PERFORMANCE OF KISAN CREDIT CARD SCHEME IN INDIA: A STATE LEVEL ANALYSIS

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Certificate

This is to certify that the dissertation entitled **'Performance of Kisan Credit Card Scheme in India: A State Level Analysis',** submitted to the Department of Economics, Central University of Haryana for the award of the Degree of Master of Philosophy in Economics, is appearing as the record of original work done by Ms. Sushila (Enrolment No. CUH/16/2015, Roll No.6016), under my supervision and guidance. The matter presented in this dissertation has not been submitted in part or full, for any other award of any degree/diploma of this university or any other university/institution.

I consider the present work is fit for evaluation.

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DECLARATION

I hereby declare that the research work embodied in this dissertation entitled **"Performance of Kisan Credit Card Scheme in India: A State Level Analysis"** has been carried out by me at the Department of Economics, Central University of Haryana for the fulfilment of the requirement for the award of the degree of Master of Philosophy in Economics, is a record of original research work done by me under supervision of Dr. Ranjan Aneja, Assistant Professor, Department of Economics, Central University of Haryana. The dissertation has been subjected to plagiarism check and the work is submitted to consideration of award of M.Phil. Economics. The content of this dissertation has not been submitted so far in part or in full for any degree or diploma in other institution.

Place: CUH, Mahendergarh

Date: (Sushila)

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INTRODUCTION

CHAPTER 1

INTRODUCTION OF THE STUDY

1.1 Background of Study

Agriculture is the mainstay of Indian economy. Mahatma Gandhi, 1901 rightly said that "India lives in villages". Indian agriculture has a long history. The area of Northern India is irrigated by the Indus and Ganga-Yamuna rivers. The Eastern part has the Brahmaputra river for irrigation and Southern India has its own river systems. Despite of all these, Indian agriculture is dependent upon the rainfall. With the Monsoon problems, the Indian agriculture is also facing many problems. A large proportion of Indian population is depends upon agricultural and allied sector. So, there is need to enhance the growth of agriculture sector. The share of agriculture in real GDP in India has declined below one fifth, but still now it is very important sector of Indian Economy because it employs around 52% of the work force. In 1950-51 the agriculture sector contributed about 51.81% in India's GDP. It was declined 31.4% in 1990-91 and 18.20% in 2013-14. The share of agriculture sector in GDP in 2014-15 is about 17.9% while the share of other sectors is increasing in which the service sector share is 57.9% and industrial sector share is 24.2%. Despite of all these importance of agriculture sector in country like India is not likely to decline due to the concern for food security, employment, rural poverty and availability of wage goods,(Vyas, 2003).The food grain production was at 257 million tonnes during 2014-15 which was about 52%(GOI, 2015b). Agriculture development is influenced by many factors like market, credit, infrastructure and irrigation. However, since the early 1990s, liberalisation and globalisation takes place which has impact on Indian

agriculture. Due to which agricultural commodities were liberalised and terms of trade becomes favourable to agriculture.

At present day the scenario of agriculture sector has been changed into market oriented production from the subsistence level of production .There is high value crops and new market for agriculture which brings the commercialisation. The continuous growth of agriculture sector will give the food security.

According to National agriculture policy, "Agriculture is a way of life, a tradition, which for centuries" thus runs the opening sentence of agriculture policy, "has shaped the thought, the outlook, the culture and the economic life of people". (Dr. Joy Nerella). With the changing scenario in agriculture sector there is necessity to provide the credit at low cost and adequate amount for attaining the sustainable agriculture development.

1.2 Agricultural credit in India

Credit is an intensive factor which accelerate the farm and non-farm sector development including other segment of economy. Credit is very necessary for farmers to generate output and income. Credit is the need to change the traditional agriculture to modern agriculture. The credit is given by both formal and informal institutions. In the past time the informal institutions were the leader for providing the credit. These informal institutions charged the higher rate of interest for the credit and exploit the people. The formal institutions provides an adequate amount of credit with low rate of interest for fulfilling agricultural requirements. The importance of agriculture credit cannot be neglected in Indian economy. It enables farmers to purchase the inputs and other factors of production. The traditional argument for the

provision of agriculture credit is that additional capital can be temporary used to enhance the level of productive capital (Eswaram and Kotwal, 1990). In agriculture sector all type of farmers (small, large and marginal) suffers from the paucity of capital. After the green revaluation, many changes came in to the agriculture sector. New technology and techniques came in to this sector. To purchase these modern techniques there was the requirement of credit to invest in to agriculture sector.

The data shows trend in the flow of agricultural credit over the given period of time.

Table no. 1 Flow of Agricultural Credit in India		
Year	Target	Achievement
2006-2007	175,000	229,400
2007-2008	225,000	254,658
2008-2009	280,000	301,908
2009-2010	325,000	384,514
2010-2011	375,000	446,779
2011-2012	475,000	476,550
2012-2013	575,000	607,375

Figure no. 1 Flow of Agriculture credit
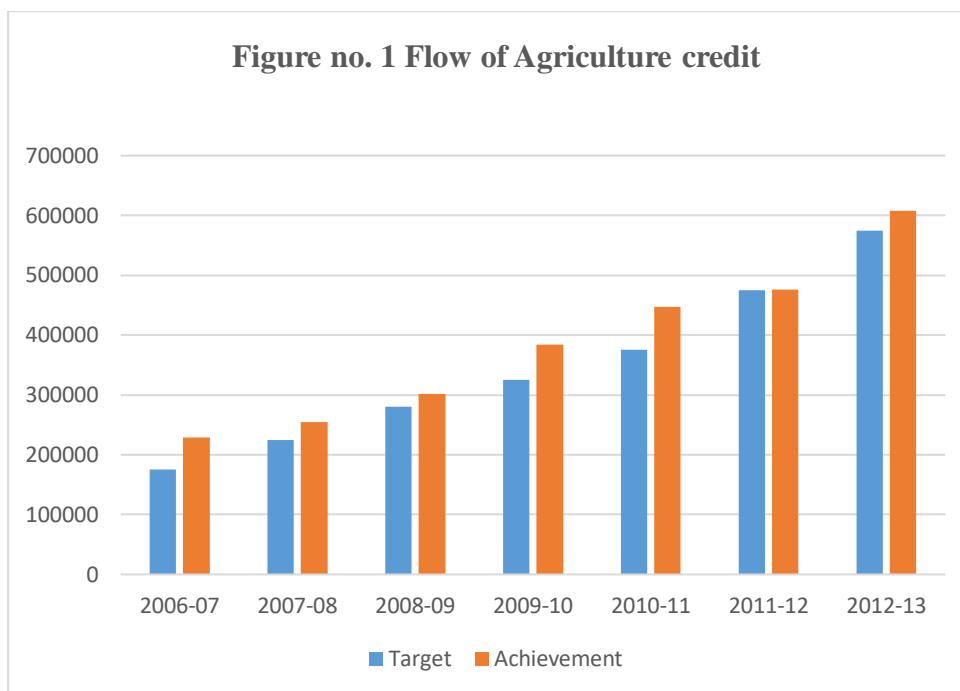
Table no.1 shows that during the year 2006-07 the targeted agriculture credit flow was Rs. 175,000 crore. Whereas the achievement was 229400. The achieved percentage was 131%. The targeted agriculture credit flow in 2007-08 was Rs. 225,000 whereas the achieved amount was Rs.254, 658. It showed 113% achievement of agriculture credit. It reduced from 2006-07 to 2007-08. In 2011-12, the achieved credit to agriculture was Rs. 476,550 crore as comparison of targeted amount of Rs. 475,000 crore. It represented 100.32% of targeted amount. From this we can understand that the achievement of agriculture credit is more than the target.

1.3 History of Agricultural Credit in India

Phase 1st (1870-1930)

During this phase in 1870 the British Raj noticed the main problem of Indian agriculture that was lake of credit. In 1904 the Cooperative societies were opened as the premier institutions for providing the agricultural loan. After that a new act passed

for credit societies and in 1915 Maclagan committee established the Cooperative banks and due to which there was the rise of three tier Cooperative credit structure. After that in 1926-1927 Royal Commission further looked at the agriculture credit.

Phase 2nd (1934-1950)

In 1934 the RBI Act was passed and this gave the attention towards the agriculture credit. In 1935 Sir Malcolm Darling submitted a report on Cooperative credit and RBI setup the two separate arms for credit structure that are one for short term and another for long term. In 1945-1950 a number of committee gave their report of provision on rural credit.

Phase 3rd (1951-1980)

In 1951 the credit given through Cooperative was only 3.3 % and commercial banks share was only 0.9%. The money lenders charged the high rate of interest from the farmers. In 1951 the foundation of Report of All India Rural Credit Survey laid by the government for the upliftment of credit structure. After that in 1963, Agriculture Refinance Corporation was setup for refinance. In 1969, the nationalization of commercial banks played a vital role in agriculture credit. It introduced the concept of priority sector for helping the neglected sectors like agriculture. Despite of all these, there was not so much improvement in credit to agriculture sector. After this a solution was made in which a separate banking structure was involved which remove the rural problems and that was the introduction of Cooperatives and Commercial banks. After the recommendations of Narasimhan Working Group (1975) RRBs were set up. Thus at the end of 1977, there were three separate banking institutions, which are called by the name or described as "Multi Agency Approach".

Phase 4th (after 1980)

After the recommendations of committee related to agriculture credit, in 1982 NABARD (National Bank for Agriculture and Rural Development) was set up for the solution of rural problems .After the reforms in1991, R.V. Gupta Committee gave their report for setting up of Kisan credit card scheme in 1998. KCC was introduced with the interest rate not beyond 9 percent for crop loans up to Rs. 50, 000.It is the very interesting point that the credit problems in rural sector directly or indirectly were the reason behind the setting up of all credit institutions like RBI, SBI and NABARD.

1.4 Introduction to Kisan Credit Card Scheme

Agriculture credit is the basic need for the Indian farmer, so after the limitations of multi credit approach, a strong idea came into the mind of policy makers that was the introduction of Kisan credit card scheme. The model of Kisan credit card scheme was formulated by NABARD. In 1998-99 the Hon'able Union Finance Minister, introduced the Kisan credit card scheme during his budget speech. According to this scheme loan is given to the farmers on the basis of their operational land holdings. Kisan credit card emerged as the most innovative scheme in the field of agriculture credit. The main motive of the scheme is to provide the adequate and sufficient amount of capital to the farmers. Kisan credit card provides the timely and hurdle free credit to the farmers. The farmers may use this credit for purchasing the fertilisers, equipment's, seeds, pesticides and other necessary inputs for agriculture.

Kisan credit card scheme was set up with main three agencies that were Cooperative banks, RRBs and Commercial banks. At the starting year only0.78 million KCC card

were issued by the banks but it progressed in subsequent years. The scope of this unique facility also includes term loans for agriculture and other allied activities and is a determining factor for consumption loan.

1.4.1 Rationale behind the Kisan Credit Card Scheme:

There are many problems faced by the Indian farmers in the procedure of obtaining the adequate amount of credit from the banks. These hurdles are, long processing and lengthy documentation, typical practices followed by banks and other financial institutions, unawareness among farmers regarding banking benefits and delay in disbursing of credit. Most of the Indian farmers depends upon the informal institutions for purchasing the inputs and other consumption requirements. These non-institution credit negatively affects the welfare of farmers because of costly and counter-productive credit. The Kisan Credit Card scheme tries to remove all these complications so that it can provide the cost effective and timely credit to farmers from the reliable banking institutions.

1.4.2 Working of Kisan credit card

The process and procedure of KCC of credit disbursing is very easy and straight-forward. The KCC is issued on the basis of operational land holdings and the farmer should also have the good history regarding the repayment of credit. After receiving the credit through KCC the farmers gets the other facilities like passbook with the farmer's name, validity period of credit, address of farmer, credit limit, particulars of land holdings etc. for the unique identity of customer. Now these Kisan credit card can be converted into credit cum debit card. With the help of Kisan credit-cum-

passbook farmers can withdraw the amount from their account according to their requirements.

1.4.3 Features of Kisan credit card scheme

The following are the main features of Kisan credit card:

- Credit is given to the farmers in order to meet the financial needs of agriculture and allied sector.
- It delivers the protection to the crops from the pest effects and other natural calamities.
- It also provides credit for crop production and other consumption requirements.
- The KCC disbursement is done through various delivery channels like ATM and mobile phones.
- Kisan Credit Card holder are also covered with KCC insurance policy.
- In some cases collateral security is to be provided. If the loan amount is above Rs. 100000/-, then the cardholder has to pledge his land as mortgage and hypothecate the crops raised on it.
- The eligible farmers for the Kisan Credit Card, have facility with a passbook or a card-cum-pass book.
- Sub-limits may be fixed by the banks.
- The credit limits are fixed on the basis of the farmers land holding.
- Credit card can be valid up to 5 years ,based upon annual review
- According to the change in cropping pattern and increase in costs of production the credit limits will be increased in future as per the requirements.
- Repayment of loan amount can be made within 12 months.

- Operations performed regarding the KCC may be through PACS in case of Cooperative banks or issuing branch in case of other banks, at the sole discretion of bank.

- The credit given through KCC may be conversable or rescheduled in case of damage to the crops due to natural calamities.

- RBI sets the security, margin and rate of interest according to its norms.

