

**STUDY OF PERFORMANCE AND IMPACT
OF MGNREGA IN CHITTOOR DISTRICT OF
ANDHRA PRADESH**

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**THESIS SUBMITTED TO THE
ACHARYA N.G. RANGA AGRICULTURAL UNIVERSITY
IN PARTIAL FULFILMENT OF THE REQUIREMENTS FOR THE
AWARD OF THE DEGREE OF**

**MASTER OF SCIENCE IN AGRICULTURE
(AGRICULTURAL ECONOMICS)**

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2021

DECLARATION

I **P. KAVYA** hereby declare that the thesis entitled “**STUDY OF PERFORMANCE AND IMPACT OF MGNREGA IN CHITTOOR DISTRICT OF ANDHRA PRADESH**” submitted to the Acharya N.G. Ranga Agricultural University, Guntur for the degree of **MASTER OF SCIENCE IN AGRICULTURE** majoring in **AGRICULTURAL ECONOMICS** is the result of original research work done by me. I also declare that no material contained in this thesis has been published earlier in any manner.

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No part of the thesis has been submitted by the student for the award of any other degree or diploma. The published part and all assistance received during the course of the investigation have been duly acknowledged by the author of the thesis.

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ACKNOWLEDGEMENTS

*It is by the fullness of grace, unfailing love and abundant blessings of the Almighty God **Lord Jesus Christ** and profuse love of my parents and my sister, I have been able to complete my studies successfully hitherto and present this piece of work uninterruptedly for which I am eternally indebted for them.*

*But for the affection, words of encouragement, boundless love, unflagging inspiration, interest and selfless sacrifice of my parents I would not have been what I am today. I owe all my success to the special persons in my life my mother **Smt. P. Lokeswari**, my father **Sri P. Govindu**. It is apt to convey, whole hearted thanks to my ever loving sister **Ms. P. Niharika** for her affectionate love, inspiring encouragement and sustained interest throughout my studies.*

*My literal power is too less to express my profound and sincere feelings of gratitude to the chairman of my advisory committee, **Smt. Dr. N. Vani**, Assistant Professor, Department of Agricultural Economics, S.V. Agricultural College, Tirupati for her insightful guidance, affectionate encouragement, unflagging help, cordial treatment and constructive criticism in planning and presentation of the investigation. Ineffable is my gratitude for her friendly care, soft indefatigable interest, whole hearted co-operation, patience and constant help in every possible manner in all aspects rendered during the progress of my research work, personally and preparation of the thesis manuscript. Her wide knowledge and logical way of thinking have been of great value for me. Her understanding, encouraging and personal guidance have provided a good basis for the present thesis.*

*With sincere regards and immense pleasure, I express my profound sense of gratitude to the member of my advisory committee, **Dr. S. Rajeswari**, Assistant Professor, Department of Agricultural Economics, S.V. Agricultural College, Tirupati, for her unwithered hospitality, full pledged cooperation and timely advice when required rendered during my research work.*

*With great pleasure I extend my heartfelt thanks to the learned member of my Advisory Committee, **Dr. B. Ramana murthy**, Assistant Professor Department of Statistics and Computer applications, S.V. Agricultural College, Tirupati, for his transcendent suggestions and sedulous effort to embellish the study.*

*I sincerely accentuate my everlasting gratitude to **Dr. I. Bhavani Devi**, Professor & Head, Department of Agricultural Economics, S.V. Agricultural College, Tirupati, for her inspiring, meticulous and valuable guidance during the entire period of my investigation.*

*With deep respect and esteem regards, I owe my indebtedness to **Dr. B. Aparna**, Assistant Professor, Department of Agricultural Economics, S.V. Agricultural College, Tirupati, for her timely help, meticulous guidance, valuable suggestions throughout the tenure of this investigation.*

*I profusely thank **Smt. S.Ujjwala rani**, Assistant Professor, Department of Agricultural Economics, S.V. Agricultural College, Tirupati, for the co-operation and encouragement rendered in completing my research work.*

*Diction is not enough to express my gratitude to the officers and the staff of **MGNREGA, Chittoor** and the **Wage seekers** for their care and cooperation in data collection.*

*I am in dearth of words to express my deep gratitude and affection towards my **Spiritual Sisters** and **Well wishers** for their prayers and continuous encouragement in all aspects of my life.*

*No words could justice to express my deepest sense of love and gratitude towards my friends **Ananya, Arundhathi, Gayathri, Jessica** and **Latha** for their excellent company, inspiration, moral support, boost up and healthy friendship.*

*With immense pleasure I thank my colleagues **Sruthi, Vasantha, Sravani, Soniya** and **Joash** for their affection and kind help during my college life. It is different to put my feelings into words of thanks to my beloved seniors **Boopathi raja, Vasudev, Ragamalika, Mary Sharon, Revathi, Sunitha, Ashwini** and beloved juniors **Vani** and **Tippu Sultan** for their affection and kind help during my college life.*

*I joyfully recollect the days I enjoyed with my friends **Shafiya, Mahalakshmi, Srilakshmi and Divya**. And I am thankful to **Prasindhu, Bhargavi and Bindu** for their help during my research work.*

*I am very much grateful of **Acharya N.G Ranga Agricultural University, Guntur** for providing me the opportunity in getting admission into Post graduate programme and also for all the facilities extended during the period of my Post graduate programme.*

I sincerely thank all those who helped me directly and indirectly to bring out this humble piece of work.

***Brain may forgotten to mention, but heart will remember
and Everyone is not mentioned, but no one is forgotten***

Kavya... 

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LIST OF SYMBOLS AND ABBREVIATIONS

MGNREGA	:	Mahatma Gandhi National Rural Employment Guarantee Act
<i>et al.</i>	:	and other
S. No.	:	Serial Number
Rs.	:	Rupees
CAGR	:	Compound Annual Growth Rate
w.r.t.	:	with respect to
HHs	:	households
%	:	per cent

ABSTRACT

Author : **P. KAVYA**
Title of the Thesis : **STUDY OF PERFORMANCE AND IMPACT OF MGNREGA IN CHITTOOR DISTRICT OF ANDHRA PRADESH**
Degree to which it is submitted : **MASTER OF SCIENCE**
Faculty : **AGRICULTURE**
Department : **AGRICULTURAL ECONOMICS**
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Year of submission : 2021

The present study entitled “Study of Performance and Impact of MGNREGA in Chittoor District of Andhra Pradesh” was undertaken to assess the performance of the programme, employment and income generation through the programme, impact on labour availability to agriculture and opinion of the sample population.

The study was conducted in Chittoor District of Andhra Pradesh in which 4 mandals were selected purposively on the basis of highest average man days per household per year. Using the same criteria from each mandal, 2 villages were selected purposively and from each village, 10 households covered under MGNREGA were selected randomly. Thus the total sample size of the study constitutes to 80. Both primary and secondary data were collected for the study and both conventional and functional analyses were employed to analyze the data and to find the conclusions.

Growth rates of person days generated through MGNREGA in Chittoor district from the year 2006-07 to 2018-19 for total beneficiaries was 0.72 and for women it was 0.79. But the growth rates of person days generated for SC and ST people were negative at the rate of 1.22 and 1.48. Growth rates of total number of works undertaken was 12.23, number of works in progress was 114.67 and number of works completed was 9.81. But the work completion rate was decreasing.

Growth rates of total available funds from the year 2006-07 to 2018-19 at national level, showed a compound annual growth rate of 4.37. The funds released from the centre at a compound annual growth rate of 5.53 and for the expenditure of funds it was 6.31 and the per cent utilization of funds was varying. Growth rates of total available funds for Andhra Pradesh, showed a compound annual growth rate of 1.13. The funds released from the centre was

at a negative compound annual growth rate of 1.47 and the compound annual growth rate for the expenditure of funds was 3.41 and the per cent utilization of funds was varying.

The growth rates of the households issued with job cards is showing a positive growth of 2.92. The households demanding employment and provided with employment were same and showing a negative growth rate of 0.23. The percentage of total job card holding household which got employment is showing negative growth rate of 3.06.

The number of households completed 100 days of work was showing a positive growth of 5.38. The percentage of households got 100 days work with respect to households issued with job cards is also indicating a positive growth rate. And the percentage of households got 100 days work with respect to households demanded and provided with employment are same with a growth rate of 5.62.

The net change in the annual income of the wage seekers is 20000 due to the implementation of MGNREGA programme. The percentage change in income was 27.75 per cent which is more than one fourth increase in the net annual income.

After the implementation of MGNREGA, the percentage of medium income group has been increase from 26.25 per cent to 72.50 per cent, the percentage of high income group also increased to 23.75 per cent, and the percentage of low income group has been decreased from 55 to 3.75 per cent due to the implementation of MGNREGA.

On an average the absolute scarcity of the labour due to MGNREGA was around 0.5 to 6 per cent which was negligible. It was inferred that there was least impact of MGNREGA on labour availability for agriculture.

The opinion survey about the benefits of MGNREGA reveals that 95 to 100 per cent of the responses given by the beneficiaries were positive.

Chapter –I

Introduction

Chapter I

INTRODUCTION

Poverty and unemployment are the two major stumping blocks of developing countries. According to planning commission of India approximately 29.8 per cent of population is Below Poverty Line (BPL). Policy makers of India understood the need for generating large scale employment opportunities to bring the population Above Poverty Line (APL). Nearly 72.22 percent of population live in rural areas and majority of them are suffering from seasonal unemployment, under-employment and disguised unemployment, even though the labour force in India is increasing numerously. (Source: Planning Commission)

Government of India focused at balanced growth and to overcome the troubles of previous employment programs, passed National Rural Employment Guarantee Act (NREGA) on August 25th, 2005 to empower the rural labourers to get 100 days of employment per household per year during off-season. The act has been launched on February 2nd, 2006 in Ananthapur district of Andhra Pradesh and it came to effect from April 1st, 2006 in 200 drought prone and backward districts in India. Further it was extended to 130 additional districts in the year 2007-2008. And the coverage still extended from 330 districts to 619 districts of India in April, 2008. Thus the entire country is covered under NREGA except the districts which have hundred percent urban population.

The NREGA is formed by merging previous programmes such as Sampoorna Gramin Rozgar Yojana (SGRY) of 2001 and National Food for Work Programme (NFFWP) of 2004. Further the Government of India renamed its premium rural job guarantee programme- National Rural Employment Guarantee Act (NREGA) as Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) on 2nd October, 2009.

The programme is aimed to provide employment to rural mass and to eliminate poverty. The objective of the MGNREGA is to provide much resources besides the available resources in the district and to provide wage employment and to provide food security through the creation of need based economic, social and community assets in the district related to soil and water conservation , rural connectivity, water harvesting, flood control, digging of new ponds, percolation tanks and conservation of small check dams, plantation and management of NTFPs, plantation, forestry related activities such as fire protection, land development works, Rural Connectivity works and B.P.L/S.T/S.C/ Individual Beneficiary asset creation works.

Since the implementation of the programme in India, 14.61 crore job cards were issued, 3102.7 crore person days were generated till 2019-20 with the total expenditure of Rs. 619716.29 crore. The total number of active workers were 14.01 crore. Total person days generated were 268.24 crore, average days of employment provided per household were 41 with the average wage rate given per day per person was Rs. 200 for the year 2019-20. (www.nrega.nic.in, 2020)

In January 2006, the Government of Andhra Pradesh has formulated the rural employment Guarantee Scheme called Andhra Pradesh Rural Employment Guarantee Scheme in accordance with National Act. As amended in the act, the scheme was renamed as Mahatma Gandhi National Rural Employment Guarantee Scheme –Andhra Pradesh in 2009. In the first phase, AP- MGNREGS was launched simultaneously in 13 districts *viz.* Ananthapur, Adilabad, Chittoor, Kadapa, Nizamabad, Karimnagar, Vizianagaram, Ranga Reddy, Medak, Khammam, Mahabubnagar, Warangal, and Nalgonda simultaneously. In the second phase, the scheme was widened to another 6 districts *viz.* Srikakulam, East Godavari, Prakasam, Nellore, Kurnool and Guntur in 2007-08. And further it was extended to the remaining districts West Godavari, Krishna and Visakhapatnam by 2008-09. (Srinivas and Pandyaraj, 2017)

The current scenario of AP- MGNREGA is that the total number of job cards issued were 6397284 till 2019-20. Over all 6514235 individuals were provided with employment in the year 2019-20 with the generation of 200792978 person days of employment. The average wage rate per day per person was Rs. 203 which is more than the national average of 200. And the average number of days employment provided per household was 50. (www.nrega.ap.gov.in, 2020)

Objectives of MGNREGA

The primary objective of the scheme is to provide the livelihood security of the household by providing at least 100 days of guaranteed wage employment in rural areas in every financial year whose adult members willing to do unskilled manual work. Secondly to build strong social safety net for rural poor, work as a fuel for sustainable agricultural economy, empowering rural poor and doing new ways of business as a model of governance reform based on the democracy and transparency.

