

Marine Fisheries Information Service

Technical and Extension Series

Number 199 January - March 2009



Juvenile croakers - a major component of the low value trawl by-catch landed at Chennai

Shoba Joe Kizhakudan and S. Gomathy *Madras Research Centre of CMFRI, Chennai*

ow value by-catch forms about 10-12% of the trawl landings at Chennai. Fishes form about 60 - 65% of this by-catch. The major fishes occurring

in the by-catch include - silverbellies, cardinal fishes, flatheads, lizardfishes, whitebaits anchovies, croakers, threadfin breams, monocle breams,

flatfishes, dragonets, glassies, rays and skates, goatfishes, pufferfishes, scorpionfishes etc. Juvenile croakers have been found to occur in considerable proportion in the by-catch. Otolithes ruber, Johnius carutta, J. belangerii (Fig. 1) J. dussumieri, Johnieops sina and Nibea maculata dominate the sciaenid assemblage in the low value by-catch. Kathala



Fig. 1. *Johnius belangerii* (25-99 mm) from low value trawl by-catch landed at Chennai in July 2007.

axillaris and J. macropterus have also been recorded in the by-catch. Almost 90% of the sciaenid catch was composed of juveniles. The month-wise species composition and proportion of juveniles for croakers (average for the period July 2005 - December 2007) is given in the table.

Month	Species	Length	% of
		range	juve-
		(mm)	niles
January	Johnieops sina	43-99	79
	Otolithes ruber	55-112	80
February	Otolithes ruber	46-60	100

March	Johnieops sina	57-88	42
April	Johnieops sina	47-108	56
May	No fishing		
June	Johnieops sina	20-116	96
	Johnius carutta	53-105	90
	Kathala axillaris	29-79	100
	Nibea maculata	63-113	87
	Otolithes ruber	36-115	96
July	Johnius belangerii	25-99	89
August	Otolithes ruber	79-110	75
	Nibea maculata	64-96	97
	Johnieops sina	55-100	75
	Johnius belangerii	27-82	97
	Johnius carutta	100	100
September	Nibea maculata	65-76	100
	Otolithes ruber	68-110	80
	Johnieops sina	55-100	85
	Johnius macropterus	100	100
	Johnius belangerii	30-85	100
October	Johnieops sina	72	25
	Johnius dussumieri	148	0
November	Johnieops sina	45-120	88
	Nibea maculata	50-85	100
	Otolithes ruber	78	100
December	Johnieops sina	70-105	100
	Johnius carutta	128	100
	Nibea maculata	62-104	100

Depending on the condition of the catch and the degree of spoilage, the croakers, along with other fishes, are either dried and sold in local markets for human consumption or sold for fish meal production. Larger croakers sorted and sold for drying fetch Rs. 8-10/- per kg. The juveniles are often mixed and sold with other fishes as raw material for fish meal preparation @ Rs. 4-5/- per kg.