

Der Open-Access-Publikationsserver der ZBW – Leibniz-Informationzentrum Wirtschaft  
*The Open Access Publication Server of the ZBW – Leibniz Information Centre for Economics*

Holloh, Detlev

Working Paper

## Community Financial Institutions in Bali: Some empirical findings

Working paper / University of Cologne, Development Research Center, No. 1994,1

**Provided in cooperation with:**

Universität zu Köln

Suggested citation: Holloh, Detlev (1994) : Community Financial Institutions in Bali: Some empirical findings, Working paper / University of Cologne, Development Research Center, No. 1994,1, <http://hdl.handle.net/10419/23661>

**Nutzungsbedingungen:**

Die ZBW räumt Ihnen als Nutzerin/Nutzer das unentgeltliche, räumlich unbeschränkte und zeitlich auf die Dauer des Schutzrechts beschränkte einfache Recht ein, das ausgewählte Werk im Rahmen der unter

→ <http://www.econstor.eu/dspace/Nutzungsbedingungen> nachzulesenden vollständigen Nutzungsbedingungen zu vervielfältigen, mit denen die Nutzerin/der Nutzer sich durch die erste Nutzung einverstanden erklärt.

**Terms of use:**

*The ZBW grants you, the user, the non-exclusive right to use the selected work free of charge, territorially unrestricted and within the time limit of the term of the property rights according to the terms specified at*

→ <http://www.econstor.eu/dspace/Nutzungsbedingungen>  
*By the first use of the selected work the user agrees and declares to comply with these terms of use.*



**Universität zu Köln**  
**Arbeitsstelle für Entwicklungsländerforschung**  
**University of Cologne**  
**Development Research Center**

## **Working Paper No. 1994-1**

**Detlev Holloh**

### **COMMUNITY FINANCIAL INSTITUTIONS IN BALI** **Some Empirical Findings**

---

Universität zu Köln  
Arbeitsstelle für Entwicklungsländerforschung  
Bernhard-Feilchenfeld-Str. 11, 50969 Köln  
Tel.: 0221-470.4078, Fax: 0221: 0221-470.5195

University of Cologne  
Development Research Center  
Bernhard-Feilchenfeld-Str. 11, D-50969 Cologne  
Tel.: ++49-221-470.4078, Fax: ++49-221-470.5195

[seibel@uni-koeln.de](mailto:seibel@uni-koeln.de)

## 1. Background

The *Lembaga Perkreditan Desa* (LPD)<sup>1</sup> in Bali are the most recent form of local finance in Indonesia. Their establishment was initiated by the provincial government of Bali after several studies on local financial institutions in Indonesia had been presented at a seminar carried out by the Ministry of Home Affairs in 1984.<sup>2</sup> By 1992, the government had established 650 of the 1,600 LPDs planned to be set up in each *desa adat* (custom village).

In 1989, the 'Project Linking Banks and Self-Help Groups' (PHBK), carried out by the central bank, Bank Indonesia, in order to provide viable financial services to small farmers and microentrepreneurs, started to cooperate with the Regional Development Bank (BPD) in integrating LPDs into the linkage program. The BPD linkage scheme includes only LPDs with earning assets of below Rp 25 million. Loans disbursed to these LPDs are refinanced by the BPD that receives 80 % of the total loan amount in the form of Bank Indonesia liquidity credit. LPDs forward loan applications to the BPD with an attached list of individual borrowers. The loan contract is signed by the head of the LPD. The BPD offers credit ceilings and loans with fixed installments. The loan period is fixed at 12 months. Interests on loan vary between 23 % and 27 % effective per annum. LPD pay an one percent provision on the loan principal. The BPD linkage scheme is a pure credit scheme, which is not related to savings mobilization in general and the requirement of blocked savings in particular. On the level of the LPD loan conditions are determined by deliberation of the *desa adat*. Usually, loans are lent on with maturities of 10 to 12 months and an interest rate of 3.5 % declining per month. Between one and three percent of the loan amount is retained as compulsory savings.

As of September 1992, the BPD had disbursed Rp 715 million to 80 LPDs and loans outstanding to 28 LPDs amounted to Rp 112 million. The average loan size per LPD was Rp 9 million. Considering an average individual loan size of Rp

---

<sup>1</sup> Literally, *Lembaga Perkreditan Desa* can be translated as 'Village Credit Institution'. I prefer to refer to LPDs as 'Community Financial Institutions' for two reasons: 1) LPDs are owned and managed by the village community; while 'village' describes only their area of operation, 'community' is used for emphasizing its social character; 2) LPDs are independent financial institutions which intermediate between savers and borrowers; their credit operations depend mainly on savings mobilized as their major source of funds.

