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Analysis of Borrowings and Repayment of Fisherfolk in Selected Fishing Villages of Tamilnadu

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A study on the borrowings and repayment of fisherfolk in two fishing villages in Kanyakumari district of Tamilnadu was taken up. The purpose-wise and source-wise borrowings and the source–wise repayment of the fishermen respondents were analysed. The factors affecting the borrowings and indebtedness of fishermen respondents are presented.

Key words: Fisheries credit, borrowings, repayment

Credit is particularly important to small-scale fishermen whose asset holdings are minimum. When institutional credit is not made available to the fisherfolk, they turn to non-institutional sources, which charge exorbitant rates of interest (Anbarasan and Fernandez, 1986; Mammo, 1987). A cross section study about the borrowings and repayment of fisherfolk was taken up in selected fishing villages of Kanyakumari district of Tamilnadu state. The study was conducted with the following objectives: to find out the purpose-wise and source-wise borrowings of fishermen respondents; to study the levels of source-wise repayment of fisheries credit by the respondents and to determine factors affecting borrowings and indebtedness of fishermen respondents.

Materials and Methods

The study was conducted in Kanyakumari district of Tamilnadu state during the period between January to March, 2003. Of the 44 fishing villages in the district, two fishing villages having the highest number of mechanised boats, namely Colachel and Kanyakumari, and another two fishing villages having the highest number of catamarans with out board engine (obe), namely Kadiapattinam and Muttom, were selected. The sample size for the study was fixed as 120 which was distributed equally between the catamaran and the mechanised boat sectors and 30 fishermen respondents were randomly selected from each fishing village. A pre-tested survey schedule was used to collect data from the respondents. The data regarding the purpose- wise and source-wise borrowings, repayment and the amount outstanding were collected pertaining to the period from January to December, 2002. The collected data were statistically analysed.

Results and Discussion

The levels and pattern of purpose –wise borrowings and repayment for the respondents of catamaran category is presented in Table 1. The overall mean amount borrowed by a fisherman operating a catamaran was estimated as Rs. 49,462 out of which the percentages of amount borrowed for fishing, household consumption and non-fishing investments were 40.81, 33.22 and 25.97, respectively. With regard to the repayment performance, the fishermen respondents repaid 34.31% of the loan obtained for non

Table 1. Levels and pattern of purpose – wise borrowings and repayment of catamaran category

(Rs. per respondent)

Purpose	Borrowed	Repaid	Outstanding
Fishing	20,183 (40.81)	4,423 (21.91)	15,760 (78.09)
Household Consumption	16,432 (33.22)	5,312 (32.33)	11,120 (67.67)
Non-fishing investments	12,847 (25.97)	4,408 (34.31)	8,439 (65.69)
Total	49,462 (100.00)	14,143	35,319

(Figures in parentheses indicate percentages to total borrowings)

–fishing investments followed by 32.33 % of loan amount borrowed for household consumption and 21.91% of loan amount borrowed for fishing occupation.

The levels and pattern of source- wise borrowings and repayment for the respondents of catamaran category is presented in Table 2. It could be inferred that out of the mean total amount borrowed per fisherman respondent, the highest percentage of 59.19 (Rs.29,279) had been borrowed from money lenders followed by 25.56% (Rs.12,643) from traders. Traders included auctioneers and wholesale agents. The credit institutions had met only 15.25% of the mean loan amount borrowed per respondent. On the other hand, the percentages of loan amount repaid to moneylenders, traders and credit institutions were 33.20, 18.73 and 27.25, respectively. The overall mean loan amount borrowed per catamaran fisherman was Rs.49,462 with the repayment level of 28.59% (Rs.14,143) and the percentage of outstanding loan amount was as high as 71.41% (Rs.35,319).

Table 2. Levels and pattern of source – wise borrowings and repayment of catamaran category

(Rs. per respondent)

Source of credit	Borrowed	Repaid	Outstanding
Credit Institutions	7,540 (15.25)	2,055 (27.25)	5,485 (72.75)
Traders	12,643 (25.56)	2,368 (18.73)	10,275 (81.27)
Money lenders	29,279 (59.19)	9,720 (33.20)	19,559 (66.80)
Total	49,462 (100.00)	14,143	35,319

(Figures in parentheses indicate percentages to total borrowings)

The levels of source-wise and purpose–wise credit outstanding for catamaran category are presented in Table 3. The percentages of outstanding loan amount availed for the purpose of fishing occupation with credit institutions and traders were 72.75 and 81.27, respectively. The mean loan amount outstanding was lower (67.67% for household consumption and 65.69% for non fishing investments) compared to the other sources of finance like credit institutions and traders. The low level of repayment performance on the part of fishermen respondents with credit institutions was not encouraging the bankers to extend further production credit to small-scale marine fisherfolk in the study area. The moneylenders were the only source of borrowings for household consumption and non-fishing investments. It could be inferred that the repayment performance of catamaran fishermen respondents was found to be deplorable irrespective of the sources of finance (Tietze, 1987).

