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Interest rates, collateral and (de-)interlinkage: a micro-study of rural credit in West Bengal

Sudipta Bhattacharyya*

This study, based on a primary field survey in rural West Bengal, analyses the terms and conditions of the differentiated structure of rural credit with the advent of capitalist agriculture within the interventionist state. The sample households are classified according to the economic classes of Patnaik as well as the standard acreage criterion. The possibility of interlinkage between credit and all other structures is remote. The average rate of interest is inversely related to ascending class status. There is a systematic association between rate of interest and the value of collateral on the one hand, and marketability of collateral and interest rates on the other.

Key words: Credit, Differentiation, Interlinkage, Interest, Collateral
JEL classifications: Q14, Q19, E43 and G21

1. Introduction

This paper addresses the issue of interlinkage, interest and collateral arrangements in the rural credit market of West Bengal in the context of the relative development of capitalism in agriculture. This paper is based on a primary field survey in two agro-climatic regions of rural West Bengal. Rural West Bengal has experienced a process of peasant class differentiation[1] in the midst of state interventionist reforms[2] under the

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Address for correspondence: Department of Economics and Politics, Visva-Bharati, Santiniketan 731 235, West Bengal, India; email sudipta236@rediffmail.com.

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[1] Lenin (1977) in his historic contribution 'Development of Capitalism in Russia' first published in 1899 developed his thesis of differentiation of the peasantry. Lenin developed this theory by refuting his contemporary Narodnik's claim that the peasantry is a homogenous identity. According to Lenin the differentiation was a process in rural Russia that transformed the bulk of the old peasantry into two distinct classes; rural bourgeoisie and rural proletariat.

[2] West Bengal's agrarian reform may be described, first of all, as an attempt to ensure an effective right to the tenants in the form of 'operation *barga*' (recording the name of tenants on spot). Second, it involves an effective acquisition of the surplus land over the ceiling and distribution of the same among the rural poor. Third, it is a process of implementation of the minimum legislative wage rate for the landless labourers. All these measures had been implemented in the framework of a newly evolved grass-root level local administration, i.e., *Panchayat Raj*.

Left Front Government since the late 1970s. The structure of rural credit is determined by the prevailing pattern of interclass distribution of all basic means of production like land/non-land assets and irrigation facilities. This, in turn, is associated with a differentiated structure of labour; input use, cropping pattern, production/productivity and market orientation across classes (Bhattacharyya, 2001). In other words, on the one hand, the structure of credit is determined by the extent of peasant class differentiation defined with respect to control over the basic means of production. On the other hand, the process of usury capital can worsen the already existing unequal distribution of the means of production (Bhaduri, 1973, 1977; Prasad, 1974). In this sense the credit structure is both the cause and consequence of the existing class structure.

This paper deals with the relative degree of institutionalisation vis-à-vis the informal market in two of our sample regions: one, capitalistically developed and the other, backward. According to the classical Marxist formulation, the growth of usury capital has retarded the process of capitalist development/class differentiation (Lenin, 1977). It is expected that with the development of capitalist agriculture, the direct method of surplus extraction will be worked out rather than pre-capitalist means like rent and usury. This is why it is expected that in the capitalistically advanced region, more credit will be available at a lower rate of interest. An analysis of the interest rate structure would tell us of the existence of interlinked transactions by looking into the association of different forms of credit transactions with interest rate. The hypothesis is that, as a result of capitalist development and institutional reform in West Bengal, the pre-capitalist mechanism of interlinkage of credit with other markets has been dissolved. It is therefore expected that cash-to-cash or kind-to-cash will be the dominant forms of transaction even at a nil rate of interest and, therefore, the possibility of interlinkage will virtually be ruled out.

It is also expected that the extent of credit transactions with collateral security will exhibit a tendency to decline with the development of capitalism and agrarian reform in West Bengal. However, it will be interesting to know whether the small proportion of credit transactions with collateral behave like those in a purely backward agriculture. Also, whether there is any difference between interest rates with collateral and interest rates without collateral and if there is a difference, what are the plausible causes for it? Furthermore, whether there is any systematic association between collateral and rate of interest and whether there are different patterns of this relationship for various economic classes/size groups? If different patterns exist, what are the reasons? In this connection, does the average rate of interest have any systematic relation with ascending economic classes/size groups? If there is such a relation, is there any variation for with and without collateral transactions? According to Bhaduri's (1977) 'default theory', the access to institutional credit for poor peasants is limited, as they do not have the collateral that has any market value. But moneylenders accept the same collateral, which has very high personal value for him. The informal credit market is personalised and at the same time depends on the pre-capitalist way of extraction of surplus. Thus, the lower the marketability of the collateral, the higher the opportunity for moneylenders to charge an exorbitant interest rate. By charging very high interest rates, the moneylenders induce default so that they can appropriate undervalued collateral. Thus Bhaduri's (1977) 'default theory' leaves two important hypotheses to be tested. First, that the incidence of the

collateral has a direct relationship with the interest rate. Second, that there is a distinct inverse relationship between interest rates and distribution of collateral according to marketability.

2. Methodology

This analysis is based on a field survey conducted in the year 1993–94 in eight sample villages purposely chosen from two blocks of Bankura district among 210 sample households. Two sample blocks were selected, namely the most advanced and the most backward block, respectively,[1] in terms of capitalist development.

In the sample survey, the selection comprised 210 sample households [of which 110 households belonged to the advanced region (henceforth AR) and the remaining 100 households belonged to the backward region (henceforth BR)] on the basis of simple random sampling without replacement. In the sample, 138 out of 210 households (66%) belonged to the lowest landed size group (0.01 to 2.5 acres). According to the National Sample Survey Organisation (NSSO) categorisation, the households belonging to this size group are marginal peasants. The concentration of a high percentage of the households in a single acreage group is due to the fact that as a result of land reform many landless or near landless received land, while many erstwhile landlord households lost their land. But at the same time looking, at the Gini coefficients of different means of production, such as assets, irrigation, input, output, etc, what is found is a considerable level of concentration (Bhattacharyya, 2001) that cannot be explained with this apparently inverse unequal distribution of land among acreage groups.

There is, therefore, the need for a second criterion that will reflect the economic strength of the households and properly indicate the economic classes of the households. Therefore, the total sample households are classified on the basis of Patnaik's (1987) labour-exploitation criterion (E-criterion) side by side with the usual acreage criterion. The labour-exploitation index of Patnaik (1987) provides an empirical approximation to the analytical concept of the class status of the household. The class status of a household is determined by whether the household employs wage labour from outside, whether the household sells its labour power to others or whether the household is a self-employed one, i.e., neither employs nor sells labour power. For this purpose certain limits are set upon the values of the E-ratio, which are given in the Appendix, using the following form of Patnaik's E-criterion in order to classify the households.

$$E = X/Y = \{(Hi - Ho) + (Lo - Li)\}/F$$

where Hi = labour days hired on the operational holding of the household, Ho = family labour days hired out to others, Li = Labour days worked on leased in land (whether by family or hired labour), Lo = labour days similarly worked on land leased

[1] Two sample blocks have been selected on the basis of level of economic development. One block is Kotulpur, which seems to be the most advanced and most prosperous in the district. The other block is Khatra-2, which seems to be the most backward. In effect, the AR and BRs represent different degrees of capitalist development. The percentage of hired-in labour in the AR (77%) is far greater than that in the BR (43%). In terms of adoption of improved production techniques, e.g., use of high yielding variety seeds, consumption of modern chemical fertiliser, etc, the AR is far ahead of the BR.

out by the household, and F = labour days worked by household workers on the operational holding.

