

Behavioral ecology and the conservation and management of large herbivores: From Africa to Arizona



Science & Mathematics Colloquium Series

Presentation by Adrian M. Shrader

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Wed., March 1, 2017, 3 pm

Santan Hall, Room 131

ASU Polytechnic campus

Behavioral ecology can support, expand, and strengthen the management and conservation efforts of large mammalian herbivores. For example, an understanding of the decisions that these herbivores make (e.g. foraging) can provide key insight into the factors driving large-scale patterns (e.g., landscape use).

To highlight this, Dr Shrader will discuss: 1) how adjustments in prey anti-predator behavior in response to the introduction of wild dogs provide insight into potential knock-on effects to trophic cascades, 2) how foraging ecology is helping to conserve the endangered oribi antelope by understanding competitive and facultative interactions between oribi and cattle, and 3) how the use of olfactory cues by herbivores (e.g. elephants) puts into context their feeding decisions and ultimately their impacts on the landscape. Finally, he will link how these approaches could be applied to the large mammalian herbivores in Arizona.

Adrian Shrader is a behavioral ecologist, yet his research interests also include aspects of conservation ecology and wildlife management. Shrader's research focuses primarily on the ecology of large mammalian herbivores (including megaherbivores), their interactions with vegetation, and the factors governing their foraging, habitat use, and movements.

Ultimately, his research strives to understand the behavioral decisions of herbivores, the information they use to make these decisions, and the effects these decisions have on their ecology. The ultimate goal of his research is to apply ecological theory to the management and conservation of large mammals. Shrader earned a PhD in ecology from University of the Witwatersrand, South Africa.



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