The agriculture sector in india economics essay

Economics

This report is a culmination of my efforts during my third and fourth semesters of Masters in Management Studies course at JBIMS, Mumbai. The yearlong project has been a great learning experience for me and I have been ably guided and supported in my endeavor by many people. I am highly indebted to my Project Guide for his advice and guidance from the very early stage of this project. His able supervision has nourished my intellectual maturity that I will benefit from for the rest of my life. I am grateful to the Director, JBIMS for giving me an opportunity to undertake such a useful thesis. I am also thankful to the respectable faculty members at JBIMS for their teachings and thorough concept building in various managerial disciplines which helped a lot during the course of my internship. I would like to thank everybody who has directly or indirectly helped me in successful completion of my yearlong project. Table of Contents

List of Figures

List of Tables

Introduction

In India, Microfinance has been defined by The National Microfinance Taskforce (1999) as provision of thrift, credit and other financial services and products of very small amounts to the poor in rural, semi-urban or urban areas for enabling them to raise their income levels and improve living standards [1]. Since independence, India has tried a large number of grant and subsidy based poverty alleviation programs. However, the credit linkage of these programs was through commercial banks only. This not only led to misuse of both credit and subsidy but banks never looked at it as a profitable and commercial activity as well. As a result, these programs became

unsustainable. Hence was adopted the concept of micro-credit in India. Success stories in neighboring countries, like Grameen Bank in Bangladesh, Bank Rakiat in Indonesia, Commercial & Industrial Bank in Philippines etc, gave further boost to the concept in India in the 1980s. India thus adopted a similar model of extending credit to the poorest sector and took a number of steps to promote micro-financing in the country.

Terminology[2]

The following terminology will be used throughout the project for various definitions of the financial sector to differentiate agriculture finance from rural finance. The diagram below demonstrates the location of each sector relative to the others. Rural finance is the provision of various financial services and financial products to the rural population. These include savings, credit, payments and insurance to individuals as well as enterprises on a sustainable basis including financing for agriculture and agro processing. Agricultural finance is that part of rural finance which is assigned specifically to financing agricultural activities such as supply of agricultural inputs, production of crops, distribution of farm output, wholesale, processing and marketing of farm output. Microfinance is the provision of financial services for poor and low income people and covers the lower ends of both rural and agriculture finance as seen in the diagram below. Figure : The Finance Mix for Agriculture

1. 1 Need for Microfinance

The poor, like the rest of the population, need financial products and services to build assets and protect themselves against risks. However, majority of the low-income persons do not have access to formal financial institutions.

This can be attributed to the following reasons: Banks face extremely high fixed and variable costs in servicing low income households, resulting in high delivery costs for relatively small transactions. The cost of operating a branch in a remote location is financially unfeasible due to the low volume and high cost dynamic. Much of the low income population is located in rural areas that are geographically remote and inaccessible. For this population, the cost of visiting a traditional bank branch is prohibitive due to the loss of wages that would be incurred in the time required. Unsuitability of existing credit products for low income householdsUnavailability of collateralizable assetsLow income population is often illiterate and lacks financial knowledge, making it nearly impossible for it to even contemplate availing existing financial servicesFurthermore, informal arrangements may be burdensome for these people and may not suitably meet certain financial service needs. While this money is readily available, it is often exorbitantly priced at 60%-100 per cent annual rates and forces the borrower into a debt trap[3].

1. 2 Findings of meeting with microfinance local moneylenders (Primary Research)

The moneylender offered loans in two types of schemes which were Daily Collection and Monthly Collection. The amount ranged from Rs. 1000 to Rs. 10000. According to him, borrowers were low-income persons like paan walas, taxi drivers, hawkers, workers who used that money mainly to build inventory for business, festive occasions etc. Daily Collection Scheme: If loan amount = Rs. 1000, then the moneylender collects Rs. 30 per day from the borrower for 42 days. Thus total collection at the end of 42 days is 30*42 = Rs. 1260. Thus holding period return is 26 %. Considering this as an

amortizing loan, the rate of interest on the basis of daily compounding is 1. 12 %. In case of loan amount = Rs. 10, 000, daily collection is Rs. 300 and so on. Monthly Collection Scheme: If loan amount = Rs. 10000, then the moneylender collects Rs. 1000 per month only as interest ==> 10% per month. Typically, communities like the Madrasis, Pathans and Kathyawadis are dominant in this business. Primarily these people belong to scheduled caste/backward class but are well-off in terms of financial position. The moneylenders use places like taxi stands and local chaiwalas to build a network of people who are in need of such credit. To mitigate risk, the moneylender lends money only in the range of Rs. 1000 - 10000. There is more risk in monthly collection scheme than in daily collection scheme, so the monthly collection scheme is offered to only people he knows well. Further, for higher amounts, the moneylender asks for a mortgage security and lends only 70% - 80%of its value. Microfinance serves as the last-mile bridge to the low-income population excluded from the traditional financial services system and seeks to fill this gap and alleviate poverty. Micro finance clients are typically self-employed, often household-based entrepreneurs. In rural areas, they are usually small farmers and others who are engaged in small income-generating activities such as food processing and petty trade. In urban areas, micro finance activities are more diverse and include shopkeepers, service providers, artisans, street vendors, etc. Microfinance loans help the low-income strata of the society in multiple ways by: providing working capital to implement new businesses and expand existing businessesinfusing credit to regularize cash flows and mitigating risks such as irregularity in accessing food, shelter, education and clothingcushioning the impact of calamities such as natural disasters, theft and illness