<sup>2</sup> Research results and contributions to the seminar have been published in Mubyarto dan E.S. Hamid, eds. 1986. *Kredit Pedesaan di Indonesia*. Yogyakarta: BPFE, P3PK Universitas Gadjah Mada.

250,000, an approximate number of 3,000 borrowers had been reached through the BPD linkage scheme. Taking into account an average of 220 households per *desa adat* about 20 % of the households in the concerned LPD areas had received loans, while the demand for credit was estimated to cover 60 % to 75 % of the households. As of September 1992, 6 of the 28 LPDs with loans outstanding were responsible for arrears amounting to Rp 26 million. Three of these LPDs, which were responsible for two thirds of the total arrears, were located in the economically less favorable eastern district of Karangasem.

The first draft of this paper was prepared in 1992 for assessing the adequateness of the BPD linkage scheme and presenting results from case studies on LPDs which were affected by arrears. This working paper includes further information on the general role and development of LPDs in Bali and adds some findings from three village studies carried out in 1993.

## **2. Legal Framework, Role and Development of LPDs**

LPDs are semiformal financial institutions which do not fall under the banking law but are regulated by provincial government law. The establishment of LPDs was decided upon by the provincial government in 1984 and their operation was regulated in subsequent provincial laws.<sup>3</sup> The objective of establishing LPDs in each of the 1,600 *desa adat* (custom village) has been to fight exploitative forms of credit relations, to increase the living standard of the village population and to strengthen village finance in general and microenterprise finance in particular. In order to achieve these objectives the government provides a starting capital of Rp 2 million for each LPD and has established special supervision and guidance teams at all government levels, which cooperate with the Regional Development Bank (BPD) in providing technical and financial support to LPDs.

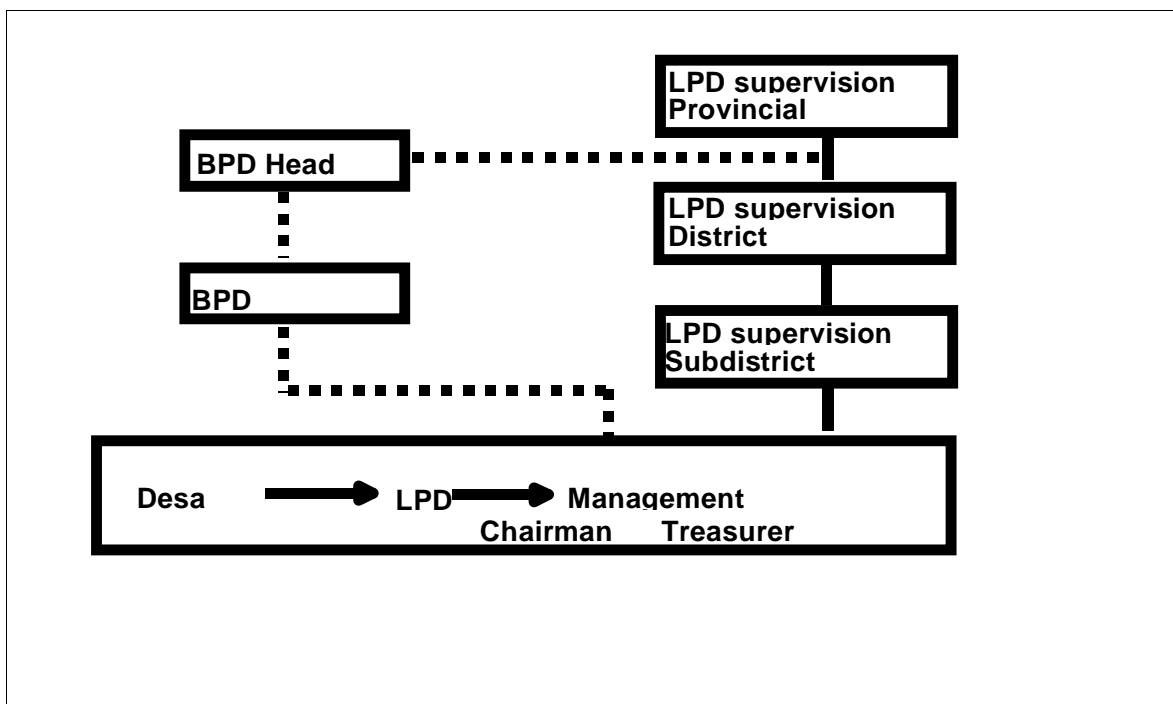
LPDs are community financial institutions which are owned, managed and used by the members of the *desa adat*. As local and user-owned financial institutions, they have an intimate knowledge of their customers and rely on mechanisms of social control and joint responsibility. Easily available client