- Repayment options are flexible.

- Disbursement procedure of KCC scheme is hassle-free.

- For all the agricultural needs only single credit facility is available.

- It decrease the burden of credit interest from the shoulder of farmers.

- It helps in availing cash discount from merchants or dealers.

- The determination of credit limits also depends upon agricultural income.

- No restriction is made on cash withdrawals up to credit limit set by banks.

- In KCC loan interest rates set are lower

- Repayment of loan can be made one time over the harvest season.

- Credit is given for annual agricultural expenses.

- Maximum flexibility and minimum documentation is there in KCC scheme.

- Credit amount can be withdrawn from any branch of banks.

1.4.4 Rupay Kisan Card

Rupay Kisan Card was introduced on 24th November 2012 in order to help farmers. In this scheme, to purchase the required and necessary inputs farmers can directly transfer their credit amount into their account without any delay. The benefits of Rupay Kisan Credit Card are as follows:

- It can fulfil all quick and current requirements of farmers.

- There is no entry fee for farmers.

- Rupay Kisan Card is very secured card due to security PIN code.

- For the credit card annual charges are very low.

- There is no need to go to PACS personally.

- Services in Rupay Kisan card are very quick and uninterrupted.

- Interest rate is low and repayment time is high.

Rupay Credit card can be used only by Kisan credit card holders and it is valid only in India

1.4.5 Rate of Interest and Collateral Requirement on Crop Loans

In terms of Govt. of India, 7% p.a. rate of interest is set for crop loans up to Rs.3 lakh. It also provides interest subvention of 3% p.a.to encourage farmers for repayment, thus making presence crop credit to them at 4% p.a. .Crop loans which are the beyond the limit of Rs. 3 lakh are being disbursed by the banks at the rate of interest charged by RBI norms and at the other terms and conditions approved by their Board of Directors. Up to the loan of Rs. 1 Lakh no separate security is require whereas beyond the loan of Rs.1 Lakh security is decided by RBI.

1.4.6 Use of the Kisan Credit Cards by the Farmers

Under this scheme, farmers can withdraw the loan amount in form of cash withdrawals using slips and the Kisan credit card-cum-passbook. Kisan Credit Card holders who have a credit limit of Rs. 25,000 can also avail cheque books.

Benefits to Banks:

Kisan credit card scheme is very favourable to the banks because it is time saving and cost-efficient scheme. There is no requirement to explain the documentation process and unbroken appraisals under the KCC scheme. It requires very little paper work. It is very hassle –free process for card holder as well as bank. There is no transaction cost and risk in recovery of loan is very less.

1.4.7 Top Banks Providing Kisan Credit Card in India:

- NABARD- NABARD provides credit or loan at easy terms and it is easy accessible to farmers to purchase the agricultural requirements and other consumption needs.

- SBI- SBI offers the short term credit to farmers for fulfil the credit requirement of agriculture and allied sector

- Bank of India- This bank gives the financial support to farmer to meet their cultivation expenses and other non-farm activities.

- IDBI- IDBI provides KCC to the farmers in order to provide crop loan, working capital and credit for investment for fulfilling agriculture needs.

- NPCI-National Payment Corporation of India will provide the Rupay Kisan credit card in near future. It acts as a part of its domestic card scheme.

1.4.8 Insurance under Kisan Credit Card Scheme:

PAIS is Personal Insurance Accident scheme who covers the farmers who are the customer of Kisan credit card scheme. At the event of death the farmer gets a personal accident cover of Rs. 50000 and 25000 Rs. in case of personal disability. For getting

the insurance, the customer should not have the age above 70 years at the time of getting the Kisan credit card.

1.5 Statement of the Research Problem

This study looked out the major agriculture reform in India comes as Kisan credit cards scheme, which makes the function of agricultural credit market very simplified. The aim of the policy is to remove all the agricultural related constraints on the poor farmers. But in the real situation only the privileged farmers takes the benefits of KCC scheme. The reason behind this is that the KCC loan is given on the basis of operational land holdings and prior goodwill to repay the loan. The farmers cannot get the repeat loan before the repayment of the loan. The trend of KCC scheme is not smooth because of many constraints like the repayment of the loan. A lot of loan amount is yet in debt. The marginal and poor farmers does not repay the loan amount on time because their income is based on agriculture and agriculture is based on monsoon .Due to these reasons the banks does not gives the Kisan credit before the repayment of the loan . So there are many problems in the progress of Kisan credit card. At the state level, all states are not equally based on agriculture sector, due to this the progress of agriculture credit also varies in these states. According to the AreendamChanda (2012) agriculture production (total yield kgs/hect) mainly concern with the labour productivity not on the land productivity. By concerning the above problems this study is related to the progress of KCC scheme so that this study can show the growth of KCC scheme and its impact on agricultural productivity.

1.6 Significance of the Study

The progress of this Kisan credit card scheme is useful in forecasting by providing the growth model which supports at the time of policy implications. This study will also tell the impact of credit on productivity that up to how much extent credit cards improves the productivity. This study also helps the policy makers by giving the new suggestions and recommendations. Further this study will serve as a useful reference for future researchers in this field.

1.7 Scope of the Study

The study re-examines the performance of Kisan credit cards in India through state - wise analysis. Data has taken from 2000-01 to 2012-13, which covers the 13 years data. The data for this study will be sourced from Trends and Progress of Banking in India (RBI), India stat. and NABARD database.

1.8 Objectives of the Study

The overall objectives is to assess the performance of KCC scheme in India. The specific objectives are as follows:

> To study the trend and performance of Kisan Credit Card Issued by three different agencies in India.
> To study the State wise progress of Kisan Credit Card in India.
> To find out the impact of Kisan Credit Card scheme on Agricultural Productivity in India.

1.9 Organisation of the Study

This study is divided into six chapters. By following the first introduction chapter, the second chapter is related to review of literatures. This chapter is related to the literatures related to the progress and performance of Kisan credit card scheme. In the third chapter Research methodology and data collection is discussed. In this chapter the research design and models included in the study are discussed. Chapter four consists of the trend and performance of KCC issued agency-wise and also contains the state-wise progress of KCC. Chapter fifth shows the impact of KCC scheme on agricultural productivity. Lastly chapter sixth is devoted for major findings, recommendations, limitations and conclusion.

CHPTER 2
REVIEW OF LITERATURE

CHAPTER 2

REVIEW OF LITERATURE

2.1 Introduction

Kisan credit card scheme is a very essential scheme for farmers which disburse the loan at low rate of interest. The growth and progress of this scheme is very essential measure for our agricultural sector. Many scholars have acknowledged the importance of progress of Kisan credit card scheme.

2.2 Empirical Literature

Mehta (2016) this paper focused towards the role of Kisan credit card scheme in providing rural credit in India. This study has taken the secondary data from the NABARD Journal, RBI Reviews and occasional papers. According to this paper Kisan credit card emerged as the most popular credit facility among farmers. This paper also suggested that for the minimisation of brokers role the process of obtaining the loan should be make easy so that sufficient money can be given for the benefits of farmers. Database of the real and needy farmers should be made so that the loan can be given to those farmers who actually needs this loan. The banks should concentrate those areas who have poor performance of Kisan credit card scheme.

Chatterjee (2015) this paper showed the effect of Kisan credit card on outcome of farming. This paper used the panel data to analyse the effect of credit card on farm output. In this paper the analysis was done on the production of wheat, rice, maize and high yield variety seeds. The data for the study was collected by the two main

sources, ICRISAT-VDSA and IHDS (Indian Human Development Survey).District panel data set was collected from ICRISAT-VDSA and household survey data was collected with the help of IHDS.

Reetu (2015) this paper explored the trend and progress of Kisan credit card in India issued by different agencies between the years 1998-99 to 2012-13. The information related to this paper was collected through secondary data. Compound annual growth rate and percentage method was used for analysing the study. According to this paper the largest amount of Kisan credit card issued by the Commercial banks whereas the peak of Cooperative banks was going on decreasing. This research concluded that all the amount of Kisan credit card disbursed by all the three institutions is on increasing. This paper suggested that for the growth of this credit scheme there is a need to educate the farmers and they need to be encouraged to adopt this scheme for betterment.

Marichamy and Ananthi (2014) this paper studied the agency wise performance of Kisan credit card scheme and studied the features of Kisan credit card scheme. According to this research paper 10.09 crore card issued by three banks up to 2011.The numbers of card issued in some states are more than five lacks (Andhra Pradesh, Maharashtra, Rajasthan, Orissa, Karnataka, Gujarat and Utter Pradesh). The performance of KCC in other states is also satisfactory. In the Andhra Pradesh state 2325card issued by the banks. As the end of March 2013, there was 1, 29, 82,000 farmers who have taken the loan under Kisan credit card scheme.

Raja Mohan and Subha (2014) According to this research the KCC scheme is an

easy access to agriculture credit to the farmers from the financial institutions. This scheme was made for the uniform credit delivery, adequate and timely supply of credit to the farmers to fulfil their agricultural requirements. Farmers almost depends upon non institutional sources of credit, the reason behind this is that the frequent needs, inadequate supply of institutional credit, unnecessary delays and improper practices used by the institutional credit lending agencies. The provision of acceptable and timely credit has been one of the big challenges for the credit institutions in India. This study taken the data from 2009 to 2013. The conclusion of the study shows that there is the significant increase in the number of Kisan credit card issued in every year by different agencies. This continuous growth progress in implementation of KCC clearly examines not only the forethought and ability of the Indian banking industry to adopt new concepts but the easy access of the farmers to new thoughts so as achieve financial inclusion. During the study period, 100526 numbers of cards issued due to the development of banking system. During the 2009 to 2012 the Indian bank, Canera bank and Indian overseas banks were not involved in KCC activities but during 2013, all these includes the KCC scheme. This proved the growth and financial inclusion of KCC scheme of bank.

Sarkar and Barman (2014)this paper presents the progress and performance of Kisan Credit Card in Assam state. This paper presented the inter district variation across the Assam during the distribution of KCC. For the collection of primary data, the sample of 80 beneficiaries collected from the Kamrup District of Assam .The secondary data was collected from the Annual Report of NABARD, Economic Survey of Assam and SLBC Meetings Report. This study concluded that the performance of Kisan credit card in Assam district is not so much of impressive. Many obstacles were

faced by the farmers during the disbursement of Kisan credit card. In the Assam state only 20 percent progress achieved by the Kisan credit card scheme.

Meena and Reddy (2013) this paper examined the growth in KCC card issued, pattern of credit adopted by the farmers and its impact on farmers income and the problems faced by kcc holders across the Karauli district in Rajasthan State, India. This study used the primary and secondary data for the research between the periods 2001 to 2011 for examining the objectives. The stratified Random Sampling was used for the selection of samples. The number of farmers selected for study was 120 and data was collected through pre-tested questionnaire. The results showed that the KCC numbers issued from the past ten years was positive and is increasing in Commercial banks and Regional Rural banks whereas Cooperative banks are showing decreasing trend. This paper also concluded that the largest source of credit to the farmers, which sanctioned Rs. 8,156 lakh (77.23%) of the total credit given to the farmers by the banks. The results showed that the income of the KCC holders is 25 to 30% extra than the non-KCC holders. This gap in income is due to the better quality input material in agriculture operations by the KCC holders. However this study also tells that the rate of interest was high in Non-KCC cards. Hence this paper suggests that there is a need to start the new activities related to crop production while fixing the credit limits of KCC.

Prakash (2013) this study is done in the Tamilnadu state regarding the Kisan credit card issue and problems faced by the farmers during the adoption of Kisan credit card scheme. This paper also analysis the impact of this scheme on farm economy of Tamilnadu state. The primary data for study was collected through structured schedule

among the 32 districts of Tamilnadu where the agricultural economy was relatively better than others and yet there was minimum number of Kisan credit card issued. Compound annual growth rate was used for the progress of KCC whereas Binary Logit model was used for knowing the factors which influence the adoption of the scheme. In this study RRBs found to be the highest bank for the Kisan credit card disbursement. The growth rate of Kisan credit card for all three agencies was found to be positive but the performance of KCC scheme was not uniform across the Tamilnadu state.

Sharma, Chaudhary and Swarrnakar (2013) according to this paper, for the growth of rural and urban areas of country the Indian government has been introducing many schemes and the KCC is one of them. In this study the impact of KCC scheme among the beneficiary farmers is studied in the Sehore district of M.P. The primary data was collected from the selected 120 respondents through survey method with the help of interview schedule. The impact of KCC scheme was measured in terms of monetary gains among the beneficiaries. Due to the KCC loan the highest increase in yield was with the Wheat crop which is the most important crop of Indian agriculture.

Bista (2012) this paper was studied the performance of Kisan credit card in India by finding the share of KCC in total amount of credit disbursed to agriculture sector. The circulation of credit through scheme has been examined from three types of financial institutions cooperative banks, regional rural banks and commercial banks in terms of total amount, membership enrolment and amount per card. The study was based upon primary and secondary data. The primary data was collected from the 60 beneficiary farmers of Samastipur district of Bihar. To assess the efficiency among the Cobb-

Douglas production function was used. The region wise study has showed that there is huge disparity in the performance of three credit institutions. The study also depicted a same situation in the Bihar districts in terms of amount, number of cards issued and amount per card. The KCC beneficiary have been found higher margin in gross returns as compare to non-beneficiary farmers.