1. 3 Microfinance Services

Figure : Microfinance ServicesMicro credit: This is the most common product offering by MFIs. Micro credit is a small amount of money lent to a client, most often without collateral. Various types of micro credit facilities are available in the form of agricultural loan, livestock loan, micro enterprise loan, housing loan etc. Micro savings: Micro savings allow clients to save small amounts of money in order to plan for the future or meet unexpected expenses. These savings are often accepted without minimum balance requirements. Current RBI regulations prohibit NBFC MFIs to accept interest bearing deposits, unless operated as Section 25 structure. This structure prohibits the conduit from charging any fees to execute this function and limits its reach within a limited radius of the bank branch. MFIs are also lobbying with the RBI to relax these regulations to allow NBFCs to charge an extra fee for the deposit-taking service and delimit the geographical reach of their operations. Micro insurance: A number of MFIs already offer micro-insurance products to their clients. This enables entrepreneurs to concentrate more on developing their businesses while mitigating other risks affecting property, health or the ability to work. Some companies combine their insurance products with their credit products thereby making the availability of credit possible to the client availing insurance. The MFI thus insures its loan against a crisis with the client as insurance protects against total collapse and thus ensures repayment of the loan. Remittances: Micro finance clients need a fast, low-cost, convenient, safe and widely accessible money transfer service. This is provided through tie-ups with post offices, banks or branches in different areas. Non fund based services: Leveraging upon the relationship with the target clients, MFIs are examining the

possibility of providing critical basic services such as low cost healthcare and education. For example, Spandana is currently developing a comprehensive low cost healthcare delivery model focused on the healthcare needs of women and children. BASIX has launched a training academy to impart education in rural development and management to potential job seekers from low income communities.

Research Methodology

The following research methodology has been used during the course of the project:

2. 1 Objective

The objective of this report is to study the various aspects of the microfinance industry in India like microfinance services, sources of funds, models etc. It also looks into how microfinance services can be applied to agriculture in India to bring about an upliftment of the farmers by providing the farmers loans and other equipments thereby increasing the crop productivity at the same time. Finally we look at the functioning of famous various microfinance institutes and rural schemes being implemented in India in the agriculture sector.

2. 2 Scope

The report begins by introducing the concept of microfinance, the need for microfinance and the different services offered by microfinance to provide financial inclusion. It then goes on to explain major microfinance models and how they are tailored in the Indian context. The report then provides an illustration of the current scenario in India by looking at the details of the

SHG Bank Linkage Program and the mFI Bank Linkage Program. Moving further, different sources of funding are explained, emphasizing on the increasing private equity funding which has been a major topic of debate among experts. The report then looks at the agricultural sector in India. It provides an outlook on the National Agricultural Policy by having an understanding of its concerns and perspectives. The agricultural credit provided by banks and other financial institutions over the past four decades has then been analyzed. Various agricultural cooperative institutions viz. NABARD, PACS and DCCB have then been studied to get a better understanding of how agricultural credit flows to the farmers. The report then looks at how microfinance can be extended to the agriculture sector and which all areas to target within the agricultural sector. It then looks at the various financial models that can be used to extend agriculture credit and explores various financial products that can be used for the sameFinally the report then analyses few famous microfinance initiatives in India, including ICICI Bank's partnership model, SKS Microfinance and Sa-Dhan. It also looks at famous microfinance initiatives in the agricultural sector such as Rythu Mitra Group, Farmers' Club Model, and Village Council Model etc. In the end, the key findings of the study and my recommendations to further improve the microfinance sector as well as flow of credit to agriculture have been provided. Throughout the report, there are different figures, tables and excerpts from interactions with different people which provide better comprehension of the topic.

2. 3 Limitations

Microfinance in itself is a very large topic. This report only aims to provide a brief overview of the microfinance sector in India by looking at is growth pattern over the past few years and its scope for further improvement. Although microfinance can be extended to a large number of industries and sectors, this report only focuses on the agriculture sector which forms the backbone of the Indian economy. Also, NABARD hasn't been covered in much detail. It has been restricted to its role in helping the agricultural sector and providing agricultural support. Finally, it is not possible to cover all the microfinance institutions operating in India as well as the various rural schemes being operated by various NGOs and for-profit government organizations. Therefore only those initiatives have been covered which have had the maximum impact on the lives of poor and the agriculture sector as a whole.

2. 4 Type of Research

The report is mainly based on secondary research. However some primary research has also been done in talking to money lenders to know how they distribute money to the poor people. Since the aim of the report is to get an initial understanding into microfinance and its possible application in the agriculture sector, the report uses both Basic as well as Descriptive Research.

