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A Study of Reverse Mortgage Products as a Financial Inclusion for Senior Homemakers Exploration of Issues for Indian Market

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Abstract

This paper explores the prospects for reverse mortgage (RM) products in India. Developed countries are faced with severe budgetary constraints in sustaining their current universal and liberal old age social and income security (OASIS) programmes. Developing countries are slated to face acute problems in meeting the OASIS needs of their projected population of the elderly.

These budgetary constraints and increasing expectations on quality of life amongst the elderly would fuel a massive demand for financial products tailored to the elderly- for safe investment avenues, systematic liquidation of assets to finance consumption, managing longevity and inflation risks and imparting liquidity to illiquid assets.

RM encompasses a range of non-recourse mortgage loans, which help a borrower get liquid funds against his home equity, without having to move out or having to make any repayments, till he dies or sells the house or moves out. Since bulk of the savings at retirement is typically locked in home equity, RM is a powerful device to increase the incomes of the elderly. RM has been in existence in Europe for several centuries but in highly localized and personalized contexts. The modern version of the RM was introduced in U.S with the support of the Federal Government in late 1980s.

Literature on RM is unanimous on its huge market potential. However, its complexity exposes a lender to several risks: mortality, interest rates and real estate markets. It is an unusual product for a typical elderly borrower, creating fears of debt burden, eviction and inability to bequeath property. Legal, taxation and other regulatory uncertainties still persist. The actual volume of RM loans in U.S is only moderate. RM products have been recently introduced in Europe and Singapore. The actual U.S experience so far, under both federally insured and proprietary RM, has been reasonably good.

Demographic projections indicate that RM could have reasonable prospects in India, to begin with in urban areas of Kerala, Tamil Nadu, Goa, Chandigarh and possibly all metros. There are however no solid secondary data relevant to RM available. These include mortality amongst the elderly, current home ownership amongst the elderly, trends in appreciation in home value and long term interest rates.

In spite of the above, we recommend further RM specific research to enable design of RM products suited to Indian conditions. Location specific assessment of market potential, documentation of legal and regulatory

issues and real estate markets would be necessary.

**Reverse Mortgage Products for the Indian Market:
An Exploration of Issues**

1. Introduction

The global market for Old Age Social and Income Security (OASIS) products are projected to grow substantially and India is no exception [1]. Defined benefit schemes, both publicly and privately funded, are facing many risks and their viability is under threat. This has prompted the development of many products for sharing such risks, with pure defined contribution plans at one extreme. In fact, the Government of India (GOI) has shifted all its recent recruits to such a defined contribution plan. However, defined contribution plans convert only the financial savings during working age into income streams in old age.

To the extent savings during working age is locked up in house property, it cannot be en-cashed for old age needs except through selling and / or moving out. This would be the case even if traditional loans were taken against house property, as they have to be repaid, either through instalments or on maturity. This is where reverse mortgage (RM) has a potential market: as an instrument to convert equity in a house property into an income stream, without any debt servicing or relocating worries. RM products are not available in India as of now.

This paper is based on a small desk research and contains the following:

- A Survey of Literature on RM, both academic as well as practice oriented
- Preliminary exploration of India specific issues

2. Home Equity Conversion Products

RM is only one among a range of actual or potential financial instruments, which could enable a house-owner to get liquid funds, against his home equity. Tightly integrated markets in housing, housing finance including secondary markets, and home equity conversion can together enhance social welfare in a wide-ranging manner [2, 3, 4]. Home equity conversion products may be useful to all those who are “house-rich but cash-poor”, not necessarily only the elderly.

The range of such home equity conversion products includes the following:

- Reverse Mortgage (discussed in detail subsequently)
- Home Reversion / Sale and Lease Back

    The homeowner sells his house outright now, but retains the right to live in it for life for a nominal/reduced rent. The sale proceeds may be paid in a lump sum or as an annuity. This could very well be an intra-family transaction.

- Interest-only Mortgage

    This could be useful to those who are in need of an immediate lump sum, but still have only limited loan-servicing capacity. During the tenure of the loan, the borrower is required to make only interest payments. The principal is due only on maturity or death or a permanent move or sale.

- Mortgage Annuity/ Home Income

    This is suitable for the very old for whom life annuity rates are more attractive. The loan amount is used to buy a life annuity. The mortgage interest is deducted from the annuity and the balance is paid as periodic income. The principal is repaid on death or sale of the house. The attraction is that the annuity will continue even if the borrower sells the house or moves out permanently

- Shared Appreciation Mortgage

    This provides loans at a below market interest rate. The loan is repaid at death or moving or sale. In return, the lender gets a pre-agreed share in any appreciation in the property value over the accumulated value of the loan.

As the markets for RM developed in U.S., some of these features have been incorporated as options in the standard RM product. Therefore, the distinctions above are not watertight.

