

# GRADUATE EXIT SEMINAR

**CONNOR ROSENBLATT**

## Population and Occupancy Modeling of the Northern Bobwhite and Associated Open Habitat Birds in Ohio



Confronted with threats of habitat loss and climate change, birds of open habitats such as grasslands and shrublands are among the most rapidly declining groups of birds across North America. One such bird is the Northern bobwhite, which inhabits a heterogeneous landscape consisting of shrubland, grassland, and early-successional forest. Bobwhites are declining at an alarming rate across most of their range, largely due to habitat loss from agricultural intensification. Populations in Ohio are secondarily threatened by heavy mortality from severe winter weather. Because bobwhites are a socially and economically important gamebird that receives heavy conservation attention, bobwhite conservation has the potential to benefit several non-target songbirds with shared habitat requirements. However, if bobwhites are to potentially offer conservation aid to non-target species, viable bobwhite populations must be maintained, and future viability of bobwhite in Ohio is in question. In the first part of my thesis, I focus on landscape-scale characteristics

that influence bobwhite occupancy in Ohio, and whether the occupancy of other open habitat species is positively predicted by bobwhite occupancy. For the second part, I focus on projecting population dynamics of bobwhite in Ohio in response to future winter weather scenarios and management alternatives.

Advisor: Dr. Robert J. Gates and Dr. Stephen N. Matthews

**MONDAY, APRIL 20, 2020**  
**9:30 A.M.**

Join the seminar via Zoom: <https://osu.zoom.us/j/411867619>

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