

## SEASONALITY OF THE PELAGIC ICHTHYOFAUNA IN THE LAZAREV SEA

Van de Putte Anton<sup>1</sup>, Hauke Flores<sup>2</sup>, Sarah Risch<sup>1</sup> and Filip Volckaert<sup>1</sup>

<sup>1</sup> Katholieke Universiteit Leuven, Laboratory for Aquatic Ecology, C. Deberiotstraat 32, B-3000 Leuven, Belgium

<sup>2</sup> IMARES Texel, PO Box 167, 1790 AD Den Burg, the Netherlands

The Southern Ocean is characterised by an extreme seasonality which is best observed by the huge variation in sea ice extent. It expands from a minimum extent of 4 million square kilometres in February to a maximum of 19 million square kilometres in September and influences the physics and chemistry of the surface layers and the corresponding life histories of organisms. Reduced light condition and sea ice cover have a pronounced impact on primary production and predation risk in the pelagic zone. Here we present comparison of the distribution of fish in the Lazarev Sea correlated to biotic and abiotic features.

Samples were collected in the framework of three LAKRIS (Lazarev Krill Study) campaigns onboard RV Polarstern during summer, fall and winter. The main focus was on factors affecting krill distribution. As such a wide variety of biotic and abiotic measures were made. Fish and fish larvae were collected from trawls from the upper 200m during both seasons.

Both during summer and winter larval composition was dominated by pre-metamorphic *Electrona antarctica* and *Notolepis coatsi*. Post-metamorphic *E. antarctica* showed a pronounced seasonal difference in occurrence.