The cross-classification of sample households, according to the two criteria[1] discussed above, shows that while the two criteria are associated, as expected, they are not identical since what is obtained are positive non-diagonal elements, especially above the diagonal, not so much below.

Some critics have raised questions about the relevance of the E-criterion in discussing rural credit. Their objection lies in the fact that the E-criterion is compared and contrasted to operated land rather than owned land, while credit availability influences operated land and it is influenced by owned land (as collateral). However, such criticism is not valid for the following reasons. In a market economy, a borrower is considered creditworthy if he can afford collateral. However, the collateral does not only include owned land, but also other items, such as ornaments, utensils, owned houses, promissory notes, etc. In fact in the sample survey, of the total 364 transactions, the owned land is used as collateral for only seven transactions (three in the AR and four in the BR). Moreover, the demarcation between owned and operated land in West Bengal becomes narrower, since tenancy as an institution is steadily decaying following the operation *barga*.[2] Credit availability can also be influenced by operated land, particularly in the context of West Bengal, as the *barga* certificate[3] ensuring security of tenant cultivators can itself act as collateral. Last but not least, credit availability not only influences operated land, but also owned land, as the distress of selling owned land on behalf of poor peasants can be checked with the higher availability of institutional credit. It is noteworthy that the economic status of households determines the demand for credit. Therefore, the E-criterion that

[1] Cross classification of the number of households

	Land less	Poor peasant	Small peasant	Middle peasant	Rich peasant	Landlord	Total
0.00	10	0	0	0	0	0	10
0.01–2.5	0	71	27	13	12	15	138
2.5–5	0	1	11	6	10	8	36
5–10	0	1	4	5	2	9	21
10–15	0	0	0	0	1	2	3
15 & above	0	0	0	0	2	0	2
Total	10	73	42	24	27	34	210

[2] NSSO 26th, 37th and 48th round data show that of the total operated area, the percentage leased in area declined steadily for West Bengal from 18.73% in 1972, 12.34% in 1982 and 10.40% in 1992, while in all India the same percentage after exhibiting a sharp decline from 10.57% in 1972 to 7.18% in 1982, shows an increase to 8.28% in 1992. Therefore data suggest that the tenancy is a decaying institution in West Bengal. Clearly, a land redistribution (through land purchase and selling) from tenant holding to ownership holding is steadily taking place, as a threat of recording tenants holding is made to the owners of the land. A micro-study of Rawal (2001) also supported this tendency.

[3] *Barga* is a Bengali word for tenant. *Barga* certificate is the name of documentary evidence identifying a particular tenant in a village. Under the *operation barga*, once a tenant has been recorded after getting the *barga* certificate, the responsibility of disproving a claim to tenancy rights was squarely put on the landowners. Consequently, this *barga* certificate can be used as collateral against the bank loan.

Table 1. *Source wise percentage distribution of outstanding credit*

Sources	All	Advanced	Backward
Government	0.00	0.00	0.00
Co-operative	2.26	0.40	7.73
Commercial bank	34.48	31.59	42.95
Other	0.93	1.25	0.00
Total institutional	37.67	33.23	50.69
Landlord	0.71	0.09	2.53
Moneylender	24.20	22.35	29.64
Traders	3.74	4.14	2.54
Relative & friends	24.42	28.81	11.58
Others	9.25	11.38	3.02
Total non-institutional	62.33	66.77	49.31
Total (institutional + non-institutional)	100.00	100.00	100.00

represents the economic status of the households is considered a more appropriate measure than the acreage criterion.

3. Rural credit and the process of institutionalisation

The NSSO of India conducted the latest indebtedness survey for all Indian states in the 48th round (1991). The NSSO data show that the percentage share of the institutional credit for West Bengal is 82.00, while in our primary field survey it is 37.67 (33 and 51 for the AR and BR, respectively) as shown in Table 1. The share of commercial banks in total outstanding credit in our survey is 34.48% (32% and 43% for the AR and BR, respectively), which is marginally below the corresponding share in NSSO (37.70%). Markedly different is the share of the co-operative-society/bank (23.70% in NSSO, 1991 as against 2.26% in our survey) and the share of Government (13.30% in NSSO as against 0.00% in primary data). Among non-institutional sources, the moneylender has a relatively high share (24.20%, about 22% in AR and 30% in the BR) in the primary field survey compared with NSSO (6.30%). The share of the 'relative and friend' is relatively higher in our primary field survey (24.42%) compared with the NSSO (8.90%). The shares of the landlord and the trader for both cases (NSSO and sample survey) are small.

The relatively greater degree of institutionalisation of the credit market in the BR may be explained by the fact that it is an area with a sizeably large tribal population, and therefore, a targeted region for Intensive Rural Development Programme (IRDP), a well-known anti-poverty programme of the Government of India. On the other hand, despite the greater demand for credit in the AR, the supply of institutional credit may not be sufficient.

Some scholars have reservations about the quality of NSSO data on indebtedness (Prabhu *et al.*, 1988; Gothaskar, 1989; Bell, 1990). They pointed out that in spite of the fact that the ratio of institutional credit outstanding to total credit almost doubled between 1971 and 1981, the percentage of the indebted households to total (and also the percentage of households reporting institutional credit) went down drastically at the All India level and also for West Bengal. The tendency does not appear internally

consistent, particularly in a situation where the total number of rural households was increasing. These anomalies downplay the perception that the NSSO data show a generalised tendency that needs to be verified by micro-studies. There is no reason why a micro-study based on only eight villages and 210 households should provide a common picture with a NSSO survey based on 8,000 villages and 64,000 households. The common thread between the NSSO survey and our study is that low-level cooperative credit is related to high dependence on moneylenders.

4. Interest rate and interlinkage

Given the fact that the formal credit market in India is constituted by nationalised Indian banks, the interest rate in the formal market is institutionally fixed. In spite of some attempts at financial sector liberalisation in India, market forces have not been able to affect the interest rate in the formal sector. The calculation of the interest rate in the informal market is more difficult. The informal credit market involves several forms of transactions, namely, cash-to-cash (cash receipt of the loan by the borrower and cash repayment of loan and interest to the creditor), cash-to-kind (cash receipt of the loan and kind repayment), kind-to-cash (kind receipt of the loan and cash repayment), kind-to-kind (kind receipt and repayment of the loan), cash-to-labour (cash receipt of the loan and repayment in the form of labour) and kind-to-labour (kind receipt of the loan and repayment in the form of labour service). In calculating the interest rate, there was no problem where interest was paid in cash. But in cases where the interest was paid in the form of kind or labour service, some problems of valuation cropped up. In such cases a valuation was done of the kind payment or labour services paid as interest at the corresponding market prices of the commodities or labour service in the relevant area. In calculating the interest rates in the informal market the maturity of the loan was considered. For example, in the case of kind-to-kind transactions it was found that the borrowers received grain on the condition that they would have to repay 1.5 times within 5 months. Accordingly the interest rate was calculated as 120% per annum.

The source and purpose-wise distribution of the weighted average rate of interest (WARI) shows wide variation in the BR compared with the AR (Tables 2 and 3). In the AR the WARI is also the highest for the professional money lender (70%) followed by the trader (67%), the landlord (53%) and the relative and friend (14%). In the BR, the WARI is the highest for the agricultural moneylender (112) followed by landlords (95%), professional moneylender (79%), traders (38%) and relative and friend (3%) (Table 2).

