

SPECIES EVALUATION

Kobresia schoenoides, Priority B-1. *Kobresia schoenoides* (C. A. Meyer) Steudel (KOSC2) CNHP: *Kobresia sibirica*. Siberian bog sedge. CNHP G5 / SR, Track A G5 N?. CO SR, WY S1. WY Disjunct, 4 SNF.

Criteria	Rank	Confidence	Rationale	Sources of Information
1 Distribution within R2	B	H	Patchy distribution, although the terminology in the rating descriptions don't really fit this species. Ranked S1 in Wyoming and S1 in Montana, but not ranked in Colorado.	Specimens at COLO and RM, CNHP records, Weber and Wittmann 2001a, Dorn 2001.
2 Distribution outside R2	B	H	Occurs more commonly on the north slope of Alaska, but otherwise a patchy, disjunct distribution in western North America and in Siberia.	Hultén 1968.
3 Dispersal Capability	D	H	Dispersal mechanisms unknown.	
4 Abundance in R2	C	L	"Four occurrences in Wyoming; census data are lacking for most sites. Surveys in 1996 on the Beartooth Plateau found this species to be locally abundant, but restricted to small areas of suitable microhabitat" (Handley and Laursen 2002). About 25 recorded occurrences in Colorado, but there are undoubtedly more to be discovered. However, "demographic stochasticity" does not apply to this species.	Handley and Laursen 2002, Fertig 2000, specimens at RM and COLO.
5 Population Trend in R2	B	M	The few populations revisited appear to have stable numbers.	Fertig 2000.
6 Habitat Trend in R2	B	L	"Alpine fellfields and tundra ridges" (Fertig 2000). "Forming dense hummocks in moist tundra, solifluction slopes and gravelly alpine lake shores" (Weber and Wittmann 2001a). These do seem like different habitats. Habitats appear stable, but few habitats have been monitored even informally.	Fertig 2000, Weber and Wittmann 2001a, Handley and Laursen 2002.
7 Habitat Vulnerability or Modification	B	M	The Wyoming habitats appear not be vulnerable to recreational trail use or other uses of Alpine ecosystems, but the Colorado habitats would be more vulnerable, since they apparently occur on deeper soils or more moveable slopes.	Fertig 2000, Weber and Wittmann 2001a, Handley and Laursen 2002.
8 Life History and Demographics	D	H	Details of life history and demographics unknown.	

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National Forests in the Rocky Mountain Region where species is KNOWN (K) or LIKELY (L)* to occur:

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COLORADO NF/NG	K	L	NEBRASKA NF/NG	K	L	WYOMING NF/NG	K	L
Arapaho-Roosevelt NF	K		Samuel R. McKelvie NF			Shoshone NF	K	
White River NF			Halsey NF			Bighorn NF		
Routt NF			Nebraska NF			Black Hills NF		
Grand Mesa Uncompahgre Gunnison NF		L	Ogala NG			Medicine Bow NF		
San Juan NF			SOUTH DAKOTA NF/NG			Thunder Basin NG		
Rio Grande NF			Black Hills NF			KANSAS NF/NG		
Pike-San Isabel NF	K		Buffalo Gap NG			Cimarron NG		
Comanche NG			Ft. Pierre NG					
Pawnee NG								

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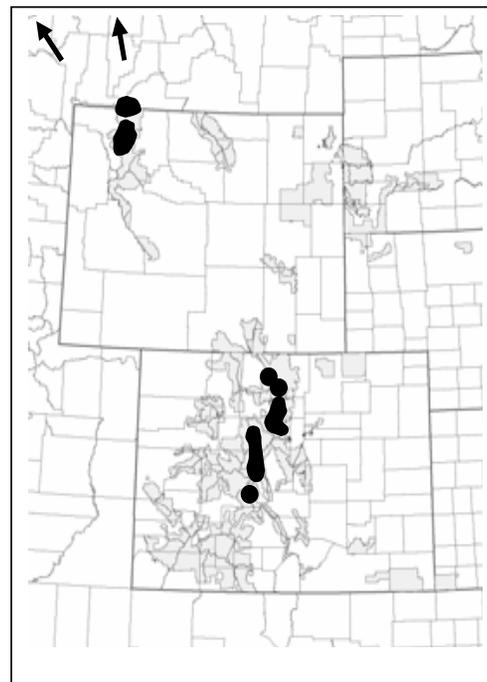
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Taxonomy. This species is now called *Kobresia schoenoides*, but it formerly was called *Kobresia sibirica* Turczaninow (Hultén 1968) or *Kobresia macrocarpa* Clokey (MTNHP 2002).

