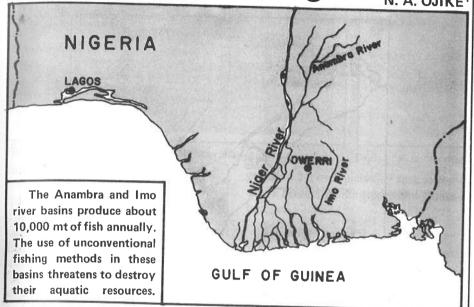
Unconventional Fishing Methods in the Anambra and Imo River Basins, Nigeria



THE ANAMBRA AND IMO river basins, comprising a series of natural lakes, flood plain ponds and river courses, are richly endowed with fishery resources. Unconventional fishing methods are commonly used in Oguta Lake, Owerrinta area of the Imo River, Ndimoko near Okigwe on the Imo River, Ulakwo on the Oramirukwa River, flood ponds of the Niger flood plain, Amansea on the Ezu River and Ogurugu and Otuocha on the Anambra River.

The need to protect the fishery resources of the basins is especially important since Nigeria is now importing frozen fish to augment the protein requirements of its 70 million inhabitants.

Poisons and Explosives

The main unconventional methods used in fishing in these areas include local poisonous herbs and chemicals like gamalin 20, etc., and various explosives.

Senior Fisheries Officer, Fishery Resources Division, Anambra/Imo River Basin Development Authority, PMB 1301, Owerri, Imo State of Nigeria.

Poisons destroy juvenile as well as mature fish. This makes it difficult for many species to maintain themselves at normal densities and may lead to the total destruction of some stocks. Fish killed by this method are sold in the market, but are known to contain some poisonous substance. The nature of the poison has not been ascertained, and is under investigation.

With regard to explosives, a group known as the "Egbemiri group" (i.e., the group using explosives to fish) are responsible in the Oguta Lake area. These men have refused to yield to calls of fisheries extension staff and marine police in the area to stop the use of explosives. Similar groups exist in other fishing centers. It is worthy of mention that fishermen involved in the use of unconventional fishing methods form associations.

Both poisons and explosives pollute the waterways which are the source of drinking water to the majority of the population of these areas. Such polluted water in reservoirs and manmade lakes is also the main source of water for irrigating farms.

During my investigation it was found that such methods are used more during the dry than the rainy season. This is because the low volume of water in river systems in the dry season requires less material to be used.

Control Measures

Given this problem, how can we effectively manage these fresh water areas to ensure sustained fish yields? There is an urgent need to control the use of unconventional fishing through education, patrols, cooperatives and legislation. Considering the socioeconomic status of the people in these areas, the following measures are advocated.

Education. Ignorance on the part of the fishermen to appreciate the grave consequences that result from the use of unconventional fishing methods has been a major handicap. A realistic approach towards solving this problem is education of the people in the areas concerned on these problems through:

- meetings between recognized Chiefs of the area, police, local government councillors, fisheries cooperatives and associations and the "Egbemiri" group;
- public enlightenment campaigns using motor vans with loudspeakers on market days near fishing centers. The campaigns should be extended to churches and schools;
- publication and distribution of pamphlets and posters in English and local languages; and
- weekly radio and TV broadcasts. Patrols. Large water bodies should be patrolled by marine police and fisheries extension staff to prevent fishermen from using explosives.

Cooperatives. Formation of fishermen's cooperative societies is recommended to attract government subsidies for improved gear, plank canoes, outboard engines and processing and storage facilities. These will help fishermen catch more fish without resorting to unconventional methods.

Legislation. Restriction or complete outlawing of the use of poisonous chemicals and explosives in fishing should be effected.

Extension. Finally, training of more fisheries extension staff should be stepped up to help in the performance and guidance of the measures suggested above to achieve the desired impact.