---

<sup>3</sup> Keputusan Gubernur Kepala Daerah Tingkat I Bali, Nomor 972, Tahun 1984; Peraturan Nomor 06 Tahun 1986 tentang Kedudukan, Fungsi dan Peranan Desa Adat sebagai Kesatuan Masyarakat Hukum Adat dalam Popinsi Bali; Peraturan Daerah Propinsi Daerah Tingkat I Bali, Nomor 2, Tahun 1988 tentang Lembaga Perkreditan Desa.

information, close distances to their customers, simple procedures, familiar staff and social control reduce transaction costs, operational risks and collateral requirements so that they are able to function as financial intermediaries for poorer sections of the population as well. LPDs are managed by a committee consisting of at least a chairman, treasurer and bookkeeper. Committee members are elected during a village meeting by the members of the *desa adat* for a four years period. Decisions with regard to planning, implementation and reporting are taken by the *desa adat* and confirmed by the district head. Profits of the LPD are to be distributed according to a fixed allocation key: 40 % for general reserves, 25 % of special funds (for social, etc., purposes), 20 % for village development, 10 % for salaries, and 5 % for external guidance.

### LPD Organization and Supervision



The LPD approach has a unique character and, though initiated and supervised from outside, it is based on local needs and directed towards the development of a decentralized financial system. The unique character of the LPD lies in the fact that it is not related to the official village administration (*desa dinas*) but is an institutional element of the custom village<sup>4</sup> (*desa adat*). The character of the *desa adat* as a democratic system regulated by customary law provides strong sociocultural bonds and effective control mechanisms. The LPD is not only the most recent but, along with financial self-help groups, also the most democratic form of local finance in Indonesia.

The first LPDs were established in 1984 and their number increased to 161 as of March 1988. After the Provincial Government had reinforced its policy by targeting the establishment of one LPD in each *desa adat*, the number of LPDs increased rapidly to 676 as of March 1993. From March 1988 to March 1993, total assets boosted from Rp 2.9 billion to Rp 53.4 billion, savings increased from Rp 1.8 billion to Rp 39.5 billion, loans outstanding increased from Rp 2.5 billion to Rp 39.6 billion, and capital, reserves and current profits from Rp 0.8 billion to Rp 12 billion.

### Selected Indicators of LPD Development<sup>5</sup>

No. of LPDs	March 1985	March 1988	March 1991	March 1993
Total assets	69.2 million	2.9 billion	21.8 billion	53.4 billion
Bank deposits	4.7 million	91.3 million	1.5 billion	11.1 billion
Loans outstanding	58.7 million	2.5 billion	18.8 billion	39.6 billion
Savings & deposits	44.3 million	1.8 billion	14.7 billion	39.6 billion
Equity & reserves	18.1 million	504 million	3.5 billion	7.8 billion
Current profits	6.1 million	340 million	2.0 billion	4.2 billion

<sup>4</sup> *Desa adat* is often translated as 'traditional village'. Warren introduced the term 'custom village' in order to emphasize that "*adat* is neither an 'invented tradition' of external construction nor a seamless or changeless 'past in the present', but a powerful framework of meaning and social action" (Warren, C. 1993. *Adat and Dinas. Balinese Communities in the Indonesian State*. Kuala Lumpur: Oxford University Press, p. 5).

<sup>5</sup> Source: Bank Indonesia and Bank Pembangunan Daerah, various statistical reports.

### **3. Findings from Field Visits and Case Studies**

In the following I shall present findings from three field visits in 1991, 1992 and 1993. The first visit was restricted to short interviews with managers of three LPDs. The second visit to three other LPDs was intended to analyze their financial development in more detail because they were involved in the linkage project and were affected by arrears. During the third visit I carried out several case studies which compared the role and development of LPDs and financial self-help groups in several Balinese villages. This paper summarizes only some preliminary results of these studies.

#### **3.1 First Observations in three LPDs in the Badung District**

The LPDs visited (*desa adat* Anggabaya, Tedung, Tengkulak) were established between 1989 and 1991. Their area of operation covers the area of one *desa adat* with 150 to 350 households or 500 to 1,000 inhabitants. The three management members had been selected from the *desa adat*, and they were assisted by two or three mobile staff members which were responsible for the mobilization of savings and collection of loans. Operational decisions were taken by the *desa adat*, while the role of government institutions seemed to be restricted to guidance and supervision. The LPDs had a proper book-keeping system, which was supervised by the Regional Development Bank. Savings were collected in three forms: compulsory savings, which were deductions (1-3 %) from each loan disbursement, voluntary savings and time deposits. About 90 % of total savings were made up of voluntary savings mobilized by mobile staff. Depending on the type of savings, interests on savings ranged between one to two percent per month. The LPDs offered two credit schemes, a monthly and a seasonal scheme, but the vast majority of loans were effected with monthly repayment schedules. The loan maturity ranged between 4 and 12 months. Depending on the credit scheme, the loan period and loan size, interests on loans varied between 3.5 %/month on balance (declining) and 3 %/month on the loan principal (flat).