As MGNREGA has emerged as a ray of hope to beat the poverty in rural areas by providing both short and long term outcomes, it is important to study the reachability of the scheme. There have been much studies that focused on various aspects of MGNREGA across the country. Yet, there is a need and scope to study the progress and performance of the Act in the study area.

The MGNREGA programme was implemented in Chittoor district even in the first phase of its implementation. The MGNREGA has shown a notable growth in performing several aspects of its implementation. Since the implementation of MGNREGA in Chittoor, it has 192741736 days of employment generated across 66 mandals with 461755 number of job cards issued (www.nrega.ap.gov.in, 2020). For the year 2019-20, the total households provided with employment were 236164 with 366645 individuals generating 12067863 person days for the year. The average days of employment provided per household per year was 51 with the wage rate Rs. 207 per day per individual for the year 2019-20.

As the MGNREGA is being implemented well in all the rural areas of Chittoor district with its implementation in 1363 Grampanchayats and as it stands in fourth position for the year 2017-18 with notable beneficiaries, the study has been conducted with the following objectives.

Objectives of the present investigation:

1. to assess the progress and performance of MGNREGA in the study area.
2. to assess the extent of employment of MGNREGA workers in the study area.
3. to evaluate the impact of MGNREGA on income of MGNREGA workers.
4. to analyze the impact of MGNREGA on labour availability for agriculture and
5. to study the opinion on benefits of the MGNREGA programme.

Scope of the study

The study would focus on the impact of Mahatma Gandhi National Rural Employment Guarantee Act in providing employment, generating income to the wage seekers and the opinion of the sample population. Though it is a micro level study, it would help in understanding the reachability of the programme to the rural poor.

Limitations

This study was undertaken in Pulicherla, Rompicherla, Chinnagottigollu and Vadamalapeta mandals of Chittoor district of Andhra Pradesh. Thus, the conclusions drawn may be related to the particular area only. Though the analysis would reflect the trend of the impact on the study area. The data collected concerned to the year 2018-19. Survey method adopted is time bound and resource bound. Farmers were asked to provide data from their memory and experiences. Even cross-checking of the data also done at times.

Organization of the thesis

The thesis has been furnished in five chapters. The first chapter deals with the introduction, concerning the enactment of the Act, features of the act and importance of the study. The second chapter bestows a critical review of the previous work done. The third chapter includes sampling procedure, analytical tools, methods adopted and collection of data for the study. The fourth chapter deals with the analysis of the results. And the final chapter encompasses the summary and conclusions of the study.

Chapter – II

Review of Literature

Chapter II

REVIEW OF LITERATURE

Research is a continuous process. For any scientific investigation, previous findings provide basis to the research. The review of literature is one of the important aspects in the researcher process. It helps the researcher to keep his research work going in right and appropriate direction. Hence, available literature as of now, in line with the objectives of the present investigation is reviewed in this chapter.

2.1 STUDIES RELATED TO THE PROGRESS AND PERFORMANCE OF MGNREGA

2.2 STUDIES RELATED TO EMPLOYMENT GENERATION THROUGH MGNREGA

2.3 STUDIES RELATED TO INCOME GENERATION OF MGNREGA WORKERS

2.4 STUDIES RELATED TO THE IMPACT OF MGNREGA ON LABOUR AVAILABILITY FOR AGRICULTURE

2.5 STUDIES RELATED TO OPINION SURVEY ON MGNREGA

2.1 STUDIES RELATED TO THE PROGRESS AND PERFORMANCE OF MGNREGA

Pillisery and Jalan (2011) found that in Andhra Pradesh state, a total of 17213443 individuals were provided with employment, who belong to 8812008 households. This amounts to 1,202,681,058 days of work created. Out of this 53.39 per cent of the paid workers involved have been women. Across different districts of Andhra Pradesh this pattern has been consistent. Women have not only outperformed men in terms of participation, but in terms of total wages received. Average wages paid to women is almost 58 per cent.

Ali *et al.* (2012) revealed that, MGNREGA's performance according to key aggregate indicators has been quite impressive, particularly when compared with previous employment programmes. Budgetary allocation for MGNREGA has expanded steadily from its base of about Rs.113, 000 million in 2006-07 to Rs.401, 000 million in 2009-10. MGNREGA has reached women, SC/ST families and the poor and the share of women in the employment provided has risen steadily from 41% in 2006-07 to 50% in 2010-18. Nearly 100 million bank /post office accounts opened for MGNREGA workers and about 85% of NREGA payments being made through them.

Sharma and Didwania (2013) reported that the total number of households who completed their 100 days work up to January month of 2008-09, 2009-10 and 2010-11 were 64, 71 and 58 respectively which showed a CAGR of -5 per cent. The works completed in the three successive years were 15, 56 and 83 respectively. Similarly, 115, 124 and 122 works were on progress during this period and the income received from Central Government in 2008-09, 2009-10 and 2010-11 was 132.69 lakh, 163.55 lakh and 87.12 lakh respectively. Total income received from State Government was 38.296 lakh in these three years which shows 19 percent decrease in compound annual growth rate.

Singh (2013) in his research found that MGNREGA in Bundelkhand region of Madhya Pradesh did not provide 100 days security to workers. During the period 2008 - 2013 MGNREGA created social inclusion and given approximately 39.63% jobs for women's which is higher from secure in NREGA Act.

Gulzar *et al.* (2016) revealed that MGNREGA provides employment to more than 3 crore households every year and has ensured improved standard of living of the vulnerable poor, more specifically among women. Women participated actively in the scheme with participation rate highest being in Kerala (93% approx.).

Kodiya *et al.* (2016) has concluded that every state has a unique work demand pattern as some states have high percentage of women participation. The outcome of the research opened the door for customized MGNREGA implementation for each state as all the 18 states under study showcase a different work demand pattern for 2012-13, 2013-14, 2014-15 and 2015-16 years.

Kumar (2016) observed that the total fund available to Mysuru District for the years 2014-15, 2015-16 and 2016-17 was Rs.10798.73 lakhs and the actual expenditure incurred was Rs.10030.05 lakh. The funds for the years 2014-15, 2015-16 and 2016-17 was Rs.4616.58, Rs.4171.48 and Rs.2010.67 and the actual expenditure was Rs.4378.16, Rs.3696.79 and 1955.10 respectively. Both the fund available and the actual expenditure were decreasing for the study period. For the financial years 2014-15, 2015-16 and 2016-17 out of total 598829 job cards issued, 114866 (19.18%) cards issued to SCs beneficiaries, 66572 (11.12%) cards issued to STs beneficiaries and 417391 (69.70%) cards issued to other category beneficiaries in the study period.

Ranjan (2016) reported that for a period of 5 years from 2009-10 to 2013-14, under MGNREGA a total number of 61.24 crore job cards have been issued and the total employment provided has been 24.6 crores only, which was 40.17% of the total job cards issued in the study area. The women participation trend in MGNREGA has shown a continuous increase from 40% in 2006-07 to 61% in 2013-14.

Benni and Nagaraja (2017) concluded that women are the majority beneficiaries and more than ninety percent beneficiaries belong to SC, ST and BC communities. Average number of days employment provided is 40.03 which is less than half of the mandated 100 days, average days of employment in the year 2012-13 was 45, in the year 2014-15 it was to 39 days. Only seven percent households could complete 100 days.

Koyu *et al.* (2017) revealed that an impressive quantum of 240.21 lakh person days were generated in Arunachal Pradesh and 10.26 lakh job cards were distributed during the periods in between 2008-09 to 2013-14. The work completion rate in the state was found to be very low i.e. 8.05 percent, households got 100 days work with respect to households provided job cards was 3.17 percent and 41.98 percent of funds remained being unspent noticing failure of the programme.

Kumar (2017) observed that total fund available to Mandya district was 16,195.17 lakhs and total fund released was 14299.37 lakhs during the study period. In the study period, the actual expenditure was 18,322.04 lakhs. The actual expenditure is less than the total fund available from 2012-13 to 2016-17. The overall employment provided is to about 2,74,753, out of this 28,633 people got man days employment to SCs, 1885 HHs employment provided to STs and 2,44,235 members got employment under MGNREGA in Mandya district.

Giribabu *et al.* (2018) found that 43% of women were registered for doing the works in MGNREGA and 47% women works actively participated to accomplish the works. For the year 2016–2017, a total of 50.4 million households have been provided employment for 138.64 lakh works (projects), out of which 56% have been generated for women whom the highest participation of women since the programme started.

Ramya (2018) studied the implementation of MGNREGA program in Kurung Kumey District of Arunachal Pradesh concluded that there was less impact of the program on the tribal livelihoods. From the total job card holders, only 86.15% of members got work and the remaining 13.85% people have not applied for a job.

Ranjithumar (2018) concluded that, the Mahatma Gandhi National Rural Employment Guarantee Scheme (MGNREGS) to establish rural economic transformation. Observed that everyday discriminations have been increasing

against SCs in rural areas through MGNREGS. Reported that social orders cannot be constructed through MGNREGA in rural areas.

Harish (2020) has revealed that the program was once famous in very few districts solely and analyzed that the program has not achieved its a hundred days of employment to every household and Job Cards. The number of days of work was also failed in asset creation for rural development as a whole. Over ten years for 2006-07 to 2015-16, the wage rate appreciably expanded at initial years. The wage charge growth in rural areas was once not sufficient as of the city area.

2.2 STUDIES RELATED TO EMPLOYMENT GENERATION THROUGH MGNREGA

Murthy and Indumati (2011) revealed that the impact of MGNREGA wage on the economic scarcity of labour is relatively modest when compared with the impact of hike in non-farm wages. Even though the provision of food security through public distribution system has contributed to the economic scarcity of labour, the relative hike in non-farm wages was contributed to higher economic scarcity of labour rather than PDS and MGNREGA wages. And since the MGNREGA has provided around 95 percent of the demanded MGNREGA work, it was the evidence that the programme is showing good performance.

Farooquee (2013) told that in the financial year 2012-13 alone, more than 48 million people were provided employment under the scheme and during the financial year 2012-13, average person days of work provided per household in Jharkhand and Uttrakhand was 39.5 and 39.96 respectively.

Salian and Leelavathi (2014) revealed that the performance of MGNREGA especially in case of women has increased. During the FY 2006-07, in Andhra Pradesh about 6.79 crore person-days of employment was generated by 0.22 Crore participating households. Persondays generation and participating households increased to 32.39 crore and 0.58 crore respectively during the FY 2012-13. The performance of 2009-10 was significantly higher

than other years due to severe drought situation in the state and cry for employment from rural workforce due to lack of employment opportunities in agriculture sector.

Suryavanshi and Sagar (2014) concluded that from 2008-09 to 2013-14 the employment demanded by the person and the families provided and it wage near to 100% in all the 6 year. The Act guaranteed 100 days to wage work on demand, failing which the claimants can legally demand cash compensation.

Deka and Panda (2015) in their study concluded that MGNREGA has given rural employment a boost and as high as 15505 no. of HHs have completed 100 days of wage employment during the FY 2013-14. They also reported that 298.47 lakh of person days during 2013-14 and 175.77 during 2014-15 were generated in Assam. HHs provided with employment in Assam is 830776 against the national figure 38683096 during 2014-15. Better employment record is found during 2013-14 both for Assam and the country as a whole. HHs completed 100 days of wage employment is very minimum during the two financial years.

Kumar and Kondaiah (2015) revealed that Kadapa district have shown higher growth rate (4.96 percent) of total job cards than Chittoor district growth rate (3.31 percent). In Kadapa district the non SC/ST Job cards have registered higher growth rate of 5.59 percent followed by SC job cards 3.52 percent and ST Job cards 3.12 percent. In Chittoor district the non SC/ST Job cards have registered higher growth rate of 3.83 percent followed by SC job cards 2.38 percent and ST Job cards 1.95 percent. The growth rates of all categories in Chittoor and Kadapa districts are significant at 5% level, indicating that there is a significant growth in job cards of the categories during the period from 2006-07 to 2015-16.

