

CCAMLR Scientific Scholarship Scheme: an important tool to involve early career researchers in CCAMLR processes and to build capacity



Davide DI BLASI¹, Jilda Alicia CACCAVO^{2,3,4}, Elisa SEYBOTH⁵, Emilce Florencia ROMBOLA⁶, Ana Laura MACHADO⁷, Andrea CAPURRO⁶, Mercedes SANTOS^{6,8}, Keith REID⁹

¹ Institute for the study of the Anthropic impacts and Sustainability in marine environment – National Research Council, Genoa, Italy

² Alfred Wegener Institute, Helmholtz Centre for Polar and Marine Research, Bremerhaven, Germany

³ Berlin Center for Genomics in Biodiversity Research, Berlin, Germany

⁴ Leibniz Institute for Zoo and Wildlife Research, Department of Evolutionary Genetics, Berlin, Germany

⁵ Cape Peninsula University of Technology, Cape Town, South Africa

⁶ Argentine Antarctic Institute, Buenos Aires, Argentina

⁷ Uruguayan Antarctic Institute, Montevideo, Uruguay

⁸ Direction of Marine Protected Areas, National Parks Administration

⁹ Commission for the Conservation of Antarctic Marine Living Resources, Hobart, Australia



Steve Parker (Mentor) with Davide Di Blasi (Recipient) working onboard a toothfish fishing vessel



Mercedes Santos (Recipient) with Jefferson Hinke (Mentor) during 2018

The word 'inclusion' is widely used to refer to the overcoming of practical and conceptual boundaries that can occur in various areas. One significant boundary in the scientific community today that requires concerted efforts to be surmounted is the difficulty that early career researchers (ECRs) confront in order to get involved in high-level research and management systems. To overcome these obstacles, the Commission for the Conservation of Antarctic Marine Living Resources (CCAMLR) established the *CCAMLR Scientific Scholarship Scheme* in 2010 in order to promote the participation of ECRs in the work of the Scientific Committee and its working groups. The CCAMLR scholarship represents a way to engage enthusiastic ECRs in CCAMLR meetings and processes, with the objective to contribute to capacity building within the CCAMLR scientific community.



Ana Laura Machado Gaye during field activity in a colony of gentoo penguins



Andrea Capurro (Recipient) with Susie Grant and Mercedes Santos (Mentors) in 2019

The CCAMLR scholarship program pairs recipients with a mentor from a different Member country who is available to guide the recipient through the processes and procedures of CCAMLR. Since the scholarship's inception, fifteen researchers representing a diverse range of skills and interests have received the scholarship: they are summarised in the table below. Such a comprehensive suite of competences serves to improve the exchange of capacity within the ECR community. Connections forged at the ECR level nourished by intra- and inter-generational dialogue among researchers strengthens the relationships between Member countries involved in the conservation of the Antarctic marine living resources.



Jilda Alicia Caccavo (Recipient) Skyping with Christopher Jones (Mentor) in COVID times (July 2020)

Recipient	Year	Mentor(s)	Subject
Rodrigo Wiff (Chile)	2012-2013	Mark Belchier (UK)	Bayesian and CPUE based biomass dynamic models for use in toothfish stock assessment in 'data-poor' fisheries
Xinliang Wang (China)	2013-2014	Xianyong Zhao (China)	data from krill fishing vessel echosounder to estimate the characteristics and relative density of krill swarms
Mercedes Santos (Argentina)	2013-2014	Jefferson Hinke (USA); Esteban Barrera-Oro (Argentina)	diet and foraging distribution studies of Adelie penguin at Hope Bay/Esperanza; key role in developing enhanced multi-Member collaboration and coordination of CEMP monitoring and associated research in the South Orkney Islands and the Antarctic Peninsula
Anna Panasiuk-Chodnicka (Poland)	2014-2015	Małgorzata Korczak-Abshire (Poland)	integrated biological, chemical and geophysical data from both marine and terrestrial in Admiralty Bay, King George Island, South Shetland Islands; contrasting response of krill and salps to a warming oceanic ecosystem and relative energy pathways presented to penguins
Aleksandr Sytov (Russia)	2015-2016	Svetlana Kasatkina (Russia)	relationship between environmental variables and the spatial-temporal dynamics of krill catch and effort
Fokje Schaafsma (EU)	2016-2017	Jan Van Franeker (EU)	how living resources are affected by changes in sea-ice habitats through investigations of the distribution, population structure and diet of trophic key species in the under-ice habitat
Andrea Capurro (Argentina)	2017-2018	Susie Grant (UK); Mercedes Santos (Argentina)	data analysis and spatial planning in relation to the work in Domain 1
Yiping Ying (China)	2017-2018	Xianyong Zhao (China)	analysis of fishing activity and the use of CPUE data combined with acoustic data from the krill fishery to study the progressive change of krill density through the fishing season
Elisa Seyboth (Brazil)	2018-2019	George Watters (USA)	factors affecting the distribution and relative abundance of fin whales <i>Balaenoptera physalus</i> and its overlap with the distributions of krill and krill fishing activities in CCAMLR Subarea 48.1
Davide Di Blasi (Italy)	2018-2019	Steve Parker (New Zealand)	non-invasive sampling video methodologies, Baited Remote Underwater Videocameras (BRUVs), to investigate the biology of Antarctic toothfish <i>Dissostichus mawsoni</i>
Ana Laura Machado Gaye (Uruguay)	2019-2020	Mercedes Santos (Argentina); Louise Emmerson (Australia)	systematic monitoring program for penguins on Ardley Island to foster the engagement of Uruguay in the work of CEMP and WG-EMM
Illia Slypko (Ukraine)	2019-2020	Dirk Welsford (Australia)	structured research of fishing and development of data-limited stock assessments for <i>Dissostichus mawsoni</i> in the CCAMLR area
Xiaotao Yu (China)	2020-2021	Xianyong Zhao (China)	acoustic methods to estimate krill biomass (comparison of FEM-BEM and SDWBA models)
Emilce Rombolá (Argentina)	2020-2021	Bettina Meyer (Germany)	early euphausiid larvae distribution in the West Antarctic Peninsula and the contribution of this region to the recruitment in the Antarctic Circumpolar Current and the Weddell Scotia Confluence
Jilda Alicia Caccavo (Germany)	2020-2021	Christopher Jones (USA)	<i>Dissostichus mawsoni</i> population connectivity in the Weddell Sea with respect to their circumpolar distribution using a multidisciplinary approach combining population genetics and otolith chemistry