Alberta Conservation Association 2016/17 Project Summary Report

Project Name: MULTISAR – South Saskatchewan

Wildlife Program Manager: Doug Manzer

Project Leader: Brad Downey

Primary ACA staff on project:

Brad Downey, Megan Jensen, Julie Landry-DeBoer, Adam Moltzahn and Rachel Whitehouse

Partnerships

Alberta Beef Producers
Alberta Environment and Parks
Canadian Cattlemen's Association
Canadian Roundtable for Sustainable Beef
Cows and Fish – Alberta Riparian Habitat Management Society
Landholders
Prairie Conservation Forum

Key Findings

- Collaborated with ranchers and completed four Habitat Conservation Strategies on roughly 8.000 acres.
- Partnered with 10 producers on 15 enhancements including upland watering sites, portable watering units and fencing.
- Signed up 6 agricultural producers with land totaling 60,000 acres for assessment in 2017/18.

Introduction

Numerous species at risk occur in the southern part of Alberta, often overlapping with agricultural landscapes, particularly livestock grazing operations. Often, existing management practices on these lands is what has allowed these species at risk to persist, but there are also many opportunities on these lands and adjoining lands to further enhance habitat quality for these species. The Canadian Cattlemen's Association, through funding from the Species at Risk Partnerships on Agricultural Lands Program, is partnering with the Alberta Beef Producers, Canadian Roundtable for Sustainable Beef, MULTISAR, and Cows and Fish over the next five years (2015 – 2020) to increase, maintain and improve habitat for species at risk within the Grassland Natural Region of Alberta. This will be completed through knowledge sharing, habitat assessments, development of voluntary habitat conservation plans and subsequent implementation and monitoring of beneficial management practices.

A Habitat Conservation Strategy (HCS) is a five-year extendable voluntary plan that provides beneficial management practices and habitat improvement recommendations to assist with the recovery of federally and provincially listed species at risk, to prevent other species from becoming at risk, and to encourage sustainable ranching operations. It is developed from extensive fish and wildlife surveys, detailed vegetation inventories, and range and riparian health assessments. The results of these baseline assessments are then considered with the needs of species at risk, sustainable grazing and management practices, and potential habitat enhancements and/or restoration opportunities. Solutions are formulated and discussed with the co-operating agricultural producers. Mutually agreeable solutions are adopted and integrated into the strategy, and then priorities for implementation and a monitoring program are developed. After signing a five-year stewardship agreement, MULTISAR assists the agricultural producer in implementing the recommendations of the strategy and monitors the impact of habitat improvements. Five years after the start of implementation of a HCS, its effectiveness is evaluated using a subset of the original fish and wildlife surveys and vegetation assessments to determine the progress of habitat change, the impact on species at risk and the need for adjusting the management approach. A landowner questionnaire is also completed to identify what is or isn't working and what could be changed. Another five-year stewardship agreement may be signed for continued implementation of the strategy.

Methods

In 2016/17, we completed multi-species point count surveys on four ranches to measure the occupancy of birds (Landry-DeBoer and Downey 2010). We also surveyed all riparian areas on these ranches by walking along the edge of the waterbodies listening and observing for amphibians (Kendell 2002). In early August, we surveyed short-horned lizards at sites that were predicted to be highly suitable habitat based on habitat models and historical occurrences (James 2002). In early October, we surveyed coulee slopes to identify new snake hibernacula (dens) (Alberta Sustainable Resource Development 2010). We also completed detailed range health assessments (Adams et al. 2005) on the ranches. We incorporated the results of the wildlife inventories and range assessments into landholder-specific HCSs and identified potential habitat enhancements for future work.

A large part of our effort goes into communication activities; these included presentations and tours to funding agencies and partners, and participation in several conferences and workshops, including presenting at the Pincher Creek open house event and setting up a booth at the Calgary Stampede.

Results

In 2016, we completed detailed wildlife, range and riparian surveys on four ranches (~8,000 acres) and developed the associated HCS. We identified 152 different species, including 12 that are considered *Endangered/At Risk* or *Threatened/May Be at Risk*. In all, 1,430 observations of species were entered into the provincial government's Fisheries and Wildlife Management Information System database. We also conducted 93 detailed range transects, 110 range health assessments, 51 tame pasture assessments and 22 riparian health assessments on the ranches.

We completed 15 new habitat enhancements as part of HCSs created in 2016 and planned for in 2017. These enhancements included installation of four upland watering sites and one pasture pipeline to reduce cattle pressure on riparian areas that support northern leopard frogs and loggerhead shrikes. Also, eight portable watering units were used at wetlands and dugouts to reduce cattle pressure and improve habitat for amphibians. We also installed wildlife-friendly fence lines to protect springs and wetlands on two properties.

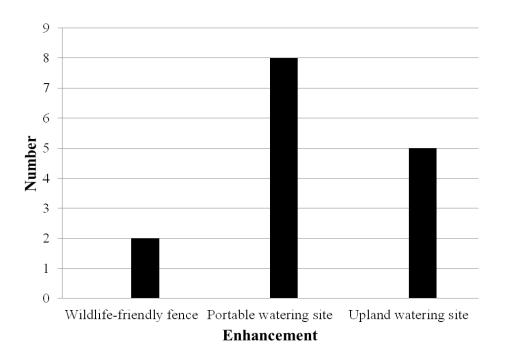


Figure 1. The number and type of habitat enhancements implemented through the MULTISAR – South Saskatchewan project in 2016.