Chanda (2012) this paper presents the evaluation of KCC scheme in Bihar and India. This study has taken the data from 2004-05 to 2009-10.This paper critically examines the determinants which are the cause of the KCC lending in India and Bihar. This study is based upon the secondary data taken from the RBI's Annual Trend and Progress of banking in India. For measuring the outcome, three major indicators had been taken – real state net domestic product per capita, food grain yield and agriculture GDP per worker. This study concludes that there is some relationship between the KCC lending and agriculture sector. In case of Bihar and BIMARU states, the main conclusion is that the degree of KCC adoption mostly depends upon state specific factors which have no correlation to their agriculture sector.

Dhanabhakyam and Malarvizhi (2012) according to this paper Kisan credit card starts with three sub limits production, consumption and assets management needs. In this paper the study was done about the awareness of Kisan credit card among Kisan credit card holders and their attitude towards KCC with practical problems. In this paper the extent of utilisation was studied in Coimbatore district. The primary data was used with 66 respondents as sample size. This study concluded that agriculturists in Coimbatore area ware well aware of Kisan credit card and utilising this loan in an efficient manner.

Sajane (2011) in this paper the objective was to examine the cost of credit and growth in numbers of KCC users .This study also checked the fairness of credit provided under KCC in comparison to non-KCC. The study used the secondary data for card issued and amount sanction. The primary data was used for the study of borrowing, cost of borrowing and interest with a sample size of120 farmers among which 60 farmers have KCC and 60 farmers have non KCC credit. The study conclude that the growth of KCC was negative (-393.38%) in Belgaum district and was positive in Sangali district (36.18%). The total cost of credit was higher in non KCC category (11.06%) as comparison to KCC (4.77%). It was also concluded that the credit given by the banks for cash crops was more than the food crops.

Sirisha and Malpadri (2011) their study examined the KCC issued by different agencies and their attainment in financial inclusion. The study was based upon secondary data collected from the publications of RBI (Report on Trend and Progress in banking in India, 2009-2010). In the research methodology they have used the compound average growth rate and percentage method for analysis. The study showed that the 936.72 lakhs KCC issued till end march 2010, the highest percentage have been issued by the commercial banks. The share of commercial banks was maximum (45.22%) in total KCC issued, cooperative banks 40.45% and RRB 14.33% during the study period. This study founded that the bad financial position of cooperative banks and RRBs is lack of infrastructure was the obstacles in the way of credit facilities.

Kumar, Singh and Sinha (2010) "Institution -al Credit to Agriculture Sector in India: Status, Performance and Determinants" said in his paper that the highest

intensity in distribution of KCCs was observed in Punjab (2.02). The distribution of KCCs was more than two-times the number of operating households in Punjab. Some other states which have distributed more number of KCCs than the number of farming households are: Haryana (1.44), Andhra Pradesh (1.06) and Orissa (1.04). The performance of states like Assam, 13 Bihar, Himachal Pradesh and Jammu & Kashmir in distribution of KCCs has been dismal. For instance, only 5 per cent of the farming households in Jammu & Kashmir and 13 per cent in Assam have obtained KCCs. In Bihar and Himachal Pradesh, only about one-fourth of the farming households have received KCCs. The density of KCCs in terms of operational area varied from 0.07 / ha in Jammu & Kashmir to 1.76 / ha in Kerala.

Barik (2010) in his study "Kisan credit card scheme – a dynamic intervention for reduction in rural poverty" opined that realising the importance of enhancement of flow of credit to the rural sector and reduction of the dependence of farmers on non-institutional sources of credit. Impact upon the efficiency of rural credit delivery system

Chandra (2010) "Part Of Farmers' Club As A Model Micro Finance Institution For Rural Areas: A Case Study Of Some Selected Farmers' Club Operating In Assam, India" he concentrated on that The clubs are assuming acknowledgment from the financiers chiefly as KCC (Kishan Credit Card) plan took after by GCC (General Cash Credit) and the KCC is more well known for its straightforwardness in getting the card by them. The little business people began taking credit by utilizing KCC to fund their transient necessity and with the end goal of effortlessness and motivating forces connected to it.

Roy and Jena (2010) in their study on "Kisan Credit Card a Bailout from Hassle of Agricultural Credit: An Evaluation of working of KCC Scheme in Orissa through Cooperatives" said that following the commencement of the KCC Scheme the Cooperative banks in Orissa have issued an aggregate number of 29,17,307 KCCs to rancher individuals up to walk 2008. The offer of Cooperative banks if there should arise an occurrence of issue of KCCs is 78.90% which is much higher in contrast with business banks (11.61%) and RRBs (9.49%).

Samantara (2010) this study reviewed the progress of KCC scheme in India. For the analysis the data has been taken from both primary and secondary sources. The survey was conducted in 14 states of India. 178 bank branches were selected for sample. OLS method was used for the analysis.

Sarangi, Umesh(2010) "Report of the Task Force on Credit Related Issues of Farmers" in his report said that Internal district reports of NABARD also bring out the weaknesses in the implementation of the scheme in terms of not providing cheque book withdrawal facility to KCC-holders, restrictions on number of transactions, fixing low credit limit by some bank branches and significant differences in service as well as inspection charges levied by banks. Such weaknesses in implementation arise from a lack of understanding of the spirit of the scheme by the bank branch officials.

Kamble (2009) this paper presents the role of Kisan credit card scheme in the benefit of small farmers. The objective of the paper was to study the features of KCC launched by three banks and to study agency wise and state wise performance of KCC

.this paper concluded that Kisan credit card have the best features of credit product like most innovative, highly appreciated and widely accepted banking product. This paper studied that RRBs had issued 4.05 lakh cards and achieving 81.2 percent of the annual target. Commercial banks and Cooperative banks target was very high compared to RRBs. This study told that 12 states was excellent in the performance regarding to Kisan credit card. This paper also suggest that the banks should concentrate more on the zones which have poor performance regarding the Kisan credit card coverage.

Karmakar (2008) "Agriculture and Rural Development in North-eastern India: The role of NABARD" he studied that the scheme made tardy progress during the initial period of its implementation in the NER. The compound annual growth rate of number of cards issued in the region during the period 2002- 03 to 2006-07 was 54.3 per cent as against the national average of 20.1 per cent. The amount sanctioned during this period for the NER (North-Eastern Region) grew at 64.5 per cent per annum as against 29.9 per cent for the country as a whole. Testimony to the increasing popularity of this credit product innovation in the region

Satyasai(2008) in the paper "Rural Credit Delivery in India: Structural Constraints and Some Corrective Measures" tells that the Kisan Credit Card changed the farmer's accessibility to bank credit. However, some areas of concern remain to be addressed like low level of awareness among farmers which reference to the right use of KCC, inoperative accounts, etc.

Singh, Gangwar and Singh (2008) in their paper entitled "Economics of Sugarcane-

based farming system in Western Utter Pradesh" said that the marginal and small farmers were more dependent on non-institutional agencies for credit. It can be interpreted that large farmers were sounder financially than other farm categories. It was also observed that about 79 per cent farmers were not having Kisan Credit Cards (KCC), i.e. only about 21 per cent farmers were holders

Anjanikumar et al. (2007) assessed the execution of provincial credit stream in India, and distinguished the variables that impacted the decision of credit outlet and the ownership of Kisan Credit Cards by rustic family units. Utilizing NSS information for the years 1991-92 and 2002-03, it was uncovered that get to and circulation of country credit, when all is said in done, expanded however was skewed for more created states and inside these towards better-off family units. The poorer family units were more subject to non-institutional wellsprings of fund. The utilization of Kisan Credit Card was empowering and its appropriation was less skewed. Age, male-headed family units, family unit size, ranch size, level of instruction, and independent work in horticulture showed up as huge variables decidedly deciding the decision of institutional wellsprings of credit and ownership of Kisan Credit Cards.

Golait, Ramesh (2007) "Current Issues in Agriculture Credit in India: An Assessment" said in his paper that The KCCS has emerged as the most effective mode of credit delivery to agriculture in terms of the timeliness, hassle free operations as also adequacy of credit with minimum of transaction costs and documentation.

Kainth, Singh (2007) in this paper entitled "Advancement in Rural monetary framework" said that plan has been stretched out to cover sharecropper, oral tenants,

ranchers to recover obligation from casual sources, other than giving long haul and additionally utilization credit amid the period from 2001-02 to 2005-06 banks gave 59,093,000 Kisan Credit Cards to agriculturists to encourage them to buy ranch inputs and different prerequisites. Offer of business banks was 37% as against co-agents and RRBs at 5 percent and 12 percent separately.

Khan, Mahmoodand.Ali (2007) this paper was to analyse the impact of short term credit scheme of ZaraiTarraqiati Bank Limited on farm production. The study was conducted in four villages of district Karak in year 2005-06. The objective of this paper was to know the distribution of short term credit of ZTBC in district Karak and its effect on farm production. This study was based on primary data collected through questionnaire method. This paper concludes that the short term credit has increased the production per unit area. However the amount which was given to the farmers that was not enough to fulfil all requirements of the farmers.

 Kumar (2007)in the article "Kisan Credit Cards becoming increasingly popular with farmer" stated that The RBI report also stated that Andhra Pradesh, Karnataka, Maharashtra, Madhya Pradesh, Rajasthan, Orissa, Uttar Pradesh and Tamil Nadu showed better implementation of the scheme and accounted for more than 75 percent of the total credit cards issued by the banks. Goa, Jammu and Kashmir, Himachal Pradesh, Sikkim and other North Eastern states showed a relatively sluggish growth.

Pandey in his book "Provincial Development" said that the scope of little and minor ranchers has been acceptable. The scope of scope is from 33% to penny percent. Along these lines on the off chance that this specimen is taken as a 12 illustrative of

national scene, it is entirely fulfilling to note that little and minimal agriculturists have been enough secured under Kisan Credit card plan by banks.

Radhakrishana (2007) "Report of the Expert Group on Agricultural Indebtedness" said his report that the share of agriculture in total bank credit of the scheduled commercial banks fell below the 18 per cent target. In recent years, in response to the agrarian crisis, there have been a number of initiatives to expand credit to agriculture such as the doubling of credit within three years, the issue of Kisan Credit Cards (KCCs), the introduction of institutional agencies such as agency banking and extension of the model of Self-Help Groups (SHGs) to farmers, the revitalization of the cooperative credit structure and the Government's acceptance of the principle of inclusive banking.

Ram Kumar and Chavan (2007) this paper examined the credit given by different banks. This paper also finds the role of credit in agriculture sector. This study finded that in 2004 it was only the beginning of credit revival whereas the actual revival started after 2000. This increase in credit covered the farm lending by increasing the share of indirect finance. According to this paper the sharp increase in financing increased the share of large size agribusiness enterprises rather than the small farmers

Dubey (2006) concentrated on the reception of KCC in Uttar Pradesh among various areas and social classes. He found that subsequent to there was uneven improvement of various districts and social classes, the entrance to a standout amongst the most essential advancement (KCC) was not even all through the state. Just land and 11 family unit size had constructive association with likelihood of a man of being a KCC holder. He recommended that, if the waste area was made cultivable to weaker

segment of society then there may be significant change regarding even circulation of KCC in the state.

Fayaz, Mohammad et al. (2006) concludes that ZTBL credit scheme had positive effect on crop production and income of growers and it is likely to be an effective tool for development of agriculture provided the distribution of credit is made with justice and the procedures are made easy.

Trivedi (2006) inspected the status of KCC in Madhya Pradesh and presumed that lone 40 for every penny of aggregate 65 lakh agriculturists have been circulated KCCs in the state against focus of covering every one of the ranchers by March 31, 2004. But bank of Rajasthan no private bank had issued any KCC to the agriculturists. Out of 4, 17,314 cards issued, business banks issued 1, 80,745 cards, RRBs issued 63,002 cards and co-agent banks issued 1, 73,567 cards.

Sidhu and Gill (2006) analysed issues of agricultural credit and indebtedness in India. They concluded that farmer suicides were reported from those states which are relatively more advanced forerunners in commercial agriculture like Andhra Pradesh, Karnataka, Kerala, Maharashtra and Punjab. In Karnataka, farmer's dependence on informal sources of credit was quite high (31.10 %). In majority of the cases, the suicide victim farmers had used loan for investment in agriculture and belonged to the category of small and marginal farmers. This indicated breakdown of community sense and social support mechanism in the area of highly commercialized and competitive agriculture.

Kallur (2005) Conducted a study on "Impact of Kisan Credit Card on flow of credit and Repayment Rate in a Backward Region" the study showed that the actual loan amount varied from minimum amount of Rs.5000/- to maximum of 3 lakhs. Consumption needs, to the extent of 20 percent, are also considered in the scheme it was observed that though the amount of loan was sanctioned to every farmer immediately there was no prompt repayment involved.

