

The study of effects of Sturgeon pen culture on distribution, abundance and biomass macroinvertebrate in Gorgan Gulf

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Abstract

Nowadays, the environmental impact of fish culture on water quality and benthic macroinvertebrates is known as pollution water. Therefore, the studies were carried out to determinate of distribution, abundance and biomass value macro invertebrate around Sturgeon pen culture in Gorgan Gulf. Seasonal samplings were carried out from August 2015 to July 2016. The study was done at 5 stations in 3 transects, where three pen culture were active. Stations were in distance 0, 5, 25, 50 and 100 m far from pen. Benthos was collected using a van Veen grab (20*25 cm). Density, abundance percent and biomass were calculated for groups. Totally, 11 genus's and 10 families belong to 3 phyla as Mollusks, Arthropods and Annelids were identified. The results showed, there were the maximum abundance percent belong to Pyrgulidae (Hydrobiidae) and Cochliopidae with 33.83% and 26.05% and the minimum abundance percent belong to Gammaridae with 0.05% respectively.

Keywords: Distribution, Biomass, Sturgeon Fish, Pen, Gorgan Gulf