

Terrestrial Conservation Focus Areas in Greatest Need (Tier I)

Missouri Coteau (5,278,913 acres)



Figure 23. Missouri Coteau Focus Area

The Missouri Coteau area represents part of the large continental prairie grassland and pothole habitat that occurs in eastern Montana. This portion of Montana's prairie pothole country contains the highest density of natural wetlands. In most years springtime finds this area dotted with small wetlands. These shallow wetlands shine amongst the small glacial hilltops that are covered with short- to mid-grass prairie species. The density of wetlands on the landscape are unique to Montana, leading to diverse wildlife and vegetative species. This is the main portion of Montana that is considered to be part of the North American duck factory, the other being areas north of Chinook.

Landscape Characteristics

This area consists of hummocky plains, outwash and stream terraces, fans, and floodplains that formed in thin glacial till and river sediments that lie over shale, siltstone, and sandstone. Moraines, kames, kettles, and small lakes also occur. Elevations range from 1,650 to 3,050 feet. Drainage density is moderate. Mean annual precipitation ranges from 12 to 15 inches, with about 20 percent falling as snow. The soil temperature and moisture regimes are frigid and udic. Primary natural disturbances include extended droughts, insects, and severe storms. Another important natural disturbance regime is prairie dog complexes. Land use is predominantly wheat farming and range and pasture lands. The breakdown for land stewardship in the Missouri Coteau area is as follows:

U.S. Federal Agencies:	147,337 acres, or 2.8% of total area, which include:
BLM:	117,375 acres, or 2.2% of total area

USFWS:	29,900 acres, or 0.6% of total area
NPS:	62 acres, or less than 0.1% of total area
State Agencies:	386,782 acres, or 7.3% of total area
Tribal Lands:	691,154 acres, or 13.1% of total area
Private:	4,040,173 acres, or 76.5% of total area
County and City:	62 acres, or less than 0.1% of total area

Associated Habitats

Habitat	Habitat Tier	Percentage of Area
Moderate/High Cover Grasslands	I	3.57
Agricultural Lands - Irrigated	III	5.39
Wetland and Riparian	I	6.13
Altered Herbaceous	II	12.69
Low/Moderate Cover Grasslands	I	27.71
Agricultural Lands - Dry	III	36.19

Note: A total of 91.69% of the Missouri Coteau area is represented; 8.31% is made up of a combination of other habitat types.

Associated Species of Greatest Conservation Need (Tier I Species)

There are a total of 318 terrestrial vertebrate species that are found within the Missouri Coteau Focus Area. Tier I species are listed below. All associations can be found in Table 27.

Amphibians: Northern Leopard Frog

Reptiles: Snapping Turtle, Spiny Softshell, Western Hog-nosed Snake, and Smooth Greensnake

Birds: Common Loon, Trumpeter Swan, Bald Eagle, Yellow Rail, Whooping Crane, Piping Plover, Long-billed Curlew, Interior Least Tern, Black Tern, Burrowing Owl, Sedge Wren, and Nelson's Sharp-tailed Sparrow

Mammals: Townsend's Big-eared Bat and Meadow Jumping Mouse

Conservation Concerns & Strategies

Conservation Concerns	Conservation Strategies
Loss of habitat due to conversion of native prairie to small grain crops	Policy-based approaches that encourage the conservation of natural communities, rather than support their conversion

	Support public and private conservation programs/activities that encourage and support private land use stewardship
	Increased cooperative efforts to maintain ecological features or processes on public, private, and tribal lands
Drainage of natural wetlands	Participate in government and private conservation partnerships to reduce the loss of wetland habitat and restore lost wetlands
Invasive or exotic plant species	Cooperative efforts to reduce the abundance of exotic plant species
Disruption of natural disturbance processes, especially fire	Work with other agencies, tribes and private organizations to restore the natural disturbance processes
Fragmentation of habitat due to fossil fuel exploration and development activities	Work with corporations, land owners and other agencies to reduce impacts of exploration
	Education and research on fossil fuel development and its impacts on natural landscape

References

The Nature Conservancy. 2005. Unpublished report.

The Nature Conservancy. 1999. Ecoregional Conservation in the Northern Great Plains Steppe. Northern Great Plains Steppe Ecoregional Planning Team. 76 pp.

U.S. Fish and Wildlife Service. 2004. Conservation Focus Areas of the Great Divide: a vast region encompassing the Upper Missouri, Yellowstone and upper Columbia watersheds. Publisher: USFWS, Benton Lake Wildlife Refuge, Great Falls, MT. 77 pp.