Microfinance Models

3. 1 Grameen Model

The Grameen Model, pioneered by Prof Muhammed Yunus of Grameen Bank is the most well-known model in the world. The model is based on the following features: Voluntary formation of small groups of five people to provide mutual group guarantees in lieu of the collateral required by conventional banks7-8 groups organized into ‘ centers’Regular fixed savings by members of the group credited towards a group fundInitially only two members of a group are allowed to apply for a loan and then based on their track record for repayment, the next two borrowers can applyRepayment based on 50 weekly installmentsThe center meets every week when savings and repayments are collected. These are generally handed over to a micro finance organization which supervises the meet and keeps accounts. The center also takes decision on guaranteeing loans to their individual members, by accepting joint liability, by raising group emergency funds and by accepting that no member of a group will be able to take a new loan if any members are in arrears. Another important task is appraising fellow-members’ loan applications, and ensuring that their fellow-members maintain their regular savings contributions and loan repayments[4]. The greatness of the Grameen model is in the simplicity of design of products and delivery. The process of delivery is scalable and the model could be replicated widely. The focus on the poorest, which is a value attribute of Grameen, has also made the model a favorite among the donor community. However, the Grameen model works only under certain assumptions. As all the loans are only for enterprise promotion, it assumes that all the poor want

to be self-employed. The repayment of loans starts the week after the loan is disbursed. One of the necessary conditions for this model to work is discipline and growth of the number of clients. By design this model might not be appropriate for sparsely populated areas like Kutch in Gujarat, or areas where there is a widespread migration of the labor class such as in parts of Rajasthan, Mahaboobnagar District of Andhra Pradesh and Bharuch District of Gujarat[5].

3. 2 SHG Model

This model was conceived by the National Bank for Agriculture and Rural Development (NABARD) in India, and Aloysius Fernandez, the conceiver of Self Help Group (SHG) initiative. It aim is to provide a low-cost and effective technique for banking access to the poor, through a program now widely known as the SHG-Bank Linkage Program. In this model, the members form a group of up to 20 members. The group formation process may be facilitated by an NGO or by the MFI or bank itself, or it may evolve from a traditional rotating savings and credit group (ROSCA) or other locally initiated grouping. The process of formal ‘ linkage’ to an MFO or bank usually encompasses: The SHG members decide to make regular savings contributions, which may be kept by their elected head, in cash, or in kind, or they may be bankedThe members borrow individually from the SHG on terms and at interest rates decided by the group themselvesSHG opens a savings account, in the group’s name, with the MFI or bank, for funds that are not needed by members, or in order to qualify for a loan from the bankThe MFI or bank makes a loan to the SHG, in the name of the group, which is then used by the group to supplement its own funds for on-lending to it members[6]The

SHG model aims to build a credit history for each individual through the group process of on-lending, so that over time each of them would have access to financial services through her own bank account thereby contributing to the vision of total financial inclusion. In the long term, the benefits to the borrower and cheaper cost of capital allow SHG programs to outscore all other models in the field of microfinance. However, there are no clear margins built into the program to take care of the cost of building, managing, and scaling the program, except through grants, subsidies and other provisions made by government[7].

3. 3 Joint Liability Group Model/MFI Model

It is a more recent model adopted by Indian microfinance, adapted from the Grameen model. It has been widely embraced by Indians and has become the major alternative to the SHG model. The JLG is not linked with a bank but is intermediated by the loan officer of a MFI who is responsible for formation and management of the group. Unlike the SHG model wherein the loan is given to the group and the bank does not track individuals' credit history, in the Grameen-inspired JLG model the loan is given to the individual (usually by the MFI), backed by the group guarantee; and an individual credit history is created, even though it may be skewed by the group guarantee scheme[7].

Microfinance in India

The Government of India, in 1992, decided that the traditional banks in India should extend financial services to the deprived sections through informal Self Help Groups (SHGs). This has now grown into a cost effective and the fastest growing microfinance initiative in the world, by providing over 103

million poor households access to a variety of financial services from the banking system. The linking of the Groups with banks has provided the members of the Groups with the facility of pooling their savings and access to credit from the banking system. It has also created a platform through which they can launch a number of livelihood initiatives and also facilitate the empowerment process. From a humble beginning of having only 500 SHGs linked to banks in 1992, the initiative grew to over 0. 5 million SHGs by March 2002 and by March 2012 almost 8 million SHGs were linked to banks. At the pilot stage, almost 100% of the SHGs linked to Banks were from the southern state. However, by March 2012, only 46% of the SHGS belonged to the southern states, while SHGs from eastern States (especially, Bihar, Orissa and West Bengal) shot up to over 20%. Together the 8 million SHGs maintain a balance of over Rs. 6550 crores in the Savings Bank accounts with the Banks, while they are estimated to have tapped savings of over Rs. 22000 crores of which nearly 70% (~ Rs. 15000 crores) goes for internal lending. Over 4. 4 million SHGs are regularly availing credit facilities from the Banks. During 2011-12 alone, over 1. 15 million Groups availed loans amounting to Rs. 16535 crores from Banks and together 4. 4 million Groups have loans to the extent of Rs. 36340 crores outstanding against them with the financing banks as on 31. 3. 2012[8].

