habitat: Alberta’s most common bat, the Little Brown Bat is found across the province, including farms, towns and cities.

Behaviour: This bat is nocturnal, foraging for its insect prey at night and roosting in tree hollows, rocky outcrops, caves and human structures during

the day. It navigates using echolocation along the edges of vegetated habitat, bodies of water or streams and eats mosquitos, spiders, beetles, moths and various flies. It can consume 600-1000 mosquitoes or other flying bugs per hour and will eat more than half its own body weight each night. Some of these bats hibernate in caves or old mines locally, however, others migrate to the northern US. The litter size is one pup per year. Predators include hawks, owls and snakes. The little brown bat is susceptible to rabies and white nose syndrome (an introduced fungus), which has caused a heavy decline in the population of many bat species.

Conservation Status: May be at Risk in AB

Big Brown Bat *Eptesicus fuscus*



Size: The big brown bat weighs 15-25 g (0.5-0.8 oz), has a body length of 11-13 cm (4-5 in) and a wingspan measuring 30 cm (12 in).

Description: The fur of this bat is red brown with the upper side being darker than the underside. The rounded snout is flattened looking and the ears are short with rounded black tips. The flight membranes are black and hairless.

Habitat: The big brown bat is probably the most common bat in southern Alberta while the number

of individuals declines in the northern regions. These bats roost in colonies within a small local area and usually forage within 3-4 km of their day roost.

Behaviour: The big brown bat is nocturnal, roosting in sheltered places during the day. Roosts include tree cavities, wood piles, rock crevices, caves and buildings. Although little is known about their hibernation in Alberta, the number of big brown bats found in Edmonton is greater in winter than in summer. It is thought that the bats move into the city to use old warehouses, where temperatures remain just above freezing. Their diet consists of a diverse array of night flying insects, especially beetles. This bat is a significant predator of agricultural pests. One pup per female is born from May to June. Known predators include common grackles, American kestrels, owls and long-tailed weasels. These bats are relatively resistant to white nose syndrome.

Conservation Status: Secure in AB

Hoary Bat *Aeorestes cinereus*



Size: The largest bat in Canada averages 13-15 cm (5-6 in) long, with a 40 cm (16 in) wingspan and a weight of 26 g (0.9 oz).

Description: The coat of the Hoary Bat is dense and gray-brown with white tips to the hairs like “hoar-frost”. The body is covered in fur except for the undersides of the wings.

Habitat: The Hoary Bat is found all over Alberta. It prefers woodland, mainly coniferous forests, but

hunts over open areas or lakes. It migrates long distances and spends the winter in the southwestern US and Central America, although some stay and hibernate.

Behaviour: The hoary bat normally roosts alone on trees, hidden in the foliage, but on occasion has been seen in caves with other bats. It hunts alone for its main food source, moths. It also eats wasps, beetles and dragonflies. It can cover an impressive 39 km (24 mi) each night while foraging. The female usually bears one or two pups in June. While not listed as threatened or endangered, hoary bats suffer significant mortality from wind turbines, mostly during migration.

Conservation Status: Secure in AB

Northern Long-eared Bat *Myotis septentrionalis*



Size: The Northern Long-eared Bat is a small bat that measures an average of 9 cm (3-4 in) in total length, including a tail 4 cm (2 in) long. It weighs between 5-8 g (0.2-0.3 oz) and has a wingspan of 25 cm (10 in).

Description: The fur and wing membranes of this small bat are light brown. It has long, pointed ears and when folded forwards, the ears extend well past the nose. It also has a long tail and a larger wing

area than most comparably sized bats, giving it increased maneuverability during slow flight.

Habitat: The Northern Long-eared Bat is found mostly in eastern North America in mature forests. It is relatively rare in the Alberta.

Behaviour: This bat roosts in cracks, hollows or under the bark of deciduous trees in summer and migrates to caves in winter. It uses echolocation to navigate through cluttered forests. Most foraging occurs in the first hours of dawn and dusk, when it eats insects, with moths being its favourite. Most unusually, it can perch and pluck insects from a surface. Females give birth to a single pup in May. Climate change, forestry practices and the potential of white-nose syndrome coming into the province may put this species at risk.