In last column of Table 3, it will be seen that the interest rate shown for the purpose of consumption shows very high interest rates in both AR (66%) and BR (89%). This has truly reflected the vulnerable condition of the borrower generally in the lean season. In the BR, the average rate of interest on credit for medical expenditure shows an abnormally high level at 92% compared with 35% in the AR. This is due to the fact that there is a lack of state hospitals and subsidised medical facilities in the BR.

The structure and distribution of informal interest rates are shown in Table 4. Of the total loan transaction and amount, the respective proportions at nil rate of interest are 33% and 44%, which are quite high. However, at the higher rates of interest (above 50%), the proportion of loan transaction and amount are 55 and 41, respectively, which shows the usual nature of usurious exploitation.

Table 2. *Cross classification of sources of credit, collaterals and average rate of interest*

Sources of credit	No collateral	Land	Ornaments	Utensils	Other	Total
Advanced region						
Landlord	2 (53)	0	0	0	0	2 (53)
Agr. moneylender	1 (14)	0	0	0	0	1 (14)
Prof. moneylender	62 (70)	3 (53)	7 (88)	10 (98)	0	81 (70)
Trader	5 (69)	0	7 (67)	0	0	12 (67)
Rel. & friend	49 (14)	0	0	0	0	49 (14)
Others	60 (20)	0	0	0	0	60 (20)
Total	179 (32)	3 (53)	14 (70)	10 (98)	0	206 (37)
Backward region						
Landlord	3 (38)	0	0	1 (180)	0	4 (95)
Agr. moneylender	30 (112)	0	0	0	0	30 (112)
Prof. moneylender	64 (91)	4 (29)	5 (36)	6 (95)	1 (120)	80 (79)
Trader	0	0	6 (38)	0	0	6 (38)
Rel. & Friend	19 (3)	0	0	0	0	19 (3)
Others	19 (33)	0	0	0	0	19 (33)
Total	135 (63)	4 (29)	11 (37)	7 (145)	1 (120)	158 (62)

Note: Figures in parentheses represent average rate of interest.

Table 3. *Cross-classification of purposes of credit and collaterals*

Purposes of credit	No collateral	Land	Ornaments	Utensils	Other	Total
Advanced region						
Agricultural work	5 (2)	0	0	0	0	5 (2)
Non-farm Activity	59 (39)	0	4 (51)	0	0	63 (41)
Household expenditure	11 (44)	0	0	0	0	11 (44)
Marriage/ceremony	24 (30)	1 (0)	0	1 (120)	0	26 (30)
Medical expenditure	13 (10)	0	4 (75)	0	0	17 (35)
Consumption	17 (54)	0	4 (62)	9 (96)	0	30 (66)
Real estate	30 (35)	2 (74)	2 (90)	0	0	34 (42)
Others	20 (1)	0	0	0	0	20 (1)
Total	179 (32)	3 (53)	14 (70)	10 (98)	0	206 (37)
Backward region						
Agricultural work	2 (1)	0	1 (36)	0	0	3 (32)
Non-farm activity	13 (72)	0	0	1 (36)	1 (120)	15 (73)
Household expenditure	6 (41)	0	0	0	0	6 (41)
Marriage/ceremony	13 (57)	1 (0)	0	0	0	14 (56)
Medical expenditure	11 (75)	0	4 (44)	2 (173)	0	17 (92)
Consumption	80 (92)	2 (80)	5 (48)	4 (91)	0	91 (89)
Real estate	4 (11)	1 (0)	1 (30)	0	0	6 (12)
Others	6 (8)	0	0	0	0	6 (8)
Total	135 (63)	4 (29)	11 (37)	7 (145)	1 (120)	158 (62)

Note: Figures in parentheses represent average rate of interest.

Table 4. *Percentage distribution of number and amount of borrowing at various interest rates in the informal market*

(a) Economic class wise

Economic classes	Nil		0–24		25–49		50–99		100 & above		Total	
	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount
All regions												
Landless	25 (3)	10 (1)	0 (0)	0 (0)	0 (0)	0.00	37 (7)	31 (1)	38 (5)	59 (3)	100 (4)	100 (1)
Poor peasant	25 (29)	23 (11)	3 (44)	2 (38)	2 (9)	6 (9)	28 (46)	32 (27)	42 (50)	37 (42)	100 (38)	100 (20)
Small peasant	31 (16)	44 (10)	6 (45)	3 (41)	8 (14)	4 (3)	18 (15)	15 (7)	37 (21)	34 (20)	100 (18)	100 (11)
Middle peasant	43 (13)	54 (11)	0 (0)	0 (0)	8 (9)	11 (7)	24 (11)	16 (6)	25 (8)	19 (10)	100 (10)	100 (9)
Rich peasant	29 (12)	48 (25)	2 (11)	1 (21)	24 (34)	25 (40)	20 (12)	19 (19)	25 (10)	7 (9)	100 (14)	100 (23)
Landlord	56 (27)	51 (42)	0 (0)	0 (0)	20 (34)	16 (41)	12 (9)	25 (40)	12 (6)	8 (16)	100 (16)	100 (36)
Total	33 (100)	44 (100)	2 (100)	1 (100)	10 (100)	14 (100)	23 (100)	23 (100)	32 (100)	18 (100)	100 (100)	100 (100)
Advanced region												
Landless	57 (4)	31 (1)	0 (0)	0 (0)	0 (0)	0.00	14 (2)	16 (1)	29 (7)	53 (1)	100 (5)	100 (1)
Poor peasant	36 (29)	25 (10)	3 (67)	2 (61)	4 (12)	8 (10)	36 (53)	36 (27)	21 (59)	29 (48)	100 (36)	100 (19)
Small peasant	50 (14)	46 (8)	0 (0)	0 (0)	8 (8)	3 (2)	31 (14)	18 (6)	11 (11)	33 (24)	100 (13)	100 (9)
Middle peasant	67 (8)	73 (8)	0 (0)	0 (0)	8 (4)	13 (4)	25 (5)	14 (3)	0.00	0.00	100 (6)	100 (5)
Rich peasant	40 (15)	53 (30)	3 (33)	1 (39)	28 (40)	26 (45)	23 (14)	19 (19)	6 (8)	1 (1)	100 (17)	100 (26)
Landlord	58 (30)	49 (43)	0 (0)	0 (0)	19 (36)	15 (39)	15 (12)	29 (44)	8 (15)	7 (26)	100 (23)	100 (40)
Total	46 (100)	46 (100)	1 (100)	1 (100)	12 (100)	15 (100)	28 (100)	26 (100)	13 (100)	12 (100)	100 (100)	100 (100)
Backward region												
Landless	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.00	56 (8)	38 (8)	44 (5)	62 (4)	100 (4)	100 (2)
Poor peasant	13 (28)	18 (12)	3 (33)	1 (13)	0 (0)	0.00	17 (44)	16 (29)	67 (47)	65 (36)	100 (40)	100 (23)
Small peasant	18 (25)	39 (21)	10 (67)	9 (87)	8 (30)	9 (14)	10 (16)	8 (11)	54 (24)	35 (15)	100 (24)	100 (18)
Middle peasant	32 (29)	39 (29)	0 (0)	0 (0)	8 (20)	8 (18)	24 (24)	18 (36)	36 (10)	35 (21)	100 (16)	100 (25)
Rich peasant	0 (0)	0 (0)	0 (0)	0 (0)	15 (20)	12 (12)	14 (8)	17 (16)	71 (11)	71 (19)	100 (9)	100 (11)

Landlord	46 (18)	61 (38)	0 (0)	0 (0)	27 (30)	29 (56)	0.00	0 (0)	27 (3)	10 (5)	100 (7)	100 (21)
Total	18 (100)	33 (100)	4 (100)	2 (100)	6 (100)	11 (100)	16 (100)	13 (100)	56 (100)	41 (100)	100 (100)	100 (100)

Note: 'Number' indicates number of loan transaction. Figures in parentheses shows economic class wise percentage distribution of loan for different interest rate.

