Savings Services of Local Financial Institutions in Semi-Urban and Rural Thailand

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This report summarizes the savings services at local-level financial institutions in four changwats (subregions) of Thailand – the semi-urban changwats of Chachoengsao and Lopburi in the Central region and the more rural Sisaket and Buriram in the poorer Northeast region. The data used for this purpose are the result of an institutional survey administered in May 1997 (before the financial crisis hit). The 161 institutions surveyed consisted of rice banks, production credit groups (PCGs) and other financial institutions in the villages and/or tambons of these areas. This report summarizes only the section of that survey that pertains to savings services offered.

The aims of this report are to examine the extent and characteristics of the various types of savings services offered to members or customers of these financial institutions. Section I describes the types of savings accounts offered and the institutions' policies regarding savings accounts. Section II focuses on the institutions' history with savings services (the number of savers, total amount of savings, and interest rates) and the reasons for changes over time. Where applicable, we attempt to compare the results from this institutional survey with those of the household survey. Both surveys are components of a larger survey project entitled Growth, Inequality and Organizational Design in Thailand.

I. Savings: Types of Services and Policies

A. Institutions

Of the 161 institutions interviewed, just over half (52.8 percent) had never offered savings services to their members. The other seventy-six institutions either offered savings at the time of the survey or had offered them at one time. Table 1 displays the fraction of these institutions that accept various forms of savings. While the most commonly accepted form of savings is clearly cash, a considerable fraction of the institutions with savings services accept rice. No institutions accepted animals or forms of savings other than cash or crops. The percentages of institutions accepting cash and rice currently are slightly lower than the percentages that accepted them when they first began offering savings services. This is at least partially caused by the fact that some institutions once offered savings but no longer do (the top row sums to less than 100 percent). It may also be because some institutions accepted multiple forms of savings originally (the bottom row sums to more than 100 percent), but currently do not.

The different types of savings accounts offered and the fraction of institutions that offer them are shown in Table 2. Spontaneous accounts refers to accounts where members can save as desired, while pledged accounts are those where saving is done in preset amounts on a regular schedule. Pledged savings are the most common type of savings account and are currently offered by 56.2 percent of institutions with savings services. Interestingly, for savings pledged accounts are much more common than spontaneous accounts (12.3 percent), but for share accounts, spontaneous (16.4 percent) are more common than pledged (6.8 percent). A comparison of the accounts currently offered with those originally offered indicates that spontaneous accounts became relatively more common over time, while the pledged share accounts and other savings accounts became relatively less common.

Table 3 summarizes the institutions' policies requiring minimum initial deposits. Over three-quarters (76.8 percent) of the institutions that offer savings had such a minimum. Although minimum initial requirements of one institutions reached 1000 baht, they were generally much lower. Eighty percent of the institutions with minimum requirements had a minimum of 76 baht or less. The skew of the upper tail brought the average minimum up to 84 baht, however.

In addition to the types and forms of savings offered and any minimum deposit requirements, institutions varied in their policies in the case of withdrawal demands exceeding the institution's available liquidity. As Table 4 shows, in response to such a situation over half (57.1 percent) of the institutions distribute the funds based on which members need them most. The other most common responses were a policy of dividing the funds equally among those wishing to withdraw (14.3 percent), distributing funds on a first come, first serve basis (10.2 percent), or noting that the situation had never arisen (8.2 percent).

A final policy that is examined at the institution level is the policy toward members. Only 11.1 percent allow non-members to save with them. Of these eight institutions, five of them evaluated the savings potential of non-members before allowing them to save. One institution reported that the president was responsible for this evaluation, another reported the chairman, and a third gave responsibility to the committee. The last two responded that both the chairman and committee performed these evaluations.