Loganathan and Ashokan(2005) n their paper "Kisan Credit Cards Boon for Small Farmers" analysed the advancement of Kisan Credit Cards issued by different banks. That the banks Co-agents hold the main position and issued 2.08 crores cards. Rs.48982.51 crores advance was dispensed to the ranchers and per capita credit per Kisan ascertained to Rs.23049.28 in RRBs, 0.29 crores of Kisan Card advances issued to the agriculturists and Rs.8440.07 crores of advance sum dispensed. The per capita credit per Kisan card computed as Rs.29103.69 which is the most elevated per capita advance per Kisan card among the banks. If there should be an occurrence of Commercial banks 0.99 crores of Kisan Credit Cards issued and Rs.25309.99 crores of advance sums dispensed. The per capita credit per Kisan card ascertained as Rs.25565.66 which holds the second position, so far the banks issued 3.36 crores advance dispensed Rs.82731.57 crores. The normal per capita acknowledge Kisan card computed as Rs.24622.49.

Radhakrishna, Panda and Manoj (2005) in this study "Macroeconomics of Poverty Reduction; India Case study" showed that KCC scheme is a new step towards the progress of rural credit. An average of about 90 lakh KCCs has been issued during the past five years 2001-01 to 2004-05, taking the aggregate to 511 lakh. Hitherto, KCCs

were only for crop loans but in 2004-05, their scope was expanded to cover term loans. Hence, Commercial banks have replaced Cooperatives as the maximum issuers of KCCs.

Rao and Sahu (2005) there is a gap between the amount required and sanctioned for crop production and other activities. A number of farmers have diverted loan amount towards purposes other than for which it was taken.

Singh and Sekhon (2005) made a study on cash in benefits of the Kisan Credit Card scheme. The results revealed that major sources of the farm credit in the case of all the farm classes, was co-operative credit almost all these respondents were in the practice of availing of credit in kind in the form of fertilizer and also in pesticides. The average amount availed by per borrower showed increasing trend with increase in the farm size. But the number of medium farm KCC beneficiaries was comparatively lower at 65.75 per cent. Besides accessing co-operative credit 30.77 per cent of the small and 28.95 per cent of the medium KCC beneficiaries were observed to be still in the grip of money lenders.

Rao (2003) felt that the Kisan Credit Card Scheme went for giving sufficient and convenient backing to the agriculturists in an adaptable and practical way had not succeeded in its actual soul in light of different stipulations and limitations. Its operations appeared to be constrained to just buy of composts from altered 14 shops. A more rancher well-disposed MasterCard framework should be worked in order to understand the goals of the plan.

Subbiah, A. also, Selvakumar, M. (2005) in article "Territorial Rural Bank and agrarian Credit" Economic advancement of our nation can be accomplished just through inspire of the town society comprising of ranchers, farming works, artisans and so forth. Money being the soul of each business wander, accessibility of satisfactory assets at sensible term is an unquestionable requirement to safeguard quickly monetary advancement of a town. Among the different institutional offices occupied with country fund, territorial provincial bank assumes a critical part in monetary the objective gatherings in rustic area.

Jaya Sheela&Bindar (2000) in their study "Rural Finance" examined the problems of over dues and the reason for non-repayment of loan disbursed under different schemes from the RRBs in Karnataka. The study revealed that about 65 per cent of the beneficiaries had deliberately postponed the repayment of loans with the expectation that the Government would waive their loans in future. They observed that borrowers did not get credit in time and this led to misuse of credit. Owing to cumbersome procedures followed by the RRBs in sanctioning loans needy borrowers were forced to go to the private moneylenders than to the bank. Further, the borrowers had not been persistently asked to repay the loan.

2.3 Research Gap

Various studies in literatures have found which lead towards the progress and performance of Kisan Credit Cards and agricultural credit. In these literatures the performance of credit cards found to be good. But in reality the Kisan credit cards are not utilised by the farmers. So there is a need to know the performance of Kisan credit cards in India. This research paper will examine the performance of Kisan credit cards

among different states and will regress the impact of KCC scheme on agricultural productivity.

CHAPTER 3
RESEARCH METHODOLOGY OF THE STUDY

CHAPTER 3

RESEARCH METHODOLOGY OF THE STUDY

3.1 Introduction

This chapter is concerned with the methodology used during the study, it represented the type and source of data, tools and techniques and sampling methods used in the study. It also describes the process of data collection and analisation. As per the study concern secondary data has used in study to fulfil all three objectives of study. The three objectives of study are: to study the trend and performance of Kisan Credit Card Issued by three different agencies in India, to study the State wise progress of Kisan Credit Card in India and to find out the impact of Kisan Credit Card scheme on Agricultural Productivity in India. To fulfil the first and second objective of study data has taken since 2000-01 to 2012-13 .Because the unavailability of some period data for third objective data has taken since 2005-06 to 2012-13. Data has been collected from different sources. To make the study reliable and efficient year wise data has taken. Data has taken at macro as well as micro level. To fulfil first and second objective CAGR (Compound Annual Growth Rate) and percentage of the total has used and to fulfil the third objective Multiple Regression has used with the help of SPSS software.

3.2 Methodology of Study

Methodology of study can be explained through following points.

- ➢ Agency wise trend and performance of KCC.
- ➢ State wise progress of KCC.

- ➢ Impact of Kisan credit card scheme on agricultural productivity.

- ➢ Data source of study

- ➢ Variables used in the study.

Three agencies have taken for analysis which are: RRBs, Commercial banks and Cooperative banks.

Agency- wise Trend and Performance of KCC

To fulfil this objective percentage growth rate and Compound Annual Growth Rate has used. For this analysis following formula has used:

Growth Rate = (Present Value- Past Year Value)/Past Year Value *100

CAGR is the rate at which something (e.g. revenue, savings and population) grows over a period of years, by considering the effect of annual compounding.

The formula for Compound Annual Growth Rate is:

CAGR=(Ending Value/ Beginning Value)^(1/(No. of years-1))-1

State- wise Progress of Kisan Credit card

State wise progress of KCC in India has analysed by taking the 15 states who major involved in KCC issuing in India. CAGR (Compound Annual Growth Rate) is used for seeing the compound growth because there are many fluctuations in year to year growth.

Impact of KCC Scheme on Agricultural Productivity

To see the impact of Kisan credit card scheme on agricultural productivity through number of Kisan credit card issued and amount sanctioned of KCC by the fifteen states. These fifteen states are Andhra Pradesh, Assam, Bihar, Gujarat, Haryana,

Karnataka, Kerla, Madhya Pradesh, Orissa, Punjab, Rajasthan, Tamilnadu, Utter Pradesh and West Bengal which are representing the above the 70% of total KCC issued and amount sanctioned in India. Agriculture productivity has taken as dependent variable and KCC amount sanctioned and number of KCC issued have taken as independent variables. For the analysis of this objective the Multiple regression has done in SPSS software.

Multiple Regression is further extension of simple linear regression. It tells about the relationship between one dependent variable and many independent variables. It tells about the change in one dependent due to the other independents.

Regression equation

$Y = a + b_1 X_1 + b_2 X_2 + \ldots\ldots\ldots + b_n X_n$

Where

Y = dependent variable

a = constant or intercept

b_i = Coefficient

X_i = independent variable

3.3 Data Source of the Study

To fulfil the above objectives of study various data sources have used. Data has collected from NABARD database, Report on Trend and Progress of Banking in India (RBI) and India stat.

3.4 Variables used in Study

For the analysis various variables are used in the study. Numbers of Kisan credit card issued, amount of Kisan credit card sanctioned and agricultural productivity are taken as variables in the study. Number of KCCs issued and Amount of KCCs sanctioned are taken as independent variables. The agricultural productivity (Total Food grains per hectare) is taken as dependent variables.

CHAPTER 4

TRENDS, PERFORMANCE AND PROGRESS OF KISAN CREDIT CARDS

CHAPTER 4

TRENDS, PERFORMANCE AND PROGRESS OF KISAN CREDIT CARDS

4.1 Introduction

This chapter includes two objectives of study. In this section a detailed analysis of first objective is done i.e. the trends and performance of Kisan Credit Card scheme issued agency-wise in India. In this we will discuss the growth of number and amount issued by three different agencies, these are Cooperative banks, RRBs and a commercial banks. This study has taken only these three banks for the trend because only these banks are those public sector banks who issues Kisan Credit cards. To check the growth rate in no of KCC, we applied Compound Annual Growth Rate (CAGR). The study covers the data between the time periods of 2000-01 to 2012-13. The trends of number of Kisan credit card issued and amount sanctioned is shown by two different tables; table no. 2 and table no. 3.

To show the state wise progress of

Kisan credit card (second objective) this study have taken the fifteen states who contribute the 70-80% of KCC issued and amount sanctioned. These fifteen states are those whose economy are based on agriculture or who have the more land for agriculture purpose. These fifteen states are as follows: Andhra Pradesh, Assam, Bihar, Gujarat, Haryana, Karnataka, Kerla, Madhya Pradesh, Maharashtra, Orissa, Punjab, Rajasthan, Tamilnadu, Utter Pradesh, and West Bengal. All these states represents the major amount of Kisan Credit card issued in India.

4.2 Number of KCCs issued Agency wise

Kisan credit cards are issued by three agencies .The number of Kisan credit cards issued by the banks shows the growth and performance of Kisan credit card in India. The numbers of credit card issued through KCC scheme are given below:

Table:2 Number of KCCs issued Agency wise (in Millions)							
Year	Coop.	G.R.	RRBs	G.R.	Com.	G.R.	Total	G.R.
2000-01	5.61	__	0.65	__	2.39	__	8.65	___
2001-02	5.44	-3.03	0.83	27.69	3.07	28.45	34.00	293.0
2002-03	4.58	-15.81	0.96	15.66	2.7	-12.05	8.09	-76.20
2003-04	4.88	6.55	1.28	33.33	3.09	14.44	49.13	507.0
2004-05	3.56	-27.05	1.73	35.15	4.4	42.39	17.79	-63.78
2005-06	2.6	-26.97	1.25	-27.74	4.17	-5.23	-46.69	-362.3
2006-07	2.29	-11.92	1.41	12.80	4.81	15.35	9.38	-120.1
2007-08	2.09	-8.73	1.77	25.53	4.61	-4.16	25.26	169.1
2008-09	1.34	-35.89	1.41	-20.33	5.83	26.46	-47.64	-288.5
2009-10	1.74	29.85	1.95	38.29	5.31	-8.92	77.14	-261.9
2010-11	2.81	61.49	1.77	-9.23	5.58	5.08	62.42	-19.09
2011-12	2.96	5.34	1.99	12.42	5.12	-8.24	27.83	-55.41
2012-13	2.69	-9.12	2.04	2.51	8.24	60.94	6.36	-77.15
CAGR	-5.4%		11%		10.8%		10.8%	
Coop.=Cooperative banks, Com.= Commercial banks								
Source: NABARD, G.R. means Growth rate								

The above table no. 2 shows the number of Kisan credit cards issued by three agencies; Cooperative banks, RRBs and Commercial banks and also shows the percentage growth rate (G.R.) of these banks. In the year 2000-01 the highest number of KCCs are issued by Cooperative banks (5.6 million) followed by Commercial banks (2.39 million) and RRBs (0.65 million) shows the lowest number of KCCs issued. The Cooperative banks shows the declining performance during 13 years except the period 2010-11, in this year the Cooperative banks shows the highest percentage growth share. In the year 2012-13 the Cooperative banks shows the declining growth rate of -9.12 percent.

In case of RRBs, year to year these banks are performing well in case to KCCs issuance. During the year 2005-06 (-27.74%), 2008-09 (-20.33%) and 2010-11(-9.23%) the RRBs shows the declining growth in KCCs issuance. The highest percentage growth rate of 38.29% is shown during the period 2009-10 by the RRBs.

In the case of Commercial banks their performance in KCCs issuance was not good at the starting periods but with time these banks are come as the biggest agency for KCCs issuance. In the year 2012-13, the highest number of KCCs (8.24 million) are issued by Commercial banks and also it shows the highest percentage growth of 60.94%.During the year 2003-04 the highest percentage growth rate (507%) is shown by these three agencies, the reason behind this growth is that in this year the fresh crop loans are issued by the banks with the support of NABARD.

In the graph 2 we can see that RRBs and Cooperative banks are showing increasing trends whereas the Commercial banks are showing declining trends. In the year 2002-03 the number of Kisan credit cards issued are declining, the reason behind this is that in this year certain states faced through natural calamities and after that in the year

2003-04 the NABARD support the farmers to enable them to take fresh loans. In the year 2004-05, the Commercial banks and RRBs are showing increasing number of KCCs issued due to the introduction of SACP (Special Agricultural Credit Plans) made by public sector banks. After the year 2010-11, all these banks are showing increasing trends due to the introduction of Rupay Kisan Credit Card Scheme in 2012. Overall all these agencies are showing increasing trends and performance except few years.