The LPDs had received loans from the Regional Development Bank in the middle of 1991. These loans were effected with a loan maturity of 12 months and an effective interest rate of 23 % per annum. The loan amount disbursed varied from Rp 5 million to Rp 10 million per LPD. These BPD loans were lent on to 83

individual customers, and the individual loan amount ranged from Rp 50,000 to Rp 1 million. The average loan amount per borrower was Rp 250,000. In all LPDs, the average loan size disbursed in the framework of the linkage project was twice as large as the average loan size prior to the linkage project (Rp 122,000). One reason for this growth was the prior scarcity of loan funds. Since the distribution of loans below and above the Rp 250,000 line (75%:25%) did not change considerably over time, it may be assumed that access to outside credit led to a more adequate finance of both relatively 'small' and 'large' borrowers.

About 37 % of the population in the three villages had savings accounts and 17 % of them had loan accounts with the three LPDs. More than half of the LPDs' customers were net savers, who held savings averaging to Rp 43,000. Interlending practices between LPDs and of LPDs with other institutions, such as village cooperatives, indicate that the credit demand of the *desa adat* members exceeds the savings mobilizing capacity of the LPDs. Assuming that only 100 households per *desa adat* demand an average annual loan amount of Rp 250,000, each LPD would need funds amounting to Rp 25 million per annum, an amount that exceeded the average size of outside credit (Rp 9 million) by far.

The LPDs' earning assets consist of loans outstanding (90 %) and bank deposits (10 %). Sources of the earning assets were savings (55 %), reserves incl. current profits (26 %), and outside credit (19 %). Depending on the repayment schedules, the proportions of reserves/profits and outside credit are either increasing or decreasing. With an outside credit of Rp 10 million, the assets of the three LPDs would increase by Rp 9 million annually. From this calculation it follows that an LPD with earning assets of only Rp 16 million (i.e., Rp 3 million in bank deposits and Rp 12 million in loans outstanding) would already fall out of the target group of the BPD linkage scheme, although only 30 % of their customers had been served only once in the framework of the linkage project.

**Conclusions:** As user-owned and culturally embedded 'Community Financial Institutions', the LPDs in Bali are one of the most promising approach in local finance in Indonesia. The BPD linkage scheme may contribute to the strengthening of this approach. The Regional Development Bank is the only bank that can provide both appropriate financial and technical services to LPDs. However, it is important that the BPD fully recognizes the important role of LPDs as local financial and



savings mobilizing institutions rather than to use them as credit channels. The BPD should adjust its interests on loans to market rates in order to instill savings mobilization efforts in LPDs. Loans disbursed to LPDs should correspond to the LPDs savings mobilization, and the LPDs should be required to deposit 10 % to 20 % of their liabilities in BPD accounts. The BPD linkage scheme should guarantee both the liquidity of the LPDs and the security of funds deposited by the LPDs' customers. Well functioning LPDs should be provided with flexible refinancing facilities, while others should be supported in improving their savings instruments.

### **3.2 Case Studies on the Financial Development of three LPDs affected by Arrears in the Karangasem District**

#### **LPD *Desa Adat Nongan***

The LPD Nongan was established in December 1990 and received two BPD loans. The first loan (Rp 5 million) was disbursed only one month after the set up of the LPD and the second loan (Rp 5 million) was disbursed in July 1991. The first loan was lent on to a group of cattle breeders. As of June 1991, Rp 3.7 million of this loan was in arrears. The second loan was used to cover the remaining balance of the group loan, while Rp 6.3 million were lent on to individual borrowers. As of September 1992, debts and arrears of the BPD loan amounted to Rp 3.3 million. Loans outstanding amounted to Rp 18.5 million of which 16.7 % (Rp 3.1 million) was categorized as unsound. Previous observations showed that individual loans amounts increased considerably with the new access to outside credit, whereas the distribution of loans to loan size classes did not change much. The example of LPD Nongan confirms this finding. Prior to the BPD loan in June 1991 the average loan size was Rp 76,000, whereas the BPD loan was lent on with loan amounts averaging to Rp 146,000. Prior to the BPD loan, 67.5 % of all loans were disbursed with amounts of below Rp 50,000 and only 0.5 % with loan amounts higher than Rp 200,000. As of September 1992, these figures had changed to 61 % and 3.5 %.

