

THREATENED SPECIES

Western Gray Squirrels Receive Attention

ONE MIGHT MISTAKE WESTERN gray squirrels for the introduced eastern gray squirrels that have invaded city parks throughout the Pacific Northwest. A closer look, however, would show that western gray squirrels are slightly bigger than the introduced gray squirrels with the reddish-brown wash to their faces, backs and tails. Western gray squirrels have longer tails and a more salt and pepper coat. And a look at the state's threatened species list would show that western gray squirrels have been listed since 1993.

Western gray squirrel populations in Washington are believed to be declining with only three isolated populations in the state—one of which can be found in the Stehekin Valley in the North Cascades. The state's review of the Stehekin population found no information on population numbers or trends, and concluded that it is highly vulnerable and may not survive without active management. Although western gray squirrels are common in California and Oregon where oak trees are common, park researchers do



not know how the population persists in Stehekin Valley where there are no oaks. The Valley's forests provide squirrels with conifer seeds, mushrooms, insects, berries, and canopies for nesting. But park researchers are concerned that park management in the Valley may be affecting the gray squirrel population.

Park researchers realize they know little about the gray squirrels' habitat requirements in the Stehekin Valley, according to park biologist Bob Kuntz. "Without better understanding

how the squirrels use resources in the Stehekin Valley, it is unknown whether, over the long term, they can continue to persist," Kuntz said. Their small, isolated populations, sensitivity to habitat change, and low reproductive rates (one litter per year) make them susceptible to extinction.

In partnership with the University of Washington and U.S. Geological Survey, North Cascades biologists hope to learn more about the squirrels through a three-year study planned to start in fall 2007. Researchers will capture and attach radio-collars to approximately 30 squirrels to assess vital demographic rates and habitat requirements on western gray squirrel populations in Stehekin. The study also seeks to determine how current park management and private land-owner's actions impact the Valley's western gray squirrel population. Biologists hope this study will help identify necessary management actions to maintain a viable population of western gray squirrels in Stehekin Valley.

Threatened, Endangered Species Find Refuge in North Cascades

According to fossil records, the current rate of species extinction is the fastest in history. Recovering rare and listed species is stated as the number one priority of North Cascades National Park Service Complex's Resource Management Plan, since the loss of one species affects the whole ecosystem. Eight known federally-threatened and endangered animal species persist in the Park Complex, though some of the species are rarer to spot than others. Habitat loss is the prime threat to species at risk of extinction, but poaching and invasive non-native species also cause numbers to dwindle. Research, in places such as North Cascades National Park, helps identify problems that rare species face.

Before a species is placed on the U.S. Fish and Wildlife Service's federal list of endangered and threatened wildlife and plants, a strict legal process determines the status of the species. An endangered species is one in danger of extinction throughout a significant portion of its range, whereas a threatened species is one likely to become endangered in the foreseeable future. The federal listing also records plants and animals that are candidates (proposed additions). Washington State Department of Fish and Wildlife maintains state specific listings for species.

For more information on the status of species, visit: <http://www.fws.gov/endangered> For North Cascades specific information, visit: www.nps.gov/noca/treas.htm



Northern Spotted Owl

Federal: Threatened
State: Endangered

These 17.5-inch owls, splashed with white spots among their brown feathers, prowl at night, and have large dark eyes. They rely on old-growth forests, nesting mostly in trees more than 200 years old, and they are rare in the park.

Bull Trout

Federal: Threatened State: Candidate

These polka-dot backed fish have white trim around each fin with no black on their dorsal fins. They prefer cold waters with temperatures just above freezing. Females build nests in the gravel and lay up to 5,000 eggs. Added to the endangered species list in 1997, bull trout are now extinct in some previously inhabited lakes and streams.

See page 2

Chinook Salmon

Federal: Threatened State: Candidate

The largest of the Pacific salmon, the king salmon weigh between 12 to 40 pounds and have a silvery, olive-brown and purple coloring. They prefer fresh water streams and deep pools, though they eventually migrate to the ocean. They persist in the Skagit River watershed, along with all five Pacific salmon species.

Western Gray Squirrel

State: Threatened

These squirrels use their bushy tails, which are as long as their bodies, for balance when jumping. They live in wooded areas, and build nests of sticks and shredded bark about 20 feet above the forest floor. A small population lives in the Stehekin Valley.

See above story

Canada Lynx

Federal: Threatened State: Threatened

Lynx, a member of the cat family, have large padded feet for snow travel and heavy, brown coats for cold weather. Lynx depend primarily on snowshoe hares, but will prey on other mammals if necessary. When hares are scarce, the lynx population declines. A small number of lynx live in the Pasayten Wilderness east of Ross Lake.

Grizzly Bear

Federal: Threatened State: Endangered

Grizzly bears can be difficult to distinguish from black bears. Grizzly bears usually have shoulder humps, dished faces and long, straight claws on their forefeet. Grizzlies often rear on their hind legs to get a better view of their surroundings. They require large territories to roam, breed only once every three to five years and produce a litter of one to two cubs. Grizzlies are extremely rare in the North Cascades.

Marbled Murrelet

Federal: Threatened
State: Threatened

These robin-sized diving sea birds have wings that allow them to fly underwater. They lay only one egg each season, and the parents travel to and from the ocean to bring food back for their chick. Murrelets migrate from the sea to nest high in the trees of old-growth forests. They have been sighted near the west boundary of the park.

See page 8

Gray Wolf

Federal: Endangered State: Endangered

These long legged and large footed wolves move quickly through snow and thick shrubbery. They live in open forests and tundra in families or packs, and are rare in the park.

Bald Eagle

Federal: Threatened State: Threatened

As adults, bald eagles can grow to 3 feet tall with wingspans of more than 7 feet. Adults have dark brown bodies, yellow beaks and white heads and tails. The Skagit River watershed supports one of the largest wintering populations of bald eagles within the contiguous United States.

Fisher

State: Endangered

These carnivores belong to the weasel family, but can grow to over 3 feet and weigh more than 30 pounds. These elusive hunters once occurred throughout Washington, however, extensive surveys have been unable to confirm the existence of a population in the state.

