Rich County Coordinated Resource Management (Rich CRM) Local Working Group

The Rich County Coordinated Resource Management (CRM) Local Working Group (LWG) is facilitated by David Dahlgren. The Rich CRM consists of state and federal agency personnel, representatives from local government, non-profit organizations, academic institutions, private industry, and private individuals.

Description of Area and General Population Information

The Rich CRM management area is located in northeastern Utah, and is a significant population center for grouse in three states – Utah, Idaho, and Wyoming. The Sage-grouse Management Area (SGMA) includes Cache, Rich, Weber, Morgan, Summit and Wasatch Counties. The area boundary was determined by consulting with adjacent states, Utah Division of Wildlife Resources (UDWR), and the Morgan-Summit Adaptive Resources Management LWG, and the Rich CRM. It incorporates vegetation types used by sage-grouse, mostly in the Wyoming Basins eco-region.

Recent Activities and Accomplishments

Several projects were proposed and developed for 2018 within Rich County. These projects were addressed in December 2017. We were unable to get a spring/summer meeting put together, however, partners continued to work with each other on projects. We held our fall project meeting on October 25, 2018, and covered several projects proposed for the upcoming year. Our new USU County Extension Agent, Dallen Smith, was able to attend and become part of the group. The most significant accomplishment this year was the approval of the Three Creeks Project by federal agencies. Many associated projects will be completed to assist the transition from the current management to the new regime. Unfortunately, our winter meeting was postponed due to the federal shutdown.

Utah State University (USU), led by Terry Messmer continues to conduct research on the sage-grouse populations in Rich County. He has recruited Hailey Peatross Wayment as a Master student to continue the research project started by Seth Dettenmaier and Wayne Smith. The objectives of the research is to understand how livestock grazing interacts with sage-grouse.

Hailey began deploying global positioning system rump-mounted radio-transmitters on female sage-grouse captured on areas that are grazed by domestic livestock on Deseret Land and Livestock and the Three Creeks Allotment to better describe the range of sage-grouse behavioral responses to the presence of livestock and grazing. We are focusing on female sage-grouse because they drive population levels. We want to know if female sage-grouse brood-rearing habitat-use patterns and vital rates differ under prescribed rotational and season-long grazing practices. If so, the question becomes, can the observed differences be explained by avoidance behavior or differences in vegetation composition and structure that are the result of livestock grazing? Specifically, we want to test the hypothesis that the vegetation important to support sage-grouse broods could be facilitated, enhanced, or prolonged by managing grazing by
domestic livestock. The hypothesis will be validated if radio-marked females that select for pastures where livestock have removed standing residual vegetation creating a “green wave” are more successful than female sage-grouse that select pastures grazed under traditional season-long practices.

Cattle grazing occurs on 87% of occupied sage grouse range, of which 70% is managed by the BLM and USFS. Thus, minor changes in Federal grazing policies can have disproportionate impacts on rural economies. Hailey’s research may suggest a possible working solution to the problem of competing land uses on western ranges. If we can parameterize sage grouse vital rates under different grazing scenarios, this may have implications for grazing policy west-wide. Completion of this project will provide better information regarding sage-grouse vital rates and habitat selection with respect to the presence of cattle and the effects of livestock grazing on the vegetation composition and structure. This science-based information will help to better define the role of livestock grazing as part of the working landscape in species conservation. The results of Hailey’s work will set in motion a process that reevaluates how western sagebrush management lands are managed for multiple benefits. In 2018, radio-marked grouse were monitored on both Three Creeks Area and Deseret Land and Livestock Ranch.

**Upcoming Year Work Plan**

An exciting development for the upcoming year is adding Dallen Smith as a facilitator for the group. Hopefully, this will help bring energy to the group and help Dallen’s work as the County Extension Agent addressing natural resource issues in the county. Many projects will continue to be implemented to help support the Three Creeks Project. The sage-grouse research project in the county will continue with a new graduate student.