



Bird Monitoring at Pipestone National Monument

Importance: *An important component of the park ecosystem*

Birds intrigue and excite visitors, having become an important part of park interpretive programs. Beyond the pleasure that birds provide, they are an important component of park ecosystems. Their high metabolism and position in the food web make them indicators of change in an ecosystem – the canary in the mine, so to speak. Preserving habitat for the wellbeing of bird populations preserves entire ecosystems for the benefit of all species.



Red-winged blackbird displaying

Long Term Monitoring: *Assessing change*¹

The Heartland Inventory and Monitoring Network monitors changes in bird community composition and bird abundance to determine the health of the community. Network staff accomplishes this by surveying seasonal and year-round resident birds in the monument during the breeding season to determine bird community composition and abundance.

Scientists use surveys to assess which species occupy the habitat over time with consideration to management actions. The network initiated a bird survey in 2009 to provide plot-specific, habitat-specific, and park-wide data on bird populations and the impacts of resource management within the monument.

Status and Trends: *Baseline data as reference point*

Thirty-six of the 40 bird species observed are permanent or summer residents to the area. The monument provides important breeding habitat for eight species that require grassland habitat. The Brown Thrasher (*Toxostoma rufum*), Dickcissel (*Spiza americana*), and Grasshopper Sparrow (*Ammodramus savannarum*) are breeding species of continental importance, meaning that populations have declined so precipitously for these species that conservation action should be taken. Additionally, scientists found:



Eastern Meadowlark (*Sturnella magna*) is a grassland obligate species, a species depending of grassland habitat.

1. Cool season grasses and forbs dominated as cover during the sampling period. Prescribed fire, initiated prior to the start of surveys, may have temporarily reduced the amount of forage cover available for birds during the breeding season.
2. Current grassland restoration efforts should provide the diversity of habitats to support the species of continental importance.

Heartland Network Inventory and Monitoring Program of the National Park Service. Visit www1.nature.nps.gov/im/units/htln/index.htm.

... protecting the habitat
of our heritage



¹ Peitz, D. G. 2010. Bird community monitoring at Pipestone National Monument, Minnesota: 2009 status report. Natural Resource Data Series NPS/HTLN/NRDS--2010/045. National Park Service, Fort Collins, Colorado.