

**International Collaborative Expedition to collect and study FISH  
indigenous to Sub-antarctic Habitats (ICEFISH) - Brazil**

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In a world experiencing climate global changes, loss of biodiversity and depletion of fisheries, the biotas of the Antarctic and the Sub-Antarctic offer compelling natural laboratories for understanding the evolutionary impact of these processes. Since the IGY (1957-58), biologists have made impressive progress in understanding the Antarctic ichthyofauna. However, research integration into the broader marine context has been limited, largely due to lack of access to Sub-Antarctic fishes. These fishes, in particular those of the dominant suborder Notothenioidei, are critical for a complete understanding of the evolution, population dynamics, eco-physiology and eco-biochemistry of their Antarctic relatives. The ICEFISH programme is designed to fill these critical gaps in our knowledge. Cruises, encompassing the South Atlantic, South Pacific and South Indian Ocean sectors constitute the ICEFISH programme, the first comprehensive international survey of the Sub-Antarctic marine habitat. The first, ICEFISH-2004 (17 May –17 July 2004) was a resounding success. Extensive fishing was performed in the South Atlantic sector: Burwood Banks, Falkland Islands/Islands Malvinas, Shag Rock, South Georgia, South Sandwich Islands, Bouvetoya, and Tristan de Cunha, at depths ranging from tidepools to the abyss (for information on the cruise, participants, and detailed science projects, see [www.icefish.neu.edu](http://www.icefish.neu.edu)). Although autonomous, ICEFISH-2007 builds on the important legacy of ICEFISH-2004. It will sample the Sub-Antarctic Pacific sector, including Campbell and Scott Islands, Antipodes, Auckland, Macquarie, and Balleny Islands. Fishing will be multi-modal, using Otter, mid-water, Blake and MOCNESS trawls, plankton nets, beach seining, tide pooling, and traps. We will charter a suitable ice-strengthened ship/icebreaker, equipped with aquaria with running seawater to maintain live specimens, and with high-quality research laboratories. Twenty-four to 28 scientists will participate, largely those of the 2004 cruise, ensuring continuity of the scientific focus of the ICEFISH programme. The scientific activity will cover a wide range of topics, many of which will develop work carried out in ICEFISH-2004.