

Biodiversity assessment >>> of Alberta's beef industry

FILLING GAPS AND IDENTIFYING OPPORTUNITIES

>>> CHALLENGES

- The relationship between beef production and biodiversity is complex and poorly understood in the Canadian prairies
- Biodiversity is difficult to incorporate into assessments of any industry
- Globally, a comprehensive framework and methodology for incorporating biodiversity into a life cycle analysis of the beef industry has been completed but has not yet been applied in Alberta.

>>> OPPORTUNITIES IN ALBERTA

- Standardized, province-wide biodiversity data for hundreds of plant and animal species from the Alberta Biodiversity Monitoring Institute (ABMI)
- Spatial land cover and human footprint data
- Rangeland inventory and health assessment data from the Government of Alberta

>>> OUR RESEARCH WILL

- Evaluate the positive and negative impacts of beef production on biodiversity
- Incorporate biodiversity assessment into a life cycle analysis of the beef industry
- Identify and increase adoption of management practices that benefit biodiversity in beef production systems



>>> OUR FOCUS IS TO

- Assess observed biodiversity patterns in relation to different environmental and management factors in Alberta's grazing lands
- Examine which components of the Rangeland Health Assessment may be good indicators of biodiversity
- Gather insight and knowledge to understand beef sectors influence on biodiversity at different spatial scales
- Examine and test a new framework and methodology for incorporating biodiversity assessment into a life cycle analysis

>>> WE WILL DO THIS BY

- Using existing biodiversity and rangeland inventory data and spatial land cover information
- Collecting new rangeland health assessment data
- Conducting producer surveys for grazing management practices
- Testing hypotheses of rangeland biodiversity patterns using new statistical approaches
- Compiling and disseminating results and new knowledge



Photo Credit: Tom Reuther

COLLABORATORS

Mike Alexander
Government of Alberta
Edward Bok
University of Alberta
J/C Cahill
University of Alberta
Cameron Cattle
University of Alberta
Dan Farr
Alberta Biodiversity
Monitoring Institute

Majid Irvani
Alberta Biodiversity
Monitoring Institute
Tim McAllister
Agriculture and
Agri-Food Canada
Jim Schieck
Alberta Biodiversity
Monitoring Institute

COMMUNICATION CONTACT:
Carrie Selin - Alberta Biodiversity Monitoring Institute
carrie.selin@gmail.com