(b) Acreage group wise

Acreage groups	Nil		0–24		25–49		50–99		100 & above		Total	
	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount
All regions												
0.00	25 (3)	10 (1)	0 (0)	0 (0)	0 (0)	0.00	37 (7)	31 (1)	38 (5)	59 (3)	100 (4)	100 (1)
0.01 to 2.5	33 (70)	49 (71)	3 (89)	1 (86)	9 (69)	15 (67)	23 (72)	19 (50)	32 (70)	16 (57)	100 (71)	100 (62)
2.5 to 5	33 (14)	28 (15)	0 (0)	0 (0)	11 (17)	10 (15)	21 (14)	40 (40)	35 (15)	22 (29)	100 (14)	100 (23)
5 to 10	34 (8)	34 (6)	3 (11)	1 (14)	14 (11)	24 (14)	21 (7)	24 (9)	28 (7)	17 (8)	100 (8)	100 (9)
10 to 15	86 (5)	85 (7)	0 (0)	0 (0)	14 (3)	15 (4)	0.00	0 (0)	0.00	0 (0)	100 (2)	100 (4)
15 & above	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.00	0.00	0 (0)	100 (3)	100 (3)	100 (1)	100 (1)
Total	33 (100)	44 (100)	2 (100)	1 (100)	10 (100)	14 (100)	23 (100)	23 (100)	32 (100)	18 (100)	100 (100)	100 (100)
Advanced region												
0.00	57 (4)	31 (1)	0 (0)	0 (0)	0 (0)	0.00	14 (2)	16 (1)	29 (7)	53 (1)	100 (3)	100 (1)
0.01 to 2.5	44 (75)	52 (75)	2 (100)	1 (100)	13 (80)	17 (75)	28 (79)	20 (51)	13 (78)	10 (60)	100 (77)	100 (67)
2.5 to 5	46 (14)	29 (16)	0 (0)	0 (0)	11 (12)	10 (15)	29 (14)	43 (42)	14 (15)	18 (39)	100 (14)	100 (25)
5 to 10	45 (4)	44 (5)	0 (0)	0 (0)	22 (8)	27 (10)	33 (5)	29 (6)	0.00	0.00	100 (4)	100 (6)
10 to 15	100 (3)	100 (3)	0 (0)	0 (0)	0 (0)	0.00	0.00	0.00	0.00	0.00	100 (2)	100 (1)
15 & above	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.00	0.00	0.00	0.00	0.00	0 (0)	0 (0)
Total	46 (100)	46 (100)	1 (100)	1 (100)	12 (100)	15 (100)	28 (100)	26 (100)	13 (100)	12 (100)	100 (100)	100 (100)

Table 4. (b) (*continued*)

Acreage groups	Nil		0–24		25–49		50–99		100 & above		Total	
	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount
Backward region												
0.00	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.00	56 (20)	38 (8)	44 (5)	62 (4)	100 (6)	100 (3)
0.01 to 2.5	15 (54)	34 (49)	5 (83)	3 (69)	4 (40)	6 (25)	15 (56)	11 (44)	61 (67)	46 (54)	100 (62)	100 (48)
2.5 to 5	17 (14)	21 (9)	0 (0)	0 (0)	13 (30)	10 (12)	12 (12)	17 (19)	58 (16)	52 (17)	100 (15)	100 (14)
5 to 10	30 (21)	22 (13)	5 (17)	3 (31)	10 (20)	21 (38)	15 (12)	18 (29)	40 (9)	36 (18)	100 (13)	100 (20)
10 to 15	75 (11)	78 (29)	0 (0)	0 (0)	25 (10)	22 (25)	0.00	0.00	0.00	0.00	100 (2)	100 (12)
15 & above	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.00	0.00	0.00	100 (3)	100 (7)	100 (2)	100 (3)
Total	18 (100)	33 (100)	4 (100)	2 (100)	6 (100)	11 (100)	16 (100)	13 (100)	56 (100)	41 (100)	100 (100)	100 (100)

Note: 'Number' indicates number of loan transaction. Figures in parentheses shows acreage group wise percentage distribution of loan for different interest rate.

Table 5. *Different forms of transaction at various interest rates*

	Nil	0–24	25–49	50–99	100 & above	Total
All regions						
Cash-to-cash	82	1	30	71	76	260
Cash-to-kind	0	0	0	1	1	2
Kind-to-cash	38	0	3	7	1	49
Kind-to-kind	0	6	0	1	36	43
Cash-to-labour	1	1	2	1	2	7
Kind-to-labour	1	1	0	1	0	3
Total	122	9	35	82	116	364
Advanced region						
Cash-to-cash	56	1	20	49	25	151
Cash-to-kind	0	0	0	1	1	2
Kind-to-cash	37	0	3	7	1	48
Kind-to-kind	0	0	0	0	0	0
Cash-to-labour	1	1	2	0	0	4
Kind-to-labour	0	1	0	0	0	1
Total	94	3	25	57	27	206
Backward region						
Cash-to-cash	26	0	10	22	51	109
Cash-to-kind	0	0	0	0	0	0
Kind-to-cash	1	0	0	0	0	1
Kind-to-kind	0	6	0	1	36	43
Cash-to-labour	0	0	0	1	2	3
Kind-to-labour	1	0	0	1	0	2
Total	28	6	10	25	89	158

The classical Marxist proposition of an inverse relationship between the growth of usury and capitalist development in agriculture has been witnessed in the BR, where backwardness is associated with the higher rate of interest (WARI 62%) at which a higher proportion of credit transactions took place in the informal market comparison with the AR (WARI 37%) (Tables 2 and 3).

The forms of informal credit at different interest ranges are shown in Table 5. Out of the total of 364 loan transactions, 260 (71%) take place in the form of cash-to-cash. Only 49 (13%) loan transactions take place in the form of kind-to-cash and only 43 (12%) in the form of kind-to-kind. A small proportion of transactions take place in the form of cash-to-labour (7) and kind-to-labour (3). Of the 364 transactions, a large proportion of transactions are made at the two polar rates of interest—nil (122) and 100% and above (116). The relatively high rate of interest (50%–99%) also registers a large number of transactions (82).

In light of the modern literature on interlinkage between rural markets, many scholars put forward the hypothesis of interlinkage between credit and labour or any other market behind the observed high proportion of loan transactions at nil rate of interest, so that interest is actually manifested in the prices at which interlinked commodities are exchanged. In other words, according to some scholars the nil rate of

interest is not actually nil. An implicit valuation must be attached to it (Bharadwaj, 1974; Basu, 1984A, 1984B). But the ground-level data of West Bengal that were obtained do not support such an argument. First of all, the data suggest that the higher economic classes and size groups make more transactions at a nil rate of interest in comparison to poor people. The percentage share of loan transactions and amount by the labour-hiring classes at a nil rate of interest are 39% and 68%, respectively, compared with that of the exploited classes, 32% and 12%, respectively. The same percentages for the size group 0.01–2.5 acres are 70 and 71, respectively (Table 4). Therefore, exploitation of the poor by the rich, by means of implicit interest within an interlinked mechanism, does not hold at all. Furthermore, looking into the cross classification between the rate of interest and the form of transaction, it is evident that out of the 122 loan transactions at a nil rate of interest, 82 (67%) loan transactions take place in the form of cash-to-cash, and 38 (31%) transactions take place in the form of kind-to-cash. Therefore, altogether 98% of the total loan transactions take place at nil rate of interest for which there is no possibility of interlinkage with labour (Table 5). This result is indeed no exception to other findings in this context (Socio-economic Research Institute, 1981, 1988; Bhaumik, 1993; Khasnabis, 1994).