The graphical representation of KCCs issued is shown below:

Figure no. 2 Number of KCCs issued Agencywise
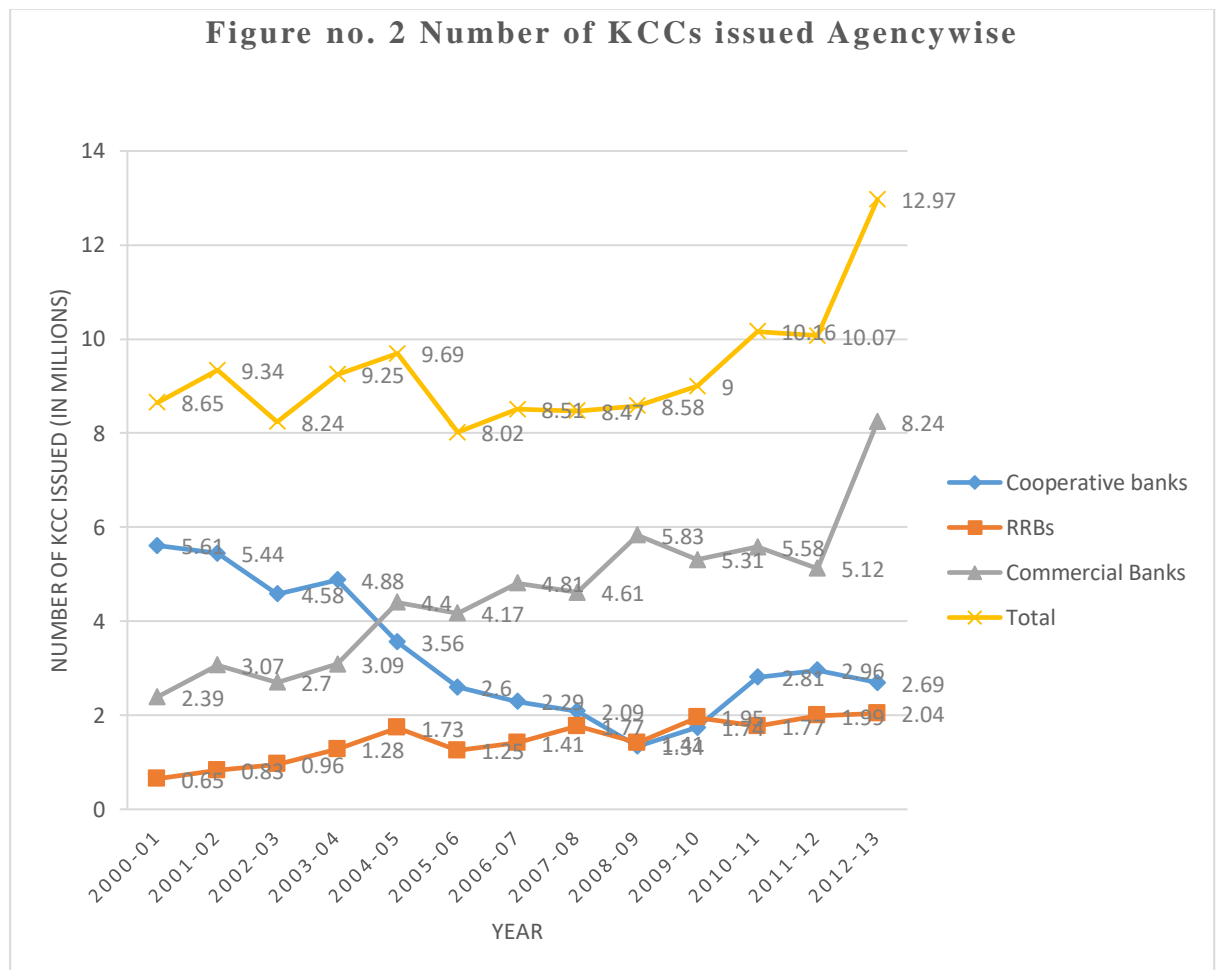
There is many variations in the number of Kisan credit card issued so in this chapter to find out the overall trend of these banks in KCC issuance CAGR method is used for the growth of three institutions. After applying CAGR method the study has found

that the Cooperative banks have negative growth from 5.4%. RRBs shows the overall growth of 11.00%. The Commercial banks shows the growth of 10.8%.The total growth showed by these three agencies from 2000-01 to 2012-13 through CAGR is 10.8%.

4.3 Amount of KCCs sanctioned Agency wise

The total amount of credit sanctioned by the KCC scheme shows the performance of KCC scheme in India. Amount of Kisan credit card issued by three agencies is given in table 3.

Table 3 : Amount of Kisan credit cards Sanctioned by Three Agencies (crore)								
Year	Coop.	G.R.	RRBs	G.R.	Com.	G.R.	Total	G.R.
2000-01	9412	____	1400	____	5615	____	16427	____
2001-02	15952	69.49	2382	70.14	7524	34.00	25858	57.41
2002-03	15841	-0.70	2955	24.06	7481	-0.57	26277	1.62
2003-04	9855	-37.79	2599	-12.05	9331	24.73	21785	-17.09
2004-05	15597	58.26	3833	47.48	14756	58.14	34186	56.92
2005-06	20339	30.40	8483	121.31	18779	27.26	47601	39.24
2006-07	13141	-35.39	7373	-13.08	26215	39.60	46729	-1.83
2007-08	19991	52.13	8743	18.58	59530	127.08	88264	88.88
2008-09	8428	-57.84	5648	-35.40	39009	-34.47	53085	-39.86
2009-10	7606	-9.75	10132	79.39	39940	2.39	57678	8.65
2010-11	10719	40.93	11468	13.19	50438	26.28	72625	25.91
2011-12	10643	-0.71	11523	0.48	69514	37.82	91680	26.24
2012-13	11930	12.09	13260	15.07	101090	45.42	126280	37.74
CAGR (%)	1.9		20.6		27.2		18.5	

Coop. = Cooperative banks, Com. = Commercial banks
Source: NABARD Publications

The table no. 3 shows the amount of KCCs sanctioned by Cooperative banks, RRBs and Commercial banks. In the year 2000-01, the highest amount is sanctioned by Cooperative banks (9412 crore) followed by Commercial banks (5615 crore) and lowest amount is sanctioned by RRBs (1400 crore). The total amount sanctioned by these banks in this year is Rs. 16427 crore. In the year 2001-02 the highest percentage growth rate is shown by the RRBs (70.14%) followed by Cooperative banks (69.49%) and then Commercial banks (34.00%). But after this the Cooperative banks shows declining trend in amount sanctioned except few years. In the year 2012-13, the Cooperative banks sanctioned Rs. 11930 crore and shows 12.09% growth rate.

In case of RRBs, the highest amount of KCCs sanctioned in year 2012-13 (13260 crore) and lowest amount of KCCs sanctioned in year 2000-01. This means that RRBs are showing increasing trends and performance in the amount sanctioned by the KCC scheme. Due the some reasons the RRBs shows the negative growth during few periods (2003-04, 2006-07 and 2008-09). During the period from 2004-05 to 2007-08, the Commercial banks shows the good performance in amount sanctioning. The reason behind this is that during this period the NABARD has started the new programme for growth of agriculture credit named by doubling of agriculture credit programme. Except the two periods (2002-03 and 2008-09), the performance of Commercial banks are good .During the year 2012-13, among all these agencies the Commercial banks sanctioned the highest amount of KCCs(101090 crore). The total

amount sanction in 2012-13 is Rs. 126280 crore and total highest percentage shown during the year 2007-08 (88.88%).

The figure 3 shows that the trends and performance regarding to the amount of KCCs sanctioned by the Cooperative banks, RRBs and Commercial banks. During the year 2003-04 the KCCs amount sanctioned declined due to the certain natural calamities in some states. The highest increase in amount of KCCs is shown during the year 2007-08. After this in year 2008-09, there is suddenly decrease in amount sanctioned by KCC scheme because in this year the banks have given the new responsibility called as Financial Inclusion as a new Mantra for rural sector and thereby opening the 'No Frill Accounts'. This scheme benefited the farmers and due to which borrowers under KCC scheme has declined. The performance of all the banks are good during these 13 years but the Commercial banks are showing declining trends due to the poor infrastructure and lack of technology up gradation. After the year 2011-12 the total amount of KCC sanctioned is on increasing due to the introduction of Rupay Kisan Credit Card scheme in 2012 which facilitate the farmer by providing credit without any delay.

The graphical representation of amount sanctioned in KCC scheme by three agencies are represented below:

Figure no. 3 Amount of KCCs Sanctioned
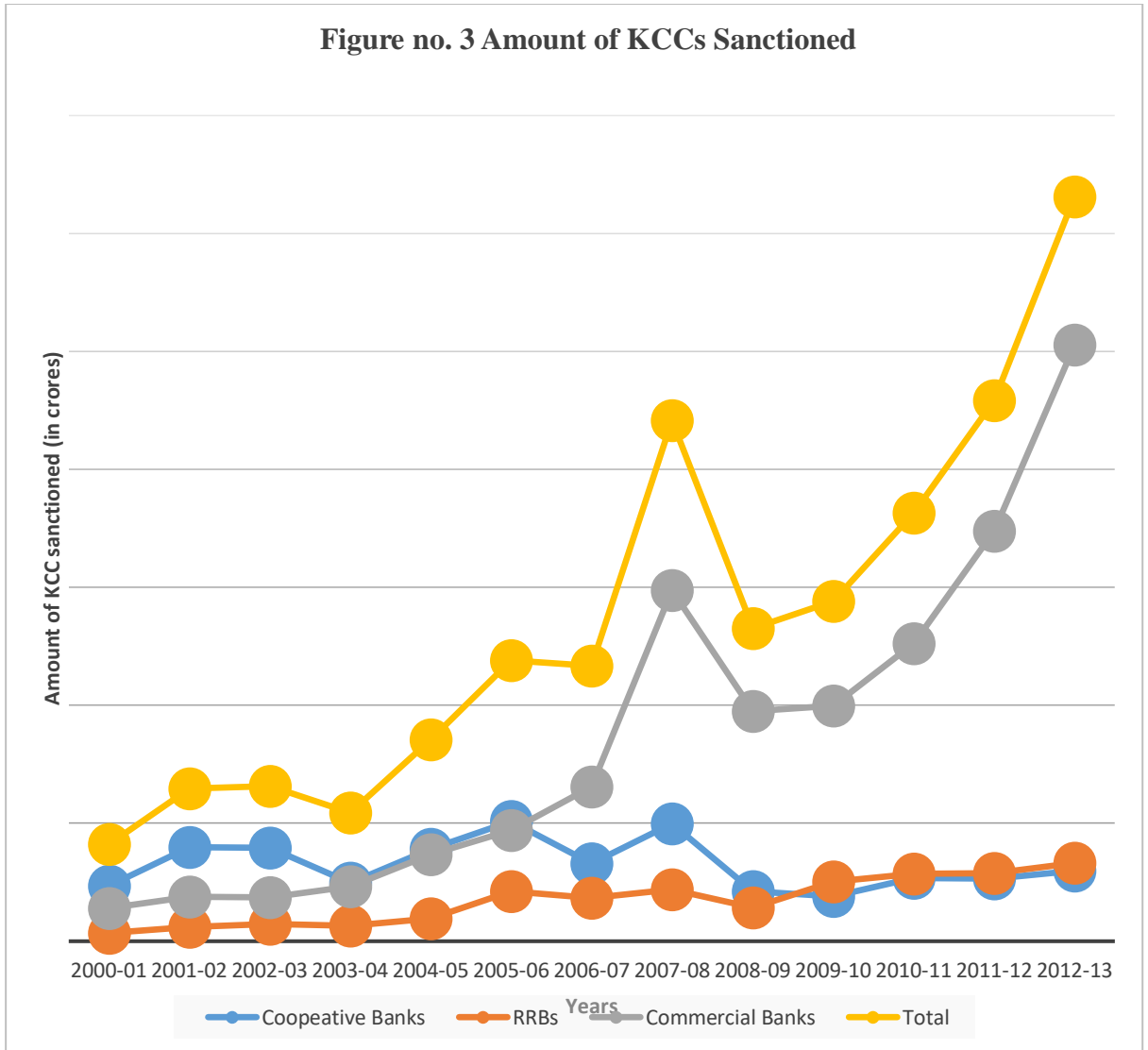
After applying the CAGR (Compound Annual Growth Rate) method for the compound growth over the years the Commercial banks shows the highest growth rate of 27.2% followed by RRBs (20.6%) and then Cooperative banks shows the lowest growth rate over the periods of only 1.9%.

