"Kotibale" a new type of boat seine introduced at Malpe Fisheries Harbour

Marine fishing at Malpe during the monsoon months (June to August) is being carried out only by the motorised canoes as fishing by mechanised vessels is banned by the Karnataka Government. The sea condition on most of the days during the monsoon period is unfavourable for conducting normal fishing. However, when there is less wind and the sea is calmer, fishermen used to venture into the sea in their outboard motorised indigenous gear nearer to the shore (<12m). These motorised units use either boat seine, gill net or mini trawl net. Among these the boat seines
ranibale and mattabale are very popular and are used to catch shoaling pelagic fishes and prawns namely oil sardine, small sized mackerel, croakers, other clupeids like lesser sardines, rainbow sardine, Thryssa spp., pomfrets, Metapenaeus dossonti and Parapeneaus stylirostris. Among the gill nets in use, the pattabale is important as they target the large sized mackerel which abound in the nearshore area in good concentration during the monsoon period every year. The pattabale catch good quantities of mackerel. The major operational disadvantage of pattabale is the long time taken for removing the gilled mackerel. On a fair catch day a unit employing 12-15 fishermen has to spend 2-3 hours for a 0.5 t catch. This year the fishermen introduced a new boat seine called as kotibale mainly to encircle the large sized mackerel shoal during the monsoon months and haul the net into the canoe, thereby saving a lot of time. The kotibale is operated from wooden canoes having an overall length of 11.7 to 17.5 m and use 15 to 25 h.p. out-board motors. Each ‘Kotibale’ unit consists of 2-3 canoes and a net and employs 18 to 20 crew members. The method of operation is similar to the operation of other boat seines. Kotibale is prepared using thicker thread with larger mesh size and more lead weights as compared to other boat seines in use. The net is thus heavier than the other boat seines and therefore sinks faster and withstands the water current much better.

About 300 kg of nylon net material is being used in the making of one kotibale. The net has a length of 500 m and a depth of 35 m. The net is webbed using thread number one and has a mesh size of 30 to 32 mm. The entire net consists of four to six pieces and the pieces are joined using No. 6 nylon rope. The head rope has a thickness of 20 mm to which attached are 3,500 apple floats using 10 mm rope. The floats are attached at an interval of 6 inches. The foot rope has a thickness of 60 mm and around 1,000 lead weights each weighing 250 g each separated by a distance of 11 inches are attached to it. Forty to forty-five numbers of purse rings each weighing 250 g are attached to the net. The rings (10 numbers) attached on either side of the net are heavier and weigh 0.5 to 1 kg. This makes the net heavier and enables rapid sinking. The total cost of the net is estimated to be around 1.6 lakhs. The making cost of a new kotibale unit is estimated to be around Rs. 6 lakhs which includes the cost of the net, the canoes and the labour involved. As shoal of large sized mackerel is encircled, transfer of the trapped fish to the carrier boats and auctioning of the same do not take much time and if need be the same unit can take two or three hauls in a day. The fishermen are confident that the modified boat seine will be profitable. During 1997 fifty kotibale have been manufactured at Malpe.

Prepared by Prathibha Rohit and R. Appaya Naik, Mangalore Research Centre of C.M.F.R.I. Mangalore - 575 001.