3. Reverse Mortgage in Brief

Roughly speaking, RM is the 'reverse' of a conventional mortgage loan.

In a conventional mortgage loan, the borrower starts with a large loan and low equity in his house. As he pays his regular mortgage instalments, he reduces his outstanding loan amount and increases his house equity.

In contrast, an RM borrower starts with a very high equity in his house. The lender extends a non-recourse loan secured by the house property. The borrower may choose to receive the proceeds through

- A lump sum at the beginning
- Monthly payments till a fixed term or a life-long annuity
- Establishing a credit-line with or without accrual of interest on credit balance
- A combination of the above

The borrower need not move out of the house or make any payment to the lender, as long he is alive and continue to live in the house or does not sell it. Therefore the loan and interest accumulates till maturity. There is no credit or income requirement to be satisfied. Even if the accumulated loan and interest goes above the realizable value of the house at disposal, the repayment is capped at that value only. Hence RM is a case of 'raising debt, falling equity'.

Understandably, the amount of loan will be a function of

- Age of the borrower and any co-applicant (life expectancy/ mortality risks)
- The current value of the property and expected property appreciation rate (real estate market risk)
- The current interest rate and interest rate volatility (interest rate risk)
- Closure and servicing costs
- Specific features chosen: fixed or floating interest; shared appreciation; interest earning credit-line; and mortgage insurance, if any

There is conceptually nothing in the reverse mortgage idea to restrict it to only the elderly[2]. But the product is particularly suited for old people: in fact, the older a person is, the more attractive RM is. Why?

- RM requires near total equity ownership of the house- more likely for ages above 50 (unless the property is inherited)
- It is attractive to only people with insufficient current income and little financial savings- by implication, retired persons
- For a given property value, the lower the life expectancy (older the person is), higher is the additional income through an RM.
- Public policy support including tax incentives is more likely if the borrowers are the elderly.
- The elderly are particularly likely to attach significant psychological/ emotional/ sentimental value to 'ageing in place' without moving out. In fact, the longer they have stayed in their current home, the more valuable this is likely to be, considering the benefits of a familiar neighbourhood [5].

It is reported [2, p.29] that as early as 400 years ago, European investors purchased homes from elderly persons and allowed them to stay in the same house rent-free for the rest of their lives. Home-reversion was created in U.K during the crash of 1929. Similar arrangements called "*viagres*" were available in France. The concept was subsequently brought into U.S, where it has developed and evolved the most, both in variety and volumes.

4. Current Volumes in U.S RM Markets

The current volumes and projections for the U.S market, to quote from http://www.reversemortgage.org, the website of The National Reverse Mortgage Lenders Association (NRMLA) of the U.S, are as follows:

> To date, more than 80,000 reverse mortgages have been originated in the U.S…

[2] For example, the relatively young can use RM to finance children's education or marriage, reduction in labour force participation for family reasons and unplanned events such as retrenchments [11]

> Lenders closed a record 13,049 Home Equity Conversion Mortgage [HECM] loans during the most recent federal fiscal year, ending September 30, 2002, a 63 percent increase over the old mark of 7,982 set in FY 1999.
>
> This year's (FY 2002) volume figure was 68 percent higher than the 7,781 HECMs closed in FY 2001.
>
> … roughly $1 billion in reverse mortgage loan proceeds was advanced between 1989 and 1999. An additional $1 billion was funded between 1999 and 2002. Between now and 2015, … $23.7 billion will be advanced to seniors, representing a solid 20 percent growth rate for the industry….

Though the current low interest rates and the boom in the real estate market of the 1990s may be behind this fast growth, observers believe that the RM market is set to take off, thanks to the relentless underlying demographics of ageing. Similar projections are not readily available for Europe.

However, the above actual volumes are miniscule compared to the potential U.S target market size identified in literature.

5. Potential Market for RM in U.S

5.1 Theoretical Framework

As briefly mentioned earlier, a comprehensive reverse mortgage market can have major macroeconomic implications, through savings, investment and consumption decisions of large sections of the population. As Mitchell [16] pointed out, not much attention has been given to designing suitable products for the de-accumulation phase of (even financial) retirement savings in general. RM will be an important piece in this jigsaw puzzle, if at all it is ever completed.

However, the micro-economic foundations for RM are in models of lifetime savings and consumption decisions. This research has a long history, even though it is still an unsettled area. Keynes suggested consumption is a linear function of current income. The so-called “life cycle” models predicted borrowing at young age, accumulation in the middle age and dis-saving to finance consumption during old age. Subsequently there have been "permanent income" hypothesis based models. These argue that an individual operates on the notion of an "expected average income" during his lifetime rather than on current, transitory income alone. The "overlapping generations" models sought to explicitly incorporate inter-generational issues of transfers between parents and children. Empirical research has not conclusively supported any one set of models.