The levels and pattern of purpose-wise borrowings and repayment for mechanised boat category are furnished in Table 4. The

Table 3. Levels of source-wise and purpose-wise credit outstanding of catamaran category

(Rs. per respondent)

Purpose	Credit institutions			Traders			Money lenders		
	B	R	O	B	R	O	B	R	O
Fishing	7,540	2,055 (27.25)	5,485 (72.75)	12,643 (18.73)	2,368 81.27)	10,275	—	—	—
Household consumption	—	—	—	—	—	—	16,432	5,312 (32.33)	11,120 (67.67)
Non fishing investment	—	—	—	—	—	—	12,847	4,408 (34.31)	8,439 (65.69)

B = Amount borrowed R = Amount repaid O = Amount outstanding
(Figures in parentheses indicate percentages to respective sources of borrowings)

Table 4. Levels and pattern of purpose-wise borrowings and repayment of mechanised boat category

(Rs. per respondent)

Purpose	Borrowed	Repaid	Outstanding
Fishing	1,50,255 (63.43)	60,705 (40.40)	89,550 (59.60)
Household Consumption	32,300 (13.64)	14,340 (44.40)	17,960 (55.60)
Non-fishing investments	54,324 (22.93)	16,845 (31.01)	37,479 (68.99)
Total	2,36,879 (100.00)	91,890	1,44,989

(Figures in parentheses indicate percentages to total borrowings)

mean amount borrowed by a fisherman respondent operating a mechanised boat was worked out to Rs.2,36,879 out of which Rs.1,50,255 (63.43%) had been borrowed for fishing occupation. The mechanised boat respondent borrowed Rs.54,324 (22.93 %) for non fishing investments and Rs.32,300 (13.64%) for household consumption. Out of the mean total borrowings, the percentage of mean loan amount repaid was 38.79 (Rs.91,890) with outstanding loan amount of Rs.1,44,989 (61.21%). The percentage of repayment of loan availed for fishing occupation was higher accounting for 40.40%, when compared to the catamaran category (21.91%). The percentages of loan repayment in the cases of household consumption and non – fishing investments came to 44.40 and 31.01, respectively.

The levels and pattern of source – wise borrowings and repayment for mechanised boat category are presented in Table 5. Out of the mean total borrowings per mechanised boat respondent (Rs.2,36,879), the credit institutions played a lead role in advancing production credit to mechanised boat respondents to the tune of 64.05%. Money-

Table 5. Levels and pattern of source–wise borrowings and repayment of mechanised boat category

(Rs. per respondent)

Source of credit	Borrowed	Repaid	Outstanding
Credit Institutions	1,51,715 (64.05)	54,865 (36.16)	96,850 (63.84)
Traders	28,495 (12.03)	12,340 (43.31)	16,155 (56.69)
Money lenders	56,669 (23.92)	24,685 (43.56)	31,984 (56.44)
	2,36,879	91,890	1,44,989

(Figures in parentheses indicate percentages to total borrowings)

Table 6. Levels of source-wise and purpose-wise credit outstanding of mechanised boat category

(Rs. per respondent)

Purpose	Credit institutions			Traders			Money lenders		
	B	R	O	B	R	O	B	R	O
Fishing	1,21,760	48,365 (39.72)	73,395 (60.28)	28,495 (43.31)	12,340 (56.69)	16,155	—	—	—
Household consumption	—	—	—	—	—	—	32,300	14,340 (44.40)	17,960 (55.60)
Non fishing investments	29,955	6,500 (21.70)	23,455 (78.30)	—	—	—	24,369	10,345 (42.45)	14,024 (57.55)

B = Amount borrowed R = Amount repaid O = Amount outstanding
(Figures in parentheses indicate percentages to respective sources of borrowings)

lenders had met 23.92% of the mean total borrowings, whereas it was 12.03% by traders. The over all mean amount repaid per fisherman respondent was computed as Rs.91,890. The percentages of loan repayment to credit institutions, traders and moneylenders were 36.16, 43.31 and 43.56, respectively. The overall mean outstanding amount to total borrowings per respondent was estimated as Rs.1,44,989. The percentage of credit outstanding to total borrowings from credit institutions and traders was 63.84 and 56.69 and from moneylenders it was 56.44%. Out of the mean total amount borrowed per respondent, 38.79% of the amount was repaid keeping the balance outstanding.

