

## ASL Announces Dr. Laura Hobbs and Dr. Roland Proud as the 2019 Acoustic Zooplankton Fish Profiler (AZFP) Award Contest Winners

ASL Environmental Sciences is pleased to announce Dr. Laura Hobbs and Dr. Roland Proud as winners of the fourth annual [Acoustic Zooplankton Fish Profiler \(AZFP\)](#) early career scientist award contest. They are both Scotland-based marine ecologists, specialising in bioacoustics. Dr. Hobbs is associated with the Scottish Association for Marine Science (SAMS) and the University of Strathclyde, and Dr. Proud is with the University of St Andrews. Together, they plan to deploy the AZFP in Lake Victoria, East Africa.

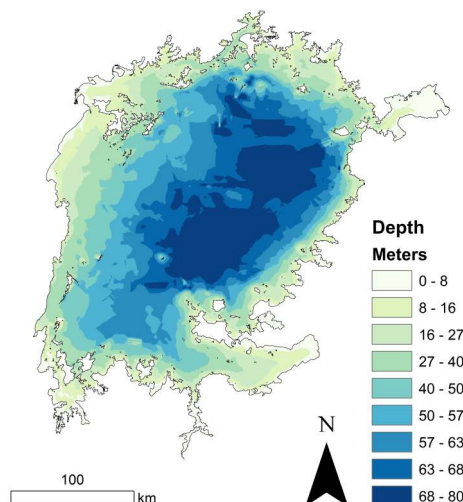
Their goal for this deployment will be to study the vertical distribution, dynamics, and ecology of important fish species (e.g. Nile Perch, Dagaa and Haplochromines) and their prey (e.g. zooplankton). This will provide the first continuous dataset of this kind for Lake Victoria, describing both the diel and seasonal changes in species abundance and vertical distribution. This will complement the 20 years' worth of acoustic survey data (vessel-based echosounders operating at 70 and 120 kHz), which have mapped the spatial distribution of these species. It will be a major ecological step forwards—Lake Victoria as a closed system is in many ways an ideal 'natural experiment'—and a major contribution to future fisheries management.

The use of the AZFP (38/125/200/455 kHz) in this context will address many socio-economic issues that face the East African Community, while also improving the knowledge of an ecosystem that is presently poorly understood. It is hoped that the project will improve sustainability by supporting the fishery that underpins regional food security, and by providing new and advanced methods of data acquisition to improve stock assessment. This project will seek to link ecological modellers with fisheries management and will be used to generate a variety of collaborations and scientific publications.

Dr. Proud and Dr. Hobbs held a consultation with the Lake Victoria Fisheries Organisation and the Lake Victoria hydroacoustics working group in June 2019. During this consultation, the optimal placement of the AZFP within the lake was discussed. It was decided that a deep section in the lake basin was most suitable, to allow for the acoustic sampling of the entire water column, while still allowing for four frequency analysis. In November 2019, Dr. Proud and colleagues from St Andrews will visit Lake Victoria to undertake a vessel-based hydroacoustic survey, and they will deploy the mooring at this time. The AZFP will be collected in February 2020.



Dr. Hobbs is a marine ecologist who specializes in bioacoustics.



Bathymetric map of Lake Victoria. The AZFP is to be deployed in the deepest part of the basin.

(map source: Hamilton, 2016, <http://dx.doi.org/10.7910/DVN/SOEKNR>)