4.4 State wise Number of KCCs Issued

The progress of KCC scheme is shown by the number of Kisan credit cards issued by fifteen states who contributes major number of KCCs issued. The progress of these states regarding to numbers of KCCs issues are shown below:

Table no. 4 Number of KCCs issued by state wise (in lakhs)									
	2006	2007	2008	2009	2010	2011	2012	2013	CAGR(%)
AP	13.5	13.78	12.14	144.3	155.8	18.98	14.14	23.25	8.1
Assam	0.65	0.34	0.48	4.63	5.68	1.17	2.51	2.21	19.1
Bihar	2.09	2.79	2.39	31.28	38.05	5.67	5.84	6.14	16.6
Gujarat	2.38	2.16	1.45	28.01	29.97	2.43	3.63	4.22	8.4
Haryana	2.53	1.10	1.54	23.48	24.92	1.48	1.91	2.00	-3.3
Karnatk	5.05	3.86	3.70	50.41	56.65	6.50	6.29	5.59	1.5
Kerala	2.40	3.17	3.53	31.24	34.66	3.01	3.42	3.66	6.2
MP.	4.97	3.73	4.03	51.51	57.77	6.27	8.41	7.24	5.5
Maharas.	7.78	10.87	8.81	79.19	86.97	7.26	9.46	10.71	4.6
Orissa	4.93	3.48	4.62	49.34	55.53	5.71	10.08	4.88	0
Punjab	1.79	1.14	1.20	22.30	23.98	2.13	2.14	2.82	6.7
Raj.	3.46	2.64	2.77	47.57	52.20	8.43	6.33	7.49	11.6
Tamil.	5.27	5.18	4.66	58.09	61.56	8.28	8.81	10.08	9.6
UP	1.33	13.58	14.26	154.2	171.1	13.48	19.43	20.27	6.1
W.B.	4.79	1.81	3.86	31.08	34.45	4.49	6.11	7.18	5.9
Total	74.94	69.70	69.50	806.680	889.34	95.29	108.51	117.81	6.6
Source: Indiastat.									
Karnatk = Karnataka, Maharas. = Maharashtra, Raj= Rajasthan,									
W.B.= West Bengal, Tamil.= Tamilnadu									

In the table no. 4 the total number of KCCs issued by the states are shown. In the year 2006, the highest number of KCCs are issued by Andhra Pradesh (1345804) and lowest numbers are issued by Assam (64963). In the year 2007, again Andhra Pradesh (1378365) is issued the highest number of KCCs and lowest numbers are issued by Assam (34117). During the next year 2008, U.P. (Utter Pradesh) is issued the 1426461 KCCs which are the highest in this year and lowest are issued by again Assam state (47638). In 2009 and 2010 again U.P. is issued the highest numbers of cards (15423000 and (17113000) and lowest are again issued by the Assam state (463000 and 568000). During the year 2011, Andhra Pradesh (1898000) takes the top position in number of KCCs issued and Assam is issued the lowest KCCs (117123). In the year 2012 U.P. (1943000) is issued the highest numbers of KCCs and lowest position is taken by Haryana (191000). During 2013, A.P. is issued 2325098 numbers of cards which are highest in this year and again Haryana is at lowest position in KCCs issuance with 200329 numbers of cards.

By doing the analysis through CAGR (Compound Annual Growth Rate), the study analysed that the highest compound annual growth rate is achieved by Assam (19.1%) followed by Bihar (16.6%), Rajasthan (11.6%), Tamilnadu (9.6%), Gujarat (8.4%) and A.P. (8.1%). The average growth rate is shown by Punjab (6.7%), Kerala (6.2%), U.P. (6.1%), West Bengal (5.9%), M.P. (5.5%) and Maharashtra (4.6%). The lowest growth rate is shown by Haryana (-3.3%) followed by Orissa (0%) and Karnataka (1.5%).

The graphical representation of number of KCCs issued by states are given below:

The figure number 4 shows the number of Kisan credit card issued by 15 states of India. The graph represents that U.P., A.P. and Maharashtra are the biggest states in number of KCCs issuance and Assam, Punjab and Haryana are showing the poorest situation in KCCs issuance. The graph shows that during the periods of 2009 and 2010, the highest numbers of KCCs are issued by all states. The reason behind this increase is that in the year 2008-09, Debt Relief scheme has stressed on need of making KCC technologically enabled which also includes the conversion of KCC into Smart cards. During the other periods the progress of KCC scheme is on an average.

Figure no.4 State wise number of KCCs issued
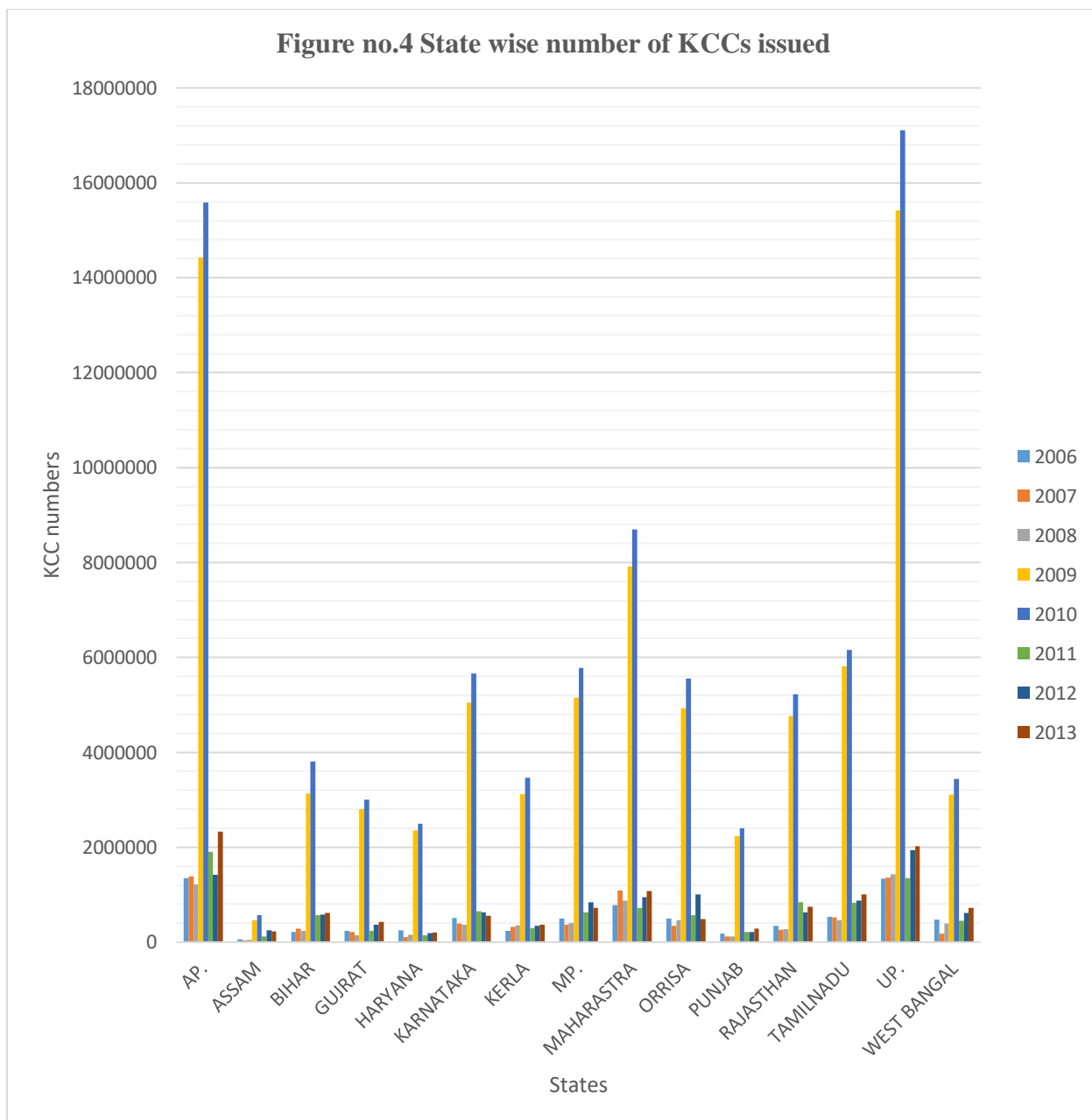
4.5 Amount of Kisan Credit Cards Sanctioned State Wise

The amount sanctioned by KCC scheme in India is represented by 15 states who shows the 70-80% of total amount of KCCs sanctioned by the institutions. This amount sanctioned by the states are given below:

Table no. 5 Amount of Kisan credit cards issued by state wise (in crores)

	2006	2007	2008	2009	2010	2011	2012	2013	CAGR %
AP	4504	63157	4169	38476	44036	8685	8890	15253	19.0
Assam	91	60	194	463	568	451	780	962	40.0
Bihar	642	992	984	10058	13256	3292	3710	3712	28.4
Gujarat	4152	4454	1606	41679	43723	2329	3430	5584	4.3
Haryana	3045	1531	2116	18358	20516	2456	3370	4849	6.8
Karnataka	7907	1707	1591	25260	28808	5615	5980	8256	0.00
Kerala	918	1103	1567	9831	11241	2647	3540	4488	25
MP	3460	2309	7564	27769	3220	5740	8440	9212	15.1
Maharas.	5101	4391	9786	42852	47197	4362	7280	12143	13.1
Orissa	2206	1663	2090	14011	15649	1497	1790	2115	0.00
Punjab	1964	1816	1816	21004	25068	5727	6720	11070	28
Rajasthan	3002	1873	1678	28556	34298	8176	7770	11498	21
Tamilnadu	1903	2363	1930	17594	20748	6573	9290	10688	28
Up	6537	6963	6419	50153	61629	9694	14040	15402	13
West Bengal	786	1144	3327	10816	12352	1940	2220	3926	26
India	46225	38693	46846	356887	382309	69184	87250	119158	14
Source: India stat.									

The table no. 5 shows the amount sanctioned by A.P., Assam, Bihar, Gujarat, Haryana, Karnataka, Kerala, M.P., Maharashtra, Orissa, Punjab, Rajasthan, Tamilnadu, U.P., West Bengal. During the year 2006, the largest amount is sanctioned by U.P. (653768 lakhs) and smallest amount is sanctioned by Assam (9109 lakhs). In the year 2007, A.P. shows the largest amount sanctioned which is Rs. 6317714 lakhs and smallest is sanctioned by Assam. During the year 2008, Maharashtra (978695 lakhs) shows the largest amount sanctioned and Assam sanctioned Rs. 19448 lakhs. In the year 2009, U.P. sanctioned Rs. 5015330lakhs which is the largest amount sanctioned during this year and lowest amount is again sanctioned by Assam (46300 lakhs). During the period from 2010 to 2013 the largest amount are sanctioned by Utter Pradesh (616290 lakhs, 969400 lakhs, 1404000 lakhs and 1540200 lakhs) and smallest amount is sanctioned by Assam state (56800 lakhs, 45100 lakhs, 78000 lakhs and 96200 lakhs).

By analysing through CAGR method, this study examines that the highest growth is achieved by Assam (40.03%) followed by Bihar (28.46%) Punjab (28%), Tamilnadu (28%), West Bengal (26%), Kerla (25%) and Rajasthan (21%). The average growth is shown by A.P. (19.03%), M.P. (15.1%), Maharashtra (13.1%) and U.P. (13%). The lowest growth is shown by Orissa (0%), Karnataka (0%), Gujarat (4.3%) and Haryana (6.8%).

The graphical representation is given below:

Figure no.5 State wise KCCs Amount Sanctioned
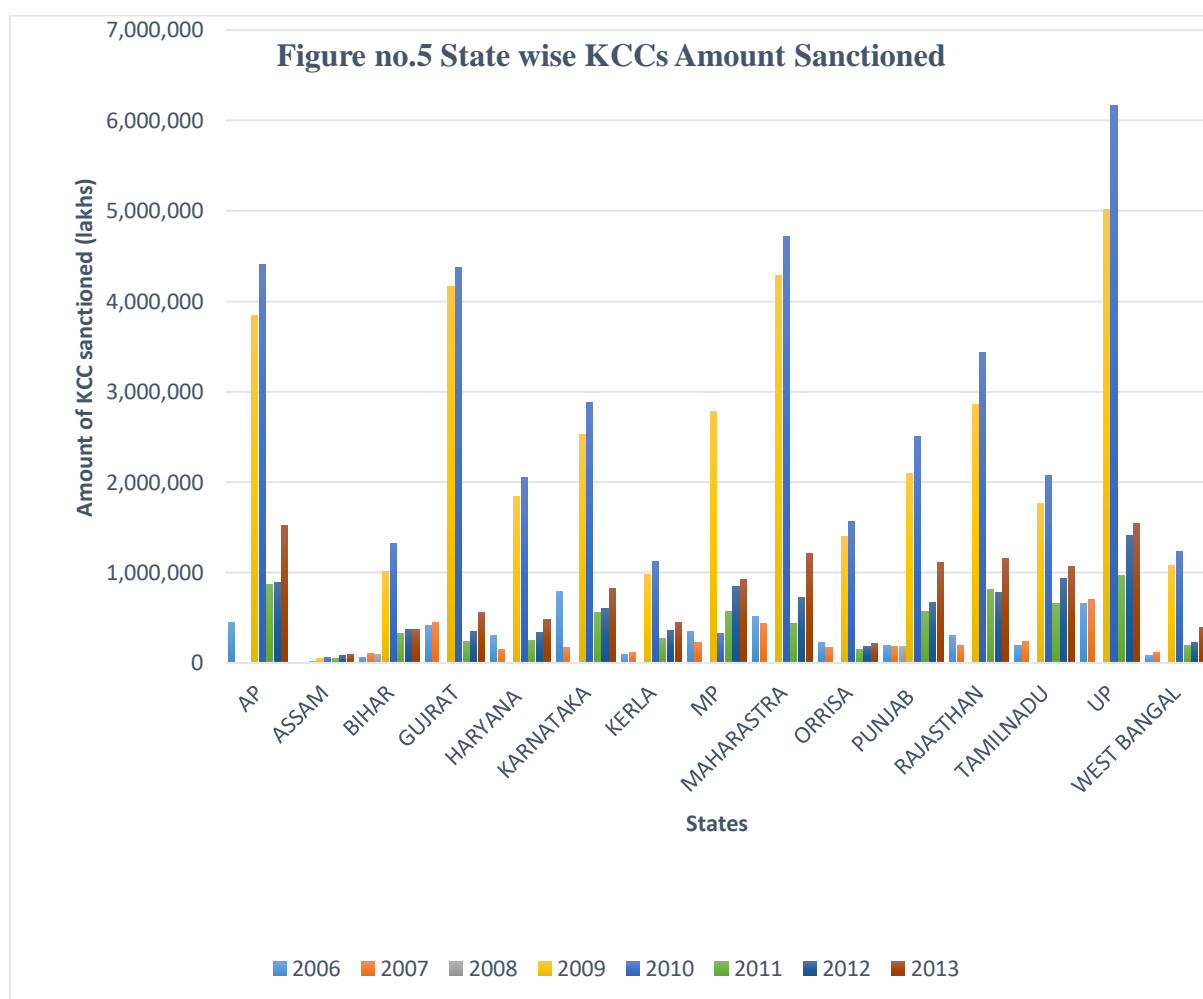
In the figure 5, state wise amount sanctioned through KCC scheme is shown. All the states are showing the well progress in amount sanctioning except some states. Utter Pradesh, Andhra Pradesh, Maharashtra and Gujarat are representing the best progress regarding the amount sanction through KCC scheme. During the year 2009 and 2010 the highest growth rate is achieved by all states due to a scheme introduction according to which there is given debt relief to the farmers and they are facilitated by

providing the new credit cards for the development of rural credit. Overall the progress of KCC scheme is satisfactory.