Conclusions

MULTISAR is a collaborative effort among landowners, conservation organizations, government and industry. The program is succeeding through co-operative teamwork with all partners working toward a common goal of habitat and species conservation on farms and ranches. Success has occurred not only through direct improvements that benefit wildlife habitat and farm or ranch operations, but also through awareness of species at risk in landholders' day-to-day activities on their land. Landholders view the MULTISAR program as non-threatening, and new relationships are being formed because of this awareness and through promotion of the program in the local community.

Communications

ACA

- Assisted at the Women's Grazing School, Julie Landry-DeBoer and Megan Jensen, July 2016.
- Participated in Youth Range Day in Onefour, toad and lizard surveys, Adam Moltzahn, July 2016.
- Delivered presentation in Elkwater on MULTISAR enhancements, Megan Jensen and Julie Landry-DeBoer, April 2016.
- Delivered presentation in Elkwater on MULTISAR enhancements, Megan Jensen and Adam Moltzahn, September 2016.
- Attended the Pincher Creek open house for the Municipal District of Pincher Creek, Julie Landry-DeBoer and Adam Moltzahn, April 2016.
- Delivered presentation to grazing co-operative in Nanton, Brad Downey, June 2016.
- Delivered presentation to Medicine Hat and area Alberta Environment and Parks staff on program expansion, Brad Downey, April 2016.
- Delivered presentation to Lethbridge and area Alberta Environment and Park staff on program expansion, Brad Downey, April 2016.
- Provided field season stories and kangaroo rat species profile for *Grassland Gazette*, Adam Moltzahn.
- Provide field season stories for *Grassland Gazette*, Megan Jensen.
- Wrote ferruginous hawk article for Alberta Conservation Association's *Conservation Magazine* (in press), Adam Moltzahn.
- Hosted MULTISAR booth at the Calgary Stampede in partnership with Canadian Cattlemen's Association, Rachel Whitehouse, Adam Moltzahn and Megan Jensen, July 2016.
- Provided information for the MULTISAR article "Fifteen years later, conservation program is an overnight sensation" in *Alberta Farmer Magazine*, Alexis Kienlen.

Partners

- Published MULTISAR: A Multi-Species Conservation Strategy for Species at Risk in the Grassland Natural Region of Alberta 2016/17, MULTISAR, March 2017.
- Published *Grassland Gazette* newsletter, Winter 2016/17 issue.
- Maintained and updated MULTISAR Facebook page and Twitter account, Kristen Rumbolt.

Literature Cited

- Adams, B.W., G. Ehlert, C. Stone, M. Alexander, D. Lawrence, M. Willoughby, D. Moisey, C. Hinz, A. Burkinshaw, and J. Carlson. 2005. Rangeland health assessment for grassland, forest, and tame pasture. Public Lands Division, Alberta Sustainable Resource Development. Pub. No. T/044, Edmonton, Alberta, Canada. 128 pp.
- Alberta Sustainable Resource Development. 2010. Sensitive species inventory guidelines. Alberta Sustainable Resource Development, Fish and Wildlife Division, Edmonton, Alberta, Canada. 69 pp. Available online: http://srd.alberta.ca/FishWildlife/WildlifeManagement/documents/SensitiveSpeciesInventoryGuidelines-Aug2010.pdf.
- James, J.D. 2002. A survey of short-horned lizard (*Phrynosoma hernandesi hernandesi*) populations in Alberta. Alberta Sustainable Resource Development, Fish and Wildlife Division, Alberta Species at Risk Report No. 29, Edmonton, Alberta, Canada. 25 pp.
- Jones, P., and J. Landry-DeBoer. 2012. MULTISAR's Monitoring, Enhancement, and Evaluation Program. Alberta Conservation Association Internal Report, Lethbridge, Alberta, Canada.
- Kendell, K. 2002. Survey protocol for the northern leopard frog. Alberta Sustainable Resource Development, Fish and Wildlife Division, Alberta Species at Risk Report No. 43, Edmonton, Alberta, Canada. 30 pp.
- Landry-DeBoer, J.P., and B.A. Downey. 2010. Habitat Conservation Strategies. Pages 12 23. *In:* F. Blouin, B.L. Downey, B.A. Downey, S.L. Frank, D.J. Jarina, P.F. Jones, J.P. Landry-DeBoer, and K.S. Rumbolt. MULTISAR: A Multi-Species Conservation Strategy for Species at Risk 2009 2010 Report. Alberta Sustainable Resource Development, Fish and Wildlife Division, Alberta Species at Risk Report No. 135, Edmonton, Alberta, Canada. 71 pp.

Photos



Alberta Conservation Association staff member Adam Moltzahn conducting a bird survey. Photo: Julie Landry-DeBoer



Alberta Conservation Association staff member Megan Jensen investigating an abandoned ferruginous hawk nest. Photo: Julie Landry-DeBoer



Alberta Conservation Association staff member Rachel Whitehouse installing fence reflectors near sharp-tailed grouse lek. Photo: Brad Downey