Project Summary Rocky Mountains Cooperative Ecosystem Studies Unit

Project Title: Economic Values of National Park System Visitation

Discipline:Social scienceType of Project:ResearchFunding Agency:National Park ServiceOther Partners/Cooperators:University of MontanaEffective Dates:8/3/2009 - 12/31/2011Funding Amount:\$100,000

Investigators and Agency Representative:

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Project Abstract:

The National Park Service (NPS) requires an evaluation of the economic values of National Park System resources throughout the NPS system. These resources contribute substantial benefits to local economies in the form of business output, jobs, and tax revenues resulting from recreational visitation. Additionally, these resources also provide other significant values including the consumer surplus individuals derive from visitation. While significant effort and funding has been provided by the NPS for quantifying the contribution of NPS-related visitation to local economic activity through the MGM2 project, no similar systemwide analysis of visitor consumer surplus values has been undertaken to date. This Statement of Work describes a project that will estimate the direct use economic values of National Park System visitation for a wide spectrum of NPS units nationwide.

For many years, the NPS has sponsored the NPS Visitor Services Project through the University of Idaho. The Visitor Services Project (VSP) has surveyed many of the NPS units and all VSP park reports are available on the VSP website. The VSP surveys an average of 10-12 park units per year, and since its inception has conducted 195 in-depth visitor surveys covering 155 NPS units. Sample sizes for the VSP surveys tend to range from 500 to 1000 completed surveys, with the exception being for some smaller sites where samples may be in the 250-500 range. Currently, the VSP personnel are finalizing the incorporation of the entire collection of VSP survey data into one unified database. While information gathered for each park varies, some data is collected for all park units.

Heberling and Templeton (2009) demonstrated the use of VSP data for a single park unit in order to estimate an individual observation travel cost model of visitor net willingness to pay for park visitation. The current study aims to expand this analysis to all park units within the VSP database for which the necessary origin-destination information and information on multi-destination and primary purpose trips is available.

The current study aims to extend the Heberling and Templeton (2009) analysis in two major respects:

- Increase the number of parks for which the analysis is conducted to as many of the 155 unique park units surveyed by the VSP as is practicable and possible given data limitations,
- Refine the travel distance and time variables in the travel cost models by utilizing state of the art route mapping and scheduling software. The PC-Miler software to be used in the current study includes an Excel spreadsheet module allowing for the batch processing of zipcode pairs to return actual map driving mileage and travel times. This is a refinement over the use of a grand circle algorithm (point-to-point) distance estimate with an applied unique circuity factor at the state level, as utilized by Heberling and Templeton.

Outcomes with Completion Dates: December 31, 2011

- Memo on VSP data extent and suitability,
- The draft analysis and results report, and
- A final analysis and results report which incorporated any NPS comments and suggestions associated with the draft report.

Keywords: economic value, of National Park System resources, Visitor Services Project, University of Montana