Negi *et al.* (2015) observed that the introduction of the programme MGNREGA had a clear positive impact on the rural economy by providing employment to the tune of 0.469 lakh and supplementing the income of the

household to the extent of 10-20 percent. Also through raising the standard of living and socio-economic performance of the rural community of the district.

Bahuguna *et al.* (2016) in their study in Rudraprayaga district of Uttarakhand in the year 2015-16 revealed that from hypothesis testing that the programme has done a great job in improving the economies of rural areas by raising their socio-economic status. 92.60% of the workers who demanded employment were provided employment, the cumulative person days generated for the financial year were 3961900 and in total 22407761 households completed their 100 working days.

Pandey (2017) studied that there is no state which could provide 100 days of employment even to 50% of the participating households in 2011-12. Tripura, Mizoram and Manipur are the only states where at least one-third of the households got 100 days of employment. Of the other five states which have reached more than ten percent, three are Nagaland, Meghalaya and Sikkim. Of the large states only Andhra Pradesh (17.80%) and Maharashtra (11.30%) show hundred days of employment per household crossing two digits level.

Diwate (2018) revealed that total no of HHs demanding job during the period from 2012-13 to 2016-17 are 50101754, 51765569, 46485800, 56458600, 59452360 respectively. Employment provided to HHs during the period is 48251564, 47684864, 41337900, 52462873, 56483200 respectively. Thus total employment provided during the period (in percent) is 96.30, 92.11, 82.92, 92.92, 95.00 respectively in India.

Lakshmi *et al.* (2018) found out that 49 percent of the respondents are having 75 to 150 days of work, 24.5 percent are having 155 to 225 days of work. Most of them are getting less than 100 working days. Most of the respondents were satisfied with the programme because of wage paid under the programme, timings of work, per month working days and behavior of officials. But they are not satisfied with work allocation by the field mate, process of application, and working conditions in the field and also they have very low savings due to less working days.

Mukherjee (2018) revealed that as a result of participating the labor force through MNREGA, the contribution of women to household earnings increases, which may potentially increase their bargaining power within the household. The conventional notion is that women who are least fettered by social norms should get maximum benefits of participation in MGNREGA. Women share in total person days generated is 40.39.

Choudury (2019) reported that the total no. of job cards issued is 48.18 lakhs of which 26.64 are active. About 81.27 lakhs no. of workers of which 39.94 are active workers, 4.99 lakhs are SC workers and 18.02 lakhs are ST workers. The total person days generated in 2018-19 were 534.27 lakhs of which 5.13 lakhs were SCs persons and 20.07 lakhs are STs Persons. The average days of employment provided per household are 30.61lakhs. The total no. of HHs completed 100 Days of wage employment (2018-19) was 18592 in Assam.

Das (2019) in his study found that there was a positive trend in expansion of employment from 1696 (2014-15) to 3321.54 man days. The involvement of households of MGNREGA of West Bengal was 33.14 days (2014-15) and 76.5 days (2018-19) out of 100 days.

Dey (2020) reported that 2006-07 to 2010-11 the number of HHs demanded and provided works were all most same and its increased rapidly, whereas 2010-11 to 2012-13 numbers were gone down in both variables constantly. From 2012-13 to 2015-16 the number of households who have demanded employment was increased, but at the same time, the number of households who were got employment was decreased compare to demand.

2.3 STUDIES RELATED TO INCOME GENERATION OF MGNREGA WORKERS.

Thomas and Bhatia (2012) reported that they showed a declining in trend of percentage of respondents with income less than 2000 from 49 per cent to 20

per cent and rise in percentage of respondents with income 2000-5000 from 50 per cent prior to and after the scheme.

Shenbagaraj and Arokiasamy (2013) analyzed the data for Ottapidaram block of Thoothukudi district revealed that the scheme was able to provide only 26 days of employment in a year on average. More over the average earnings by each person did not exceed Rs.2000 per year.

Mishra *et al.* (2014) studied that the average annual income for the households in the study area showed an upward trend from 2905.6 in 2006 to 6129 in 2013. The increasing average duration of work and rising wage rate in MGNREGA has increased the average annual income for sample households in Vidarbha region by more than thrice, whereas the number of households participating in MGNREGA came down drastically.

Reddy *et al.* (2014) suggested that for the country as a whole the earnings from the Scheme were a little over 12 percent of the poverty threshold income. The steep decline in rural poverty from 44.5 percent in 2004–05 to 19.8 percent in 2009–10 is due to MGNREGS. In the country, the highest impact was seen in Tripura where the MGNREGS earnings were as high as a little over 20 percent of the poverty threshold income followed by Mizoram (19.4%).

Xavier and Mari (2014) found that 43.3 per cent women and 3.3 per cent men obtained Rs.3072 during April, 2013 whereas 27 per cent of women and 2.5 per cent of men earned Rs.2560. The remaining 22.5 of women and 0.8 per cent of men beneficiaries earned Rs.2048. It was clear that majority of the women beneficiaries received maximum amount provided in the scheme. This earning capacity of the women helped them to take part in the decision making of the family.

Pamecha and Sharma (2015) had revealed that MGNREGA was successful in increasing the income by providing wage employment to rural households in Dungarpur district. Their study concluded that 60.5 per

households reported an increase between Rs. 5000-10000, 8% (more than 10000) and 29% (less than 5000).

Kaur and Randhawa (2016) in their study concluded that as the consequence of income generation, MGNREGA has made significant impact in improving expenditure on food consumption, household possession, housing conditions and sanitary conditions of beneficiaries.

Sudarshan and Agarwal (2017) reported that the combined effect of additional employment generated by MGNREGS and the increased rate of wage in both MGNREGS and agricultural labour had made significant changes in the annual per capita income of beneficiaries. The percentage increase in annual per capita income and monthly per capita expenditure on food consumption was 9.5%.

Singh *et al.* (2018) suggested that before implementation of MGNREGA programme, maximum of the beneficiary (60%) belongs to low income earning group (< Rs 20000) followed by 34 per cent of medium income group (Rs 20000 to Rs 40000) and 6 per cent of high-income group (> Rs 40000) beneficiaries. After the implementation of MGNREGA, the percentage of the beneficiary has increased, 68% belonged to medium income earning group (Rs 20000 to Rs 40000), 26.67 per cent beneficiary belonged to high income group (> Rs 40000) and handiest 5.33 per cent belongs to low income earning group (< Rs20000).

Swamy *et al.* (2018) studied that per farm income of non beneficiary group farmers in Highest Expenditure Mandals (HEMs) of Karimnagar was highest i.e. ₹.42120 and for beneficiaries of Lowest Expenditure Mandals (LEMs) of Karimnagar i.e ₹.3025. Income transition was clearly seen and majority of labourers crossed poverty line in HEMs of Karimnagar.

2.4 STUDIES RELATED TO THE IMPACT OF MGNREGA ON LABOUR AVAILABILITY FOR AGRICULTURE

Harish *et al.* (2011) concluded that the number of person days generated with the implementation of MGNREGA programme has increased significantly to 16 percent. The income has increased to the tune of 9.04 percent due to additional employment generated from MGNREGA and the labour scarcity has increased by 53 percent and 30 percent for weeding and sowing respectively due to the implementation of MGNREGA works.

Thadathil and Mohandas (2012) observed that the workers who had left agriculture and joined MGNREGA constituted only 16 percent of the sample population. It implied that MGNREGA is not responsible for the shifting of the labour from agricultural sector. They further stated that MGNREGA acts as a standard minimum wage, keeping the labour market wage rate high.

Nagaraj *et al.* (2014) observed that the labour use per ha of paddy has drastically reduced after MGNREGA to the extent of 20- 30% in both the study area reflecting the shortage of farm labour. The mechanical power used is almost doubled in case of paddy after implementation of MGNREGA. In the case of cotton, there was no significant change in labour and machinery used before and after MGNREGA, as cotton is not that labour intensive compare to paddy. Interestingly, it was observed that in spite of reduction in labour absorption, the productivity of paddy has increased after MGNREGA.

Reddy *et al.* (2014) suggested that in states like Andhra Pradesh, Punjab, Haryana, Uttar Pradesh, and Tamil Nadu after the introduction of NREGA there has been faced shortage after the implementation of NREGA. Labor shortage was also reported during peak paddy sowing season in Punjab and during apple harvesting season in Himachal Pradesh.

Verma (2016) found that the increased access to paid work due to NREGA has had a positive impact on women's socio-economic status and general well- being. Among all the states, 82 per cent of the widows in the

sample regarded MGNREGA as a very important source of income, and of the total sample, 69 per cent of the women stated that MGNREGA had helped them avoid hunger. So there has been some shift out agriculture into the NREGS, mainly with respect to female workers.

Thangamalar *et al.* (2016) analysed that the overall impact in soil ecology attributes, water attributes, crop attributes, society attributes, economics attributes, market attributes and labour availability attributes were ranging from 40 to 80% due to MGNREGA activities on agriculture. This was due to the MGNREGA activities like supply channel improvement, micro irrigation, deepening and strengthening of check dams. The study also indicated that MGNREGA work should be implemented in lean season. Therefore, agricultural works will not be affected and beneficiaries of MGNREGA workers will get income from both farm and nonfarm activities.

Alha (2017) in his study found that the impact of MGNREGA on contributing to the shortage of labour for agricultural operations was minimal since work availability in the programme does not clash with the agricultural season in the villages. The shortage in agricultural labour (if there is any at all) and their diversion from farms is due to factors outside MGNREGA, namely, migration and emerging non-farm opportunities in nearby villages and towns, either with higher wages or a steady income flow.

Khakwal *et al.* (2017) observed that the average number of days of employment as agricultural labour increased significantly from 73.16 days in 2007-08 to 81.15 days in 2013-14. The increase in employment during the period was estimated to be 10.9 per cent. The significant change was due to that the agricultural activities are always given utmost importance in the study area as the block comes under one of the highest agriculturally affluent zones of the state. It shows that there is least impact of the MGNREGA on the labour available for agriculture.

Lakshmi and Sundaramari(2019) reported that non-availability of labourers during peak season was one of the major constraint faced by the

paddy farmers due to the MGNREGA Programme. The shifting of agricultural labourers from agriculture to other occupations also led to the shortage of labourers. The number of persons engaged in agriculture in the state reduced drastically even as the total number of workers increased between 1993-94 and 2012-13.

2.5 STUDIES RELATED TO OPINION SURVEY ON MGNREGA

Bhargava (2013) observed that all the surveyed GPs have given wide publicity to the work to be executed under the scheme. Muster rolls were available for public scrutiny at the work site in major Gram Panchayats of Ajmer district. Majority of beneficiaries interviewed accepted that measurement of individual work under piece rate norms not conducted daily in transparent manner but no frequent visits were made by the VMC to the worksite.

De and Bhattacharya (2013) revealed that there was lack of awareness of the participants regarding the provisions of MGNREGA. The unawareness has been more pronounced in case of women. Not only that, age, education and occupational status inversely affect the participation level in the manual activities while participation from the poor and backward communities was significantly higher. Malpractices and corruption were to be controlled to make the development programmes truly inclusive across gender and class.

Sole (2014) observed that the respondents of the three villages were totally aware about the MGNREGA programme. The major source of information was by Gram Panchayats i.e., 78 per cent in Udaipur Kalan, 86 per cent from Patan and 74 percent from Bandarsindri got awareness from their Gram Panchayats and the remaining respondents information through their fellow wage seekers.

Maske (2015) in his study concluded that majority of the respondents in the study area were not aware of the MGNREGA programme. The awareness

about the workside provisions was 0 per cent. And the payments were also delayed in the study area which had to be given in fortnight after the work done.

Rao (2015) found that workers are not satisfied with the current wage rate and source of information etc. The wage rate provided under NREGP is Rs.150 per day, which is very low as compared to the wage rate in other daily works. But there is more job security compared to other private daily jobs. In this scheme, cardholders have been demanding for a wage increment. It is important that the information about the availability of work under NREGP correctly and timely available to the workers in various ways. SHGs playing a very important role in providing information about the availability of work under NREGP. Thirty-six per cent of the workers are getting information from SHGs and 40 percent of the workers are getting information from Panchayat members.