B. Accounts

While the above analysis summarized the distribution and policies of the institutions, this section analyzes data based on individual types of savings accounts. For example, a pledged saving account and a pledged share account have two separate observations even if they are offered by the same institution. Table 5 presents the distribution of such accounts. As in the institutional distribution in Table 2, pledged share accounts are the most typical (57.8 percent of accounts), followed by spontaneous share accounts (14.5 percent) and spontaneous savings accounts (10.8 percent). While

Table 2 showed that some institutions offered pledged shares, the fact that none show up in Table 5 indicates that these accounts were either not reported in the individual account level data, or possibly included in the "other" category.

As one would expect from the high frequency of pledged savings accounts, savings at village-level institutions is not completely flexible. As Table 6 shows, more than half of the accounts (56.6 percent) have members save monthly, while only 14.5 percent of accounts allow members to save anytime. The same percent of accounts have annual savings or some other frequency of savings, included several accounts that are simply one-time deposits.

Table 7 summarizes the procedures reported for members of pledged accounts who want to change the amounts pledged. In total, over a third of such accounts do not allow members to lower their pledges; 13.0 percent do not allow any changes and 21.7 percent only allow the pledge to be increased. An additional 17.4 percent of accounts only allow the pledge to be changed at the end of the year, often after dividends or interest is distributed and new members are allowed to join. Some accounts allow pledge to be changed more flexibly, however, either by notifying the institution (19.6 percent) or simply changing it whenever desired (8.7 percent).

For the accounts with required saving, the distribution of policies toward members that failed to save is shown in Table 8. A common policy is for a member to lose membership either immediately (15.2 percent of accounts with requirements) or after a grace period (21.2 percent). For other accounts members were reminded or pressured into saving (18.2 percent) or given fewer shares or dividends (6.1 percent). For the 15.2 percent of accounts with no consequences toward members who don't save, it can only be reasoned that these accounts have saving requirements in name only.

The size of deposits varies both within a given type of savings account and between different accounts, as Table 9 expresses. While "average" ("smallest" and "largest") in the left-hand column refers to the average *annual deposit* (smallest and largest, respectively) for any given account type, the "mean" ("highest" and "lowest") refers to the mean (highest and lowest) amount *over all accounts*. For example, the account with the highest average deposit reported an average deposit of 7800 baht, while the average (over accounts) of the highest annual deposit reported was 2898 baht. A second example is that at least one account type had at least one individual that deposited 60,000 baht in 1996 (the largest individual deposit) and at least one account type had at least one acc

The average annual deposit in the average account for 1996 was 744 baht. Since the mean deposits are all larger than the 60^{th} percentile of institutions, it is clear that the distribution of accounts is skewed and there are a few accounts with very large depositors relative to the norm. Similarly, while the means show about a ten-fold difference between the largest and smallest depositors, the 20^{th} , 40^{th} and 60^{th} percentiles indicate that most accounts have tighter bands of around three, four or five to one. These numbers are lower than the average changes in deposits calculated from the household survey. The average annual net change in deposits from 1996 to 1997 for rice banks, PCGs, and agricultural cooperatives were 1120 baht, 2177 baht, and 2264 baht (Seiler and Townsend, 1998). These numbers are averaged across households, however, and would thus be comparable to the averages above weighted by the total savings in the institution. Thus, if accounts with higher average savings rates tended to also have more savers, this could explain some or all of the discrepancy. A second possible reason for the discrepancy is that the average annual savings is directly asked in the questionnaire. It is possible that the responses are more representative of the median or mode than the arithmetic average. Since, the distributions are skewed¹, this could also explain some discrepancy. Unfortunately, the institutional data does not allow for directly comparable numbers to be calculated.

From Table 9 it is also clear that the average interest rate of 12% is also affected by a distribution of interest rates skewed to the left, since 60 percent of accounts have annual interest rates at or below 9%.

A final interesting fact that can be deduced from the Table 9 is the fact that one account had each individual deposit the small amount of only 20 baht (80 cents) a year. This is clear since both the lowest average annual deposit and the lowest highest annual deposit is 20 baht.