4. 1 Progress under microfinance during 2011-12

4. 1. 1 SHG Bank Linkage Program

Under the SHG-Bank linkage programme, over 103 million rural households have now access to regular savings through 7. 96 million SHGs linked to banks. About 27% of these SHGs are savings linked through the SGSY

programme – the rural poverty alleviation programme of the Government of India where predominantly households below the poverty line are admitted as members. Table : Overall Progress under SHG-Bank Linkage for last 3 years

Particulars

2009-10

2010-11

2011-12

No. of SHGs

Amount

No. of SHGs

Amount

No. of SHGs

Amount

SHG Savings with Banks as on 31st MarchTotal SHGs69. 536198. 7174. 627016. 3079. 66551. 41Of which SGSY Groups16. 941292. 6220. 231817. 1221. 231395. 25% of SGSY Groups to Total24. 420. 927. 125. 926. 721. 3All Women SHGs53. 14498. 6660. 985298. 6562. 995104. 33% of Women Groups76. 472. 681. 775. 579. 177. 9Loans disbursed to SHGs during the yearTotal SHGs15. 8714453. 311. 9614547. 7311. 4816534. 77Of which SGSY Groups2. 6721982. 412480. 372. 12643. 56% of SGSY Groups to Total16. 915. 220. 117. 018. 316. 0All Women SHGs12. 9412429. 3710. 1712622. 339. 2314132. 02% of Women Groups81. 6868586. 880. 485. 5Loans Outstanding against SHGs as on 31st MarchTotal SHGs48. 5128038.

2847. 8731221. 2743. 5436340. 00Of which SGSY Groups12. 456258. 0812. 867829. 3912. 168054. 83% of SGSY Groups to Total25. 722. 326. 925. 127. 922. 2All Women SHGs38. 9823030. 3639. 8426123. 7536. 4930465. 28% of Women Groups80. 382. 183. 283. 783. 883. 8Source: Status of Microfinance in India 2011-12, NABARDSource: Status of Microfinance in India 2011-12, NABARDFigure : SHGs as on 31. 3. 2012 – Savings and CreditSource: Status of Microfinance in India 2011-12, NABARDFigure : SHGs - Agency wiseSource: Status of Microfinance in India 2011-12, NABARDFigure : Region wise Average Savings Balance of SHGsOver 4. 36 million SHGs have now access to direct credit facilities from the banks and the total bank loans outstanding against these groups is over Rs. 36340 crores as on 31 March 2012 i. e. an average of Rs. 83500 per group. About 1. 15 million SHGs were extended fresh loans to the extent of Rs. 16535 crores during 2011-12 by all banks averaging Rs. 1. 44 lakh per group. Although fresh lending to SHGs during the year showed an increase of 13. 7% over last year, the steady decline in the number of SHGs being extended fresh loans by banks for the last 3 years is a matter of concern. The increase in NPA against loans to SHGs continued to escalate during the current year as well. In absolute terms, the gross NPA against loans to SHGs increased from Rs. 1474 crores at the end of March 2011 to Rs. 2213 crores by March 2012. In percentage terms it increased from 4. 72% last year to 6. 09% during the current year. It was only 2. 9% during 2009-10[8]. Table : Agency wise NPAs of Bank Loans to SHGs

Agency

Loans Outstanding

against SHGs- Position as on

Amount of NPAs

Percentage of NPAs

to Loan Outstanding

Mar-10

Mar-11

Mar-12

Mar-10

Mar-11

Mar-12

Mar-10

Mar-11

Mar-12

CBs(Public Sector)19724. 4221412. 7524406. 57513. 531019. 91581. 12. 64. 766. 48CBs(Pvt. Sector)440. 29470. 511403. 7223. 9347. 0974. 375. 4410. 15. 3RRBs6144. 587430. 058613. 58218. 53272. 82426. 343. 563. 674. 95Coop. Banks1728. 991907. 851916. 1467. 04134. 3130. 973. 887. 046. 84

Total

28038. 28

31221. 17

36340

823. 04

1474. 1

2212. 7

2. 94

4. 72

6. 09

Source: Status of Microfinance in India 2011-12, NABARD4. 1. 2 mFI Bank Linkage ProgramMicrofinance institutions act as an important channel for extending financial services to the micro finance sector in the country by raising resources from Banks and other institutions. mFIs could be: NGO mFIs – registered under the Societies Registration Act, 1860 or the Indian Trusts Act, 1880Cooperative mFIs – registered under the State Cooperative Societies Act or Mutually Aided Cooperative societies Act or Multi State Cooperative Societies ActNBFC mFIs incorporated under Section 25 of Companies Act, 1956 (these NBFCs are working " not for profit")NBFC mFIs incorporated under the Companies Act, 1956 and registered with RBI[8]The Progress under mFI-Banks linkage programme during the last 4 years is as shown below: Table : Progress under mFI-Bank Linkage Programme

Particulars

2008-09

2009-10

2010-11

2011-12

no. of mFI's

Amount

no. of mFI's

Amount

no. of mFI's

Amount

no. of mFI's

Amount

Loans disbursed by banks to mFI's5813732. 3377910728. 54718448. 964655205. 29Loans outstandingagainst mFIs as on31 March1915470. 51165913955. 75231513732. 62196011450. 4Fresh loans as % ofLoan Outstanding

74. 5

Source: Status of Microfinance in India 2011-12, NABARD76. 9

61. 5

45. 5The agency wise details of loans extended to mFIs are shown below.