Discussion. *Kobresia schoenoides* apparently is more abundant in Colorado than in Wyoming or Montana, but the habitats as described are more vulnerable in Colorado than they are in Wyoming. Region-wide, this species does not have many viability concerns.

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SPECIES EVALUATION
REGION 2 SENSITIVE SPECIES EVALUATION FORM

Species: <i>Kobresia schoenoides</i> / Siberian Kobresia (<i>K. macrocarpa</i> , <i>K. sibirica</i>)			
Criteria	Rank	Rationale	Literature Citations
1 Distribution within R2	AD	Siberian Kobresia occurs in the Beartooth and Absaroka ranges of Park County, Wyoming, on the Shoshone National Forest. It also occurs in Colorado, therefore, additional information is necessary in order to determine its status in Region 2. This species is found on alpine fellfields and tundra ridges. It often occurs on stony, wind-blown sites dominated by <i>Geum rossii</i> turf or rich in cryptogams on solifluction terraces or lobes. The elevational range is from 10,000 to 11,500 feet. These alpine habitats are discontinuous across the landscape. Confidence in Rank High	<ul style="list-style-type: none"> • Dorn 2001 • Fertig 1997, 1998, 2000 • Fertig and Bynum 1994 • Johnson 1962 • Porter 1965 • Rosenthal 1998, 1999 • Scott 1997 • University of Wyoming 1998
2 Distribution outside R2	B	Siberian Kobresia is circumboreal. In North America it is known from Alaska to the Northwest Territories and south in the Rocky Mountains to Colorado. Its range in the Region is considered disjunct. Confidence in Rank High	<ul style="list-style-type: none"> • Hulten 1968 • Lesica and Shelly 1991 • Porsild 1980 • Scott 1997
3 Dispersal Capability	D	Dispersal vectors are unknown. Confidence in Rank High	<ul style="list-style-type: none"> • -
4 Abundance in R2	AD	Siberian Kobresia is known from 4 occurrences in Wyoming, all of which have been observed since 1981 (most recently in 1999). All known populations are on the Shoshone National Forest. Census data are lacking for most sites. Surveys in 1996 on the Beartooth Plateau found this species to be locally abundant, but restricted to small areas of suitable microhabitat. This species is ranked "S1" in Wyoming and "SR" in Colorado. Confidence in Rank High	<ul style="list-style-type: none"> • Fertig 1997, 1998, 2000 • Fertig and Bynum 1994 • Rosenthal 1998, 1999 • University of Wyoming 1998 • USDA Forest Service 2001 • WYNDD 2002
5 Population Trend in R2	D	Trends are not known. Populations may currently be stable, although no data are available to predict past abundance and distribution. Confidence in Rank High	<ul style="list-style-type: none"> • -
6 Habitat Trend in R2	D	Not known. They may have been impacted in the past by sheep grazing. Confidence in Rank High	<ul style="list-style-type: none"> • -
7 Habitat Vulnerability or Modification	BD	Most colonies are probably not threatened or vulnerable, although Siberian Kobresia occurs in special management areas and on lands managed for multiple use by the Shoshone National Forest. Confidence in Rank High	<ul style="list-style-type: none"> • Fertig 1997, 1998, 2000 • Fertig and Bynum 1994 • Rosenthal 1998, 1999 • University of Wyoming 1998 • WYNDD 2002
8 Life History and Demographics	D	Siberian Kobresia is a densely tufted, perennial graminoid. Flowering and fruiting occur from July through August. Additional information on the species, including life history stages, population structure, longevity, mortality, and seed biology, are not available. Confidence in Rank High	<ul style="list-style-type: none"> • Hulten 1968 • Porsild 1980 • Scott 1997
Initial Evaluator(s): Joy Handley and Scott Laursen			Date: April 1, 2002

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National Forests in the Rocky Mountain Region where species is KNOWN (K) or LIKELY(L)¹ to occur:

<u>Colorado NF/NG</u>		<u>Kansas NF/NG</u>		<u>Nebraska NF/NG</u>		<u>South Dakota NF/NG</u>		<u>Wyoming NF/NG</u>	
Known	Likely	Known	Likely	Known	Likely	Known	Likely	Known	Likely
		Cimmaron NG		Samuel R. McKelvie NF		Black Hills NF		Shoshone NF	X
				Halsey NF		Buffalo Gap NG		Bighorn NF	
				Nebraska NF		Ft. Pierre NG		Black Hills NF	
				Ogalala NG				Medicine Bow NF	
								Thunder Basin NG	

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