Shobha (2015) found that more than 80% of the women beneficiaries in both the Panchayat were aware about MGNREGA through their Panchayat members. More than 60% of the women beneficiaries recorded their attendance with the help of thumb. About 8% of the women beneficiaries in both the Panchayat had another family member working in same scheme. More than 40% of women beneficiaries of the both the Panchayat felt that there existed wage discrimination. The beneficiaries expressed dissatisfaction over the low wages given to them. But 85% of the women beneficiaries in Peedampalli and Pattanam Panchayat were satisfied with the scheme, inspite of low wages.

Devi and Nabakumar (2016) observed that only 32.5 per cent of the respondents have felt that introduction of MGNREGA leads to an improvement in the condition of the poor in their village to some extent. However, 66.5 per cent of the respondents have expressed that there have been not much change in the condition of the poor people. It is observed that 93.5 per cent of the respondents join the scheme with an expectation to get an opportunity of socialization with their friends and relatives and 93 per cent with an idea of local development.

Arya *et al.* (2017) concluded that 25 per cent of the family depends on services as the main source of livelihood. 20 per cent on farm labor and remaining on agriculture. 40 per cent of respondents are aware of NREGA. 35 per cent get information from panchayat. 30 per cent of respondents have idea on rules and regulations. Period of getting wage is 3-4 months. 50 per cent respondents are not aware of unemployment benefits and accidental benefits. All the respondents have a bank account. Most of them withdraw money through ATM. They learned monetary dealings.

Abymon *et al.* (2018) drew some conclusions that NREGA is the only source of income for 66% of the rural respondents. Only 24% of the workers have been provided with full 100 days of employment, while it was mandatory that 100 days of employment was to be provided for those who register under the Act. 100% respondents are of the opinion that the training provided was adequate. 100% of the workers are fully aware about the various allowances receivable under the scheme. 91% of the workers are of the opinion that their problems at the worksite are being addressed timely and effectively. The workers are not provided with crèche facility, which is provided in almost all the work sites in the northern states.

Ganaje (2018) revealed that availability of worksite facilities was important factor that can raise the profitability of the scheme in future. About 95 per cent out of the total 360 workers said that their job cards were not with them. Out of total sample of 360, 164 respondents (45.4%) reported that sometime wages were paid within a period of 15 days and majority of respondents reported that there is delay in payment of wages. And 91.7% have no awareness about worksite facilities.

Jahan and Mohan (2018) made a survey to elicit response from the beneficiaries of MGNREGA. This study provided an insight into the awareness of MGNREGA on a micro-level in J&K and indicated that the Government needs to step up its efforts to increase awareness as the beneficiaries still lack complete awareness about basic provisions of the Act.

Chapter – III

Material and Methods

Chapter III

METHODOLOGY

This chapter presents the procedural details in selecting the sample, method of data collection and analytical techniques employed in attaining the objectives of the study. This chapter is presented under the following heads.

3.1 SAMPLING DESIGN

3.2 COLLECTION OF DATA

3.3 METHODS OF COMPUTATION

3.4 TOOLS OF ANALYSIS

3.5 TERMS AND CONCEPTS USED

3.1 SAMPLING DESIGN

Purposive cum random sampling technique were employed for selection of sample in the present study.

3.1.1 Selection of the district

Since the implementation of MGNREGA in Chittoor, with the budget of Rs. 373937.87 lakhs, 183868739 days of employment across 66 mandals. Issued 674941 job cards. The MGNREGA is being implemented well in all the rural areas of Chittoor district and it stood in fourth position for the year 2017-18 with notable beneficiaries, it was purposively selected for the study.

3.1.2 Selection of mandals

The list of all 66 mandals of Chittoor district, was prepared and four mandals *viz.*, Pulicherla, Rompicherla, Chinnagottigollu and Vadamalapeta were purposively selected for the present study based on the highest average number of mandays.

3.1.3 Selection of villages

All the villages in selected mandals were listed out and two villages from each selected mandals were purposively selected based on the criterion of highest number man days thus the total sample villages to eight. The selected villages were Pathapeta, Devalampet, Bandakindapalle, Ganugachintha, Kotabylu, Thippireddygaripalle, Appalayagunta, Lakshammakandriga.

All the farmers in selected villages were listed out. From each village, 10 wage seekers of MGNREGA were selected at random. Thus, the total sample constitutes 80 respondents.

Table 3.1 : Distribution of sample among selected villages

S.No	Village	Wage seekers
1	Pathapeta	10
2	Devalampet	10
3	Bandakindapalle	10
4	Ganugachintha	10
5	Kotabylu	10
6	Thippireddygaripalle	10
7	Appalayagunta	10
8	Lakshammakandriga	10
	TOTAL	80

3.2 COLLECTION OF DATA

The data used in the study to fulfill the set of objectives were collected from the selected farmers through personal interview with the help of pretested schedules designed for the purpose. The data on family composition, land holding, cropping pattern, farm inventory of the selected respondents were collected. Besides, the data on input-output coefficients and prices of factors and farm products were collected. Further, an opinion survey was conducted to find out the benefits of the MGNREGA programme. Every effort was made at

the time of interview to convince the respondents that the study was undertaken purely for research and not for any other purpose. The data for the present study were pertained to the agricultural year 2018-2019.

3.3 METHODS OF COMPUTATION

An economic analysis of various crops under owned and tenant operated farms necessitates proper estimation of cost of resources, resource services and the valuation of output. The detailed procedures followed in computing the cost of cultivation is described below.

3.3.1 Human labour

Actual days worked in performing various cultural operations in the cultivation of paddy, tomato, groundnut, and sugarcane during *kharif* and *rabi* season were recorded separately for male, female, family and hired labour. The woman-days were converted into man equivalent days by assigning a ratio of 1.50 womandays equivalent to one manday. Human labour was quantified in terms of productive man work units (usually about 8 hours of productive work). Wages, whether paid in cash or kind or in combination of both were computed in rupee equivalent. Family labour was valued at the prevailing wage rate of casual labour for the similar operation in the study area.

3.3.2 Bullock labour

It included both owned and hired cattle power and was measured in terms of plough units of 6 hours. The cost of either owned or hired bullock labour was estimated at the prevailing wage rates in the study area.

3.3.3 Tractor services

Tractor services both owned and hired were charged at the prevailing rates in the locality per an hour of work.

3.3.4 Seed

The cost of both purchased and farm produced seed was estimated at the prevailing market price.

3.3.5 Farm Yard Manure

The cost of FYM per tone was calculated on the basis of prevailing market price both for purchased and owned quantities.

3.3.6 Fertilizers and plant protection chemicals

The cost of fertilizers and plant protection chemicals was estimated on the basis of prevailing market price.

3.3.7 Transportation cost

The amount spent on transporting the material inputs from house to the farm and produce from farm to home was considered as transportation cost. It varies according to distance and mode of transportation.

3.3.8 Interest on working capital

It was calculated at the rate of 7 percent per annum (the rate at which the institutional agencies advance short term loans) for half of the amount for full crop period and for the rest of the amount for half of the crop period since the financial resources were used at different stages of crop cultivation. Imputed value of family labour was excluded while computing the interest on working capital.

3.3.9 Repairs and maintenance charge:

Repairs and maintenance charges of missionary tools and implement used in the cultivation of different crops were computed on the basis of actual amount incurred by the farmer. Then the amount was apportioned according to the acreage under the selected crops.

3.3.10 Rental value of owned land

It was charged at the prevailing lease rates for the different crops in the study area for owner farmers.

3.3.11 Land revenue

Land revenue actually paid by the owner farmers was considered.

3.3.12 Rent paid for leased-in land

Rent actually paid by the tenant farmer to the land lords for different crops cultivated on leased-in lands was considered.

3.3.13 Depreciation

Annual amount of depreciation on each working asset owned by the owner and tenant farmers was calculated by following the straight line method. Later it was apportioned based on the acreage under different crops.

3.3.14 Interest on fixed capital

It was estimated at the rate of 9 per cent as the fixed deposits in commercial banks would fetch this rate of interest. Then the amount so calculated was apportioned on crop acreage. Since rental value was considered, land value was excluded from fixed capital.

3.4 TOOLS OF ANALYSIS

Both conventional and functional analyses were employed to analyse the data and arrive at valid conclusions. Simple arithmetic averages and percentages were worked out in order to find out costs, returns and farm efficiency measures. Functional Analysis was used to estimate the resource productivity and resource use efficiency.

3.4.1 Conventional Analysis

Averages and percentages were calculated through conventional analysis. The same pertaining to resource base, costs, returns and various measures of farm income were calculated and presented in the study.

3.4.2 Change in Income:

Change in income as a result of MGNREGA programme implementation was estimated as follows

Increase in income = Net income of beneficiary families after employment in MGNREGA – Net Income of beneficiary families before employment in MGNREGA.

3.4.3 Estimation of compound growth rate

Growth of any variable indicates its past performance. The analysis of growth is usually used in economic studies to find out the trend of a particular variable over a period of time. It clearly indicates the performance of the variable under consideration and hence it can be very well used for making policy decisions.

The growth rate was estimated using the exponential growth function of the form

$$Y=a*b^t*u^t$$

Where,

Y= Dependent variable for which growth rate was estimated

a= intercept

b = regression coefficient

t = time variable

u = disturbance term

The compound growth rate

$$r = (B-1)*100$$

3.5 TERMS AND CONCEPTS USED IN THE STUDY

The following are the terms and concepts used in the present study.

3.5.1 Farm

Farm is a piece of land where crops and livestock enterprises are taken up under common management and has specific boundaries.

3.5.2 Operational holding

It refers to the total land area held under single management for the purpose of cultivation.

3.5.3 Man Day

It refers to the work accomplished by a normal healthy human being in a day of 8 hours.

3.5.4 Cattle Pair Day

It refers to the work turned out by a pair of bullocks in a day of 6 hours.

3.5.5 Farm Assets

The physical property that has value owned by the farm business. Land, farm buildings, machinery, livestock, implements were included under farm assets.

3.5.6 Cost of cultivation

Cost of various resources and resource services used for raising a crop on a unit area.

3.5.7 Variable costs

Costs associated with the using of variable resources *viz* seeds, fertilizers, farm yard manure, plant protection chemicals, gypsum, human labour, bullock labour, tractor services etc.

3.5.8 Fixed costs

Costs associated with the owning of fixed resources. Depreciation, interest on fixed capital, land revenue and rental value of owned land were considered as fixed costs.

3.5.9 Paid out costs (Explicit costs)

These include payments made on the purchase or hiring of resources and resource services used in the production of crops by the farmer.

3.5.10 Imputed costs (Implicit costs)

These include costs of self-owned and self-employed resources and resource services. Rent on owned land, interest on owned fixed capital, wages to farmer's own labour and family were considered as implicit costs.

3.5.11 Gross returns

They are monetary values of total output (main+ by product) multiplied with their corresponding prices.

3.5.12 Net returns

They are arrived at by subtracting total costs from gross returns.

Chapter – IV

Results & Discussion

Chapter - IV

RESULTS AND DISCUSSION

The current chapter includes the results of the field investigation regarding the impact of the MGNREGA programme in Chittoor district of Andhra Pradesh. The major findings of the study are given under the following heads with relevance of the objectives of the study.

- 4.1 Socio economic profile of the selected wage seekers.
- 4.2 Progress and performance of MGNREGA in the study area.
- 4.3 Employment of MGNREGA workers in the study area.
- 4.4 Impact of MGNREGA on income of MGNREGA workers.
- 4.5 Impact of MGNREGA on labour availability for agriculture.
- 4.6 The opinion on benefits of the MGNREGA programme.

4.1 SOCIO ECONOMIC PROFILE OF THE SELECTED WAGE SEEKERS

Socio economic profile of the wage seekers include the details of family size, educational status, availability of family labour, land holding details, assets and cropping pattern of the wage seekers.

4.1.1 Composition of family members

The family composition regarding the male, female, children and farm family labour available in the family are given in the Table 4.1.

From the table it is observed that the average size of the family was 4.32 persons. In the total family members, male, female and children were 1.26, 1.40 and 1.66 respectively. The overall participation of family members in farm works was 2.50 persons. Out of the total persons, the share of male workers was 45.60 per cent where as it is 54.40 for the female workers and the children were not participated in the farm operations.

Table 4.1 Family composition and family labour contribution on selected farms (in number)

S. No.	Particulars	Farms family	Percentage
1. Family composition			
a.	Male	1.26	29.17
b.	Female	1.40	32.41
c.	Children	1.66	38.43
	Total	4.32	100
2. Farm family workers			
a.	Male	1.14	45.60
b.	Female	1.36	54.40
c.	Children	-	-
	Total	2.50	100

4.1.2 Education level of respondents

Education level of the wage seekers was represented in the table 4.2. From this it is clear that 13.75 per cent of the wage seekers were illiterate. The wage seekers who studied primary school and secondary school were sharing 23.75 and 40 per cent respectively. Respondents who completed their graduation were 22.50 per cent. Major proportion of people have completed secondary education.