**Solvability:** The LPD's loan disbursements increased from Rp 14 million (as of June 1991) to Rp 50 million (as of September 1992). The amount of loans

outstanding increased from Rp 10 million to between Rp 17 million and 18 million in 1992. This development was supported by higher interest income and an improved savings mobilization. The savings to outside credit ratio changed from 4:10 in July 1991 to 10:3 in September 1992. While in July 1991 savings contributed only 29 % to the loan portfolio, this proportion increased to 54 % in September 1992. The overall debt to equity ratio decreased from 3.2 to 2.6, and the outside credit to equity ratio from 2.8 to 0.6. This change indicates an increasing degree of self-sustainability. The increasing role of savings, however, points also to a higher degree of risk and responsibility with regard to funds mobilized from the community. Both the growth of loans outstanding and savings expose the LPD to higher risks of securing these savings and sustaining credit repayment. The risks mentioned above are not reflected in the LPD's asset structure. Between June 1991 and September 1992, total assets increased from Rp 10 million to Rp 19.6 million, and the proportion of the loan portfolio in total assets increased from 92 % to 96 %. Thus, almost all funds were directly lent on. As of September 1992, the LPD owed only Rp 425,000 in cash and held only Rp 319,000 in the BPD savings accounts. These amounts were not adequate a) to provide a sufficient collateral-substitute for the BPD, b) to provide sufficient security for savers, and c) to manage the increasing credit risks.

**Liquidity:** The situation described above involves also a liquidity problem. Taking into account the possibility of larger savings withdrawals combined with increasing credit collection problems, the prevailing degree of liquidity will not be sufficient to meet the need of both savers and borrowers. The fact that almost all savings are immediately converted into loans point to a high credit demand and to a structural liquidity squeeze of the LPD. Since the first BPD loan was also not able to solve this problem, a more stable type of refinance seems to be necessary. Almost all assets were made up of the loan portfolio. Regarding the loan portfolio as current assets, the current assets to debt ratio was stable and sufficient: 1.3 in the third quarter of 1991 and 1.4 in the third quarter of 1992. However, excluding the loan portfolio these ratios would be only 0.11 and 0.06. This shows that the asset structure was not only highly dominated by the loan portfolio but also that the LPD's liquidity was highly dependent on its loan collection performance.

**Profitability:** The average quarterly net income of the LPD Nongan doubled from Rp 518,000 in the second quarter of 1991 to Rp 1.1 million in the second quarter of 1992. Since the average equity, total assets and earning assets increased also by almost 100 %, the LPD's profitability showed only a slow growth. The return of equity increased from 20.3 % to 22.3 %, the return on assets increased from 4.9 % to 5.7 %, and the return on earning assets increased from 5.2 % to 6.1 %.

**Conclusions:** The BPD loan enabled the LPD to expand its credit business. The LPD's arrears, liquidity problem and asset structure, however, show that this expansion is exposed to high risks. Without a sufficient financial backup arrears reached directly the bank level. The security of savings mobilized from the community was severely questioned and the extension of loans has to slow down.

#### **LPD Desa Adat Sukahet**

The LPD Sukahet was also established in December 1990 and received one BPD loan (Rp 10 million) in July 1991. The BPD loan was lent on with an average loan size of Rp 180,000, whereas the individual loan size prior to the BPD loan had been only Rp 80,000. Changes in loan distribution were more pronounced than in the case of LPD Nongan. Prior to the BPD loan, 51 % of all loans were disbursed with amounts below Rp 50,000 and only 2 % of the loans were larger than Rp 200,000. As of September 1992, only 34 % of the loans were smaller than Rp 50,000, while 16 % of the loans were larger than Rp 200,000. As of the same month, arrears and loans outstanding of the BPD loan amounted to Rp 9 million. No installment was made since April 1992. Loans outstanding to individual borrowers amounted to Rp 25.4 million, of which 21.6 % (Rp 5.5 million) were categorized as unsound.

**Solvability:** Between June 1991 and September 1992, loan disbursements boosted from Rp 23 million to Rp 122 million. Loans outstanding grew from Rp 11 million to Rp 29 million in May 1992, but decreased to Rp 25 million in September 1992. This development was related to the initial impact of the BPD loan and a significant increase in savings mobilization. Although the bank loan was not repaid, the savings to outside credit ratio changed from 6:10 to 16:9. The contribution of savings to the loan portfolio increased from 32 % to 61 %. The overall debt to equity ratio decreased from 4.2 in the third quarter of 1991 to 3.6 in the third quarter

of 1992, and the outside credit to equity ratio decreased from 2.5 to 1.3. Total assets grew from Rp 12 million (June 1991) to Rp 32 million (September 1992). The proportion of the loan portfolio in total assets decreased from 98 % to 79 %, which indicates an increased financial backup in the form of bank deposits. As of September 1992, the LPD held Rp 4.4 million in its BPD savings account and Rp 1.4 million in cash.

