



Candidate for Asst. Professor of Mosquito Biology/Ecology position: Mmabaledi Buxton

Doctor of Philosophy in Biological Sciences:
Botswana International University of Science
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Date: Monday, October 17, 2022
Time: 4:00 pm - 4:50 pm
Format: In-Person Seminar & Virtual Access
Location: Genomics Auditorium 1102A

Zoom: 938 1040 4405
Passcode: 833289

Title:

“Human activities facilitate mosquito proliferation: opportunities for sustainable vector control initiatives”

Abstract:

The risk of mosquito proliferation is increasingly becoming problematic globally. Shifting climates and other anthropogenic-related factors are facilitating mosquito success and associated diseases in humans, livestock, and wildlife. Mosquito and associated disease control efforts are, however, often limited by knowledge and/or implementation gaps. To bridge these gaps, it is essential to focus on various components of mosquito biology and ecology that are often unassessed and/or neglected. As mosquitoes are semi aquatic, the understanding of the significance of water in promoting mosquito reproduction, development and survival is crucial. Here, I demonstrate the contribution of various biotic and abiotic mediated factors in unravelling mosquito success across (i) urban, (ii) agricultural and (iii) natural spheres with potential opportunities for sustainable control. With increasing societal disapproval of synthetic pesticides towards vector mosquito control, biological control measures are increasingly appreciated, albeit with their own limitations. To this end, studies pertaining biological and ecological components of mosquito vectors, may form a crucial step in the diversification of overall management strategies for emerging and re-emerging mosquito-borne infections.