The large proportion of interest-free transactions can be explained by the insurance policy among the lenders and borrowers. In the absence of any formal insurance in agriculture, it is guaranteed through the credit market. It might be assumed that the higher the advancement or capitalist development, the higher is this kind of insurance. Thus we find that in the AR 94 transactions are made at nil rates while in the BR the figure is 28 transactions (Table 5). For relatives and friends, clearly an insurance policy acts as a motive behind nil rates of interest. Here, borrowers and lenders have symmetrical interests. A lender of today may be a borrower tomorrow. The lenders know that they can obtain an interest-free loan tomorrow (from the relative and friend) if they provide the same today. The second largest portion of interest-free transactions from the source of 'others' comes from different kinds of shops—cloth, fertilisers, medicines and groceries. In this case, the interest of the lenders and borrowers are not symmetrical. For the shopkeeper the motive is clearly sales promotion.

There is an aspect of insurance attached to both lenders and borrowers. First of all, for the borrower the regular purchase from the particular shop involves a possibility of credit purchase at the time of a shortage of liquid cash. The benevolence on the part of the shopkeeper in offering credit purchase at nil rates of interest might attract customers, who due to this obligation would continue to purchase the product from the same shop in future even when they do not require any credit. The possibility of insurance for ensuring labour availability during the peak season is, however, remote. As mentioned earlier, there is only one transaction in the form of cash-to-labour in the AR (of the total 94 transactions at nil rates of interest) and one transaction in the form of kind-to-labour in the BR (of the total 28 transactions at nil rates of interest; Table 5). The hypothetical situation that the credit is disbursed by the labour-hiring households to the households hiring out labour in a form other than cash-to-labour or kind-to-labour, with the hope that the exploited households will offer their labour to them in the peak season as a gesture of good will, is also remote. In the field survey there was not a single household like that. The observation is that while the nil rate of interest reflects the insurance policy, the higher rate of interest acts as an instrument of surplus extraction.

According to many authors (Bhaduri, 1973; Bharadwaj, 1974), interlinked transactions have commonly evolved out of the landlord–tenant relationship. It is therefore necessary to go through the information on tenant households. There are 31 tenant households in the AR and nine such households in the BR. Of the total 31 tenant households in the AR, 18 households (58%) pay interest in the form of cash-to-cash, six households (19%) pay interest in the form kind-to-cash and the remaining six households pay interest both in the form cash-to-cash and kind-to-kind. Only one household makes transactions in the form cash-to-labour. Therefore, for 30 households out of the 31 in the AR, there is no possibility of interlinked transactions. Of the nine tenant households in the BR, only six households are involved in loan transactions. Of them, one household is involved in loan transactions in the form cash-to-cash, and one in kind-to-kind. Four households are involved in loan transaction both in the form cash-to-cash and kind-to-kind. We may conclude, therefore, that in the case of tenant households as a whole, there is a little possibility of interlinked transactions.

5. Mortgage and interest rate

In this section we deal with the interclass dynamics of mortgaged transactions and their association with the rate of interest. In the sample households 14% of the total loan transactions in the informal sector have been conducted with a mortgage constituting 20% of the total amount of loans. The proportion of mortgaged transactions is higher in the BR compared with the AR (Table 6). It has been observed that while in much of the informal credit market the transactions take place without any collateral security, in the remaining small segment, the credit transactions with collateral take place with fundamentally different terms and conditions, as described below.

5.1 Inverse relation between collateral and interest rate

We have seen that the interest rate in the informal sector maintains a negative relationship with the share of mortgaged loan to total loan, the percentage of mortgage amount and the percentage of collateral value to loans with collateral transactions. First of all, the rate of interest seems to have an inverse relationship with the share of loan covered by the mortgage. From Table 6 we see that in the interest range of 25–49%, 60% of the total loan is covered by collateral securities, while in the interest range of 100% and above, 29% of the total loan is covered by collateral securities. In other words there is a broad inverse relation between the interest rate and the proportion of mortgage loan. This kind of inverse relationship is more prominent in the BR. The loan covered by mortgage is relatively less at a nil rate of interest. This is because the relatives and friends, who are the main source at the nil rate of interest, demand no collateral against the loan.

Second, the inverse relationship between interest rate and mortgage amount is clear from the same table (Table 6). The table shows the broad tendency for the higher rates of interest to be associated with the lower percentage of the amount of mortgage value.[1] For example, the highest range of interest, 100% and above, constitutes the

[1] The mortgage values are calculated by imputing the values of the mortgage property on the basis of the average expected values of the mortgaged property that the household borrowers may derive from the sales in the market at the date of the survey.

Table 6. *Percentage of the number and amount of mortgage at various interest rates in the informal sector*

(a) Economic class wise

Economic classes	Nil				0–24				25–49				50–99				100 and above				Total			
	No		Amount		No		Amount		No		Amount		No		Amount		No		Amount		No		Amount	
All regions	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B
Landless	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	33	100 (9)	37	100 (3)	13	100 (4)	22	100 (1)
Poor peasant	3	5 (20)	6	7 (6)	0	0 (0)	0	0 (0)	33	5 (7)	19	5 (3)	13	22 (62)	11	18 (40)	26	68 (65)	39	70 (57)	16	100 (44)	21	100 (21)
Small peasant	5	12 (20)	29	50 (29)	0	0 (0)	0	0 (0)	60	38 (21)	125	23 (7)	17	25 (25)	27	16 (23)	8	25 (9)	9	11 (6)	12	100 (16)	26	100 (13)
Middle peasant	13	67 (40)	45	80 (47)	0	0 (0)	0	0 (0)	33	33 (7)	57	20 (6)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	8	100 (6)	30	100 (13)
Rich peasant	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	42	56 (36)	79	86 (53)	10	11 (13)	15	13 (37)	25	33 (13)	5	1 (2)	18	100 (18)	23	100 (26)
Landlord	3	17 (20)	4	16 (18)	0	0 (0)	0	0 (0)	33	66 (29)	46	53 (31)	0	0.00	0	0 (0)	14	17 (4)	57	31 (32)	10	100 (12)	14	100 (26)
Total	4	10 (100)	11	23 (100)	0	0 (0)	0	0 (0)	40	28 (100)	60	43 (100)	10	16 (100)	8	9 (100)	20	46 (100)	29	25 (100)	14	100 (100)	20	100 (100)
Advanced region																								
Landless	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0 (0)	100	100 (15)	125	100 (6)	29	100 (7)	66	100 (1)
Poor peasant	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	33	9 (14)	19	17 (4)	7	18 (40)	7	28 (26)	50	73 (61)	17	55 (26)	14	100 (41)	9	100 (10)
Small peasant	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	25	67 (40)	33	63 (28)	33	33 (8)	11	37 (9)	12	100 (11)	10	100 (5)
Middle peasant	13	50 (50)	70	79 (71)	0	0 (0)	0	0 (0)	100	50 (15)	100	21 (8)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	17	100 (8)	64	100 (19)
Rich peasant	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	40	66 (57)	79	86 (67)	13	17 (20)	17	13 (46)	50	17 (8)	105	1 (2)	17	100 (22)	25	100 (37)
Landlord	4	34 (50)	5	21 (29)	0	0 (0)	0	0 (0)	11	33 (14)	29	36 (21)	0	0.00	0	0 (0)	25	33 (8)	67	43 (57)	6	100 (11)	12	100 (28)
Total	2	7 (100)	8	21 (100)	0	0 (0)	0	0 (0)	28	26 (100)	53	47 (100)	9	19 (100)	7	11 (100)	48	48 (100)	30	21 (100)	13	100 (100)	17	100 (100)