Table 4.2 Education level of the respondents on farms (in number)

S. No.	Category of education level	Farms	Percentage
1.	Illiterate	11	13.75
2.	Primary school	19	23.75
3.	Secondary school	32	40
4.	College	18	22.50
	Total	80	100

4.1.3 Average size of land holding of sample farms

The average land holding size of the wage seekers was presented in the Table 4.3 and it was 2.06 hectares. Out of that, the area shared by dry land was 0.55 hectares which is 26.70 per cent and the area occupied by irrigated land was 1.51 hectares which is 73.30 per cent.

Table 4.3 Average size of land holding of sample farms (in hectares)

S. No	Particulars	Area (ha)	Percentage
1	Dry land	0.55	26.70
2	Irrigated land	1.51	73.30
	Total	2.06	100

4.1.4 Asset structure of sample farms

The economic profile of the wage seekers can be understood by assessing the composition of the farm assets. For this the farm assets were calculated and given in the Table 4.4.

The total value of assets including land value was ₹1789870.60 and the value of assets excluding land value was ₹164545.85 which is 9.19 per cent. The land value alone constituted ₹1625324.75 which is 90.81 per cent. The worth of farm buildings was ₹11565.42 which is 0.65 per cent, value of implements and machinery was ₹ 90405.87 which is 5.05 per cent and the worth of livestock was ₹ 62574.56 which is 3.5 per cent.

Table 4.4 Asset structure of sample farms

S. No.	Particulars	Farms	Percentage
1.	Value of land	1625324.75	90.81
2.	Value of farm buildings	11565.42	0.65
3.	Value of implements and machinery	90405.87	5.50
4.	Value of livestock	62574.56	3.50
5.	Value of total assets		
a.	Without land value	164545.85	9.19
b.	With land value	1789870.60	100

4.1.5 Cropping pattern on selected farms in Chittoor district

In the study area crops were cultivated in 2 seasons they were *Kharif* and *Rabi* as the area is having canal and bore wells for the irrigation. The cropping pattern includes mango, ground nut, sugarcane and paddy in *Kharif* season and mango and sugarcane in *Rabi* season. The cropping pattern on selected farms was presented in the Table 4.5.

Ground nut was grown in 0.55 hectares of dry land in *Kharif*. Mango, paddy and sugarcane were cultivated in 1.95 hectares of *Kharif* irrigated land. Out of which mango occupies 1.03 hectares, paddy occupies 0.44 hectares and sugarcane occupies 0.48 hectares constituting to about 52.82, 22.56 and 24.62 percentages. Sugarcane and mango were cultivated in 1.51 hectares of *rabi* irrigated land. Out of which sugarcane was cultivated in 0.48 hectares with 31.78 per cent and mango was cultivated in 1.03 hectares constituting to 68.21per cent.

Table 4.5 Cropping pattern on farms (in hectares)

S. No	Particulars	Area	Percentage
1	Kharif dry land		
	Ground nut	0.55	100
	Total	0.55	100
2	Kharif irrigated land		
	Mango	1.03	52.82
	Paddy	0.44	22.56
	Sugarcane	0.48	24.62
	Total	1.95	100
3	Rabi irrigated land		
	Sugarcane	0.48	31.78
	Mango	1.03	68.21
	Total	1.51	100
	Gross cropped area	4.01	

4.2 PROGRESS AND PERFORMANCE OF MGNREGA IN THE STUDY AREA

To assess the progress and performance of MGNREGA, the employment generated to different categories of people, work completion rate and financial performance of the programme in the study area is undertaken.

4.2.1 Employment of MGNREGA workers

To assess the progress and performance of MGNREGA, person days generated for SC , ST people and for women were taken and presented in the Table 4.6. For that, the data of total person days generated was taken from the year 2006-07 to 2018-19 in the study area.

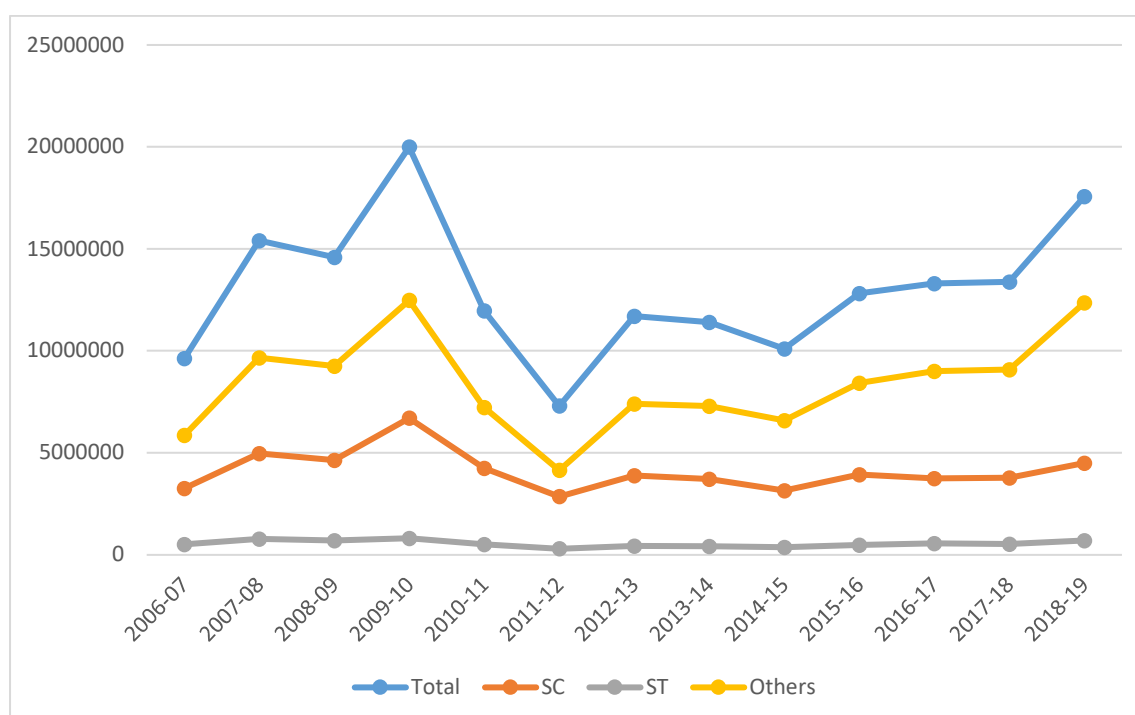
From the table, it is observed that the number of person days generated were increased from the year 2006-07 to 2018-19. The same is also observed with all the sectors. When the compound annual growth rate was calculated it is observed that there is a positive growth rate with total person days generated (0.72), others (1.80) and women (0.79). The share of SC people is 31.54 and for ST people is 4.16 per cent as the programme is also aimed to achieve strong social net for the vulnerable groups. The employment share for women is 58.35 per cent, equal and non-discriminatory wages to both men and women, no need of special knowledge, work timings and work within 5 kms helped women to participate in the work more actively than men. More participation of women was also observed in the work of Gulzar *et al.* (2016). There was a negative growth rate with SC (-1.22) and ST (-1.48). Similar results were observed with the findings of Ranjithumar. (2018)

Table 4.6 Extent of employment of MGNREGA workers

Financial year	Total person days generated				
	Total	SC	ST	Others	Women
2006-07	9626275.5	3258863	500665	5866747.5	5446482.5
2007-08	15401125	4964406.5	771984.5	9664734	9345717.5
2008-09	14583228	4641020	696071	9246137	8455870.5
2009-10	19997726.5	6704984	813567.5	12479175	11621664
2010-11	11964821.5	4239583.5	504255.5	7220982.5	6930631.5
2011-12	7304052	2857041	300058.5	4146952.5	4249512.5
2012-13	11697691	3882206	422426	7393059	6688238
2013-14	11400856	3706875.5	409242.5	7284738	6607987.5
2014-15	10096334.5	3151348.5	368402	6576584	5854750.5
2015-16	12814656	3922781	471279	8420596	7521187
2016-17	13299400	3742398	552276	9004726	7712442
2017-18	13386893	3770663	529716	9086514	7966450
2018-19	17565817	4500581	703557	12361679	10288702
Grand total	169138876 (100)	53342751 (31.54)	7043500.5 (4.16)	108752624.5 (64.30)	98689635.5 (58.35)
CGR	0.72^{NS}	-1.22^{NS}	-1.48^{NS}	1.80^{NS}	0.79^{NS}

Note: ** denotes significance at 1 per cent level,
 * denotes significance at 5 per cent level,
 NS denotes Non- Significant

Figure 4.1 Extent of employment of MGNREGA workers



4.2.2 Works undertaken and their completion rate under MGNREGA

From the Table 4.7, it is observed that the number of works undertaken is showing a positive growth of 12.23 as the works undertaken by MGNREGA for each year were increasing for creation of assets. And the number of works in progress were increased and the number of works completed also showing a positive growth of 9.8 where as the work completion rate is showing a negative growth of -2.15 and it is only 76.14 and 67.50 per cent work completion rate for the years 2017-18 and 2018-19 which is showing under capability of MGNREGA programme to develop into an asset creation programme. Due to the slack attitude of both workers and officials towards the programme, there was less work completion rate in the study area. The results were in conformity with the study of Ranjan. (2016).

Table 4.7 Works undertaken and their completion rate under MGNREGA

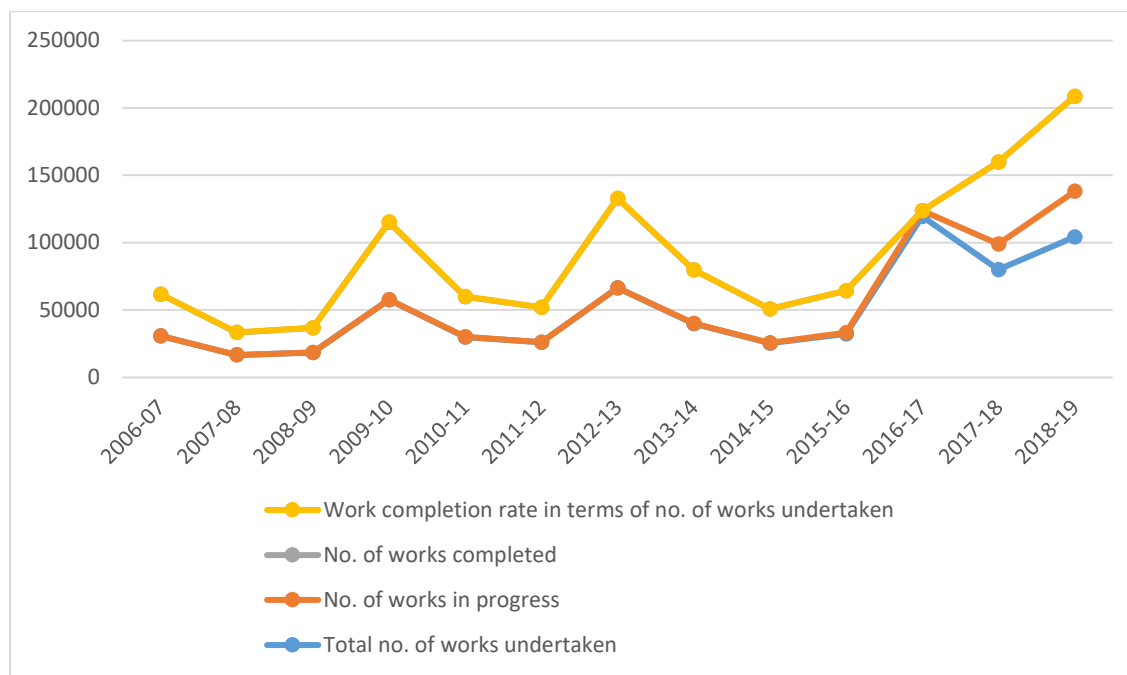
Year	Total no. of works undertaken	No. of works in progress	No. of works completed	Work completion rate in terms of no. of works undertaken
2006-07	30811	4	30,807	99.98
2007-08	16678	9	16,669	99.94
2008-09	18296	9	18,287	99.95
2009-10	57584	9	57,575	99.98
2010-11	29921	9	29,912	99.96
2011-12	25927	36	25,891	99.86
2012-13	66411	49	66,362	99.92
2013-14	39857	115	39,742	99.71
2014-15	25370	258	25,112	98.98
2015-16	32117	969	31,148	96.98
2016-17	119406	4,207	1,15,199	96.47
2017-18	79895	19,063	60,832	76.14
2018-19	104289	33,799	70,490	67.59
CGR	12.23**	114.67**	9.81*	-2.15*

Note: ** denotes significance at 1 per cent level,

* denotes significance at 5 per cent level,

NS denotes Non- Significant

Fig. 4.2 Works undertaken and their completion rate under MGNREGA



4.2.3 Financial performance of MGNREGA

The financial performance of MGNREGA was represented in the Tables 4.8 for India and 4.9 for Andhra Pradesh.