4.6 Conclusion

From the above analysis, it concludes that in terms of total credit card issued and total amount sanctioned in India by the three agencies, there is an impressive increase in Kisan credit card scheme till now which is very good for our economy .Overall the Commercial banks are at the top in the number of Kisan credit cards issuing and amount sanctioning. The Regional Rural banks performance is also satisfactory but the Cooperative banks are showing decline trends and performance. Some fluctuations are shown in the trends and performance of KCC scheme in India due to some reasons like the natural calamities, debt repayment and emergence of MFI (Micro Finance Sector) and other Self-help groups. Beyond all these problems the KCC scheme is showing increasing trends and performance. This chapter concluded that the progress of Kisan Credit Card scheme among these 15 states are good. In the case of number of cards the two states, Andhra Pradesh and Utter Pradesh are more above from other states and Assam is far below as comparison to other states but if we look towards the growth rate Assam growth rate is the highest among all the states and Haryana is at bottom with negative growth rate. In the case of amount sanction through KCC scheme, Utter Pradesh is sanctioned the highest amount and Assam is sanctioned lowest amount but in this also Assam shows the highest annual compound growth rate whereas Karnataka and Orissa shows zero growth rate. From this, it concluded that the highest KCCs are issued among those states who have the largest agriculture land. The progress of KCC scheme is not good in Haryana the reason

behind this may be the unawareness and debt repayment. Overall the progress of KCC scheme among all states is impressive.

CHAPTER 5

IMPACT OF KISAN CREDIT CARDS ON AGRICULTURAL PRODUCYIVITY

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IMPACT OF KISAN CREDIT CARD ON
AGRICULTURAL PRODUCTIVITY

5.1 Introduction

In this chapter impact of Kisan Credit Card scheme on agricultural productivity is analysed. For the analysis eight years data have been taken and Multiple Regression tool is used. For the examination of impact on agricultural productivity in India fifteen major states are taken -who contributes 70-80% in KCC scheme. The agricultural productivity (total food grains per hectare) is taken as dependent variable and number of KCCs issued (kccno) and amount sanctioned through KCC scheme (kccamt) are taken as dependent variables. Multiple Regression Analysis is done in SPSS software. Firstly the analysis will be done by state wise and after that all over analysis will be done. The multiple regression equation for analysis is given below:

$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \ldots\ldots + \beta_n X_n$

Productivity $= \alpha + \beta_1$ kccamt $+ \beta_2$ kccno

Whereas:

Productivity = dependent variable,

Kccamt and kccno are independent variables.

Null hypothesis$_1$: There is no significant impact of KCC amount on agricultural productivity.

Null Hypothesis$_2$: There is no significant impact of KCC Numbers on agricultural productivity

5.2 Impact of KCC Scheme on Agricultural Productivity State wise Analysis

For this objective analysis we put the values of the three variables agricultural productivity, Kisan credit cards numbers and KCC amount sanctioned among all states into the SPPS software table and gives the names to the variables as; productivity, kccno and kccamt. After this we will go to the analyse option into the SPSS software , click on Regression and after that by choosing our variables as dependent and independent analyse the impact by looking at the coefficient values and p-values. β Coefficient values tells us that when there is one unit change in independent variable then by how much unit dependent variable changes. P value (sig.) tells the acceptance or rejection of statistical hypothesis. If p valueis less than .005% then we do not accept the null hypothesis and vice-versa. The results of state wise multiple regression is given in below table:

Table no. 6 State- wise Multiple Regression results				
States	Variables	C	Kccamt	Kccno
A.P.	β	2434.953	0.00	0.00
	sig.	0.00	0.672	0.695
ASSAM	β	1312.045	0.00	0.007
	sig.	0.00	0.61	0.004
BIHAR	β	1513.345	0.00	0.003
	sig.	0.001	0.134	0.135

GUJARAT	β	1877.341	0.003	-0.002
	sig.	0.00	0.339	0.318
HARYANA	β	3259.861	-0.001	0.002
	sig.	0.00	0.182	0.195
KARNATAKA	β	1481.75	0.00	0.00
	sig.	0.00	0.227	0.181
KERLA	β	2220.9	0.001	0.00
	sig.	0.00	0.016	0.023
M.P.	β	1275.133	0.00	0.00
	sig.	0.00	0.932	0.874
MAHARASTRA	β	1081.63	0.00	0.000
	sig.	0.00	0.643	0.816
ORRISA	β	1400.28	0.00	0.001
	sig.	0.00	0.257	0.257
PUNJAB	β	4099.143	0.00	0.00
	sig.	0.00	0.097	0.089
RAJASTHAN	β	1118.298	0.00	0.00
	sig.	0.00	0.171	0.196
TAMILNADU	β	2159.871	0.00	0.001
	sig.	0.00	0.352	0.313
U.P.	β	2093.075	0.00	0.00
	sig.	0.00	0.101	0.096
WEST BENGAL	β	2542.151	0.00	0.00
	sig.	0.00	0.265	0.297

Table no. 6 shows the state wise multiple regression results which explains the state wise impact of amount of KCCs and numbers of KCCs on their agricultural productivity. In case of Andhra Pradesh, if there is one unit change in kccamt and kccno then there is no change in agricultural productivity. Our p-values (sig.) of kccamt and kccno no are greater than the sig. value (.005) then the results for A.P. state does not accept the both null hypothesis (Null hypothesis$_1$ and Null Hypothesis $_2$).

In case of Assam state, if there is one unit change in kccamt then there is no change in agricultural productivity and if there is one unit change in kccno then by 0.7% agricultural productivity changes. The p values of kccamt is greater than significant value so it does not accept null hypothesis $_1$ and the p value of kccno is less than the .005 so it accept null Hypothesis $_2$.

In case of Bihar, with change in one unit of kccamt there is no change in agricultural productivity whereas with one unit change in kccno there is change of 0.3% in agricultural productivity. Both the p values are more than 0.005 so it does not accept the both null hypothesis.

In case of Gujarat, if there is change of one unit in kccamt and kccno then productivity changes by 0 .31% and -0.2%. The p values of kccamt and kccno are greater than the sig. value so it does not accept the both null hypothesis.

In case of Haryana, when there is one unit change in kccamt and kccno then productivity changes by -0.1% and 0.2%. The p value is greater than 0.005 so it does not accept the both null hypothesis.

In Karnataka there is no impact of kccamt and kccno on agricultural productivity and both the null hypothesis does not accepted.

In Kerala, the kccamt change by one unit changes the productivity by 0.1% and productivity does not changes with change in kccno. The p values of kccamt and kccno are less than 0.005 so both the null hypothesis are accepted.

In case of M.P., kccamt and kccno does not have any impact on agricultural productivity and both the null hypothesis does not accepted.

In Maharashtra also, kccamt and kccno does not have any impact on agricultural productivity and both the null hypothesis does not accepted.

In case of Orissa, with the change in kccamt there is no change in agricultural productivity and with change in one unit of kccno, productivity changes by 0.1%. Both the null hypothesis does not accepted.

In case of Punjab, both the independent variables does not make change in dependent variable. Both the null hypothesis does not accepted.

In Rajasthan, there is no change in agricultural productivity with change in kccamt and kccno and both the null hypothesis does not accepted.

In Tamilnadu, there is no change in productivity with change in kccamt whereas when there is one unit change in kccno then productivity changes by0.1%. Both the null hypothesis does not accepted.

In Utter Pradesh, there is no change in agricultural productivity with change in kccamt and kccno and both the null hypothesis does not accepted.

In West Bengal also there is no change in agricultural productivity with change in kccamt and kccno and both the null hypothesis does not accepted.

Table no.7 Aggregate multiple regression results			
	C	kccamt	kccno
β	2136.416	0	0
Sig.	0	0.871	-0.887

The table no.7 shows the results of multiple regression when all the states are combined to know the impact of KCC scheme on agricultural productivity of India. The results interpret that when there is change in one unit of both the independent variables (kccamt and kccno) then there is no change in dependent variable (productivity) and both the p values are higher than the significant value (0.005) so, both the null hypothesis does not accepted.

5.3 Conclusion

This chapter concluded that among the states there are only two states who have significant impact on agricultural productivity and all other 13 states does not have any impact on agricultural productivity and there is no change in productivity due to change in KCCs numbers and KCCs amount. In Assam state, it accept the null Hypothesis $_2$ means that there is impact of KCCs number on agricultural productivity. In Kerala both the null hypothesis are accepted, this means that both the KCCs number and KCCs amount have an impact on agricultural productivity. The reason behind this impact may be courses like the financial literacy and credit counselling centre are opened in districts by the Kerala government and through this knowledge they utilise the scheme in a proper way. The literature tells that there are many other major factors which influence the agricultural productivity and credit is much far for

influencing the productivity. So this chapter concluded that there is no impact or negligible impact of Kisan Credit Card scheme on Agricultural productivity in India.

CHAPTER 6

MAJOR FINDINGS, CONCLUSION, POLICY IMPLICATIONS AND LIMITATIONS

CHAPTER 6

MAJOR FINDINGS, CONCLUSIONS, POLICY IMPLICATIONS AND LIMITATIONS

6.1 Major Findings

This paper shows the performance of KCC scheme in India with state level analysis. This study have the three objectives and by achieving these objective the study have some major findings. These are as follows:

- ✓ The Commercial banks are at the top in amount sanctioning and credit card issuing.

- ✓ The highest growth rate is achieved by the Commercial banks (27.2%) and lowest growth rate is achieved by Cooperative banks (1.9%).

- ✓ The highest growth regarding to the no. of cars issued and amount sanctioned is shown during the years 2007-08 and 2012-13. The reason behind this is the financial inclusion and introduction of Rupay Kisan Credit Card scheme.

- ✓ The lowest growth rate is shown by Cooperative banks due to the poor infrastructure, lack of technology and lack of supervision.

- ✓ Among the states Orissa, Karnataka and Haryana are showing the poor progress regarding to KCCs issue and amount sanction.

- ✓ Andhra Pradesh, Uttar Pradesh, Karnataka and Gujarat are those states which have got highest amount of Kisan credit card on the bases of their land holdings. This means that KCC scheme is working properly according to their rules that KCC loan is given on the basis of operational land holdings. But their compound growth is not as much as could be.

- ✓ The lowest KCCs number and amount sanctioned by Assam state because Assam has the fragmented lands and KCC loan is given on the basis of land holdings. Assam state have the marginal and tenant farmers.

- ✓ The highest growth rate is also shown by the Assam state beyond the above limitations. This means that the fertility of land and productivity is good in Assam state and they are utilising the loan in a proper way.

- ✓ The expansion of credit is not equal among the states.

- ✓ Haryana growth rate is founded negative. This means that the debt repayment problem occurs in Haryana so the banks are not issuing the new credit cards.

- ✓ The KCCs number issued by the Assam state have an impact on agricultural productivity.

- ✓ The KCCs number issued and amount sanctioned by Kerala state have an impact on their agricultural productivity.

- ✓ All the 13 states among fifteen except Kerala and Assam does not have impact on agricultural productivity.

- ✓ Assam state have the highest growth rate but lowest number of KCCs issued and amount sanctioned and its KCCs number have an impact on productivity. This means that the farmers are utilising KCC credit in a very efficient way.

- ✓ In India KCC scheme does not have impact on Indian agricultural productivity.

- ✓ The land holdings are not the correct measure on the basis of which credit is given to farmers because the tenant farmers ,marginal farmers and those who works on leased lands they does not get the proper credit and only large farmers get benefit from this scheme this is the reason behind the no impact of KCC on productivity.

✓ The performance of KCC scheme in India is quite impressive.