Backward region																														
Landless	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	0	0.00	0	0	(0)	0	0	(0)	0	0.00	0	0.00
Poor peasant	13	9	(33)	33	10	(15)	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	38	27	(100)	47	12	(100)	17	64	(70)	73	78	(96)	18	100	(48)	61	100	(42)
Small peasant	14	20	(33)	96	67	(77)	0	0	(0)	0	0	(0)	100	60	(43)	205	30	(28)	0	0.00	0	0	(0)	5	20	(10)	5	3	(3)	13	100	(22)	57	100	(31)
Middle peasant	13	100	(34)	7	100	(8)	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	0	0.00	0	0	(0)	0	0	(0)	0	0	(0)	4	100	(4)	3	100	(2)
Rich peasant	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	50	33	(14)	75	90	(9)	0	0.00	0	0	(0)	20	67	(20)	1	10	(1)	21	100	(13)	10	100	(3)
Landlord	0	0	(0)	0	0	(0)	0	0	(0)	0	0	(0)	100	100	(43)	112	100	(63)	0	0.00	0	0	(0)	0	0	(0)	0	0	(0)	27	100	(13)	33	100	(21)
Total	11	13	(100)	26	27	(100)	0	0	(0)	0	0	(0)	70	30	(100)	99	33	(100)	12	13	(100)	14	5	(100)	11	44	(100)	27	35	(100)	15	100	(100)	32	100	(100)

Note: 'Number' indicates number of loan transaction. A = Percentage of mortgaged loan to total loan. B = Percentage share of loan at a particular interest rate to total loan. Figures in parentheses shows economic class wise percentage distribution of loan for different interest rate.

(b) Acreage group wise

Acreage groups	Nil				0–24				25–49				50–99				100 and above				Total			
	No		Amount		No		Amount		No		Amount		No		Amount		No		Amount		No		Amount	
All regions	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B	A	B
0.00	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0 (0)	33	100 (9)	37	100 (3)	13	100 (4)	22	100 (1)
0.01 to 2.5	5	11 (80)	14	31 (97)	0	0 (0)	0	0 (0)	29	19 (50)	51	35 (56)	14	21 (100)	16	13 (100)	22	49 (78)	29	21 (59)	14	100 (74)	22	100 (70)
2.5 to 5	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	67	57 (29)	97	52 (24)	0	0.00	0	0 (0)	17	43 (13)	38	48 (38)	13	100 (14)	18	100 (20)
5 to 10	10	33 (20)	5	12 (3)	0	0 (0)	0	0 (0)	50	67 (14)	49	88 (12)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	10	100 (6)	13	100 (6)
10 to 15	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	100	100 (7)	125	100 (8)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	14	100 (2)	18	100 (3)
15 & above	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0.00
Total	4	10 (100)	11	23 (100)	0	0 (0)	0	0 (0)	40	28 (100)	60	43 (100)	10	16 (100)	8	9 (100)	20	46 (100)	29	25 (100)	14	100 (13)	20	100 (100)
Advanced region																								
0.00	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0 (0)	100	100 (15)	125	100 (6)	29	100 (7)	66	100 (1)
0.01 to 2.5	3	9 (100)	10	28 (100)	0	0 (0)	0	0 (0)	30	27 (86)	54	49 (75)	11	23 (100)	14	15 (100)	43	41 (70)	14	8 (28)	14	100 (82)	19	100 (73)
2.5 to 5	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	33	33 (14)	86	47 (25)	0	0.00	0	0 (0)	50	67 (15)	51	53 (66)	11	100 (11)	17	100 (26)
5 to 10	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0 (0)	0	0 (0)	0	0 (0)	0	0.00	0	0.00

Table 6. (b) (*continued*)

Acreage groups	Nil		0–24		25–49		50–99		100 and above		Total	
	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount	No	Amount
10 to 15	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0.00
15 & above	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0.00
Total	2 7 (100)	8 21 (100)	0 0 (0)	0 0 (0)	28 26 (100)	53 47 (100)	9 19 (100)	7 11 (100)	48 48 (100)	30 21 (100)	13 100 (100)	17 100 (100)
Backward region												
0.00	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0.00
0.01 to 2.5	13 13 (67)	49 39 (92)	0 0 (0)	0 0 (0)	25 7 (14)	2 1 (1)	21 20 (100)	31 8 (100)	15 60 (90)	48 52 (96)	15 100 (65)	43 100 (63)
2.5 to 5	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	100 75 (43)	175 85 (22)	0 0.00	0 0 (0)	7 25 (10)	6 15 (4)	17 100 (17)	20 100 (9)
5 to 10	17 33 (33)	15 12 (8)	0 0 (0)	0 0 (0)	100 67 (29)	121 88 (46)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	15 100 (13)	28 100 (18)
10 to 15	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	100 100 (14)	125 100 (31)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	25 100 (4)	27 100 (10)
15 & above	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0 (0)	0 0 (0)	0 0 (0)	0 0.00	0 0.00
Total	11 13 (100)	26 27 (100)	0 0 (0)	0 0 (0)	70 30 (100)	99 33 (100)	12 13 (100)	14 5 (100)	11 44 (100)	27 35 (100)	15 100 (100)	32 100 (100)

Note: 'Number' indicates number of loan transaction. A = Percentage of mortgaged loan to total loan. B = Percentage share of loan at a particular interest rate to total loan. Figures in parentheses shows economic class wise percentage distribution of loan for different interest rate.

smaller percentage of mortgage value (25). And the comparatively lower range of interest, 25–49% is associated with the higher percentage of mortgage value (43). However, this inverse relationship is clearer for the AR in contrast to that in the BR.

Third, the percentage of collateral value to loans varies inversely with the rate of interest (Table 7). In other words, the higher the interest range, the lower the share of collateral to loan and vice versa. Thus the percentage of collateral value to loan declines from 207 at a nil rate of interest to 159 in the interest range 25–49%, to 156 in the range 50–99% and ultimately to 103 in the interest range of 100% and above.

In short, in order to protect themselves from exploitation at the high rate of interest, borrowers have to put forward high valued collateral. This trend is valid for all the classes and size groups, as shown below.

5.2 Interclass/size group pattern

Analysis of the data shows that the well-to-do labour-hiring classes who have no shortage of assets, are able to advance high-value collateral and secure large, relatively low-interest loans, even from moneylenders, i.e., non-institutional creditors. The ratio of the market value of the collateral to loan is about 2 (200%) (Table 7). The picture is quite different with the poorer classes who have few assets.[1] They are unable to give adequate collateral. Yet, being below the poverty line, they are forced to borrow to survive by agreeing to pay to the moneylender interest rates in the range of 50% and above. The ratio of the market value of collateral to loan is nearer 1 (100%) for them (Table 7).

