

SEMINAR

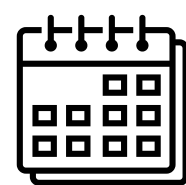
Towards Ecosystem-Based Fisheries Management in Antarctica: using animal-borne sensors to monitor prey consumption in chinstrap penguins

Antarctic krill are a critical food source for animals such as penguins and whales. Krill also supports a growing commercial fishery, which may lead to resource conflicts with marine predators. CCAMLR - an international body under the Antarctic Treaty – aims to manage the krill fishery to ensure sufficient food remains for the region's predators, but consensus is yet to be reached on how to achieve this.

Dr Chris Oosthuizen

Chris Oosthuizen is a marine predator ecologist with extensive experience working on Antarctic and sub-Antarctic seabirds, seals, and whales. His recent research focuses on the foraging ecology of penguins in the Antarctic Peninsula, using animal-borne video and bio-logging technologies. He is a Research Associate at the Institute for Coastal and Marine Research.

Our research contributes to the development of monitoring indices for krill-feeding penguins that can support Ecosystem-Based Fisheries Management. We developed methods that use animal-borne sensors (similar to wearable tech used by human athletes) and a machine learning pipeline to detect when penguins catch krill. This approach allows us to move beyond simply tracking where penguins go at sea to understanding how well they are feeding - key information for ecosystem monitoring and management.



26 September 2025, 11:00-12:00 SAST



**Ocean Sciences Campus,
Nelson Mandela University**



REGISTER:
<https://forms.office.com/r/vXDYYUTygV>

