

HABITAT ENVIRONMENT OF AQUATIC ORGANISMS IN THE COASTAL SEA OF TOKYO, JAPAN

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Tokyo Metropolitan Government has started census monitoring program of aquatic organisms (benthos, fish, attached organisms, phyto- and zooplankton) in the mid 1980 in order to evaluate the environmental condition from comprehensive perspective. In this program, number of population and species, total wet weight and water quality have been recorded. And in case of coastal fish, individual length and weight, sex, presence of egg etc. also have been measured.

We studied the change and present state of habitat environment in the coastal sea of Tokyo using these census and water quality data since F.Y. 1985 and the following results have been obtained.

- The result of benthos monitoring, which have been carried out in May and September at 16 sites every year, shows that the number of population, biodiversity and biomass decrease in September compared to in May. Considering DO, this result seems to mean that the anaerobic condition at the sea bottom in summer damage benthos. And this cycle have been repeating during about 20 years.

- In case of fish monitoring, in all of 7 monitoring sites, totally some 90 fish species occurred. In offshore areas, number of species and individuals were very smaller than those in the tidal flat areas. This was supposed to be the effects of anaerobic bottom water occurring in summer. The data from a site Kasai in a tidal flat area was used to examine the long-term trends. Temporal changes in number of individuals, number of species and species diversity were insignificant. Three of the most abundant species make up more than 80% of total fish population. Considering each species respectively, *Chaenogobius annularis*, *Acanthogobius flavimanus* and *Gobius gymnauchen* occurred frequently.