Table 10 shows the variety of policies that accounts have toward withdrawing savings. The survey reported a wide range of withdrawal limitations. These included: members must fully withdraw and relinquish membership (14.8 percent); members can only withdraw if they move or die (7.4 percent); members must be members for a specified period before they can withdraw (8.6 percent); members can withdraw only in case of need (7.4 percent), members need approval to withdraw (7.4 percent); and members can only withdraw up to a certain fraction of their savings (2.5 percent). Other policies were less restrictive. 11.1 percent of accounts allowed members to withdraw as desired while 4.9 percent required advance notice. Oddly, 3.7 percent of accounts do not allow withdrawal. Since members must eventually see some type of return on their savings, it is difficult to know how to interpret this response.

II. History of Savings Services

This section focuses on the experiences of institutions with their savings services over time. The analysis is not by chronological year, but instead by age of the saving services. Thus, the data for savings in its fifth year of existence are grouped together for all institutions regardless of their actual corresponding chronological year. The tables also focus on only the first ten years of experience, since the survey showed that relatively few institutions that had offered savings services longer than this. Over the course of the ten years presented, however, both the actual sample and the size of the

¹ In fact, in the household survey the median household had zero net change in savings. (Seiler and Townsend, 1998)

sample change. Many of services were much younger than ten years old so the sample sizes for earlier years are larger. Still, some institutions did not have data ranging back as early, and others had missing data in the middle years that wasn't reported, so the actual institutions in the sample may vary as well. This should be kept in mind when interpreting the tables.²

Table 11 presents a summary of institutions savings experience over time. In the first year of savings, the average number of savers an institution had was forty-three, while the savings per saver was 230 baht and total savings was 8700 baht.³ Each of the three measures of savings services (savings per saver, number of savers, and total savings) tended to grow⁴ very rapidly in the initial year. Total new savings has consistently positive average growth rates, as does savings per saver (except for one year). The average growth rate in the number of savers is less consistent, however. The levels data presented tend to generally reflect these growth trends too.

The average interest rate remained fairly consistent over time, ranging between 8% and 10%. Individual institutions changed their interest rates even less often, so much of this change is a result of the changing sample. Generally, for those institutions that didn't change their interest rates, the rates were pegged to an outside interest rate, often either a commercial bank or the BAAC. Different reasons were given for changing these interest rates. In some cases members either joined or left and so earnings or dividends were divided among a different number of people. In other cases interest rates were increased if the institution had made many loans that year, or decreased when fewer loans were given. Finally, other institutions changed their interest rate in response to the interest rate that the institution was receiving from a larger account.

While Table 11 is informative, it does not get at the variation in the experiences of the individual institutions. That is, did some institutions consistently grow each year, while others consistently lost members and savings, or did institutions tend to have one year of boom but then another year of bust? Tables 12 through 14 attempt to explore this by looking at five-year averages of annual growth rates. The tables show that the five-year average growth rates are much lower in general than one would expect by simply averaging the numbers presented in Table 11. Table 12 shows that the mean savings per saver grew at 6 percent a year for the first five years. The percentile distribution indicates that the distribution is left skewed and the median is certainly higher. While 20 percent of institutions did not grow, 40 percent of institutions had their savings per saver grow annually at rates of at least 25 percent over the first five years. The experiences of institutions during the second five years (given they existed that long) had a similar

³ The apparent inconsistency between these three numbers is due to slight variations in the samples.

² Additionally, data for the year of the survey, 1997, was ignored. Since the survey was given in May this data was for only part of the year. Scaling this data would be difficult because of the cyclical nature of both incomes and expenditures. Oddly, ignoring this data seemed to lower the average growth rates calculated, however.

⁴ Growth rates presented are the average of the institutional growth rates, not the growth rate of the institutional average. Consequently, the growth rate numbers may appear to be inconsistent with the corresponding level numbers. The averaging method chosen adds relatively more weight to institutions with smaller values than the alternative.

distribution but the growth rates were lower. Finally, the standard deviation of five-year growth rates was much lower for the second period than the first. This may indicate that there is much greater disparity in experience across institutions initially, than for those that survive at least ten years.

