

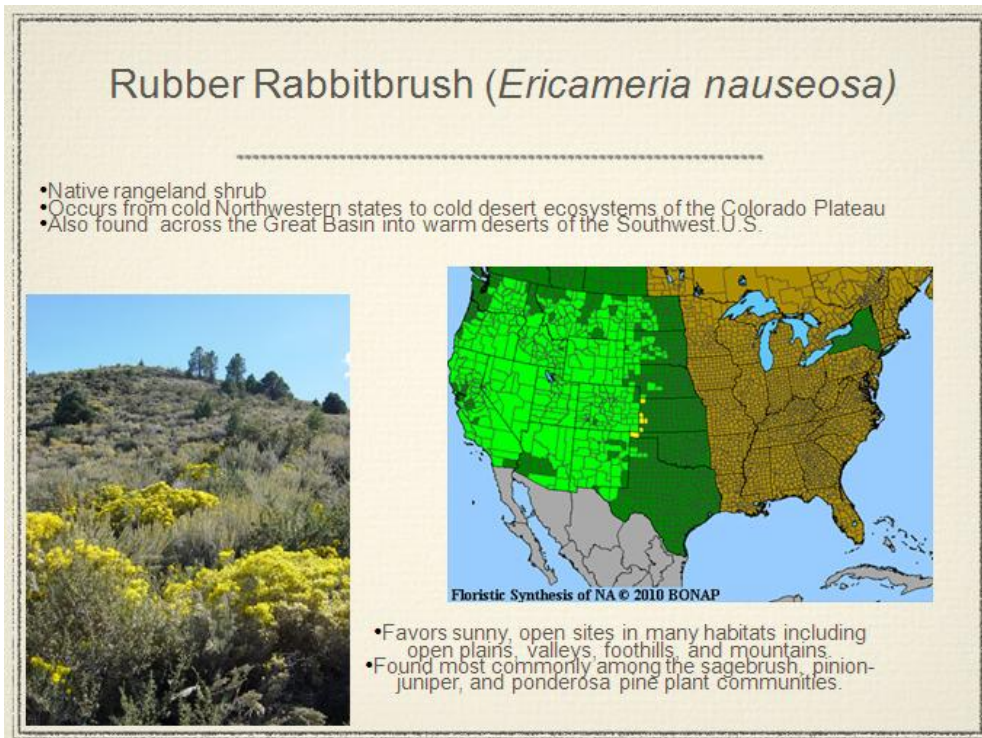
Rubber Rabbitbrush: Controlling a Native Shrub

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ABSTRACT: In recent years, rubber rabbitbrush has become a major problem on rangelands in Southwest Colorado. Its ability to spread quickly and out compete other native plants has decreased the health of local rangelands. Rubber rabbitbrush is a native species stretching from the cold desert ecosystems of the Colorado Plateau, across the Great Basin, into the warm deserts of the Southwest. Rangelands that have experienced recent fires, over grazing, or other disturbances are often taken over by dense stands of rabbitbrush. Conventional methods of controlling the shrub have been ineffective, so recent research has now been focused on finding a biological control. The rabbitbrush beetle (*Trirhabda nitidicollis*) is considered to be the most effective insect although there are also two fruit flies that use rabbitbrush as their host. This biological control is the rabbitbrush beetle and tests have shown that it is effective in controlling rubber rabbitbrush. Biological control of rubber rabbitbrush appears to be an effective and economical alternative over the conventional treatments of herbicides and prescribed fire. Complete eradication of rabbitbrush is not a realistic and intended goal. Proper grazing management must be practiced on all lands where rabbitbrush control is applied in order for the benefits from the rangeland to be sustained. This should apply regardless of the control method being considered. Rubber rabbitbrush is a native shrub that does fit a niche in western rangeland and soils. The goal of biological control is to check the spread and reduce the amount of plants in a stand to open it up for native grass production and improved rangeland health.



Biological Control: Rabbitbrush Beetle (*Trirhabda nitidicollis*)

- The insect that is being proposed is the rabbitbrush beetle.



- A native insect that occurs from Western Montana down to New Mexico and west into California.

Rabbitbrush Beetle (*Trirhabda nitidicollis*)

- Adults lay their eggs around August where they overwinter.

- The eggs then hatch in April and the first instar larvae begin to feed. They progress through various stages before entering the soil to pupate.



- Adult emerges and begins to feed on the foliage of the plant until they are ready to mate.