Conservation Status: May be at Risk in AB

Silver-haired Bat *Lasionycteris noctivagans*



Size: The length of body of the Silver-haired Bat is 10 cm (4”), the weight is 8-12 g (0.3-0.4 oz) and notably, its wingspan is up to 30 cm (12”).

Description: This medium sized bat is nearly black with white tipped hairs on its back. Its flight pattern is slow and leisurely, often close to the ground.

Habitat: It is found primarily in forested areas in central and southern Alberta, although it appears to be present in southern Alberta only during the spring and fall migrations.

Behaviour: The Silver-haired Bat uses tree roosts in summer. It may be found alone or in small groups under bark, in abandoned bird’s nests, in hollow trees, or hanging upside down among the leaves throughout the forests in central Alberta. The

litter size is 2 young per female. Owing to its solitary nature and avoidance of humans, little is known about Silver-haired Bats in Alberta. It is known to be a strong flier during migration, however, this species experiences mortality at wind energy projects. It is relatively resistant to white nose syndrome.

Conservation Status: Sensitive in AB

REPTILIA

Colubridae (Rear-fanged snakes)

Red-sided Garter Snake
Western Terrestrial Garter Snake
Plains Garter Snake

Red-sided Garter Snake *Thamnophis sirtalis parietalis*



Size: Common or Red-sided Garter Snakes are thin and about 1.2 m (4 ft.) long.

Description: Most have longitudinal stripes of red, green, blue, yellow, gold, orange, brown or black on an olive background. Red markings are present between the stripes.

Habitat: They are found in marshes, bogs, wetlands, ponds and forests. Mating occurs just before hibernation. Some males mimic a female role to lure away other males when they outnumber females. Females may delay fertilization by storing the sperm internally until spring. They give birth to 12-40 live young between July and October.

Behaviour: In summer they are most active in the morning and afternoon. They hibernate in common dens, emerging to bask in the sun. The saliva contains mild venom that is toxic to amphibians. For humans it might cause itching and swelling. If disturbed, they might secrete a foul-smelling fluid. Garter snakes feed on amphibians, earthworms, fish, small birds and rodents. They are prey for larger fish, bullfrogs, snapping turtles, hawks, racoons and foxes.

Conservation Status: Sensitive in AB.

Western Terrestrial Garter Snake

Thamnophis elegans vagrans



Size: These medium sized snakes are usually 46-104 cm (18-41 in.) long.

Description: The body is brown, grey or greenish with a yellow, light orange or white dorsal stripe and 2 side stripes of the same colour. It is an immensely variable species, and even the most experienced herpetologists have trouble when it comes to identification.

Habitat: Terrestrial Garter Snakes are found in grasslands and woodlands and prefer wetland habitats to hunt and hide. They mate in spring producing live young in litters of 1-24, from July to

September. Newborns are 17-23cm (7-9.5in) long. No parental care is given.

Behaviour: This species has a mild venomous saliva that immobilises prey but is harmless to humans. They constrict prey but rather inefficiently. If harassed, they may emit a repulsive secretion from their rear end. They eat soft bodied invertebrates, frogs, mice and fish.

Conservation Status: Sensitive in AB.

Plains Garter Snake *Thamnophis radix*



Size: Plains garter snakes average 0.91 m (3 ft.) in length.

Description: This slender snake is greenish to grey olive or brown with an orange or yellow stripe down its back and black bars on its lip. Lateral stripes are greenish yellow. The belly is grey-green with small dark spots along the edges and the head has distinctive light yellow spots on top.

Habitat: These garter snakes are commonly found near streams and ponds and in urban areas. Mating occurs in April and May near the communal hibernation site, 5-40 young are born alive from July on and are about 18cm (7in) long.