Empirical data also indicate that housing represents an increasing proportion of the total wealth as people age. In addition, inequality in housing wealth is far less than the inequality in total wealth among elderly households.

However, one puzzling empirical finding, at least in U.S, is that elders continue to accumulate assets with age, contrary to the predictions of theoretical models. Explanations offered include the following:

- In fact it is not so if we consider the 'really' old only.
- It is a misleading conclusion based on aggregate data on all elderly households
- that does not stand up when we exclude data on very rich households who do not
- face budget constraints
- Precaution/ insurance against uncertainty in expenses- example, inflation, long-term care, health
- Bequest motive- the elders really want to leave as big a legacy as possible
- Strategic bequest- bequest is a part of the strategy by which the elderly ensure that their children/ heirs look after their needs (other than monetary).
- Uncertain life span- since we are not sure when exactly we would die, we just happen to leave behind something, not because we intended so.

5.2 Empirical Estimates for U.S [6, 7, 8]

Most of the estimates are from the public policy perspective of the potential of RM to meet the financial needs of the elderly. They are based on various federally sponsored surveys (American Housing Survey, Survey of Income and Program Participation), rather than surveys to specifically assess the potential for RM. Given the survey data, they estimate the number of the respondent households who may benefit through RM:

- Elderly (e.g., age 62 and above)
- High levels of housing equity with or without high expected rates of appreciation (relatively higher valued homes with mortgages almost paid up)
- Low levels of current incomes (RM will enhance income substantially)
- Potentially without bequeath motives (having no children)
- Living alone (widowers/ widows)
- Indebted (RM lump sum may help payoff high cost debt)
- Comparatively long tenure in the current house (say above 10 years, indicating high value attached to continued stay)

Having done the above, these studies estimate/ simulate the RM lump sum/ annuity which such households could generate, using one or the other of the RM products available (typically, the federally insured HECM with a tenure annuity payout). Thus they estimate the number of households that could increase their monthly incomes by various percentages compared to their current income levels.

For example, Meyer and Simons [6, p.253] provide the following estimates:

> …over six-million homeowners in the United States could increase their effective monthly income by at least 20% by using a reverse mortgage. Of these, more than 1.3 million have no children…[RM will allow] over 1.4 million poor elderly persons to raise their income above poverty line.
>
> Almost five million households could receive a lump sum…that is twice as large as their current holdings of liquid assets…giving them access to resources in case of financial emergencies without losing their home.

Merrill, Finkel and Kutty [8] use a different data set and more restrictive criteria, to identify the prime target group for RM: the relatively older among elderly (age>70 yrs); low income (<30000 $/yr); high home equity (between 100000 to 200000 $); and a strong desire to remain in current home (length of stay >10 yrs). They estimated such households in late 1980s to be 800000.

Kutty [7] focused specifically on the potential of RM to lift the elderly poor above the poverty line. Based on a 1991 survey, the author estimated that 621820 such households constituting 18% of all elderly poor households could be brought above the poverty line. The author advocated strong public policy support for RM.

It is puzzling that the actual volumes are nowhere near the estimated potential, even fifteen years after the introduction of the federally supported and insured HECM product.

We now turn to the explanations offered so far in the literature.

5.3 Plausible Reasons for the Gap between Potential and Actual Volumes

We can classify the plausible reasons into three broad groups [9]

- Demand Side
- Supply Side
- "Regulatory mine-

field" Demand Side

Leviton [5] found that homeowners took RM loans[3] only as a "last resort". Her paper is unusual on two counts: it is based on her PhD thesis; and uses a qualitative research methodology of in-depth interviews of 31 households, to explore the meaning of home, financial values, decision making and life stage. We summarize her findings:

On "Attachment to Home"

…strongly attached to their houses and wanted to remain there as long as seemed possible or sensible…

… buying a house had been a defining moment, the beginning of a new stage in their life… A reverse mortgage would allow them to hold onto…

6. Indian Market Potential

India-specific Characteristics of Relevance to RM

- There are no universal old age social security related benefits. Only about 10% of the active working population are covered by formal schemes. This would substantially enlarge the potential target market for RM: 'house-rich, cash-poor'.

- A much lower proportion of urban households, and by implication, less scope for

RM.

- A much larger proportion of elders co-living with their family members of subsequent generations and hence less scope for RM

- A possibly stronger bequeath motive, reducing the scope for RM.

- A possibly higher real rate of appreciation of real estate and housing prices, making RM more attractive to the lender.