Table : Loans to mFIs by Banks/Financial Institutions

Financing Agency

Period

Loans disbursed to mFIs

during the year

Loan outstanding against mFIs

as on 31 March

No. of mFIs

Amount

(Rs. crore)

No. of mFIs

Amount

(Rs. crore)

All Commercial Banks

2008-095223718. 9317624977. 892009-106458038. 61140710095. 322010-114607601. 02215310646. 842011-123364950. 9816849810. 98

Regional Rural Banks

2008-095913. 415331. 22009-104624. 1410352. 222010-1194. 162342. 012011-1211313. 2812837. 51

Coperative Banks

2008-09NANANANA2009-100030. 012010-11NANANANA2011-1241. 61194. 75

SIDBI

2008-09NANANANA2009-10882665. 751463808. 22010-112843. 781393041. 772011-1212239. 421291597. 11

Total by all agencies

2008-095813732. 3319155009. 092009-1077910728. 5165913955. 752010-114718448. 96231513730. 622011-124655205. 29196011450. 35Source: Status of Microfinance in India 2011-12, NABARD

4. 2 Sources of Funds

Figure : Sources of Funds

Grants / Donations

Microfinance in India was always seen as asocial cause with a not for profit function. Traditionally, the sector is financed by grants or donations from the state, institutes like NABARD, social minded professionals etc.

Bank Loans

India’s priority sector lending rules require that domestic banks employ 40% of their credit to certain activities or groups of people deemed particularly deserving. Till the crisis of 2010, both public and private sector banks have been happy to lend to MFIs to fulfill the requirement of priority sector lending.

Private Equity Funding

There is still not enough grant capital available to meet the funding requirements of the world’s microfinance institutions (MFIs) as they continue to scale. But this has changed drastically in the last few years with many

foreign based private equity funds pouring money into this sector. Private equity in microfinance is mostly invested in the form of early stage start-up or growth capital. This type of investing is very different from the large-cap private equity techniques employed in the developed world[9].

Advantages of Private Equity in Microfinance:

private equity in microfinance often serves to strengthen balance sheetsgreater corporate governance requirements of such investors inevitably results in stronger organizationsincreasing flow of this type of capital will allow the sector to scaleleads to greater accountability and transparency[9]In India, a series of notable investments has provided the foundation for increased outreach, greater geographic diversity, the introduction of new products and improved mechanisms to attract and retain high quality talent. Private equity investors and venture capital companies have invested Rs. 2, 542. 5 crore in the industry since 2006. In 2009, there were 17 such deals valued at Rs. 867 crore. In 2010, inflows of about Rs. 526. 5 crore were reported, according to Venture Intelligence. Much of the private capital is backed by aggressive growth plans laid out by the promoters of MFIs with a clear focus on financial bottom lines. Table : Private Equity Investments in Microfinance

MFI

Period

Investment

(USD Mn)

Investors

SKS

Mar-0710. 6Unitus, SequoiaDec-0732. 3SandstoneNov-0880. 3SVB Financial Group, Kismet

Spandana

Aug-0710. 7Lok, JM FinancialNov-0821. 9ValiantOct-0947. 1Temasek

BASIX

Dec-087. 1Lok, Aavishkaar GoodwellSource: Lok Capital

Other Funding Options

Micro finance institutions in India have been exploring innovative debt financing deals to support their robust growth. Non-convertible debentures, syndication, securitisation and bond issues are some of the financing structures that have gained popularity and are likely to be employed for future fund raising. These instruments have been used to diversify the investor base and raise foreign currency debt. Leading players like SKS, Grameen Koota and Spandana Sphoorthy have raised hundred crores worth of funds by way of issuing NCDs. For investors, NCDs still remain a good option given the Fixed Income scenario. Essentially, these NCDs are more attractive as the companies typically offer two to four per cent higher returns

than the fixed deposits. They attract no TDS on interest as they would be issued in a dematerialised form and listed as a security in the National Stock Exchange.

Agriculture Sector in India

5. 1 National Policy on Agriculture

There is an urgent need to make agriculture demand driven, increase value addition in agriculture products and leverage competitive advantage to maximize opportunities in the domestic as well as global market. The farm production level has to grow consistently to maintain food security in the face of ever-growing population. The 11th Five-Year Plan aims at faster and more inclusive growth. Even as the growth of more than 9% is projected for the economy, the income can be doubled in Ten years if the population growth is pegged down at 1. 50%. The National Policy on Agriculture seeks to actualize the vast untapped growth potential of Agriculture; strengthen rural infrastructure to support faster agricultural development, promote value addition, accelerate growth of agribusiness and create employment in rural areas[10]. The National Policy on Agriculture has the following prime objectives: A growth rate in excess of 4% per annum in the agriculture sectorGrowth that is based on efficient use of resource and conserves our soil, water and bio-diversityGrowth with equity, i. e., growth which is widespread across regions and farmersGrowth that is demand driven and caters to domestic markets and maximizes benefits from exports of agricultural products in the face of the challenges arising from economic liberalizationGrowth that is sustainable technologically, environmentally and economicallyThe policy envisages development of animal husbandry,

poultry, dairy and aquaculture for diversifying agriculture and generating exportable surpluses paving the way for rapid expansion of agri-business[10]