**Liquidity:** LPD Sukahet had a much better financial backup than LPD Nongan. Consequently, the proportion of the loan portfolio in current assets was considerably lower: 81 % compared to 96 %. The overall liquidity ratio (current assets to debts) was, as in the case of LPD Nongan, 1.3. Excluding the loan portfolio from current assets, the ratio was considerably better (0.24) as in the case of LPD Nongan (0.06) but also not sufficient if the increasing risk and high arrears ratio is considered.

**Profitability:** The average quarterly net income increased from Rp 594,000 in the second quarter of 1991 to Rp 870,000 in the second quarter of 1992. The average equity increased from Rp 3.9 million to Rp 6.5 million, average total assets grew from Rp 10.9 million to Rp 28.4 million, and average earning assets grew from Rp 10.4 million to Rp 26.1 million. The relatively lower growth of the net income resulted in a declining profitability: return on equity declined from 15.2 % to 13.5 %, return on assets declined from 5.4 % to 3.1 %, and return on earning assets declined from 5.7 % to 3.3 %. One major problem may be seen in the cost structure of LPD Sukahet. Compared to income, costs increased over-proportionally. The LPD faced high burdens of operational costs and interests to be paid on savings. Interests paid on the BPD loan during 1992 made up between 20 % and 35 % of the LPD's overall costs.

**Conclusions:** The conclusions drawn for LPD Nongan are also valid for LPD Sukahet. However, the considerably larger arrears have more seriously affected the solvability and profitability of LPD Sukahet. The liquidity situation appears to be more favorable, but this is due to the non-performing BPD loan. The repayment of this loan would absorb the LPD's savings and cash, would reduce considerably the liquidity for new loan disbursements, and would consequently reduce income and would make the asset structure totally dependent on the loan portfolio.

### **LPD *Desa Adat Padangkerta***

The LPD Padangkerta was established in 1990 and received one BPD loan amounting to Rp 10 million in July 1991. The loan was lent on with an average individual loan size of Rp 188,000, compared to a previous average loan size of Rp 100,000. Prior to the BPD loan, 36 % of all loans were disbursed with amounts below Rp 50,000 and 8 % of the loans were larger than Rp 200,000. As of September 1992, only 25 % of the loans were smaller than Rp 50,000, but 34 % of the loans were larger than Rp 200,000. As of the same month, loans outstanding of the BPD loan decreased to 0.6 million, because most of the arrears were repaid in August and September. Loans outstanding to individual borrowers amounted to Rp 23.7 million, of which 53 % were in arrears. 42 % of the loans were categorized as unsound and 11 % as doubtful or defaults.

**Solvability:** With the BPD loan, the volume of loan disbursements increased from Rp 23 million (June 1991) to Rp 85 million (September 1992). Loans outstanding grew from Rp 11 million to Rp 29.3 million in May 1992, but declined to Rp 23.7 million in September 1992. While the BPD loan was almost fully repaid in September 1992, the LPD relied on a rapid increase in savings mobilization. Savings and deposits grew from Rp 9.5 million (June 1991) to Rp 21.5 million (September 1992). The savings to outside credit ratio changed drastically from 10:10 to 35:1. The contribution of savings to the loan portfolio increased from 50 % to 91 %. The overall debt ratio declined slightly from 5.9 in the third quarter of 1991 to 5.6 in the third quarter of 1992, whereas the outside credit to equity ratio fell from 2.5 to 0.2. As in the case of the other LPDs, this change points to both an increasing degree of self-finance and an increasing degree of risk for savers. Total assets doubled from Rp 13.2 million to Rp 26.6 million in September 1992, and the proportion of the loan portfolio in total assets decreased from 96 % to 94 %. As of September 1992, the LPD held only Rp 10,000 in its BPD account and Rp 1.4 million in cash, compared to liabilities totaling to Rp 22 million. Thus, as in the case of LPD Nongan, the degree of financial backup was far from being sufficient.

