Introduction

Invasive fungal diseases are exerting a growing threat on wildlife populations, causing profound ecological disruptions and posing significant challenges to conservation efforts. Fungal diseases such as chytridiomycosis in amphibians and sudden oak death in trees have highlighted the vulnerability of various species to invasive fungi. These pathogens exhibit a complex relationship with temperature, with variations influencing both their growth and the susceptibility of the host species. Some hosts are more susceptible to fungal pathogens at certain temperatures, while others may experience heightened resistance. This is particularly true for white-nose syndrome (WNS) in bats. First discovered in 2006, WNS has decimated bat populations across North America. Caused by the cold loving fungus *Pseudogymnoascus destructans* (Pd), it affects bats during hibernation in winter, significantly decreasing their survival rates. However, some bat populations have shown signs of recovery in regions where WNS has been present for decades. This recovery is not uniform and appears to be temperature dependent. This variance is likely due to the fact that Pd grows more slowly at temperatures nearing freezing, leading to less severe infections because of reduced exposure to the fungus.