5. 2 Concerns & Perspectives of National Agricultural Policy

There are many issues that have a bearing on bringing synergy to agricultural growth through credit. The strategies are to be formulated in the context of various problems and associated issues. Reduced Investment: During the last decade, the overall growth in capital formations has shown a negative growth rate of 0. 22%. This is inconsistent with the public sector which has shown a positive growth rate as in public sector, capital is invested to create infrastructure which leads to private investments in agricultural assets for productive purposes. Stagnating productivity: With limited land space being available under agricultural production, productivity has taken a hit thereby putting greater reliance on increasing cropping intensity and increasing yield. Throughout the 1990s, crop yields have been declining at a steady rate with the average yield in India being only 30% to 50% of the highest average yields in the world. Fragmentation & Exclusion of small holders: Agriculture in India has been the preserve of Small and Marginal Farmers. In terms of number of holdings, the Small and Marginal Farmers (less than 2 ha. land) account for 78% in 1990-91. Yet it is reported that 73% of the farmer households are outside the formal financial system and the exclusion is 87% among this segment of farming community. Small and marginal farmers are often unable to adopt modern technology thereby resulting in unemployment and low labor productivity. Declining trend in prices and Profitability: Profitability has declined due to low yields and market prices failing to keep pace with rising input costs. This is due to a

combination of factors–falling prices, stagnant productivity, rising input cost, and lack of mechanism to make forecast of prospects of different crops / farming systems in the light of globalization. Substantial increase in cost of cultivation has been a general trend in the cultivation of crops with increase in labor costs accounting for the major share. Also, the yield of crops has been stagnant. Stagnation in creation of more irrigation potentials: Major parts of our country still depend on the monsoons for better production and droughts & floods have been a part of the economy. Thus there is an urgent need to increase the irrigation potential for effective utilization of the rainwater including rain harvesting technique and watershed development for better productivity and financial stability for the farmer. Inadequacy of Post-harvest management policy has led to wastage of commodity at farmer's fields or storage warehouses. This has resulted in loss of income for the farmers thereby discouraging them from making a higher level of investment. Insufficient Investment in Infrastructure has not matched with the growth in agriculture and regulatory restrictions in commodity logistics has resulted in higher cost of handling thus, leading to inefficiencies in the supply chain management[11].

5. 3 Agriculture Credit

The policy framework for agricultural finance has been evolved from time to time with a view to creating an enabling environment for the smooth, increased and hassle free flow of financial resources to agriculture. The need for adequate institutional credit to agriculture occupied the place of priority since 1936 and 1937 when studies sharply exhibited that farmers were totally dependent upon moneylenders while cooperatives played a negligible

role. The recommendations of the All India Rural Credit Review Committee set up by the Reserve Bank of India in July 1966 brought commercial banks to play increased role in the delivery of agricultural credit as an integral part of national policy. The role, functions and responsibilities of commercial banks were further expanded following the nationalization of 14 major commercial banks in 1969 and six more in 1980. In order to significantly augment the flow of loanable resources of the financial institutions and, further, to provide operational guidelines in the matter of rural credit to stimulate the process of rural development, National Bank for Agriculture and Rural Development (NABARD) was established in 1982 by way of restructuring and expanding the role of the already existing Agricultural Refinance and Development Corporation. The flow of credit to agriculture in four distinct phases during 40 years' period (1970-2010) is as follows: the decade 1970-80 represents the nationalization of 14 major private banks in 1969, process of establishing regional rural banks in 1975, adopting multi-agency approach for dispensation of agricultural credit and formulating and implementing district credit planthe decade 1980-90 represents the nationalization of six more private banks in 1980, establishment of National Bank for Agriculture and Rural Development [NABARD] in 1982, mandated provision of bank credit under Government sponsored subsidy schemes and linking agricultural credit targets at 18% with individual bank's net bank creditthe decade 1991-00 represents implementing the concept of village level credit planning for 15 to 20 villages allotted to each of rural, semi-urban and urban branches of public sector banks and RRBs under Service Area Approach, formulation of potential linked credit plan for each district annually by NABARD, implementation of Agricultural Debt Relief Scheme and