**Liquidity:** The LPD's assets are highly dominated by its loan portfolio. While the general current assets to debt ratio (1.1) was stable and satisfactory, this ratio would be only 0.06 if the loan portfolio is excluded. The fall in total assets and the loan

portfolio were related to serious arrears problems. Income and credit installments could not be used for further lending activities or reserve funds, but had to be used for credit repayment to BPD. With a decline in current assets, total assets almost entirely made up by the loan portfolio, and more than half of the loan portfolio in arrears, LPD Padangkerta faced severe security and liquidity problems.

**Profitability:** The average quarterly net income of the LPD decreased from Rp 476,000 in the second quarter of 1991 to Rp 447,000 in the second quarter of 1992. In the third quarter of 1992 the LPD made a loss of Rp 562,000. This loss was caused by a high growth in interest payments, both for the BPD loan and for savings, as well as by increasing operational costs. The average equity increased from Rp 3.5 million in the second quarter of 1991 to Rp 4.6 million in the second quarter of 1992. Average total assets increased from Rp 11.9 million to Rp 30.2 million, and earning assets from Rp 10.1 million to Rp 27.2 million. The decline in the net income resulted in a drastic decline in the LPD's profitability: the return on equity fell from 13.6 % in the second quarter of 1991 to 9.7 % in the second quarter of 1992 and turned negative (-12.3 %) in the third quarter of 1992. For the same time periods, the return on assets declined from 4 % to 1.5 % and -2 %, and the return on earning assets declined from 4.7 % to 1.6 % and -2.2 %.

**Conclusions:** In the third quarter of 1992 LPD Padangkerta used its own capital to cover arrears of the BPD loan. Since this repayment was not matched by an improved repayment performance of individual borrowers, this situation has to be regarded as a major threat for the LPD's solvability, liquidity and profitability. About half of its loan portfolio was highly exposed to risk. The debt to equity ratio was twice as high as for the other LPDs. Savings mobilized from the community were not adequately secured by liquid moneys and reserves in the form of bank deposits. The LPD's equity covered only 30 % of the loan amount in arrears.

### 3.3 Three Village Studies on the Role of LPDs in the Gianyar, Tabanan and Karangasem Districts

The eight LPDs visited in 1992 and 1993 are located in the eastern district of Karangasem and the southern districts of Gianyar and Tabanan. As of December 1992, these LPDs had 2,924 savings customers and 1,814 borrowers with average loans outstanding of Rp 25 million per LPD or Rp 110,000 per borrower. Individual loan sizes, effected with maturities of between 6 and 18 months, ranged from Rp 25,000 to Rp 750,000. The average LPD accumulated assets amounting to Rp 30 million of which Rp 23 million were mobilized as savings and time deposits. The number of savers covered 42 % and the number of borrowers 19 % of the *desa adat* households. There is a high variance in the outreach and financial capacity of LPDs. In most cases the volume of assets generated by also LPDs other than the eight ones discussed here varied between Rp 20 million to Rp 30 million. A considerable number of LPDs, however, were either able to accumulate assets of more than Rp 100 million or stagnated at a level below Rp 10 million. While an increasing number of LPDs approach the financial capacity of small formal financial institutions, many are comparable to large savings-mobilizing financial self-help groups, and some stagnate at a level comparable to that of an average financial self-help group. One factor for explaining this situation may be the variance in external conditions, such as the competition with other local financial institutions. Another factor may be seen in the variance in internal conditions, such as the attractiveness of the savings and credit schemes offered to the *desa adat* population.

In order to examine the role of LPDs in comparison to financial self-help groups, three villages were selected in which LPDs faced different development conditions. The first case, the *Lodtunduh* village in the district of Gianyar, represents an example where two LPDs in two *desa adat* play a minor role in local finance, whereas the other two cases, the *Seraya* village in the district of Karangasem and the *Keramas* village in the district of Gianyar, the LPDs play a dominant role.

**Lodtunduh** is an administrative village that consists of two *desa adat* and, therefore, is served by two LPDs. However, when the LPDs were established in the early 1990s, they had to compete with 9 already well-functioning financial self-help groups. By 1993, the LPDs held the savings accounts of 307 villagers with a total