Financial performance is assessed by the utilization of available funds. The total available funds for the programme in India increased from the year 2006-07 to 2018-19, showed a compound annual growth rate of 4.37. The funds released from the centre at a compound annual growth rate of 5.53. The total expenditure also increased from 5880.80 lakh to 69618.59 lakh with a compound annual growth rate of 6.31. For the years 2016-17 and 2018-19 the per cent utilization of funds was more than 100 which were coinciding with the results of Giribabu *et al.* 2018.

Table 4.8 Financial performance under MGNREGA of India

Year	Central release (Rs. In lakh)	Total available fund (Rs. In lakh)	Total expenditure (Rs. In lakh)	Per cent utilization
2006-07	7382.08	10731.51	5880.80	54.80
2007-08	10307.70	16059.94	9833.95	61.23
2008-09	29939.60	37397.06	27250.10	72.87
2009-10	33506.61	49579.19	37905.23	76.45
2010-11	35768.95	54172.14	39377.27	72.69
2011-12	29189.77	48832.49	38034.70	77.89
2012-13	23579.18	39620.16	25074.69	63.29
2013-14	32743.68	42215.67	38672.40	91.61
2014-15	26710.96	31467.58	26404.45	83.91
2015-16	33309.83	39042.40	29436.45	75.40
2016-17	47411.72	57386.67	58062.92	101.18
2017-18	55659.93	64985.89	63649.48	97.94
2018-19	62125.07	69228.68	69618.59	100.56
CGR	5.53**	4.37**	6.31**	

Note: ** denotes significance at 1 per cent level,
 * denotes significance at 5 per cent level,
 NS denotes Non- Significant

Figure 4.3 Financial performance under MGNREGA of India

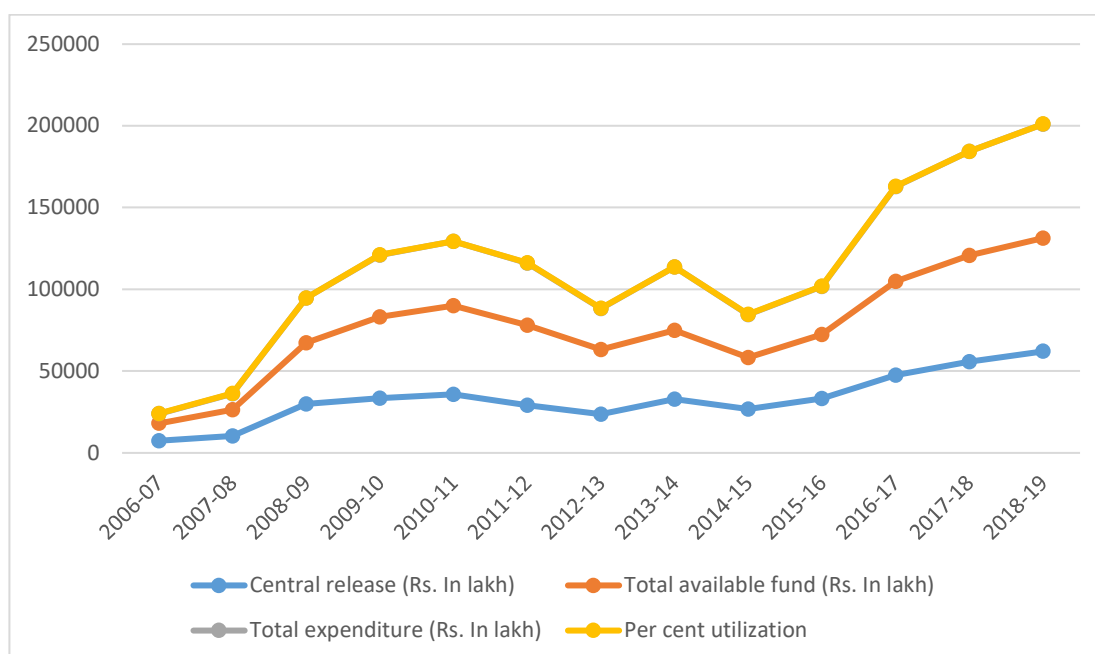


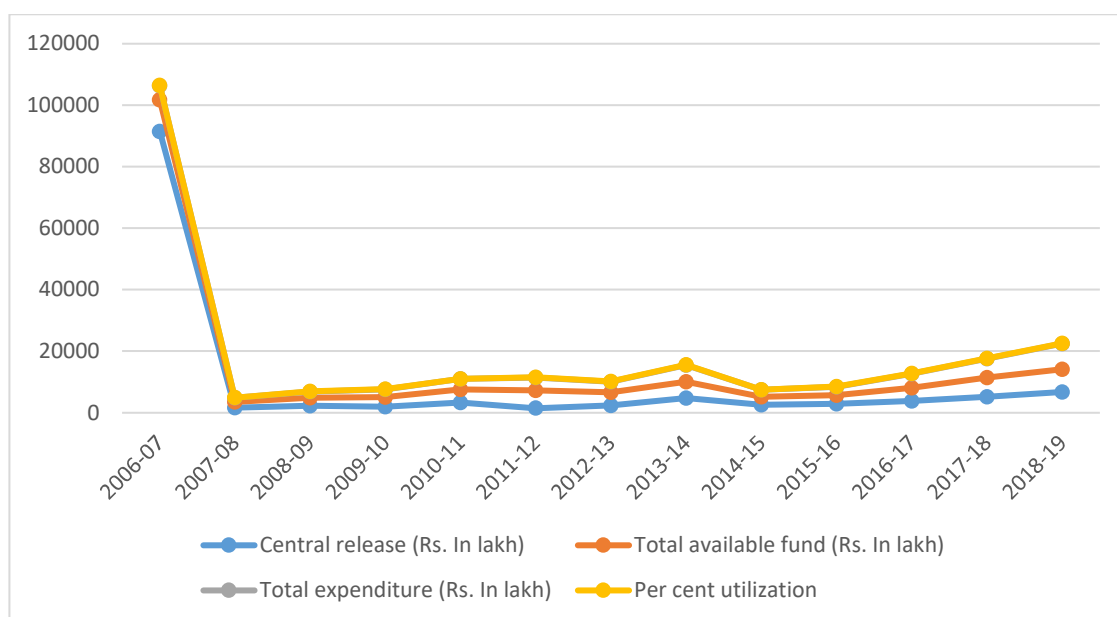
Table 4.9 Financial performance under MGNREGA of Andhra Pradesh

Year	Central release (Rs. In lakh)	Total available fund (Rs. In lakh)	Total expenditure (Rs. In lakh)	Per cent utilization
2006-07	91461.43	10231.88	4654.26	45.49
2007-08	1653.54	1885.68	1336.31	70.87
2008-09	2258.09	2592.17	2013.45	77.67
2009-10	1964.78	3125.18	2468.93	79.00
2010-11	3296.43	4317.38	3345.67	77.49
2011-12	1477.58	5781.51	4180.14	72.30
2012-13	2396.07	4206.10	3447.27	81.96
2013-14	4750.49	5344.79	5337.80	99.87
2014-15	2539.21	2676.78	2209.87	82.56
2015-16	2856.85	2808.27	2737.99	97.50
2016-17	3776.38	4270.607	4568.71	106.98
2017-18	5127.63	6280.71	6114.24	97.35
2018-19	6684.54	7400.36	8310.74	112.3
CGR	-1.47^{NS}	1.13^{NS}	3.41[*]	

Note: ** denotes significance at 1 per cent level,
* denotes significance at 5 per cent level,
NS denotes Non- Significant

The total available funds for the programme in Andhra Pradesh increased from 10231.88 lakh to 7433.36 lakh from the year 2006-07 to 2018-19 showed a compound annual growth rate of 1.13. The funds released from the centre decreased at a compound growth rate of 1.47. But the total expenditure increased from 4654.26 lakh to 8310.74 lakh from 2006-07 to 2018-19 with a compound growth rate of 3.14.

Figure 4.4 Financial performance under MGNREGA of Andhra Pradesh



4.3 EXTENT OF EMPLOYMENT OF MGNREGA WORKERS IN THE STUDY AREA

To assess the extent of employment of MGNREGA workers, compound annual growth rates were calculated for the households who got employment against the employment demanded and for the households who has completed 100 days of employment.

4.3.1 Demand based employment provided under MGNREGA

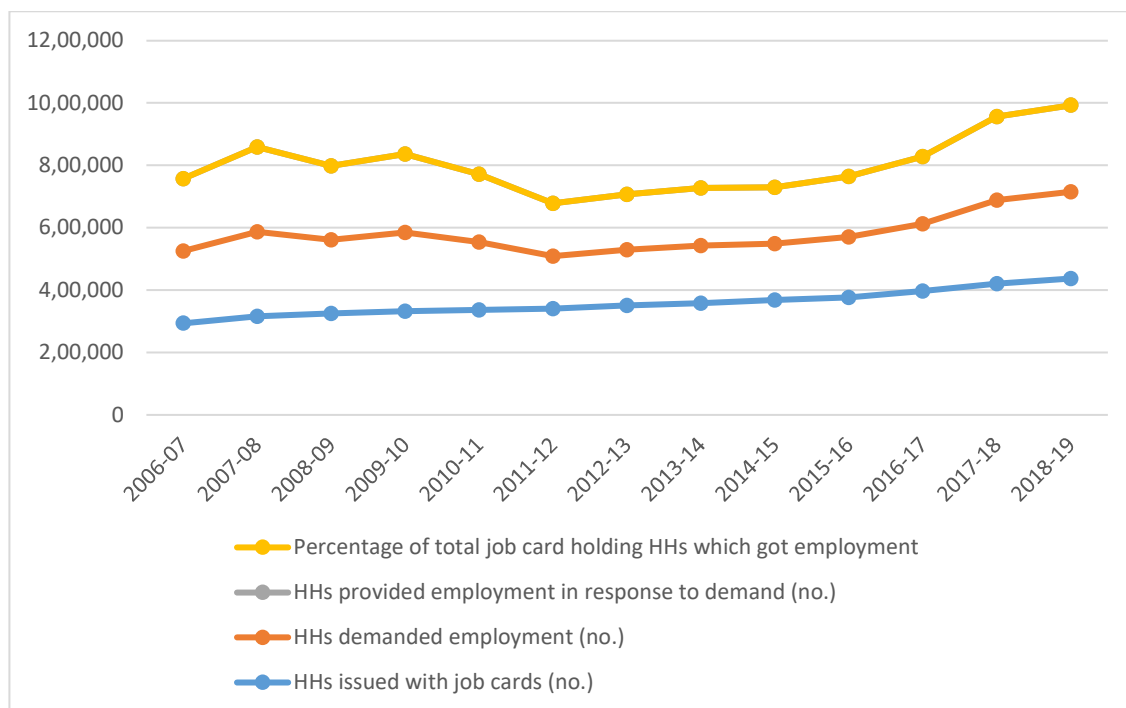
From this Table 4.10, it is showing that, the households issued with job cards is showing a positive growth of 2.92. The households demanding employment and provided with employment were same and showing a negative growth rate of 0.23. The results were similar to with the work of Farooque. 2013. The percentage of total job card holding household which got employment is showing negative growth rate of 3.06.