Financial Sector Reforms andthe decade 2000-10 represents introducing a plethora of policy initiatives sharply focusing on agricultural credit, namely doubling the flow of agricultural credit, implementing agricultural credit package, formulating Annual Special Agricultural Credit Plan to increase the disbursement by 20% to 25% over the previous year and financing new farmers, broadening the scope of priority sectors credit and stipulating agricultural credit targets linked with revised definition of Adjusted Net Bank Credit and significant disincentives for shortfall in achieving the targets etc. The credit flow to agriculture increased from Rs. 2, 85, 146 crores during the Ninth Plan (1997-2002) to Rs. 6, 91, 739 crores during the Tenth Plan (2002-07). Credit disbursement during the Eleventh Plan (2007-12) is estimated at Rs. 19, 59, 524 crores, of which Rs. 13, 87, 633 crores have already been disbursed between 2007-08 and 2010-11. However, the need for affordable, adequate, hassle-free and timely supply of institutional credit to agriculture continues to assume critical importance[12]. The agency wise distribution of agricultural credit is as follows: Table : Agency-wise Disbursement of Agricultural Credit during 1970-2011

Period

Commercial Banks

Cooperatives

Regional Rural Banks

Total

1970-71 to 2010-11

16, 28, 42714, 70, 8502, 18, 35833, 17, 635

1970-71 to 2000-01

1, 00, 63410, 55, 87420, 52911, 77, 037

2001-02 to 2010-11

Source: Bank Credit to Agriculture in India", Manan Prakashan, Mumbai15, 27, 7934, 14, 9761, 97, 82921, 40, 598(All figures in Rs. Crores)

5. 4 Kisan Credit Cards

Kisan Credit Card (KCC) has been a credit product provided by banks since 1998-99 to facilitate farmers the required financial liquidity and avail credit when it is absolutely needed, providing in the process flexibility, timeliness, cost effectiveness and hassle free services to the farmers. Banks issued 10, 38, 40, 827 cards with sanctioned loan amount of Rs. 5, 00, 373 crore during 1998-99 to 2010-11. In the aggregate total, commercial banks had a share of 46. 2% in cards issued and 56. 7% share in the loan amount sanctioned, as compared with cooperatives' share of 39. 2% and 30. 2% respectively, followed by 14. 6% and 13. 1% share by RRBs. Loan amount sanctioned per card by commercial banks was the highest (Rs. 59, 156), followed by RRBs (Rs. 43, 061) and cooperatives (Rs. 37, 178). The impact evaluation of this product after a decade conducted in 14 States involving 178 bank branches and 1876 product users revealed that paddy was the major crop cultivated by the sample KCC holders and the average productivity per hectare of paddy of the KCC holders was higher by 13. 3% ranging from 18 quintals to 34 quintals compared with the non-KCC holders in which case yield per hectare varied from 14 quintals to 26 quintals. The increase in the yield was partly attributed to the adequate, timely and hassle free availability of credit

that facilitated purchase and use of inputs particularly fertilizers as compared to the non-KCC holders.

5. 5 Agricultural Cooperative Credit Institutions

Cooperatives were the pioneers in the field of rural credit in India. The entire rural credit delivery was more or less a preserve of the cooperative credit institutions from 1904 to 1969, when the nationalization of Commercial Banks and the subsequent emergence of Regional Rural Banks in 1975 heralded the adoption of the Multi Agency Approach to rural lending. Even today, the cooperative credit structure has the largest outreach and delivers credit to the largest numbers of clients in the rural areas in comparison to other institutions, although the quantum of credit delivered is second to commercial banks. The institution wise arrangement for rural credit in India is as given below: Figure : Institution wise arrangement for Rural Credit in IndiaThe various agricultural credit institutions are as described below:

5. 5. 1 National Bank for Agriculture and Rural Development (NABARD)

NABARD was set up on July 12, 1982 with an initial capital of Rs. 1, 000 million, which was enhanced to Rs. 20, 000 million, fully subscribed by the Government of India and the RBI. With the formation of NABARD the agriculture credit functions of the RBI and refinance functions of the then Agricultural Refinance and Development Corporation have been transferred to NABARD. The objectives of NABARD are to: Facilitate credit flow for agriculture, rural infrastructure and rural developmentPromote policies, practices and innovations conducive to rural developmentStrengthen rural credit delivery system through institutional developmentSupervise Rural

Financial Institutions (Cooperative Banks and Regional Rural Banks)Provide consultancy services

Functions:

Credit Planning and Monitoring: Mapping the agriculture potential and potential in other related sectors available for development through bank credit; preparation of district-wise annual Potential Linked Credit Plans (PLPs) and State Focus Paper (SFP) based on the PLPs; Formulation of policies and operational guidelines for Rural Financial Institutions (RFIs); Supervising the credit flow to agriculture and other related sectors; Coordination with various Government agencies and departments at all levels. Financial Services: Loans to State Governments for development of infrastructure facilities in rural areas and strengthening cooperatives; Refinance by way of loans and advances to RFIs; Support for micro credit schemes of NGOs and other formal and non-formal agencies; Monitoring and evaluation of projects financed; Co-financing with financial institutions. Promotion and Development: Promotion of Kisan Credit Card (KCC) and Swarozgar Credit Card (SCC); Assisting RBI and Government of India (GoI) in formulation of policies relating to rural credit; Capacity building of institutions; Support to innovation and experimentation of new models and practices in rural development and credit delivery system; Dissemination of innovative products and ideas; Support to Research and Development; Promotion of micro credit innovations; Promotion of Farmers' Clubs, Joint Liability Groups and Tenant Farmers; Promotion of Rural Non-Farm Sector (RNFS); Consultancy services. Supervision: On-site inspection of Cooperative Banks

and RRBs; Off-site surveillance on the financial health of Cooperative Banks and RRBs[12].