Looking into the interclass distribution at the highest range of interest, 100% and above, in Table 6 it is seen that the exploited classes have the highest percentages of transactions and amount of mortgage at 74% and 60%, respectively. On the other hand, the corresponding figures for the labour-hiring classes are 17% and 34%. The same percentages for self-employed borrowers are 9% and 6%. Interclass distribution in a lower range of interest of 25–49% shows the opposite tendency. The labour-hiring classes account for 65% of loan transactions and 84% of the total amount of mortgage. In general the tendency is for the lower (higher) ranges of interest to be associated with a higher proportion of mortgage for the higher (lower) economic classes. This is a general tendency and both the AR and the BR more or less show this tendency.

This analysis has refuted the popular story that the credit market is simply made up of two nearly homogenous categories—the lender and the borrower. According to this view, borrowers in the informal market are essentially the poor peasants and the lenders are landlords cum moneylenders. The latter supplies credit against collateral in order to extract surplus from the former by undervaluing the collateral and charging very high rates of interest. Our analysis has shown that the reality is a much more complicated process, where the classes with diametrically opposite characters belong to the borrower category, so that the latter is a highly heterogeneous category, and far from being a homogenous one. Furthermore, the data obtained suggest the opposite of Bhaduri's (1977) theory of the direct association between the incidence of collateral and high

[1] The asset-wise distribution in the combined region is that the exploited classes own 9% of the asset while 66% of the asset is owned by the labour-hiring classes. Only the remaining 25% of asset is owned by the self-employed classes. The value of the Gini-coefficient is 0.502. The Gini-coefficient for owned land is 0.348 for the successful implementation of the operation barga. For details see, Bhattacharyya (2001).

Table 7. *Percentage of collateral value to loans with collateral transactions*

(a) Economic class wise

Economic classes	Nil	0–24	25–49	50–99	100 & above	Total
All regions						
Landless	0	0	0	0	125	125
Poor peasant	500	0	213	141	128	140
Small peasant	200	0	205	155	27	113
Middle peasant	267	0	100	0	0	200
Rich peasant	0	0	194	179	141	191
Landlord	120	0	125	0	120	123
Total	207	0	159	156	103	146
Advanced region						
Landless	0	0	0	0	125	125
Poor peasant	0	0	213	130	52	74
Small peasant	0	0	0	155	23	49
Middle peasant	300	0	100	0	0	211
Rich peasant	0	0	197	179	140	193
Landlord	120	0	143	0	120	127
Total	210	0	170	157	70	135
Backward region						
Landless	0	0	0	0	0	0
Poor peasant	500	0	0	155	259	250
Small peasant	200	0	205	0	125	197
Middle peasant	100	0	0	0	0	100
Rich peasant	0	0	150	0	145	150
Landlord	0	0	112	0	0	112
Total	203	0	132	155	249	179

(b) Acreage group wise

Acreage groups	Nil	0–24	25–49	50–99	100 & above	Total
All regions						
0.00	0	0	0	0	125	125
0.01 to 2.5	214	0	162	156	128	165
2.5 to 5	0	0	194	0	79	114
5 to 10	100	0	121	0	0	118
10 to 15	0	0	125	0	0	125
15 & above	0	0	0	0	0	0
Total	207	0	159	156	103	146
Advanced region						
0.00	0	0	0	0	125	125
0.01 to 2.5	210	0	162	157	55	148
2.5 to 5	0	0	200	0	77	108
5 to 10	0	0	0	0	0	0
10 to 15	0	0	0	0	0	0

(b) Acreage group wise (*continued*)

Acreage groups	Nil	0–24	25–49	50–99	100 & above	Total
15 & above	0	0	0	0	0	0
Total	210	0	170	157	70	135
Backward region						
0.00	0	0	0	0	0	0
0.01 to 2.5	222	0	250	155	254	229
2.5 to 5	0	0	175	0	200	178
5 to 10	100	0	121	0	0	118
10 to 15	0	0	125	0	0	125
15 & above	0	0	0	0	0	0
Total	203	0	132	155	252	179

interest rates in the informal market. The surplus extraction in Bhaduri's (1977) model was mediated by deliberate default on the part of the borrower that is also absent in our data. But, what has been shown is some association between the marketability of collateral and the interest rate, which will be discussed in the next section.

However, we should keep in mind that Bhaduri's default theory was made in the context of a purely backward and pre-capitalist economy. What has been studied here is an economy that has experienced the rapid development of capitalist agriculture on the one hand, and a 'pro poor' state intervention on the other. As a result, a rapid differentiation has taken place in which labour-hiring classes emerge that cultivate land with a profit motive. They therefore raise, to a large extent, the demand for credit. However, the inadequacy of institutional credit compels them to resort to non-institutional credit with low interest by offering high valued collateral. This is why the next section shows the inverse relationship between average interest rate and ascending class status.

5.3 Average rate of interest and marketability of collateral

It is to be expected that there will be a systematic relationship between the rate of interest and the types of collateral. Table 8 displays the interclass and acreage group-wise distribution of average rate of interest for loans with and without collateral, according to regions. It has been found that for all types of credit, the average rate of interest maintains a clear inverse relationship with the ascending status of economic classes and size groups. This has proved the earlier proposition that the higher economic classes and size groups enjoy low rates of interest. Another tendency that needs clarification is that both in the AR and in the BR the average rate of interest without collateral is much less than that with collateral. The reasons for such a tendency can be found by disaggregating the source and purpose. Table 2 shows that of the 206 loan transactions in the AR and the 158 in the BR, the maximum number of transactions, namely, 179 (87%) and 135 (85%), respectively, took place without any collateral. We have further disaggregated the collateral according to different types.

In the samples, mainly three types of collateral are used, i.e., land, ornaments and utensils. The ranking of collateral according to marketability suggests that land is the

Table 8. *Distribution of average interest rate*

	All regions			Advanced region			Backward region		
	Collateral	No collateral	Total	Collateral	No collateral	Total	Collateral	No collateral	Total
Economic classes									
Landless	120	87	93	120	32	78	0	100	100
Poor peasant	114	61	69	107	56	63	126	79	91
Small peasant	69	45	51	108	39	52	17	63	50
Middle peasant	14	45	40	16	14	15	0	62	33
Rich peasant	43	28	31	43	20	23	9	97	45
Landlord	56	28	31	66	29	32	33	16	21
Total	65	38	42	68	32	37	56	31	29
Acreage groups									
0.00	120	87	93	120	32	78	0	100	100
0.01–2.5	58	35	38	53	29	32	79	66	69
2.5–5	94	27	55	99	43	52	47	77	46
5–10	31	45	44	0	29	29	31	70	27
10–15	30	0	4	0	0	0	30	0	7
15 & above	0	100	100	0	0	0	0	0	100
Total	65	38	42	68	32	37	56	31	29

most marketable, followed by ornaments and then utensils. Both in the AR and in the BR we find a clear inverse relationship between the marketability of collateral and interest rates. In other words, the greater the marketability of the collateral, the lower the rate of interest and vice versa. This gives support to Bhaduri's (1977) default theory, where the formal sector does not accept collateral that has no market value, although the same collateral is accepted by the private moneylender against a very high rate of interest. In our study, the percentage share of private moneylenders' involvement to total loan transactions are 74 and 70 in the AR and the BR, respectively. Moreover, it becomes clear that the inverse relationship between average rate of interest and marketability of collateral arises owing to the same tendency that prevails for moneylenders. Thus it has been found that at the aggregate level the average rate of interest for transactions without collateral is 32.08, for land the average rate of interest is 53, for ornaments it is 70 and for utensils it is 98. Similarly in the BR, the average rate of interest for no collateral is 63, the same for land is 29, for ornaments it is 37 and for utensils it is 145 (Table 2). According to Bhaduri (1977) it is the lender who undervalues the collateral and charges exorbitantly high rates of interest, particularly for the types of collateral that have lower marketability. In this way the creditor induces the borrower to default so that the former can acquire the collateral. The helpless and vulnerable borrowers decide that it is better to give up the collateral rather than pay the exorbitantly high rate of interest. Analysis shows that it is clear that the lower the

marketability of the collateral, the greater the instances of the moneylender charging an exorbitantly high rate of interest. But it has not been possible to verify to what extent the creditor undervalues the collateral offered by the exploited classes in order to gain from default in repayment. This is because information is not available regarding the collateral values actually recorded in the books of the creditor.