6.2 Conclusion

Kisan credit card is the most innovative scheme for providing the credit to the farmers for purchasing the agricultural inputs and consumption purpose, so it very essential to know the progress of this scheme. After analysing this paper many conclusions came regarding this scheme. Through the interpretation this paper concludes that the trend and performance of KCC scheme is impressive. The Commercial banks are the major source among banks for providing the credit and these banks are also showing the highest growth in number of KCCs issuing and amount sanctioning. The RRBs are showing the increasing growth but the progress and performance of Cooperative banks are very poor. There is a need to enhance the Commercial banks and improve the situation of Cooperative banks in order to better performance of Kisan credit card. The trends of KCC among these banks are fluctuating due to the introduction of other agriculture credit opportunities in agriculture sector like MFI (Micro Finance Institutions) and other Self Help Groups. The state wise progress of KCC scheme is also good. The highest growth rate is shown by Assam followed by Bihar, Punjab, Tamilnadu, Kerala, Rajasthan, West Bengal regarding to amount sanctioned and lowest growth rate is shown by Orissa, Karnataka, Gujarat and Haryana. In regard to the credit cards number issued by this scheme the highest growth rate is shown by Assam followed by Bihar, Rajasthan, Tamilnadu ,Gujarat and Andhra Pradesh and lowest growth rate is shown by Orissa, Karnataka and Haryana. This means there is a need to improve the scheme among Orissa, Karnataka and Haryana. This shows that the expansion of Kisan credit card is not equally among the states. In some states the progress was good at the time of implementation of the scheme but later on their

growth declines, the fact behind this is debt repayment. After the analysis the study concludes that the Kisan Credit Card scheme does not have any impact or little bit impact on agricultural productivity. Among the fifteen states who are representing the India's performance regarding the KCC scheme (contributing 70%-80% to KCC) there are only two states Kerala and Assam where the KCC scheme have an impact on agricultural productivity and other states have no impact on agricultural productivity. This study concludes that the performance of KCC scheme is satisfactory.

6.3 Policy Implications

The important suggestions that have been observed in the course of the study are summarised as below:

1. The Commercial banks performance is good regarding the KCC scheme so there is a need to open more and more braches of these banks in rural areas so that KCC scheme moves towards more achievements.

2. According to findings there is no impact or little bit impact of KCC scheme on agricultural productivity so there is a need to enhance the loan amount given under this scheme.

3. For the better performance of Kisan credit card scheme, there is a need to solve the land holding problem by making the verified database of farmers which will help the banks to find out the needy ones.

6.4 Limitations of the Study

Following are the limitations of the study:

1. The study has taken the trends and performance of KCC of three Public institutions i.e., RRBs, Commercial Banks and Cooperative Banks. However the study can be enlarged by taken the Private sector institutions.

2. The nature of study depict the requirement of secondary data. The Non-availability of secondary data is always a constant. Hence in this study the data of initial three years of the scheme i.e., 1998 -2000 is not taken due to the unavailability.

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APPENDIX

Appendix 1 Table for multiple regression analysis

State	years	Kccno	productivity	Kccamt
AP	2006	1345804	2365	450460
AP	2007	1378365	2231	631774
AP	2008	1214582	2613	416974
AP	2009	14432000	2744	3847680
AP	2010	15582000	2294	4403600
AP	2011	1898000	2530	868500
AP	2012	1414000	2519	889000
AP	2006	2325098	2670	1525300
Assam	2006	64963	1416	9109
Assam	2007	34117	1286	6098
Assam	2008	47638	1378	19448
Assam	2009	463000	1551	46300
Assam	2010	568000	1662	56800
Assam	2011	117000	1763	45100
Assam	2012	251000	1704	78000
Assam	2013	221456	1962	96200
Bihar	2006	209249	1311	64293
Bihar	2007	279376	1656	99267
Bihar	2008	239348	1546	98464
Bihar	2009	3128000	1766	1005880
Bihar	2010	3805000	1530	1325600
Bihar	2011	567000	1479	329200
Bihar	2012	584000	2098	371000
Bihar	2013	614839	2366	371200
Gujarat	2006	238534	1551	415277
Gujarat	2007	216758	1423	445456
Gujarat	2008	145342	1831	160629
Gujarat	2009	2801000	1595	4167980
Gujarat	2010	2997000	1560	4372300
Gujarat	2011	243000	1843	232900
Gujarat	2012	363000	1874	343000
Gujarat	2013	422002	1970	558400
Haryana	2006	253997	3045	304559
Haryana	2007	110747	3393	153103
Haryana	2008	154686	3420	211649
Haryana	2009	2348000	3388	1835880
Haryana	2010	2492000	3383	2051600
Haryana	2011	148000	3526	245600
Haryana	2012	191000	3879	337000
Haryana	2013	200329	3689	484900

State	Year	Value 1	Value 2	Value 3
Karnataka	2006	505037	1776	790727
Karnataka	2007	386786	1289	170708
Karnataka	2008	370540	1548	159177
Karnataka	2009	5041000	1511	2526080
Karnataka	2010	5665000	1377	2880800
Karnataka	2011	650000	1684	561500
Karnataka	2012	629000	1629	598000
Karnataka	2013	559877	1488	825600
Kerala	2006	240090	2219	91804
Kerala	2007	317523	2331	110378
Kerala	2008	353127	2221	156753
Kerala	2009	3124000	2440	983130
Kerala	2010	3466000	2470	1124100
Kerala	2011	301000	2399	264700
Kerala	2012	342000	2695	354000
Kerala	2013	366477	2547	448800
MP	2006	497855	1130	346072
MP	2007	373557	1167	230903
MP	2008	403447	1069	756483
MP	2009	5151000	1168	2776990
MP	2010	5777000	1285	322090
MP	2011	627000	1162	574000
MP	2012	841000	1510	844000
MP	2013	724933	1676	921200
Maharashtra	2006	778374	948	510106
Maharashtra	2007	1087696	940	439164
Maharashtra	2008	881317	1150	978695
Maharashtra	2009	7919000	1001	4285230
Maharashtra	2010	8697000	1039	4719700
Maharashtra	2011	726000	1184	436200
Maharashtra	2012	946000	1155	728000
Maharashtra	2013	1071962	1038	12143000
Orissa	2006	493979	1349	220654
Orissa	2007	348726	1359	166310
Orissa	2008	462362	1484	209018
Orissa	2009	4934000	1363	1401120
Orissa	2010	5553000	1397	1564900
Orissa	2011	571000	1432	149700
Orissa	2012	1008000	1303	179000
Orissa	2013	488439	1592	211500
Punjab	2006	179235	3986	196410
Punjab	2007	114108	4017	181654
Punjab	2008	120871	4255	181654
Punjab	2009	2230000	4231	2100440
Punjab	2010	2398000	4144	2506800

Punjab	2011	213000	4280	572700
Punjab	2012	214000	4364	672000
Punjab	2013	282232	4347	1107000
Rajasthan	2006	346500	919	300246
Rajasthan	2007	264731	1119	187345
Rajasthan	2008	277334	1180	167884
Rajasthan	2009	4757000	1263	2855610
Rajasthan	2010	5220000	931	3429800
Rajasthan	2011	843000	1249	817600
Rajasthan	2012	633000	1348	777000
Rajasthan	2013	749108	1480	1149800
Tamilnadu	2006	527892	1847	190379
Tamilnadu	2007	518203	2610	236378
Tamilnadu	2008	466563	2125	193084
Tamilnadu	2009	5809000	2225	1759420
Tamilnadu	2010	6156000	2477	2074800
Tamilnadu	2011	828000	2393	657300
Tamilnadu	2012	881000	3162	929000
Tamilnadu	2013	1008270	2131	1068800
Up	2006	1333064	2057	653768
Up	2007	1358072	2057	696334
Up	2008	1426461	2206	641969
Up	2009	15423000	2365	5015330
Up	2010	17113000	2236	6162900
Up	2011	1348000	2386	969400
Up	2012	1943000	2498	1404000
Up	2013	2027098	2542	1540200
West Bengal	2006	479726	2423	78699
West Bengal	2007	181931	2511	114482
West Bengal	2008	386386	2525	332796
West Bengal	2009	3108000	2493	1081670
West Bengal	2010	3445000	2522	1235200
West Bengal	2011	449000	2601	194000
West Bengal	2012	611000	2645	222000
West Bengal	2013	718921	2717	392600

Appendix 2 Regression results of Assam state

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.929ª	.863	.808	98.87637	2.493

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1312.045	64.831		20.238	.000	1145.392	1478.698
kccno	.000	.000	-.104	-.544	.610	.000	.000
kccamt	.007	.001	.977	5.094	.004	.003	.010

Appendix 3 Regression results of Bihar

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.625 a	.390	.146	323.50236	1.636

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1513.345	197.899		7.647	.001	1004.629	2022.061
kccno	.000	.000	-3.562	-.134		-.002	.000
				1.785			
kccamt	.003	.002	3.551	1.779	.135	-.001	.007

a. Dependent Variable: productivity

Appendix 4 Regression analysis of Gujarat

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.499 [a]	.249	-.001	482.98735	.954

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1877.341	219.914		8.537	.000	1339.230	2415.452
kccno	.003	.003	6.584	1.038	.339	-.004	.009
kccamt	-.002	.002	-6.912	-1.090	.318	-.006	.002

a. Dependent Variable: productivity

Appendix 5   Regression analysis of Haryana

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.583 a	.339	.075	235.98708	1.634

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	3259.861	192.861		16.903	.000	2764.095	3755.626
Kccno	-.001	.001	-5.024	1.550	-.182	-.003	.001
Kccamt	.002	.001	4.844	1.495	.195	-.001	.004

a. Dependent Variable: productivity

Appendix 6 Regression results of Karnataka

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.606[a]	.367	.114	149.92052	2.393

a. Predictors: (Constant), kccno, kccamt

b. Dependent Variable: productivitvity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1481.757	99.714		14.860	.000	1225.433	1738.081
kccamt	.000	.000	2.349	1.376	.227	.000	.001
kccno	.000	.000	-2.654	1.555	-.181	.000	.000

a. Dependent Variable: productivity

Appendix 7 Regression results of Kerala

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.853 a	.728	.619	99.71582	3.050

a. Predictors: (Constant), kccno, kccamt

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	2220.921	66.490		33.402	.000	2050.002	2391.840
kccamt	.001	.000	2.889	3.587	.016	.000	.002
kccno	.000	.000	-2.597	-3.224	.023	.000	.000

Appendix 8 Regression results of Madhya Pradesh

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.074[a]	.006	-.392	250.43338	.710

a. Predictors: (Constant), kccno, kccamt

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1275.133	135.583		9.405	.000	926.605	1623.660
kccamt	1.179E-5	.000	.046	.932	.090	.000	.000
kccno	-7.911E-6	.000	-.085	-.874	.167	.000	.000

a. Dependent Variable: productivity

Appendix 9 Regression results of Maharashtra

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.267 ᵃ	.071	-.300	108.82740	1.204

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1081.432	55.816		19.375	.000	937.952	1224.912
kccno	-6.098E-6	.000	.219	-.493	.64 3	.000	.000
kccamt	-2.543E-6	.000	-.109	-.245	.81 6	.000	.000

a. Dependent Variable:
productivity

Appendix 10 Regression results of Orissa

**Model
Summary**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.521ᵃ	.271	-.020	92.91162	1.168

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	1400.280	48.161		29.075	.000	1276.478	1524.082
kccno	.000	.000	-4.706	1.281	-.257	.000	.000
kccamt	.001	.001	4.501	1.225	.275	.000	.002

Appendix 11 Regression results of Rajasthan

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	2159.871	273.512		7.897	.001	1456.786	2862.957
kccno	.000	.000	-1.023	-1.027	.352	.000	.000
kccamt	.001	.001	1.118	1.122	.313	.000	.002

a. Dependent Variable: productivity

Appendix 12 Regression results of Utter Pradesh

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.675 [a]	.456	.239	161.58092	2.059

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	2093.075	120.344		17.392	.000	1783.722	2402.429
kccno	.000	.000	-4.707	-2.005	.101	.000	.000
kccamt	.000	.000	4.798	2.044	.096	.000	.001

a. Dependent Variable: productivity

Appendix 13 Regression results of West Bengal

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.503 a	.253	-.046	95.98081	.391

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	2542.157	54.123		46.970	.000	2403.030	2681.284
kccno	.000	.000	-2.515	1.254	-.265	.000	.000
kccamt	.000	.000	2.334	1.164	.297	.000	.002

a. Dependent Variable: productivity

Appendix 14 Regression results of Andhra Pradesh

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.208ᵃ	.043	-.339	212.20555	2.313

a. Predictors: (Constant), kccamt, kccno

b. Dependent Variable: productivity

	Unstandardized Coefficients		Standardized Coefficients		Sig.	95% Confidence Interval for B	
Model	B	Std. Error	Beta	t		Lower Bound	Upper Bound
1 (Constant)	2434.953	150.024		16.230	.000	2049.304	2820.602
kccno	-3.094E-5	.000	-1.051	-.416	.695	.000	.000
kccamt	.000	.000	1.136	.449	.672	.000	.001

a. Dependent Variable: productivity

Appendix 15 Regression Results of Tamilnadu

Model Summary

Model	R	R Square	Adjusted R Square+	Std. Error of the Estimate	Durbin-Watson
1	.448[a]	.201	-.119	420.87951	2.656

a. Predictors: (Constant), kccno, kccamt

b. Dependent Variable: productivity

Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95% Confidence Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
1 (Constant)	2159.871	273.512		7.897	.001	1456.786	2862.957
kccamt	.001	.001	1.118	1.122	.313	.000	.002
kccno	.000	.000	-1.023	-.352 1.027		.000	.000

a. Dependent Variable: productivity