

**ARIZONA GAME AND FISH DEPARTMENT
HERITAGE DATA MANAGEMENT SYSTEM**

Plant Abstract

Element Code: PDBRA060R0

Data Sensitivity: No

CLASSIFICATION, NOMENCLATURE, DESCRIPTION, RANGE

NAME: *Boechera gracilipes*

COMMON NAME: Rock Cress

SYNONYMS: *A. arcuata* var. *longipes*, *Arabis gracilipes* Greene

FAMILY: Brassicaceae

AUTHOR, PLACE OF PUBLICATION: Greene, 1900. Pittonia 1:193.

TYPE LOCALITY: Near Flagstaff, Arizona. N.C. Wilson, 1893.

TAXONOMIC UNIQUENESS: Distinct species of ca 111 species of *Boechera*. Primarily a North American genus, especially in the western United States, but range includes Greenland and far eastern Russia. Members of this genus separated from genus *Arabis* based on genetic and cytological data (Al-Shehbaz, 2003).

DESCRIPTION: Stems usually single, arising from center of rosette near ground surface. 70.0-100.0 cm (28.0-40.0 in.) tall, stout, densely pubescent below, glabrous above. Leaves numerous, crowded at base of stem. Blades mostly 1.0-3.0 cm (0.75-1.25 in.) long, lower ones more or less dentate, upper entire. Raceme often half as long as entire stem. Pedicels slender 2.0-4.0 cm (0.8-1.75 in.) long, spreading. Siliqua 2.0-6.0 cm (0.8-2.75 in.) long, about 2.0 mm (0.08 in.) wide. Nerved at least in lower half, seeds biseriate (McDougall 1973).

AIDS TO IDENTIFICATION: Fruiting pedicel length, considered diagnostic by R. C. Rollins (1993) and N. H. Holmgren (2005b), occasionally fails to separate *Boechera gracilipes* from the closely-related *B. fendleri*. The two are consistently distinguished by trichome characters. In *B. gracilipes*, basal leaves usually lack prominent cilia and surfaces are persistently pubescent with at least some 3-rayed trichomes. Also, stems are rather densely pilose proximally, with the largest trichomes more than 0.9 mm. By contrast, basal leaves of *B. fendleri* always have prominent cilia, surfaces are often glabrescent, and 3-rayed trichomes usually are rare or absent. Stems of the latter are proximally hirsute to hispid, with the largest trichomes less than 0.9 mm (FNA, Vol. 5. 2005).

ILLUSTRATIONS:

TOTAL RANGE: Known from Arizona, Nevada, and Utah.

RANGE WITHIN ARIZONA: Coconino, Mohave, Gila and Yavapai counties.

SPECIES BIOLOGY AND POPULATION TRENDS

GROWTH FORM: Perennial or biennial herb

PHENOLOGY: April to June

BIOLOGY:

HABITAT: Ponderosa pine forests and pinyon-juniper woodlands

ELEVATION: 5,577 to 7,545 ft (1700-2300 m).

EXPOSURE:

SUBSTRATE: Basalt, limestone, and sandy soils

PLANT COMMUNITY:

POPULATION TRENDS:

SPECIES PROTECTION AND CONSERVATION

ENDANGERED SPECIES ACT STATUS:

STATE STATUS:

OTHER STATUS:

MANAGEMENT FACTORS:

PROTECTIVE MEASURES:

SUGGESTED PROJECTS:

LAND MANAGEMENT/OWNERSHIP:

SOURCES OF FURTHER INFORMATION

LITERATURE CITATIONS:

- Al-Shehbaz, I.A., 2003. Transfer of most North American species of Arabis to Boechera (Brassicaceae). Novon, pp.381-391.
- Kearney, T.H., R.H. Peebles with collaborators. 1960. Arizona flora. Second edition with supplement by J.T. Howell, E. McClintock and collaborators. University of California Press, Berkeley. pp. 350-351.
- Lehr, J.H. 1978. A catalogue of the flora of Arizona. Desert Botanical Garden, Phoenix, Arizona. p. 57.
- McDougall, W.B. 1973. Seed plants of Northern Arizona. The Museum of Northern Arizona, Flagstaff. p. 193.

MAJOR KNOWLEDGEABLE INDIVIDUALS:**ADDITIONAL INFORMATION:**

Revised: 1989-11-06 (ANHP)
1991-10-20 (BKP)
1995-05-16 (DBI)
2020-06-12 (KSL)

To the user of these abstracts: you may use the entire abstract or any part of it. We do request, however, that if you make use of these abstracts in plans, reports, publications, etc. that you credit the Arizona Game and Fish Department. Please use the following citation:

Arizona Game and Fish Department. 19XX (= **year of last revision as indicated at end of abstract**). X...X (= **taxon of animal or plant**). Unpublished abstract compiled and edited by the Heritage Data Management System, Arizona Game and Fish Department, Phoenix, AZ. X pp