One has to answer the question as to why two parallel systems of credit transactions prevail, so that in one segment a considerably large number of transactions take place without any collateral, while in the other segment the transactions take place with high valued collateral. The answer is found by looking into the purpose-wise distribution of credit. In the season of cultivation the poor classes need not depend on credit, as plenty of jobs are available at a moderately high wage rate. This is the reason the poor peasants cum labourers need not be dependent on usurious credit in the busy season. This explains how a large number of credit transactions, even in the informal market, take place without any collateral. However, the question of credit transaction with collateral arises only when the sources of credit without collateral are exhausted. There is generally a sudden shortage of food in the months of July and August, i.e., a lean season for cultivation when jobs are not available. Poor households during this period have to depend on credit with high valued collateral. Considering only credit transactions with collateral, it is clear that 13 out of 27 credit transactions (48%) in the AR and 11 out of the 23 credit transactions (48%) in the BR take place for the purpose of food consumption. Medical expenses come second (four transactions in the AR and six transactions in the BR). However, in the case of credit transactions without collateral, food consumption constitutes only 10% of the total transactions in the AR and 59% in the BR. In the AR, non-farm activity registers the highest percentage (33) indicating the growing tendency of diversification in the economy (Table 3).

6. Conclusions

This paper addresses some issues on the terms and conditions of the rural credit market in the differentiated agrarian structure of West Bengal where a substantial degree of state intervention has taken place. The paper is based on a field survey in two agro-climatic regions in rural West Bengal—one is capitalistically advanced while the other is backward. The households have been classified according to economic classes following Patnaik's (1987) methodology and the usual acreage criterion. There are variations in the facts and patterns found in the two regions. The BR registers a higher degree of institutionalisation of rural credit in comparison to the AR owing to the fact that the former is a target region for government's anti-poverty programme.

Looking into the interest rate structure, it has been seen that the WARI and also the interest rate at which more credit is transacted in the informal market of the AR is much lower than in the backward BR. This phenomenon has been explained by the classical Marxist proposition that there is an inverse relation between the usury capital and the level of capitalist development/class differentiation. With capitalist development, the direct method of surplus extraction is used rather than pre-capitalist methods like rent and usury.

There is a distinct tendency for the transactions to be de-interlinked for both the AR and the BR. This is reflected in the fact that the dominant form of credit transactions

for both the regions is 'cash-to-cash'. Therefore, by and large, there is no question of prevalence of an interlinked implicit rate at the 'apparent' nil rate of interest, as 98% of loan transactions are made in the form of cash-to-cash and kind-to-cash. Moreover, the labour-hiring classes in a sizeably large proportion make transactions at this nil rate of interest, which refutes the conventional wisdom of the interlinked exploitation by the rich of the poor. The nil rates are actually a reflection of the insurance policy among the relatives and friends with symmetrical motives (the largest percentage transacted at this rate) or between the rural people and the shopkeepers with asymmetrical motives. There is also a popular belief that interlinked transactions are evolved within the landlord–tenant relationship (e.g., Bhaduri, 1973). However, among the tenant households in the sample, considering both regions, there is little possibility of interlinkage as most of these households are involved in loan transactions in the form of 'cash-to-cash'.

In the sample households, the non-collateral transactions constitute around 86% of the total loan transactions and 80% of the total amount of loan. However, within the tiny proportion of loan transactions with collateral, what was found was some systematic relations between the variables that behave as in any other pre-capitalist backward economy. First of all, the interest rate maintains an inverse relation in both AR and BR with the share of mortgaged loan to total loan, the percentage of mortgage amount and the percentage of collateral value to loans with collateral transactions. Second, both the AR and the BR follow the general tendency that the lower (higher) ranges of interest are associated with a higher (lower) proportion of mortgage for the higher (lower) economic classes. Both tendencies are the reflections of the fact that the labour-hiring classes are able to offer high valued collateral and enjoy low interest loans. But the classes belonging to the exploited category could not afford the high valued collateral and become the helpless prey of exploitation by means of a high rate of interest. Thus the average interest rate shows the expected pattern of inverse relationship with ascending class status in both regions. Finally, both the AR and the BR follow the same pattern, with the WARI without collateral being much less than that with collateral. The tendency of both regions also supported the main argument of the default theory that the marketability of the collateral is inversely related to the average rate of interest. The purpose-wise distribution of informal credit helps to understand why two parallel systems of credit transactions prevail. In the busy agrarian season, when plenty of jobs are available at relatively high wage rates, poor borrowers dominate the process of bargaining and loan transactions take place without any collateral. However, in the lean season, when not many jobs are available, it is the lenders who dominate the bargaining process and who refuse to provide loans without any collateral.

The data have some definite points of departure with the 'default theory' of Bhaduri (1977). First of all, in the default theory, borrowers and lenders are considered as two nearly *homogenous* classes of peasantry, where the lenders are essentially landlords cum moneylenders, who exploit the borrowers cum poor peasants through the process of usury. However, our analysis does not support this simplistic story. First, it has been shown that diametrically opposite classes/size groups of peasantry belong to the borrower category, which makes the latter highly *heterogeneous* in character. Second, an important proposition of Bhaduri's (1977) theory is based on the *direct association* between the incidence of collateral and high rate of interest in the informal credit market. Contrary to that, an *inverse relation* was found between the incidence of

collateral and the interest rate. This is owing to the previous point of inclusion of rich peasantry among the borrower category (which was ruled out by Bhaduri) who can secure low interest loans by supplying the collateral. Third, the deliberate default on the part of the borrower (Bhaduri, 1977) as a cause of surplus extraction is also absent from our data. Finally, our data supports one important proposition of Bhaduri (1977), which is the inverse relation between the marketability of the collateral and interest rate in the informal market.

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Appendix

Table A.1. *The following limits are specified to the value of E in order to classify households into a set of mutually exclusive and all-exhaustive categories (sub-categories not specified here are not ruled out)*

Class	Defining characteristic	Value of $E = X/F$	Reason	
1. Landless labourers	No self-employment; working entirely for others	$(E \to -\infty)$	$F = 0$, $X < 0$ and large	Primarily exploited by others
2. Poor peasant (poor tenant and labourer with land)	Working for others to a greater extent than self-employment	$(E \leq -1)$	$F > 0$, $X < 0$, $\|X\| \geq F$	
3. Small peasant	Zero employment of others or working for others; and working for others to smaller extent than self-employment	$(0 \geq E > -1)$	$F > 0$, $X \leq 0$, $\|X\| < F$	Primarily self-employed
4. Middle peasant	Smaller employment of others' labour than self-employment	$(1 > E > 0)$	$F > 0$, $X > 0$, $X < F$	
5. Rich peasant	At least as large an employment of others' labour as self-employment	$(E \geq 1)$	$F > 0$, $X > 0$, $X \geq F$	Primarily exploiting labour of others
6. Landlord	No manual labour in self-employment, large employment of others' labour	$(E \to \infty)$ and large	$F = 0$, $X > 0$	

Source: Patnaik (1987).