Table 13 shows that, averaging over five years, the membership in savings programs actually tended to decrease. Still, some institutions had positive experiences. 60 percent of institutions had growth rates in membership of at least 1 percent annually over the first five years, while 40 percent had average annual growth rates of at least 2 percent over years six through ten. The changes in number of savers tended to mirror the changes in the number of members of the institution (Kaboski and Townsend, 1999). Many of these increases and declines are in response to village migrations. Institutions that grew often grew because of either self-promotion or because gradually people realized the benefits and trusted the institutions.

Often reasons given for not growing were related to institutional policies. Either new membership was restricted (or restricted to certain times) or villagers did not have enough money to meet savings requirements during hard times. In looking for overall trends, however, cross-tabulations of growth rates in savings or number of savers showed no obvious relationship between the flexibility of policies and the growth of savings services. Indeed, if anything restrictive policies seemed to be positively correlated with growth.

Table 14 shows a more positive experience for growth in savings, which averaged 12 percent over the first five years and 2 percent over the next five years. Thus, while membership may have tended to decrease, the growth in average new deposits per member allowed total new savings to increase on average. Again, many of the institutions seemed to be very successful as measured by the growth rate in total new savings. 40 percent of the institutions with data for five years had annual growth rates in new savings of at least 32 percent over the first five years. For institutions that did not grow, they generally attributed it to the fact that membership was stagnant. Some institutions had limitations on the savings that any member could make, though.

III. Conclusions

Over half the institutions in the survey offered savings services. The typical institution had savers that deposited between 200 and 1200 baht annually and the average institution had forty-four savers in its first year. Interest rates on saving were relatively constant and averaged 12%.

The savings policies and experiences of institutions varied widely, but in general policies tended to be fairly restrictive. Many accounts had pledged saving or shares and restrictions on withdrawals. While some institutions were very successful with consistent growth in the amount of savings and the number of savings, many other institutions had savings programs that stagnated or even failed. While the actual responses from

institutions indicated that restrictive policies may have hindered the growth of some institutions, a rough statistical analysis of the data yielded no relationship.

Bibliography

Seiler and Townsend, *Saving in Rural Thailand*, unpublished report, 1998 Kaboski and Townsend, *Founding and Membership of Local Financial Institutions in Semi-Urban and Rural Thailand*, unpublished report, 1999

1. Percent of Institutions with Savings Services that Accept Various Forms of Savings

	Cash	Rice	Other Crops	Animals	Other	Total
Currently	86.3	11.3	1.4	0.0	0.0	99.0
When Savings First Offered	88.2	12.2	1.4	0.0	0.0	101.8

2. Percent of Institutions with Savings Services that Offer Various Types of Accounts

	Pledged Savings	Pledged Shares	Savings (spontaneous)	Shares (spontaneous)	Special Deposits	Time Deposits	Other Savings	Total
Currently	56.2	6.8	12.3	16.4	4.1	4.2	16.4	116.4
When Savings First Offered	59.2	6.6	11.8	15.8	3.9	4.0	17.5	118.8

3. Minimum Initial Deposit Requirements (Amounts in baht)

Percent of Institutions with Requirement	Mean Amount (Std. Dev.)	Highest Minimum Required	Lowest Minimum Required	20 th percentile	40 th percentile	60 th percentile	80 th percentile
76.8%	84 (194)	1000	1	10	20	50	76

4. Policy for Withdrawal If Demand

Exceeds Available Liquidity

	Determined by Need	Divided Equally	First Come, First Serve	Never Occurred	Other	Total
Percent of Institutions	57.1	14.3	10.2	8.2	10.2	100.0

5. Distribution of Types of Savings Accounts

	Pledged Savings	Pledged Shares	Savings (spontaneous)	Shares (spontaneous)	Special Deposits	Time Deposits	Other	Total
Percent of Accounts	57.8	0.0	10.8	14.5	3.6	3.6	9.6	100.0

