



WILDLIFE

Managing Pocket Gophers

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by W.F. Andelt and R.M. Case ¹

Quick Facts...

Four species of pocket gophers are found in Colorado.

Pocket gophers reduce productivity of portions of alfalfa fields and native grasslands by 20 to 50 percent.

Damage by pocket gophers can be reduced by exclusion, cultural methods and habitat modification, trapping, and toxicants applied by hand or with a burrow builder.

Four species of pocket gophers are found in Colorado and distributed almost entirely in different areas (Figure 1), possibly because of different ecological requirements or competition. Plains pocket gophers (*Geomys bursarius*) are abundant in sandy and silty soils of the plains but are not abundant in compacted soils. The northern pocket gopher (*Thomomys talpoides*) occurs in deep, sandy soils of the plains to shallow gravel in mountainous areas. It is the most common species in mountain rangelands and forests. The Botta's (formerly called valley) pocket gopher (*Thomomys bottae*) is found primarily in well-developed soils of warm valleys in southern Colorado. The yellow-faced pocket gopher (*Pappogeomys castanops*) inhabits a portion of southeastern Colorado where the plains pocket gopher is found. However, the yellow-faced pocket gopher is confined to drier sites. Pocket gophers attain the highest densities on light-textured soils with good herbage production. Shallow soils limit pocket gophers due to tunnel cave-ins and poor insulation from warm summer and cold winter temperatures.

Distinguishing among the four species of pocket gophers in Colorado is moderately easy. The northern and Botta's pocket gophers have smooth upper incisors with a single indistinct groove near the inner border and have smaller bodies and proportionately smaller front feet than the plains and yellow-faced pocket gophers. The northern pocket gopher usually is dark-colored with a whitish chin and belly whereas the Botta's pocket gopher is often reddish-brown with a blackish chin and reddish belly. These two species are often difficult to tell apart. The plains pocket gopher has two distinct grooves on the front surface of each upper incisor whereas the yellow-faced pocket gopher has one distinct groove.

Biology, Reproduction and Behavior

Pocket gophers feed on roots they encounter from digging, from vegetation they pull into the tunnel from below, and vegetation above ground near the tunnel. They like above-ground vegetation when it is green and succulent. Pocket gophers prefer alfalfa. Many trees and shrubs are clipped just above ground, especially under snow cover.

Pocket gophers construct burrow systems by loosening the soil with their claws and incisors, then use their forefeet and chest to push the soil out of the burrow. The soil is deposited in fan-shaped mounds 12 to 18 inches wide and 4 to 6 inches high.

Burrow systems consist of a main tunnel, generally 4 to 18 inches below the soil surface, and a variable number of lateral burrows extending from the main. Lateral burrows end with a soil mound or only a soil plug at the surface. Burrows are about 2 to 3 1/2 inches in diameter, depending on the size of the

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