Table 4.10 Demand based employment provided under MGNREGA

Year	HHs issued with job cards (no.)	HHs demanded employment (no.)	HHs provided employment in response to demand (no.)	Percentage of total job card holding HHs which got employment
2006-07	293,607	231,952	231,952	79
2007-08	315,795	271,248	271,248	85.89
2008-09	324,416	236,808	236,808	72.995
2009-10	332,225	252,124	252,124	75.89
2010-11	336,268	217,550	217,550	64.7
2011-12	340,024	169,071	169,071	49.72
2012-13	350,877	178,167	178,167	50.77
2013-14	358,200	184,606	184,606	51.53
2014-15	368,264	180,333	180,333	48.96
2015-16	375,904	194,255	194,255	51.67
2016-17	397,214	215,490	215,490	54.25
2017-18	420,429	267,827	267,827	63.7
2018-19	437,060	277,909	277,909	63.58
CGR	2.92**	-0.23^{NS}	-0.23^{NS}	-3.06*

Note: ** denotes significance at 1 per cent level,
* denotes significance at 5 per cent level,
NS denotes Non- Significant

Figure 4.5 Demand based employment provided under MGNREGA



4.3.3 Households given full 100 days job

The number of households completed 100 days of work was showing a positive growth of 5.38. The percentage of households got 100 days work with respect to households issued with job cards is also indicating a positive growth rate. And the percentage of households got 100 days work with respect to households demanded employment and households provided with employment are same with a growth rate of 5.62. The results were confirmed by the work of Bahuguna *et al.* 2016. It was presented in the table 4.11.

Table 4.11 Households given full 100 days job

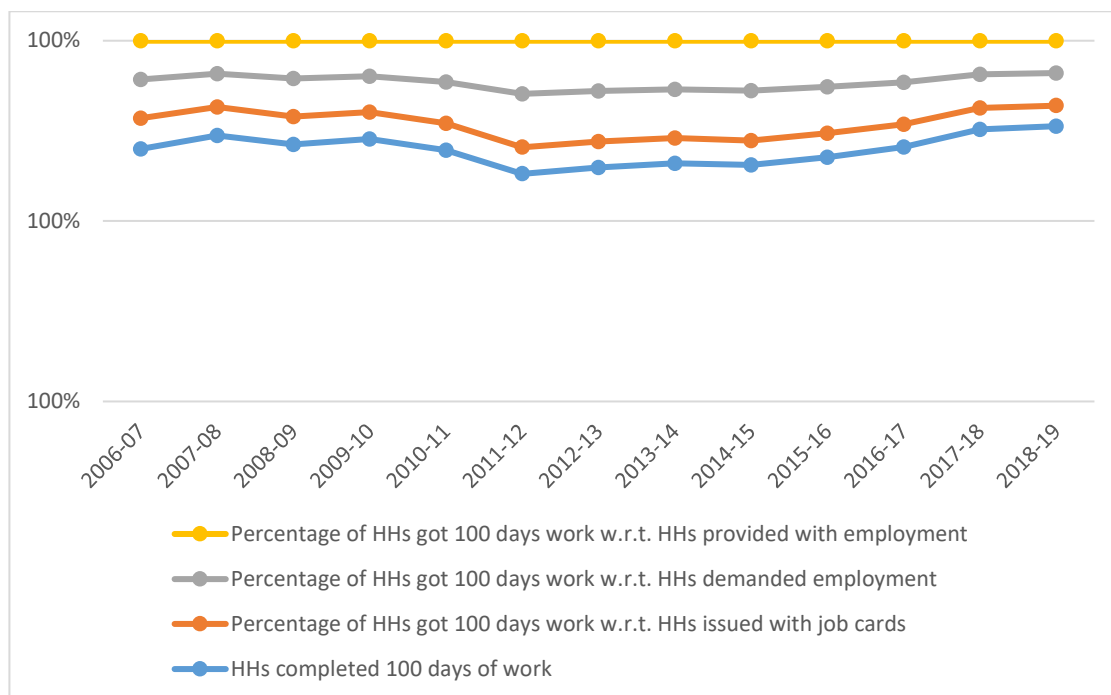
Year	HHs completed 100 days of work	Percentage of HHs got 100 days work w.r.t. HHs issued with job cards	Percentage of HHs got 100 days work w.r.t. HHs demanded employment	Percentage of HHs got 100 days work w.r.t. HHs provided with employment
2006-07	16,627	5.66	7.17	7.16
2007-08	40,884	12.95	15.07	15.07
2008-09	50,588	15.59	21.36	21.36
2009-10	76,706	23.09	30.42	30.42
2010-11	36,461	10.84	16.76	16.76
2011-12	40,106	11.80	23.72	23.72
2012-13	49,114	14.00	27.57	27.56
2013-14	51,079	14.26	27.67	27.67
2014-15	39,924	10.84	22.14	22.14
2015-16	50,737	13.50	26.12	26.12
2016-17	48,682	12.26	22.59	22.59
2017-18	59,459	14.14	22.20	22.20
2018-19	70,051	16.03	25.21	25.21
CGR	5.38*	2.39^{NS}	5.62*	5.62*

Note: ** denotes significance at 1 per cent level,

* denotes significance at 5 per cent level,

NS denotes Non- Significant

Figure 4.6 Households given full 100 days job



4.4 IMPACT OF MGNREGA ON INCOME OF MGNREGA WORKERS

Impact of MGNREGA on the income of beneficiaries was analysed by calculating the annual income of wage seekers from agriculture, non-agriculture and from before and after MGNREGA were calculated and presented in the Table 4.12.

The annual income from agriculture and non agricultural operations is Rs. 46082 and Rs. 6000. Additional income received from the implementation of MGNREGA is 20000 per annum. There was no change in the annual income received from agricultural and non agricultural operations due to the implementation of MGNREGA programme. Therefore, the net change in the annual income of the wage seekers is 20000 due to the implementation of MGNREGA programme. The percentage change in income was 27.75 per cent which is more than one fourth increase in the net annual income. Similar results were observed by Pamecha and Sharma. 2015.

Table 4.12 Impact of MGNREGA on income of beneficiaries

Particulars	Annual income			
	Agriculture	Non-agriculture	From MGNREGA	Total
Before MGNREGA	46082	6000	-	52082
After MGNREGA	46082	6000	20000	72082
Net change	0	0	20000	20000
Per cent of net change	-	-	-	27.75

Table 4.13 Distribution of the respondents according to their increased annual income due to MGNREGA

Categories	Beneficiaries(80)			
	Before MGNREGA		After MGNREGA	
	Number	Percentage	Number	Percentage
Low Income (<Rs. 30000)	44	55	3	3.75
Medium Income (Rs. 30000-90000)	21	26.25	58	72.50
High Income (>Rs. 90000)	15	18.75	19	23.75
Total	80	100	80	100

The distribution of beneficiaries according to the effect of MGNREGA on increase in annual income was presented in Table 4.13. The beneficiaries were categorized into 3 groups based on their annual incomes. They were low income group beneficiaries (<Rs 30000), medium income group beneficiaries (Rs 30000-90000) and high income group beneficiaries(>Rs 90000).

From the table, it is clear that, maximum number of beneficiaries (55 per cent) belongs to the low income level group (<30000), followed by medium

income group (30000- 90000) of 26.25 per cent and 18.75 per cent of high income earning group (>90000).

After the implementation of MGNREGA, the percentage of medium income group (30000-90000) has been increase from 26.25 per cent to 72.50 per cent, the percentage of high income group (>90000) also increased to 23.75 per cent, and the percentage of low income group (<30000) has been decreased drastically from 55 to 3.75 per cent due to the implementation of MGNREGA. The findings were confirmed by the work of Swamy *et al.* 2018.

4.5 TO ANALYZE THE IMPACT OF MGNREGA ON LABOUR AVAILABILITY FOR AGRICULTURE

Major operations performed for crops like mango, groundnut, paddy and sugarcane and their prevailing wage rates, labour required, labour availability, labour scarcity and absolute scarcity were calculated for the data collected in the study area. These were given in the Table 4.13.

The major crops grown in the study area were groundnut and paddy in *kharif* season, sugarcane in *rabi* season and mango is a perennial crop. The major agricultural operations in mango are digging of pits, planting, irrigation, weeding, fencing, watch and ward and harvesting. The major operations in groundnut are land preparation, sowing, weeding and harvesting. The major operations in paddy are land preparation, transplanting, weeding and harvesting. And the major operations followed in sugarcane are land preparation, sowing, weeding and harvesting.

The labour required for digging of pits in mango were 15 man days per hectare, the labour available before the implementation of MGNREGA was 13.96 man days per hectare which leads to the labour scarcity of 6.93 per cent, the labour available after the commencement of MGNREGA was 13.52 man days per hectare resulting in 9.87 percent of labour scarcity and the absolute scarcity due to the implementation of MGNREGA was 2.93 per cent. This process was continued for other operations and crops also. The average prevailing wage rate was Rs. 300 per day per person.

Table 4.14 Impact of MGNREGA on labour availability for agriculture

Season	Major crops	Major activity	Prevailing wage rate (Rs/day)	Labour required (labour days/ha)	Labour availability before MGNREGA	Labour availability after MGNREGA to MGNREGA	Percentage of Labour scarcity before MGNREGA to MGNREGA	Percentage of Labour scarcity after MGNREGA	Percentage of Absolute scarcity
Kharif	Mango	Digging of pits	300	15	13.96	13.52	6.93	9.87	2.93
		Planting	300	12.50	12.17	11.83	2.64	5.36	2.72
		Irrigation	300	9.50	9.21	9	3.05	5.26	2.21
		Weeding	300	6.50	6.32	6.21	2.77	4.46	1.69
		Fencing	300	16	15.50	14.98	3.13	6.38	3.25
		Watch and ward	300	24	22.89	22.50	4.63	6.25	1.63
	Groundnut	Harvesting	300	11	10.67	10.67	3.00	3.00	0.00
		Land preparation	300	3.50	3.36	3.20	4.00	8.57	4.57
		Sowing	300	4.5	4.10	3.89	8.89	13.56	4.67
		Weeding	300	17	15.78	15.23	7.18	10.41	3.24
		Harvesting	300	22	21.28	21.28	3.27	3.27	0.00
		Land preparation	300	5.50	4.80	4.44	12.73	19.27	6.55
Paddy	Transplanting	300	17.50	16.85	16.26	3.71	7.09	3.37	
	weeding	300	15	14.54	13.98	3.07	6.80	3.73	
	Harvesting	300	30	28.76	27.59	4.13	8.03	3.90	
	Land preparation	300	8.50	8	8	5.88	5.88	0.00	
	Sowing	300	30	28.57	28.25	4.77	5.83	1.07	
	Weeding	300	32	30.87	29.54	3.53	7.69	4.16	
Rabi	Sugarcane	Harvesting	300	98	95.48	93.82	2.57	4.27	1.69

On an average the absolute scarcity of the labour due to MGNREGA was around 0.5 to 6 per cent which was negligible. Similar results were observed in the research of Thadathil and Mohandas. 2012. This less scarcity of labour even after the implementation of MGNREGA was due to the planned schedule of MGNREGA works which were planned by the wage seekers and the MGNREGA staff combinedly.

The crop wise labour scarcity because of the implementation of MGNREGA was given in the Table 4.14. Labour required for the major operations under mango were 94.50 man days per hectare, labour available before the implementation of MGNREGA were 90.72 and the labour available after the implementation of MGNREGA were 88.71 leading to the labour scarcity of 4 per cent before the implementation of MGNREGA and 6.13 per cent after the implementation of MGNREGA. The implementation of the programme resulted in 2.13 per cent of absolute scarcity of labour.

Labour required for the major operations done under groundnut were 47 man days per hectare, labour available before the implementation of MGNREGA were 44.72, the labour available after the implementation of MGNREGA were 43.60 leading to the labour scarcity of 4.85 per cent before the implementation of MGNREGA and 7.23 per cent after the implementation of MGNREGA resulting in 2.38 per cent of absolute scarcity of labour due to the implementation of MGNREGA.

Labour required for the major operations done under paddy were 68 man days per hectare, labour available before the implementation of MGNREGA were 64.95, the labour available after the implementation of MGNREGA were 62.27 leading to the labour scarcity of 4.49 per cent before the implementation of MGNREGA and 8.43 per cent after the implementation of MGNREGA resulting in 3.94 per cent of absolute scarcity of labour due to the implementation of MGNREGA.

