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Inside the black box of visitor and citizen choices: Hybrid choice modeling in the context of recreation, tourism, and natural resource management

Proposed session for the International Conference on Monitoring and Management of Visitors in Recreational and Protected Areas (MMV10)

Choice experiments have long been used in tourism, environmental valuation, and other fields to understand choice behavior and the trade-offs that consumers and citizens make. Visitor choices include, for example, what protected area and specific site to visit. Citizen choices include preferences for protected area and broader landscape management.

Meanwhile, structural equation modeling has long been used to model psychological and other types of constructs as latent variables rather than as single-item measures. The integration of choice and latent variable models is referred to as hybrid choice modeling (HCM). This integration facilitates understanding of the relationship between psychographic characteristics (e.g. values and attitudes) and choices. As Ben-Akiva et al. (2002) note, HCM can enrich our understanding of choices by evaluating the cognitive workings inside the "black box" of respondent choice processes. For example, (a) how might values and environmental attitudes affect decisions about visiting nature interpretive centers?, (b) how might level of recreational specialization affect decisions regarding hiring of nature-based tour guides?, and (c) how might meanings assigned to landscape types affect preference for siting of renewable energy infrastructure?

HCM has been applied most frequently in the transport field, but it also has been applied in recreation / tourism (e.g., Lindberg, Veisten, and Halse, 2019: Sarman, Scagnolari, and Maggi, 2016) and in natural resource / landscape management (Mariel, Meyerhoff, and Hess, 2015). The purpose of this session is to "build community" among those who have used HCM in a recreation, tourism, or natural resource management context, and to illustrate the relevance of this method for those who have not yet used it.

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