Behaviour: Their diet consists of earthworms, slugs and amphibian larvae and small mammals and birds. They are most active from April to late October and then hibernate in communal sites – sink holes, burrows or rocks. They are cold tolerant snakes that emerge to bask on sunny winter days. When harassed they rarely bite, but writhe to escape and emit a foul smelling secretion.

Conservation Status: Sensitive in AB.

AMPHIBIA

Ambystomatidae (Mole Salamanders)

Western (Barred) Tiger Salamander

Western Tiger Salamander *Ambystoma mavortium*



Size: The Western or Barred Tiger Salamander is the largest terrestrial salamander in North America, from 15 to 22cm (6-9in) - even up to 30cm (12") long.

Description: It has a broad head and a sturdy body. The back is grey, dark brown or black with muddy yellow markings giving a tiger-like appearance. The belly is light to dark. Salamanders are an extremely variable, and hence, complex group of species with a lot of variability amongst and between species. They are found from southwestern Canada in British Columbia, Alberta, Saskatchewan, and Manitoba, south through the

western United States to Texas and northern Mexico.

Habitat: They inhabit forests, fields, meadows or grasslands. Adults spend most of their time underground.

Breeding throughout the year they gather by ponds for spawning. Females lay eggs in water. The larvae hatch in 19-50 days and have external gills. Some retain their gills into adulthood. Western Tiger Salamanders can live up to 15 years.

Behaviour: Mostly active at night, these Salamanders are opportunistic feeders, and will often eat anything they can catch, including various insects, slugs, and earthworms. They are primarily terrestrial as adults, but their juvenile larval stage is entirely aquatic, having external gills. Predators include fish, dragonfly nymphs, predacious diving beetles, many birds and most carnivores.

Conservation Status: Secure in AB. There has been some decline in numbers due to deforestation and habitat loss and the introduction of non-native predatory fish. However, the population in most of the prairie provinces is secure.

Bufonidae (Toads)

Western Toad *Anaxyrus boreas*



Size: A large species, the Western Toad is 5.6 cm – 13 cm (2.2– 5 in.) long.

Description: They have a white and cream back stripe on dusky grey and greenish skin and a pale belly with dark mottling. The salivary glands are on the sides of the head and oval in shape, the pupils are horizontal and they lack cranial crests.

Habitat: Western toads are terrestrial, controlling their body temperature by basking in sun and evaporative cooling. They spend daylight hours

beneath the forest floor or in the water and are mostly active at night. Unlike most toads, they walk rather than jump. Their diet consists of bees, beetles, ants and spiders, slugs and worms.

Behaviour: These toads are found near ponds and streams and are active from April to September. Breeding occurs in shallow ponds with sandy bottoms. The male call is a soft peeping sound. Females lay eggs in gelatinous masses of up to 16,500 per clutch, beneath submerged vegetation for protection. The eggs hatch as tadpoles in 3 – 12 days and are fully formed as adults within 3 months. Juvenile toads become mature in 2 – 3 years. Predators include fish, dragonfly nymphs, predacious diving beetles, many birds and most carnivores.

Conservation Status: Sensitive in AB.

Canadian Toad *Anaxyrus hemiophrys*



Size: Canadian Toads are usually 5-7 cm (2-3 in.) in length, with females being the longer.

Description: These toads are brown with a yellowish line down the centre of their back and rows of brown spots on each side with reddish warts. The belly is whitish spotted with grey. The salivary glands (that secrete toxins) are large oval and meet the skull crests that form between the eyes. Projections on the hind feet are used for burrowing.

Habitat: Found near ponds and lakes in prairies, aspen and boreal forests, Canadian toads are

terrestrial, taking to water to avoid capture. They hibernate in the fall by burrowing into the earth, emerging when the soil thaws. Adults feed on worms, beetles and ants and can live up to 7-12 years.

Behaviour: Males call to initiate breeding with a brief trill. This occurs in ponds from May to July. Females lay up to 6000 eggs in long strings, which hatch into tiny black tadpoles in 3-12 days. Feeding on aquatic vegetation, over 7-11 weeks they transform into juveniles. Males reach maturity after 1 year and females after 2 years. Predators include fish, dragonfly nymphs, predacious diving beetles, many birds and most carnivores.

