

1125-AC-1091 **Shandelle M Henson*** (henson@andrews.edu). *Climate Change and Tipping Points in Seabird Colonies.*

Changes in sea surface temperature (SST) are associated with changes in reproductive and feeding strategies in colonial seabirds at Protection Island National Wildlife Refuge, Washington, USA, located in the Strait of Juan de Fuca. Years of high SST are associated with high egg cannibalism and ovulation synchrony in the colony. We hypothesize that decreased fish availability associated with high SST is correlated with the rise in cannibalism, and that reproductive synchrony is a response to cannibalism. Proof-of-concept models illustrate the conditions under which these hypotheses are supported and show that prolonged rises in SST can create tipping points that allow colony collapse. This talk is coauthored by James L Hayward and J. M. Cushing. (Received September 14, 2016)