5. 5. 2 Primary Agricultural Credit Society (PACS)

Primary Agricultural Credit Society (PACS) plays an important role in extending credit to farmers. PACS is the center of the co-operative movement and was started with the objective of providing cheap credit & to teach principles of co-operation to the members or farmers.

Structure and Objectives of PACS

Figure : Structure of PACSThis structure helps to strengthen the base level primary society. If a person at the base level requires funds, he applies to the society. If the Primary Society doesn't have funds at its disposal, it applies to the Central Bank which in turn applies to the State Bank when in need. The main objectives of primary credit societies are given below. Borrowing funds from members as well as others to be utilized in giving loans to the members for productive purposesActing as the agent for the joint supply of agricultural, domestic and other requirements of the members, and of the joint sale of producePurchasing and owning implements, machinery or cattle for renting it to the membersDisseminating knowledge of the latest improvements in agriculture, handicraft, etc. Encouraging thrift, self-help and co-operation among the members

Functions of PACS

The primary function of these societies is to provide short and medium term credit; supply agricultural and other production requirements and undertake marketing of agricultural produce. The main functions of PACS are as listed

below: to associate itself with the programme of productionto lend adequate amount to its members for their agricultural production and consumption purposesto borrow adequate funds from the central financial agencies for helping the members adequately for the above purposesto attract local savings for share capital and fixed depositsto supervise the use of loans (especially medium term loans) and to see that they are paid regularlyto distribute fertilizers, seeds, insecticides, agricultural implements etc. either on its own or as agentto supply certain consumer goods in common demand such as kerosene, sugar etc. to store the produce of the members till it is soldto collect or purchase produce, where necessary, on behalf of a consumers society, marketing society, or governmentto associate itself with programme of economic and social welfare for the village[13]The performance of PACS over the past 5 years is as given below: Table : Performance of PACS over the last 5 years

Year

Number of Societies

Total Membership

Owned Funds

Total Deposits

Total Borrowings

Total Loans Issued

2007-08

93, 224125, 7921, 103, 8842, 348, 4074, 371, 4494, 961, 275

2008-09

94, 950131, 5301, 098, 3832, 544, 9264, 784, 7975, 764, 248

2009-10

95, 633132, 3501, 180, 5822, 624, 5384, 893, 8445, 878, 674

2010-11

94, 647126, 4191, 247, 8633, 528, 6075, 176, 3907, 493, 754

2011-12

93, 413121, 2251, 445, 5613, 723, 8165, 400, 0109, 130, 382Source: Bank Credit to Agriculture in India", Manan Prakashan, MumbaiMembership & Borrowers in ThousandsRs. In Lakhs

5. 5. 3 District Central Cooperative Bank (DCCB)

The DCCB are at the middle level of the Cooperative Credit Structure and are functionally positioned to deal with the concerns of both the upper and lower tiers. The DCCB as the name suggests has an area of operation covering a single district. In any district, the banking system would comprise Commercial Banks, RRBs, Cooperative Banks and other agencies like SFC, MFIs, Non Formal Credit institutions and Nonbanking Credit agencies. The major roles & functions of a DCCB are:

Banking Entity

The DCCBs are recognized by the Reserve Bank of India as part of the Banking Regulations Act. They are allowed to accept deposits from general public and provide loans to individuals and institutions including primary cooperative societies. Keeping in mind the special nature of their ownership

and development role, special provisions have been incorporated in the Banking Regulations Act 1949 to ensure their smooth functioning.

Leader of Cooperative Movement

One of the most important roles of the District Central Cooperatives Bank is to support and develop the Primary Agricultural Credit Societies. The main source of funds for the PACS is the DCCB and the lending programme of PACS is regularly supervised by the supervisors of the DCCBs. Among the most important line of credit provided by the DCCB to PACS is that for providing production loans for crops to members of PACS. Many PACS also undertake multiple activities like sale of fertilizers and other agricultural inputs and several act as distributors of ration items under the Public Distribution System (PDS). The financial assistance for such activities and other loans provided to members are also sourced from the DCCBs as the PACS usually do not have major resource base of their own. The DCCBs also provide capacity building support to PACS. They conduct training programmes for secretaries and directors of the board of the PACS. Periodical seminars are also conducted to update the staff and members of PACS on important developments affecting them.

Leader in Agricultural Lending

Historically, the DCCBs have been considered as the most important financial institution to support the short term credit requirements of the agricultural sector. These loans include both production loans and marketing loans provided to the members. Usually the production loans are provided on the basis of the " Scale of Finance" which is fixed for each major agricultural crop in the district. The scale of finance is computed by taking the total cost of

production of the crop based on average price of inputs, including labor. The yield and market value of the output are also computed and the credit required per hectare for raising the crop is determined. The scale of finance is fixed by a committee called the " District Level Technical Committee" and the DCCB is the convener of this committee. The members of the DLTC include the representatives of the agricultural department, banks, NABARD etc[14].