Plant Data Sheet

Species
Silky lupine, *Lupinus sericeus*, Pursh

Photo credit: Wildflowers of Glacier National Park, Montana; **mtylerjr.smallbizdepot.com/Pictures/Montana/Wildflowers/**

Range
Silky lupine occurs east of the Cascade Range from British Columbia south to California and Arizona and east to Alberta, Montana, South Dakota, Colorado, and New Mexico. (Hitchcock and Cronquist 1973)

Climate, elevation
Silky lupine has been found to 10,000 feet (3,030 m) elevation in Colorado and Utah (FEIS database)

Local occurrence
East of the Cascades, silky lupine occurs as a significant component of the herbaceous layer in ponderosa pine savannas, shrub-steppe, and grassland communities. (FEIS database)

Habitat preferences
Silky lupine occurs in a range of habitats including grasslands, sagebrush, mountain brush, and aspen and conifer forests. Silky lupine is found on dry, rocky sites on gentle to steep slopes and in open woods. (FEIS database)

Plant strategy type/successional stage
Seral species. Tolerant of partial shade but prefers full sun. Occurs in open, climax ponderosa pine systems throughout its range and in openings within late-seral Douglas-fir forests in Idaho. (FEIS database)

Associated species
Some species commonly associated with silky lupine include Gambel oak (*Quercus gambelii*), common snowberry (*Symphoricarpos albus*), ninebark (*Physocarpus malvaceus*), serviceberry (*Amelanchier* spp.), mountain-mahogany (*Cercocarpus* spp.), arrowleaf balsamroot (*Balsamorhiza sagittata*), western yarrow (*Achillea millefolium*), heartleaf arnica (*Arnica cordifolia*), pinegrass (*Calamagrostis rubescens*), bluebunch wheatgrass (*Pseudoroegneria spicata*), Sandberg bluegrass (*Poa secunda*), Idaho fescue (*Festuca idahoensis*), prairie junegrass (*Koeleria cristata*), and sedges (*Carex* spp.). (FEIS database)

May be collected as:
Seed

Collection restrictions or guidelines
Collect seedpods when they turn tan, before dehiscence. Pods are generally mature from July into August depending upon location. (FEIS database; Hosokawa, et al. 2001)

Seed germination
Silky lupine seeds are protected by a hard seed coat and need germination pretreatments of scarification and stratification. One method for achieving germinable seeds is as follows: Seeds are placed in a hot water scarification bath and allowed to cool overnight to imbibe. Seeds are wrapped in moist paper towels and placed under refrigeration at 3 degrees C for a 30-day stratification. (Hosokawa, et al. 2001)

Seed life (can be stored, short shelf-life, long shelf-life)
Seeds can remain viable from 20 to 60 years in sealed containers at 3 to 5 C. (Hosokawa, et al. 2001)

Recommended seed storage conditions
Dry seeds in sealed containers stored at 3 to 5 C.

Propagation recommendations
Seed

Soil or medium requirements
Seeds should be inoculated with *Rhizobium* specific to *Lupinus* spp. and can be planted for container production in a soilless mix of peat, perlite, vermiculite and sand with a controlled release fertilizer. (Hosokawa, et al. 2001)
Silky lupine grows best on sites with dry, sandy, loamy, sandy-loam, and clayey-loam soils. (FEIS database)

Installation form
Silky lupine does not transplant well, so direct seeding after inoculation with *Rhizobium* is recommended. If container grown seedlings are used, they should be transplanted the first year if possible and can be installed in the spring or fall. (Hosokawa, et al. 2001)

Recommended planting density
No data found.

Care requirements after installed
Water regularly at least through first growing season.

Normal rate of growth or spread; lifespan
Container grown seedlings are large enough for transplanting after 1 growing season.

Sources cited
FEIS database: Accessed on 5/9/03, www.fs.fed.us/database/feis/plants/forb/lupser

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Data compiled by Anne G. Andreu, 5/9/2003