6. Frequency At Which Members Save

	Anytime	Monthly	Annually	Other	Total
Percent of Accounts	14.5	56.6	14.5	14.5	100.0

7. Procedure for Changing Amount Pledged

	Can't change	Can increase, but not decrease	Can only change at end of year	Notify institution	Can change when desired	Never happened	Other	Total
Percent of Pledged Accounts	13.0	21.7	17.4	19.6	8.7	8.7	10.9	100.0

8. Consequence of Failing to Save as Required

	Lose membership	Lose membership, after grace period	Receive fewer shares or dividends	Reminded or pressured into saving	No consequence	Never happened	Other	Total
Percent of Accounts w/ Requirement	15.2	21.2	6.1	18.2	15.2	6.1	18.2	100.0

Over Accounts => Over Deposits ∥ ↓	Mean (Std. Dev.)	Highest	Lowest	20 th percentile	40 th percentile	60 th percentile	80 th percentile
Average Annual Deposit	744 (1146)	7800	20	200	288	600	1200
Smallest Annual Deposit	288 (275)	1500	10	120	152	240	360
Largest Annual Deposit	2898 (8886)	60,000	20	312	600	1200	2400
Annual Interest Rate	12% (14%)	70%	0%	5%	7%	9%	16%

9. Annual Deposits (in baht) and Interest Rates in 1996

10. Withdrawal Policies for Accounts

	Can't withdraw	Only when member moves or dies	Can only withdraw at end of year	Can only withdraw limited fraction	Must leave group	Only after member for specified period	Only in case of need	Need approval	Need advance notice	As desired (or notify institution)	No policy	Other	Total
Percent of Accounts	3.7	7.4	6.2	2.5	14.8	8.6	7.4	7.4	4.9	11.1	7.4	18.5	100.0

11. Average Savings^{*}, Number of Savers, Total Savings^{*},

and Interest Rates over Time

	1 st Year	2 nd Year	3 rd Year	4 th Year	5 th Year	6 th Year	7 th Year	8 th Year	9 th Year	10 th Year
Avg. New Savings per Saver (in baht)	230	340	340	360	470	450	430	640	640	550
Avg. % Growth Rate in New Savings per Saver	219	36	5	20	18	3	8	-5	23	12
Avg. Number of Savers	43	50	51	60	63	62	63	73	82	87
Avg. % Growth Rate of Savers	23	0	9	-7	-4	5	1	14	18	-4
Avg. Total New Savings (in thousand of baht)	8.7	18.1	24.1	30.1	46.9	44.4	41.9	54.2	58.6	35.6
Avg. % Growth Rate in New Savings	329	157	9	21	9	8	13	4	18	20
Avg. Interest Rate	8%	9%	9%	10%	10%	9%	9%	9%	8%	8%

* Savings is new savings, i.e. net deposits over the course of the year.

	Mean (Std. Dev.)	Highest	Lowest	20 th percentile	40 th percentile	60 th percentile	80 th percentile
Annual % Growth (Years 1-5)	6 (52)	70	-100	-20	6	25	44
Annual % Growth (Years 6-10)	9 (10)	22	-2	-1	2	15	20

12. Five-Year Growth Rates in Savings per Saver

13. Five-Year Growth Rates in Number of Savers

	Mean (Std. Dev.)	Highest	Lowest	20 th percentile	40 th percentile	60 th percentile	80 th percentile
Annual % Growth (Years 1-5)	-6 (36)	24	-100	-5	1	6	13
Annual % Growth (Years 6-10)	-7 (39)	35	-100	-7	-4	2	21

14. Five-Year Growth Rates in New Savings

	Mean (Std. Dev.)	Highest	Lowest	20 th percentile	40 th percentile	60 th percentile	80 th percentile
Annual % Growth (Years 1-5)	12 (62)	114	-100	-43	8	32	61
Annual % Growth (Years 6-10)	2 (40)	-100	34	0	4	17	24