



Jack Mackerel (*Trachurus Murphyi*) distribution peculiarities in the high Seas of the South Pacific in relation to the population structure

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ABSTRACT

The materials on jack mackerel occurrence, distribution and biology collected in 139 research, fish-detecting and commercial fishing Russian expeditions to the South Pacific in 1978-1991 are presented. Mean annual (1982-1991) maps of jack mackerel *Trachurus murphyi* aggregations distribution by quarter in one-degree square grid are given. Distribution of spawning and immature jack mackerel in the catches taken in the South Pacific area is shown. The analysis of the zonal, in longitude, jack mackerel occurrence at different stages of reproduction cycle in the high seas of the ocean between 30° and 50°S is made. It has been determined that in the high seas of the Pacific Ocean southward of 30°S, outside the 200-mile zones of the coastal states, there exist appropriate conditions for jack mackerel reproduction and existence at all stages of life cycle. It provides the recruitment for the fishing part of jack mackerel stock in the oceanic waters of the South Pacific.