- Widespread under valuation of real estate properties to accommodate transactions involving unaccounted money and evasion of taxes on property and real estate transactions

- Complexity, variety and location specific variations in types of home ownership[14]:
    a. *Benami* holdings/ 'Irrevocable power of attorney'
    b. Leasehold/ freehold
    c. Land use conversion regulations
    d. Floor space regulations
    e. Rent/ tenancy controls
    f. Disposal of ancestral property

- Absence of competitive suppliers for immediate life annuity products. This, in turn, is a consequence of
    a. Lack of data on old age mortality rates
    b. Lack of long-term treasury securities for managing interest rate risks of annuity providers

- The fledgling nature of the secondary markets for mortgage and securitization of mortgage loans

- India specific legal and taxation issues
    a. License/ Permission required under insurance/ banking regulation for offering RM
    b. Income tax treatment for RM lender and borrower
    c. Capital gains on property
    d. Reporting and provisioning by the lender as per banking/ insurance regulation

e. Seniority of RM claims vis-à-vis other secured lenders

f. Status of RM loan in case of insolvency

Old Age Population (extracted from [1])

Though the Indian population is still comparatively 'young', India is also 'ageing'. Some demographic projections for India indicate that

- The number of elderly (>60 yrs) will increase to 113 million by 2016, 179 million by 2026, and 218 million by 2030. Their share in the total population is projected to be 8.9 % by 2016 and 13.3% by 2026. The dependency ratio is projected to rise from 15% as of now to about 40% in the next four decades

- The percentage of >60 in the population of Tamil Nadu and Kerala will reach about 15% by 2020 itself!

- Life expectancy at age 60, which is around 17 yrs now, will increase to around 20 by 2020

Sources of Income Support for the Elderly in India (extracted from [1])

As of 1994, the estimated percentage among the elderly, dependent on various sources of income was as follows:

Source	**Men**	**Women**	**All elderly**
Pensions/Rent	9-10%	5%	7-8%
Work	65%	15%	40%
Transfers Of which, from Children	30% 22%	72% 58%	52% 40%

In addition, as per a survey of the National Sample Survey Organization (NSSO) in 1994, less than 4% of the elderly lived alone. A 1995-96 National Sample Survey of the elderly reported that about 5% of them lived alone, another 10% lived with their spouses only and another 5% lived with relatives/ non-relatives, other than their own children. In other words, co-residence with children and other relatives is predominant.

However, the following aspects are worrisome:

- The extent and adequacy of support, especially for widows

- Vulnerability of such support to shocks to family income

- As incomes and life expectancy rose in the now developed countries, simultaneously there was a decline in co-residence rates and intergenerational support. It may happen in India too

- Strains due to demographic trends seem inevitable: fewer children must support parents for longer periods of time. In a recent survey covering 30 cities, 70% of the respondents did not expect their children to take care of them after retirement.

- Job related migration of youth within the country and emigration.

7. Potential Market Segments

Given the above, we have attempted a first-cut specification of the potential target segment for RM:

Age Group

Above 58 years, assuming 58 is the typical retirement age. Older the individual, more attractive will be RM. Additional considerations will include the minimum age specified for preferential treatment as 'senior citizens' in matters such as income tax or the recently introduced *Varishta Bima Yojana*.

High House Equity

The current monthly annuity payout by LIC under its immediate annuity product *Jeevan Akshay* is 844 Rs for a single premium payment of Rs 1 lakh, for a person aged 65[15]. The annuity will be lower in case of joint life or annuity certain options [19]. If we were to use a minimum of Rs 5000 as the monthly annuity that makes RM a worthwhile activity, we need an RM loan of around Rs 6 lakhs. Assuming a loan to home value ratio of 60%, this implies a current market value of Rs. 10 lakhs.

1. Conclusions and Suggestions

1. Reverse mortgage, if available, offers an attractive option to the elderly to finance their consumption needs on their own, without the necessity of moving out or worrying about indebtedness or repayment.

2. If designed properly and offered by an empathetic lender, RM might turn out to be the vanguard product to build up brand equity for the lender in this niche segment. Demographic projections indicate that this segment is the fastest

3. growing segment all over the world.

4. RM, if widely available, might in fact encourage more people in the working population to increase the proportion of their savings invested in housing.

5. This segment is likely to attract increasingly favourable public policy attention,

given the projected importance of this segment in the electoral politics of all democratic countries.

6. However, the actual size of the RM markets is nowhere near its estimated potential, for a variety of reasons from the demand, supply and regulatory considerations.

7. Any interested RM lender in the Indian market must proceed with caution.
8. The necessary steps before a pilot RM product seem to be the following:

   a. Assessment of potential demand in a limited geographical area through

      i. A scientific market survey amongst the specified target segment
      ii. Qualitative research to explore borrower concerns and expectations

   b. Precise assessment of legal, taxation and regulatory issues related to RM

   c. Exploratory financial modelling to assess lender risk and options for managing it.

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