Conservation Status: May be at risk. Once common in boreal and parkland habitats, dramatic declines in populations and distributions are occurring, but population monitoring is ongoing. Habitats are threatened by drought, conversion to farm land, agricultural chemicals, and oil and gas activities.

Hylidae (Tree Frogs)

Boreal Chorus Frog

Boreal Chorus Frog *Pseudacris maculata*



Size: Alberta's smallest amphibian, the Boreal Chorus Frog, is only 2-4 cm (0.8-1.6 in.) long.

Description: Also called the Striped Chorus Frog it is brown or green with 3 broken back stripes (distinct or faint). There is a stripe through the eye and along the side. Slightly enlarged toe pads aid in climbing small grasses but they are not good climbers. The legs are shorter than those of the western chorus frog.

Habitat: They feed on a variety of invertebrates including snails and insects.

Behaviour: This species is found around permanent water bodies in cleared land and forests; also in sloughs and open meadows with sufficient cover and moisture. Breeding occurs annually from February to April. After mating a single female can lay 500-1500 eggs, in masses of jelly attached to vegetation in shallow water. The eggs hatch in 10-14 days and tadpoles become juvenile frogs in 2 months. They reach maturity the next summer. Predators include fish, dragonfly nymphs, many birds and most carnivores.

Conservation Status: Secure in AB.

Ranidae (True Frogs)

Wood Frog
Northern Leopard Frog

Wood Frog *Lithobates sylvatica*



Size: The smallest true frog in Alberta, the wood frog is 5-7 cm (2-2.8 in.) long.

Description: They are brown, tan or rust with a light back stripe and dark eye mask. The belly is yellow or green and the hind legs are striped. The smooth skin may have prominent ridges and warts high on the sides.

Habitat: Wood frogs eat a variety of invertebrates, including worms and insects, with tadpoles grazing on algae and plant detritus. Movement of prey triggers the frog to lunge, open its mouth and make

contact with the tip of the tongue only. They leap to escape predators.

Behaviour: Wood frogs are found in moist woodlands, forested swamps, ravines and bogs. They overwinter in upland areas beneath the soil and leaf litter. They can tolerate the freezing of their blood and tissues utilising urea and glucose as antifreeze. Breeding occurs from late April to June. Males have a duck-like call. Females deposit eggs on submerged vegetation next to other egg masses for protection in shallow clear temporary ponds. The eggs hatch after 3 weeks and become juvenile frogs in 6-12 weeks. Most wood frogs only breed once in their lifetime. Predators include fish, dragonfly nymphs, predacious diving beetles, many birds and most carnivores.

Conservation Status: Secure in AB.

Northern Leopard Frog *Lithobates pipiens*



Size: This large frog species can be 11 cms (4.3 in.) long.

Description: It is green or brown with circular dark spots bordered by light rings on its back, sides and legs. A pair of light folds run from behind the eyes and down the back, with a pale stripe under each eye across to the shoulders. The belly is pale. The iris is golden with a black horizontal pupil. The toes are webbed.

Habitat: Found in ponds, swamps, marches and streams with abundant vegetation. In summer they move to grassy areas.

Behaviour: These frogs eat anything that will fit into their mouths, including crickets, worms and flies. They are preyed on by herons, snakes, turtles and fish, and are used in medical research. Leopard frogs breed in spring. Males make a short snore-like call to attract females. Up to 6,500 eggs are laid in water. These hatch after 9 days and metamorphosis is complete in 70-110 days. The juveniles are 2-3 cm (0.8-1.2 in.) long and resemble adults. They may live for up to 4 years.

Conservation Status: At risk in AB. This species has severely declined since the late 1970s. Previously common and widespread, it has disappeared from most of its Alberta range. It may still occur around Big Lake, but most of the breeding population in the southeast of the province. The protection of remnant breeding areas is essential.

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