Boat building - A livelihood focused intervention for fisherfolk

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Fisher folk's dependence on depleting fishery resources and open access nature of fisheries reflecting the tragedy of the commons, has resulted in a core of adaptation measures which has led them to seek livelihood diversification. Fishermen families within themselves are seen to engage in multiple income generating activities or observed to move away to fishery/non fishery related livelihoods. This study documents the case of boat building as a livelihood occupation among fisher folk of Chinnamuttom fishing village, Kanyakumari district.

There are 47 coastal villages in Kanyakumari district with total 1,43,388 fisher folk population. As per the Marine fisheries Census 2010, 96.96 % of the fisherfolk are actively involved in fishing. Among fishery related activities, 48.51 % of fisherfolk are involved in fish marketing, followed by 17.92 % in net making/repairing, 12.99% in fish curing, 12.72% in shrimp peeling sheds, 10.84 % as labourers and 12.90 % in other miscellaneous works. Boat building is an additional source of income for these fishermen. Though the *Kattumaram* and the canoe are the two main types of crafts operated by the traditional sector, the number of motorised and

mechanised crafts in the fishery have increased significantly over the years. There are two mechanised boat building yards in Agatheeswaram taluk of Chinnamuttom village in Kanyakumari and one mechanised boat building yard in Kanyakumari. These yards specialize in the making of single day trawlers or multiday (70 feet length and 18 feet breadth) trawlers. The boats are made of wood plus fibre coating. *Vagai* (*Albizia lebbeck*) is used for building the base of the boat and *Aini* (*Artocarpus hirsuta*) is used for the sides of the boat. It takes 4 months to build a mechanized boat and normally 2 boats are built in a year. There are nine carpenters and one supervisor involved in this endeavor.

Table 1. The economics of boat building (for 1 mechanised boat)

Components	Cost (₹)
Wood (Vagai and Aini)	8,16,250
Cost of engine (540 HP)	18,50,000
Cost of fibre coating	2,75,000
Cost of insulated cold storage holder	16,50000
Cost of dinghy boat	2,50,000
Cost of otterboards (2 numbers)	30,000

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Cost of 1600 m rope with fibre coating @ ₹ 90/metre of rope	1,44,000
Cost of equipments and electronic gadgets on board	
Wireless set	39,000
Echosounder	96,000
GPS	24,000
Batteries (2 numbers)	19,000
Wire ropes = 190 m @ ₹ 78/meter	14,820
Steel propeller	1,37,500
Nets (8-12 types)	7,00,000
Syntex tank (1000 litre capacity)	14,000
Gas cylinders (2 numbers)	9,500
Boat trial run	45,000
Labour charges (for 9 carpenters @ ₹ 750/day x 25 days/month x 4 months) + ₹ 1,20,000 for 1 supervisor	
(@ ₹ 1,200/day x 25 days x 4 months)	7,95,000

Interest paid by owner for a loan of ₹ 70 lakhs/boat building =	
(@ ₹ 1.75 lakh/month x 4 months)	7,00,000
Total cost incurred for one boat	7609070
Selling price/boat	85,60,000
Net profit/boat builder	9,50,930
Income earned per labourer (@ ₹ 750/day	
x 25 days/month x 4 months)	75,000

Thus the net profit earned per boat builder accrues to ₹ 9,50,930 and the income earned per labourer for a period of four months (duration of boat building) is ₹ 75,000. Fisher folk who work as labourers in boat building yards are from nearby places such as Pinnakayal,Chettikulam,neighbouring district of Tuticorin as well as migrants from other states such as Andhra Pradesh.