value of only Rp 15.5 million. The financial self-help groups, however, mobilized savings from their 1,104 members which amounted to Rp 113.7 million. The LPDs' loan portfolios were made up of 202 borrowers and totaled to Rp 26.3 million, whereas loans outstanding to 833 borrowers of the financial self-help groups amounted to Rp 168.8 million. In *desa adat* **Lodtunduh** the LPD was not able to increase its starting capital from the provincial government by more than Rp 1 million during two years. Savings amounting to Rp 243,000 were collected from 28 members and loans outstanding of Rp 2.6 million were provided to 34 members of the *desa adat*. Half of the loans outstanding were affected by arrears. The LPD was not able to make 'good' loans because 'good' borrowers were organized in financial self-help groups. In *desa adat* **Mawang** the LPD was by far more successful in developing its own customer base, but the financial self-help groups were still able to sustain their dominance. The latter were established in the first half of the 1980s and had accumulated assets of Rp 52.4 million, but the LPD had generated assets of Rp 27.9 million during just four years although the groups organized almost all households of the *desa adat*. The LPD's entrance into successful competition with the already established groups was mainly due to two factors which distinguish the situation in the two *desa adat*. The first factor was that the groups in *desa adat* Lodtunduh were able to meet an increasing credit demand through access to bank credit that was not available to those in *desa adat* Mawang. The second factor was that part of the first groups diversified their savings instruments by providing time deposit facilities and interest on savings, while this was not the case in *desa adat* Mawang. In this situation the LPD offered an interest earning savings scheme which was also attractive to group members. In order to maintain its member and customer based the largest financial self-help groups reacted by setting up its own interest earning savings facility and succeeded to mobilize an additional savings amount of Rp 7 million in 1993, whereas the LPD's savings mobilization slowed down.

The **LPD Desa Adat Keramas** in the Gianyar district started its operation in 1991, while two financial self-help groups were set up in 1988/89. Although they served 1,154 savers and 510 borrowers, the LPD and the self-help groups had accumulated assets totaling to only Rp 39.8 million by 1993. 89 % of the borrowers received small loans of up to Rp 100,000. A comparison between the LPD and the financial self-help groups shows that savings mobilization considerably influenced their development. Despite having organized almost all households in two *banjars* and



being established earlier than the LPD, the two self-help groups experienced slack growth in assets, whereas the LPD was able to accumulate Rp 30 million during just three years of operation. The major reason for this difference was not only the LPD's larger area of operation but also its emphasis on savings mobilization. While the LPD offered an attractive interest earning savings scheme, the self-help groups did not mobilize voluntary savings. By 1993, the LPD had 778 savings customers with savings totaling to Rp 21.1 million. With 376 members the groups had a large customer base, but were able to generate only Rp 6.1 million of compulsory savings. While the LPD had loans outstanding of Rp 23.4 million to 441 borrowers, the loan portfolio of the groups was only sufficient to meet the credit demand of 69 members. The financial self-help groups were not able to attract additional savings and, therefore, to meet the credit demand of their members.

The **LPD Desa Adat Seraya** in the Karangasem district was established in 1989, while four financial self-help groups were established in the 1980s. Despite less favorable economic conditions, the LPD was able to rapidly increase its assets from Rp 12.2 million in 1989 to Rp 140.9 million in 1993, whereas the financial self-help groups did not experience a significant growth. With the establishment of the LPD the groups' capability to mobilize savings stagnated. The LPD services met the demand of savers and borrowers and were more attractive than those offered by the self-help groups. While the groups did not pay interest on savings, the LPD offered interest earning savings and time deposit schemes through which it mobilized 86 % of its assets. By 1993, the LPD had attracted 1,269 savings customers who had deposited Rp 120.8 million of savings and time deposits. The groups had 858 members but mobilized savings amounting to just Rp 23.3 million. Thus, the LPD was also better able to meet the demand for credit. Although its number of borrowers (472) was similar with that of the groups (403), the LPD's outstanding loans were more than four times as high. Although loan uses did not vary considerably, 80 % of the group borrowers received loan amounts of up to Rp 100,000, whereas half of the LPD loans were larger than Rp 250,000. The diversification of credit terms reflected the more professional LPD management. While the groups effected loans with standardized maturities of 10 or 12 months, the LPD's borrowers were able to chose between a range of loan maturities.

## **Conclusions**

Both financial self-help groups and LPDs in Bali have assumed an important role in local finance. However, financial self-help groups and LPDs have to be regarded as competing forms of local finance. Within this competition, the LPDs have certain advantages. First of all, they cover a larger area of operation and are, therefore, able to develop a larger customer base and higher financial capacity. They offer interest earning savings schemes which do not exist in many self-help groups. As LPDs are also embedded in the local community, they are an appropriate alternative for group members whose financial needs are not met by their groups. The establishment of competitive financial services and the management of increasing savings and loan portfolios requires a more professional financial management than is found in many self-help groups. LPDs are better prepared to professionalize because their financial operations are institutionally separated from their customers and they enjoy technical assistance from the regional government and development bank. Above all, the comparison between LPDs and financial self-help points to importance of the rural populace's access to appropriate savings instruments and to the crucial role of savings mobilization in sustaining the service capacity of local financial institutions and in sustaining the viability of their institutional development under competitive conditions.