

Antennaria arcuata Cronquist (1950)**MEADOW PUSSYTOES**

FAMILY: *Asteraceae*, the sunflower family.

STATUS: **Heritage Program SENSITIVE LIST, ranks: G2 S1**

USFWS/ESA: species of concern. **STATE OF NEVADA:** none. **BLM:** Special Status Species in Nevada.

USFS: Humboldt-Toiyabe NF Sensitive Species. **NNNPS:** watch list.

POPULATION CENSUS (NEVADA): **4 occurrences mapped;** total estimated **individuals 1002+**, total estimated **area 0.82+ ha (2.0+ ac)**. **TREND:** unknown.

IMPACTS AND MAJOR THREATS (NEVADA): Livestock grazing and trampling, water diversions and impoundments, and resulting long-term hydrology alterations, hay mowing, competition with invasive weeds, mineral extraction developments.

INVENTORY EFFORT (NEVADA): Not yet systematically surveyed in Nevada, but most potential habitat has been examined. Most recent entered survey 1984, average year of last survey 1981.

Years since last entered survey (percent of mapped records at various survey ages): **11-20 yrs: 50%; 21-30 yrs: 50%.**

LAND MANAGEMENT (NEVADA) in decreasing predominance: Humboldt-Toiyabe National Forest, U. S. Bureau of Land Management, Nevada state lands, private lands (?).

RANGE: Elko County, Nevada; also in ID and WY. Maximum Nevada **range dimension 7.8 km (4.8 mi)** excluding most disjunct record. **Type specimen** collected in Blaine County, Idaho.

ELEVATIONS RECORDED (NEVADA): 6200-6500 feet (1890-1981 meters).

HABITAT (NEVADA): Bare, periodically disturbed soil in marginal, seasonally dry parts of moist, often hummocky, alkaline meadows, seeps, and springs, surrounded by sagebrush and grassland associations. Aquatic or wetland-dependent in Nevada.

PHENOLOGY: flowering summer. Range of most frequent **survey months:** July-August.

LIFE-FORM AND HABIT: stoloniferous short-lived perennial herb.

DESCRIPTION: *Antennaria arcuata* is a loosely white-woolly perennial herb with conspicuously arching stolons. Stolons extend up to 1 dm long and give rise to new plants. Plants are dioecious (either staminate or pistillate). Basal leaves are few, wider at the top, and several cm long. Flowering stems are solitary, 3 to 4 dm tall, with well-developed, and gradually reduced stem leaves. The flower heads are moderately numerous and arranged in a close terminal cluster. Male and female plants vary slightly in size of flowers, involucre (bracts at base of flower head), and pappus (modified calyx on top of ovary/fruit) (Lorain 1990). **Distinguishing features:** The most distinctive feature of *Antennaria arcuata* is its conspicuously arching, woolly stolons (hence its common name). This feature is diagnostic. Other characters to look for are the single flowering stem, white-woolly pubescence, and preference for damp meadow habitats.

PHOTOGRAPHS: Anderson et al. (1991), Fertig et al. (1994), Smith and Curto (1995); Nevada Natural Heritage Program slide collection (1986-present) and files.

ILLUSTRATIONS: Anderson et al. (1991), Cronquist (1994), Fertig et al. (1994), Hitchcock and Cronquist (1973), Mozingo and Williams (1980).

SPECIFIC REFERENCES:

Cronquist, A. 1950. Notes on the Compositae of the northwestern U. S. Leaflets of Western Botany 6: 41-50.

Dorn, R. D. 1980. Illustrated guide to special interest vascular plants of Wyoming. Cheyenne, Wyoming: U. S. Fish and Wildlife Service and Bureau of Land Management. 67 pages.

Fertig, W. 1996. Status report on *Antennaria arcuata* in central Wyoming. Laramie: Wyoming Natural Diversity Database, prepared for the Bureau of Land Management, Wyoming State Office. 126 pages.

Lorain, C. C. 1990. Report on the conservation status of *Antennaria arcuata* in Idaho. Boise: Idaho Department of Fish and Game.

Marriott, H. 1986. Status report on *Antennaria arcuata*. Laramie: Wyoming Natural Diversity Database, prepared for the U. S. Fish and Wildlife Service. 42 pages + appendices.

Steele, B., F. Johnson, and S. Brunsfield (editors). 1981. Vascular plant species of concern in Idaho. Moscow, Idaho: Forest, Wildlife and Range Experiment Station. 161 pages.

OF FURTHER INTEREST: Individual plants are usually in small, dense, unisexual clusters. Populations generally consist of equal proportions of staminate and pistillate plants (Fertig 1996). Distinct, although no studies have been done to show that the Wyoming, Idaho and Nevada (all significantly disjunct) populations represent the same taxon.
