RM-CESU Completion Report

Project Title: UW-NPS Grand Teton Research Center, Small Grants 2010

Park: Grand Teton NP

Project number: UWY-114; P09AC00133

Effective Dates: September 1, 2009 – December 31, 2012

Amount Funded: \$20,500

NPS Contact: Sue Consolo-Murphy, Grand Teton National Park, (307) 739-3481; sue_consolo-murphy@nps.gov

<u>University Partner</u>: Hank Harlow, University of Wyoming, Laramie, WY 82071; 307-766-4227; hharlow@uwyo.edu

Project Description: The UW-NPS Grand Teton Research Center cooperative research program includes a shared funding initiative between the University of Wyoming and the National Park Service which provides small research grants for projects conducted within the Greater Yellowstone Area to benefit science and understanding about the parks and surrounding areas. Grand Teton National Park annually provides a 'Research Needs" list on its website and through the UWNPS small grants call for proposals. In response and/or as unsolicited proposals, researchers propose projects to the University of Wyoming. These proposals are reviewed by a panel of University of Wyoming faculty as well as Grand Teton and Yellowstone National Park personnel, and are ranked and selected for grants based on merit, contributions to science, and applicability to park and ecosystem needs. In 2009, the grants fund totaled \$41,000 of which the University of Wyoming provided \$15,000, Yellowstone NP provided \$6,000, and Grand Teton NP provided \$20,000. This budget includes sponsorship support for the Grand Teton NP-UWNPS Resource Symposium in late 2009, for an additional \$500.

GRTE sponsored 4-5 specific projects selected in April 2010. These projects include:

James Pritchard, Iowa State University. Trails of Grand Teton National Park

Mary Humstone, University of Wyoming. Cultural Resources Research at Jenny Lake, GTNP.

Christopher Monz, Utah State University, Assessment of Recreation Impacts in Alpine Areas of GTNP

Nanette Nelson, University of Wyoming. Evaluation of GTNP's "Be Bear Aware' Message to Visitors

Matthew Kauffman, University of Wyoming. Resource Selection, Seasonal Distribution, Movement, and Recruitment of Bighorn Sheep in the Teton Range.

Project Results:

Grand Teton NP organized and the UWNPS Research Center hosted the park's third Resource Symposium in September, 2009. The symposium featured 30 speakers presenting updates on their research and natural or cultural resource management projects to 100 attendees from the NPS, UFWS, USFS, and partner organizations. Results were more-informed specialists, interpreters/educators, rangers, planners, and senior program managers, including the park

superintendent who attended day one.

Results from research projects also served to inform park managers and staff on relevant issues. Dr. Pritchard's history of park trails and Ms. Humstone's work at Jenny Lake contributed to updated National Register evaluations of their historic significance and provided information useful when the park's cultural resource specialist evaluated the impacts of trail projects and reconstruction or remodeling in the Jenny Lake area and consulted with the Wyoming State Historic Preservation Office under Section 106 of the National Historic Preservation Act. Dr. Monz' work helped inform vegetation managers of high-elevation sites that may need additional monitoring, protection from excess permitted camping nights, and/or restoration effort.

Ms. Nelson and her advisor, Dr. Patricia Taylor, presented the results of their visitor surveys to interagency grizzly bear managers at the Yellowstone Ecosystem Subcommittee, which prompted additional interest in re-design or cross-agency use of signs and messages to educate visitors about living and recreating in bear country. It also prompted interest by Yellowstone NP to prepare funding proposals for a similar visitor survey done in their park. Dr. Kauffman's students completed field work and analysis updating state and park managers on the small and genetically isolated bighorn sheep herd. Management actions to reduce stress on the small herd have been implemented, including additional education and protection of wintering areas near the ski resort adjacent to GTNP.

Investigators satisfactorily completed their annual reports and, in some cases, submitted technical publications to professional journals. Dr. Monz and Ms. Nelson presented their results at the 2011 Resource Symposium, a similar forum to that sponsored in 2009.