The levels of purpose–wise and source-wise credit outstanding for mechanised boat category is furnished in Table 6. Credit institutions and traders were the two sources of finance. Percentage of mean credit outstanding from credit institutions and traders availed came to 60.28 and 56.69 respectively. For the loan amount borrowed from money lenders for household consumption, the amount yet to be paid was Rs.17,960 accounting for 55.60%. Mechanised boat respondents borrowed money from credit institutions and moneylenders for non-fishing investments. The amount outstanding was found to be very high accounting for 78.30% and 57.55%, respectively. The factors determining the borrowings and indebtedness of fishermen respondents were analysed by using the multiple linear regression analysis. The estimated function is:

$$Y = 2438.470 + 1138.540^{**}X_1 + 8.673\ ^{*}X_2 + 0.187\ ^{*}X_3 - 6.485\ X_4^{NS}$$
$$(366.886) \quad (3.527) \quad (0.073) \quad (7.367)$$
$$- 1.789\ ^{*}X_5 + 0.404\ X_6^{NS} - 0.129\ ^{*}X_7$$
$$(0.931) \quad (0.479) \quad (0.276)$$

$R^2 = 0.67$ F value = 6.43 **
n= 120

Factor	Regression Co-efficients	Std. Error of Co-efficients	t value
a	2438.470	—	—
X_1	1138.540	366.886	3.258 **
X_2	8.673	3.527	2.174 *
X_3	0.187	0.073	2.119 *
X_4	-6.485	7.367	0.795
X_5	-1.789	0.931	1.682 *
X_6	0.404	0.479	0.926
X_7	-0.129	0.276	2.264 *

** significant at 1% level * significant at 5% level

Where,

Y = total amount borrowed during the previous year.

X_1 = repayment performance of borrowers with reference to respective sources of borrowings in %

X_2 = number of dependents to earners in the respondent's family

X_3 = value of assets holding Rs.

X_4 = rate of interest paid %

X_5 = annual income from fishing Rs.

X_6 = total outstanding debt prior to current year

X_7 = savings of the household Rs.

The regression coefficient of repayment performance of borrowers with reference to respective sources of borrowings was positive and significant at p = 0.01, while those of the percentage of dependents to earners, value of assets and total savings of the household were positive and significant at p = 0.05. The regression co-efficient of annual income from fishing was negative and significant at p=0.05.

The positive regression coefficient value for X_1 indicates its significant role in taking decisions regarding lending of money to the fishermen respondents. The partial regression coefficient for X_2 (number of dependents to earners) was 8.673, which could be inferred that one number increase in dependents to earners in the household, leads to an increase of 8.673 % in total borrowings. The regression co-efficient for asset holdings of the fishing household was 0.187, which means that one percent increase in asset holdings results in an increase in the total borrowings by 0.19%. The interest rate on borrowings does not influence the level of borrowings.

The negative regression co-efficient values for annual fishing income could be viewed that for one rupee decrease in annual income from fishing, the total borrowings of the fishing household increase by Rs.1.79. The total outstanding debt prior to current year does not affect the dependent variable. Inverse relationship exists between the total savings and the borrowings of the fishing household as reflected in the negative regression coefficient for savings aspect.

The R^2 value of 0.67 for the estimated function implies that about 67% of the variation in total borrowings among fishing households were explained by the seven explanatory variables included in the model. The F value is significant at 1% level (table value is 2.96 at p = 0.01) indicating the best fit of the function. The choice of variables is appropriate and their behaviour indicates the validity of the analysis. Thus, the repayment performance of the borrowers to the various lending sources, number of dependents – to – earners, value of assets owned, annual income from fishing and total savings determine the total amount borrowed.

In the light of the field observations and the results of the analysis, some suggestions are proposed.

i) Leadership training may be given to the fishermen to realise that prompt repayment of loan would help to get further production loan from institutional sources.

ii) Group action among fishermen to ensure steady flow of institutional credit to the villages may be initiated.

iii) The fisher folk may be encouraged to augment subsidiary income from fishery related sources to improve their socio economic status.

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