Table 4.15 Crop-wise labour scarcity due to implementation of MGNREGA in Chittoor district

Crop	Labour required (labour days/ha)	Labour availability before MGNREGA implementation (labour days/ha)	Labour availability after MGNREGA implementation (labour days/ha)	Labour scarcity before MGNREGA implementation (%)	Labour availability after MGNREGA implementation (%)	Labour scarcity due to MGNREGA implementation (%)
Mango	94.50	90.72	88.71	4	6.13	2.13
Groundnut	47	44.72	43.60	4.85	7.23	2.38
Paddy	68	64.95	62.27	4.49	8.43	3.94
Sugarcane	168.50	162.92	159.61	3.31	5.28	1.92

Labour required for the major operations done under sugarcane were 168.50 man days per hectare, labour available before the implementation of MGNREGA were 162.92, the labour available after the implementation of MGNREGA were 159.61 leading to the labour scarcity of 3.31 per cent before the implementation of MGNREGA and 5.28 per cent after the implementation of MGNREGA resulting in 1.92 per cent of absolute scarcity of labour due to the implementation of MGNREGA.

It reveals that the labour scarcity due to MGNREGA for mango is 2.13 percent, for ground nut is 2.38 per cent, for paddy it is 3.94 per cent and for sugarcane it is 1.92 per cent. Hence it was inferred that the MGNREGA programme has least impact on the labour available for agriculture.

4.6 TO STUDY THE OPINION ON BENEFITS OF THE MGNREGA PROGRAMME

An opinion survey was conducted to understand the opinions of the beneficiaries on the MGNREGA programme on the various aspects like, the implementation of the programme by Gram Panchayat, facilities provided at work place and other aspects. The results were given in the Table 4.15. The survey included yes or no questions for the convenience of the wage seekers.

From the table it was observed that, cent percent of the beneficiaries have awareness about the scheme and 100 per cent of the knowledge was provided by the field assistants and other staff of MGNREGA by conducting grama sabhas and meeting them personally.

On being asked about the implementation of the programme by gram panchayat, all were responded positively that, 100 per cent of job cards are being prepared by the gram panchayat only, attendance was marked daily in the muster rolls, the works executed were in good condition, panchayat has implemented the programme properly, panchayat has erected work site notice board at work site after completion of work, and all respondents were satisfied by the programme implementation by the gram panchayat. And 93.5 percent

respondents told that, notices related to MGNREGA were displayed in panchayat offices regularly.

The impact of MGNREGA was positive on the socio economic conditions of the beneficiaries. The programme helped as the livelihood for 93.75 percent of respondents and the socio economic status of the families has been improved for 91.25 per cent of the respondents.

All respondents liked the scheme and are interested to work under the scheme as it is a very good opportunity for them to work near by their villages and mostly women were attracted to MGNREGA as they were getting equal employment and wages unlike other works. All the beneficiaries have applied for the job card and all of them got receipt from the panchayat for the application.

Table 4.16 Opinions of beneficiaries on MGNREGA

S. No.	Questions	Percentage of YES	Percentage of NO
Awareness and source of knowledge			
1	Do you have knowledge / awareness about MGNREGA programme?	100	0
2	Has any officer /official provided knowledge / awareness about MGNREGA programme in your village / Gram Sabha?	100	0
Implementation of MGNREGA by Grampanchayat			
3	Has your job card been prepared under MGNREGA scheme by the Gram Panchayat?	100	0
4	Are notices related to MGNREGA put up in Panchayat offices regularly?	93.5	7.5
5	Whether your attendance is being marked in the muster rolls daily?	100	0
6	Whether works executed in your ward under MGNREGA Programme by the	100	0

	Panchayat are proper and in good condition?		
7	Whether the Panchayat has implemented the MGNREGA programme properly?	100	0
8	Whether the Panchayat has fixed/erected work site notice board at work site after completion of work?	100	0
9	Are you satisfied with the MGNREGA Programme/scheme being implementing by the Panchayat?	100	0
Socio economic impact of MGNREGA			
10	Does this type of scheme help as a livelihood option?	93.75	6.25
11	Whether socio economic status of your family has improved after implementation of MGNREGA programme?	91.25	8.75
Likeliness towards the scheme			
12	Do you like this scheme?	100	0
13	Are you interested in working under MGNREGA?	100	0
Enrolling for MGNREGA			
14	Have you applied for providing of employment under MGNREGA programme?	100	0
15	Have you got receipt from the Panchayat for application submitted for providing employment?	100	0
Employment generation			
16	Have you got 100 days work in a year under MGNREGA Programme/ Scheme?	100	0
17	Whether 100 days employment provided under MGNREGA Programme/ Scheme is less?	96.5	3.5

18	Whether employment provided under MGNREGA is required to be increased for more than 100 days?	96.5	3.5
Aspects of the programme			
19	Are any facilities provided at the worksite ?	100	0
20	Is work always given within 5 km of the village?	97.25	2.75
21	If not then do you get extra wages?	100	0
22	Have you got wages for the work done under MGNREGA within seven-fifteen days?	93.5	7.5
23	Have you received unemployment allowance in case the Panchayat failed to provide you employment within 15 days from the receipt of application for employment?	100	0
24	Are you aware about the grievance redressal mechanism?	100	0
25	Are there people in the village who do not have the job card but are interested in working under MGNREGA?	0	100
26	Are aged / disabled people also employed under MGNREGA?	100	0
27	Have you opened account in Bank/Post office for wages being received under MGNREGA programme?	7.5	93.5
28	Are you a skilled worker?	0	100
29	Are you an unskilled worker?	100	0
Suggestions			
30	Do you have any suggestions for improving this scheme?	95	5
31	Do you have any other livelihood option in your mind?	2.75	97.25

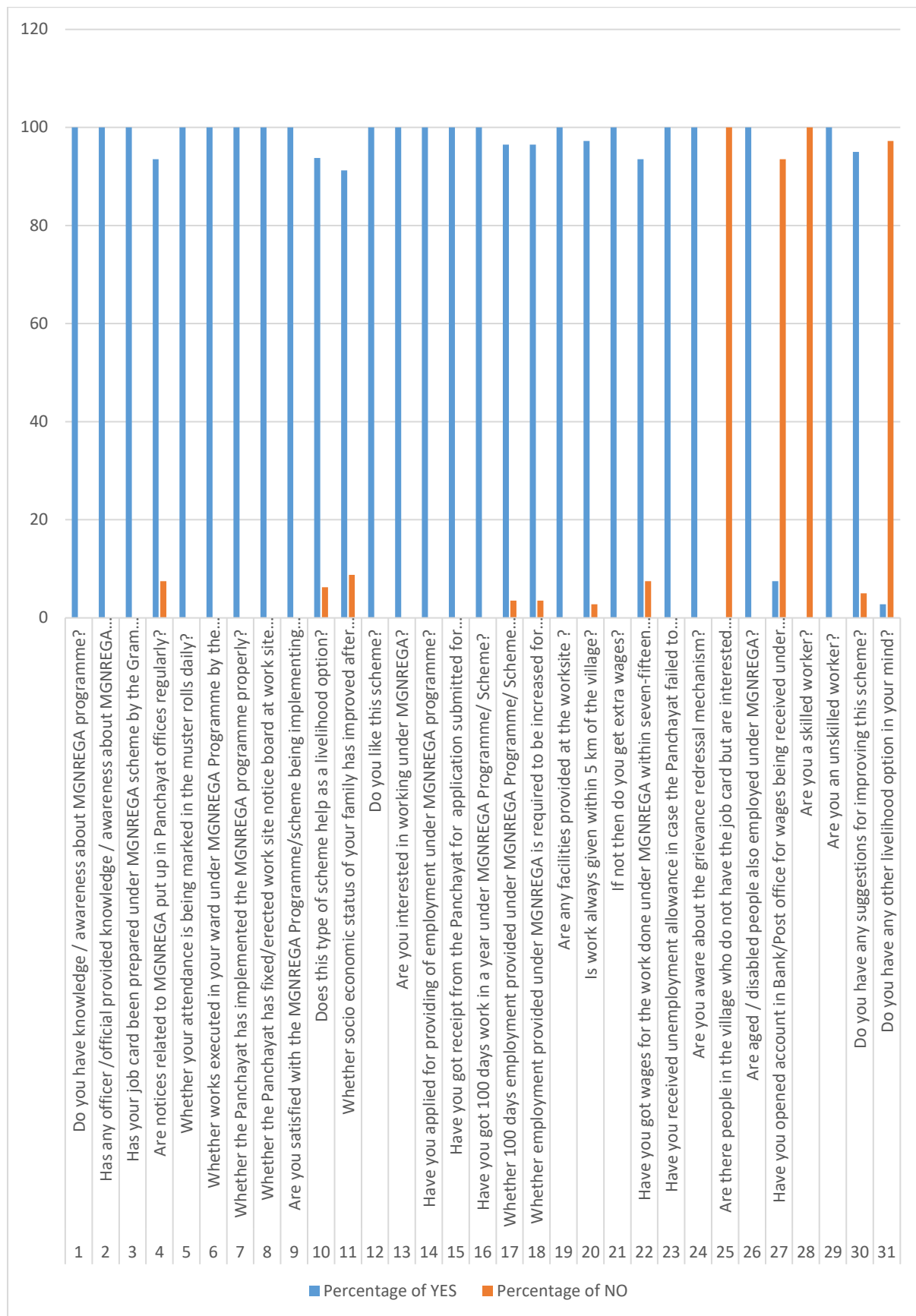
The respondents got 100 days of employment per annum. 96.5 per cent of employees felt that the 100 days of employment provided under the scheme was less and the employment days need to be increased as they will be idle for the remaining days in the year apart from the crop season.

On being asked about the aspects of the programme, cent per cent of the respondents told that they were provided with facilities at the work site like water, tents, cradles and other needed facilities, 97.25 percent respondents told that, work was given within 5 kms only, and 100 per cent of people said that, they were paid extra wages if it is not the case. 93.5 per cent of respondents are getting the wages credited in their account within a fortnight.

All the respondents have an idea about grievance redressal mechanism and unemployment allowances. Only 7.5 percent of respondents opened their bank accounts for the programme. All the respondents were unskilled workers.

Among the beneficiaries, 95 per cent of them have suggestions for improving the programme as to link the agricultural operations with the MGNREGA programme for reducing the labour cost in agricultural operations. And 2.75 per cent respondents have other livelihood options in their mind which are self employment works.

Fig.4.7 Opinion survey on the benefits of MGNREGA



Chapter – V

Summary & Conclusions

Chapter - V

SUMMARY AND CONCLUSIONS

Poverty and unemployment are the two major stumping blocks of developing countries. According to planning commission of India approximately 29.8% of population is Below Poverty Line (BPL). Nearly 72.22 percent of population live in rural areas and majority of them are suffering from seasonal unemployment, under-employment and disguised unemployment, even though the labour force in India is increasing numerously. (Source: Planning Commission)

Government of India focused at balanced growth and to overcome the troubles of previous employment programs, passed National Rural Employment Guarantee Act (NREGA) on August 25th, 2005 to empower the rural labourers to get 100 days of employment per household per year during off-season. The act has been launched on February 2nd, 2006 in Ananthapur district of Andhra Pradesh and it came to effect from April 1st, 2006 in 200 drought prone and backward districts in India. . Further the Government of India renamed its premium rural job guarantee programme- National Rural Employment Guarantee Act (NREGA) as Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) on 2nd October, 2009. The programme is aimed to provide employment to rural mass and to eliminate poverty.

Since the implementation of the programme in India, 14.61 crore job cards were issued, 3102.7 crore person days were generated till 2019-20 with the total expenditure of Rs. 619716.29 crore. The total number of active workers were 14.01 crore. Total person days generated were 268.24 crore, average days of employment provided per household were 41 with the average wage rate given per day per person was Rs. 200 for the year 2019-20. (www.nrega.nic.in, 2020)

The current scenario of AP- MGNREGA is that the total number of job cards issued were 6397284 till 2019-20. Over all 6514235 individuals were provided with employment in the year 2019-20 with the generation of 200792978 person days of employment. The average wage rate per day per person was Rs. 203 which is more than the national average of 200. And the average number of days employment provided per household was 50. (www.nrega.ap.gov.in, 2020)

The present study entitled “Study of Performance and Impact of MGNREGA in Chittoor District of Andhra Pradesh” was undertaken to assess the performance of the programme, employment and income generation through the programme, impact on labour availability to agriculture and opinion of the sample population.

5.1 THE OBJECTIVES OF THE STUDY

1. To assess the progress and performance of MGNREGA in the study area.
2. To assess the extent of employment of MGNREGA workers in the study area.
3. To evaluate the impact of MGNREGA on income of MGNREGA workers.
4. To analyze the impact of MGNREGA on labour availability for agriculture and
5. To study the opinion on benefits of the MGNREGA programme.

The study was conducted in Chittoor District of Andhra Pradesh in which 4 mandals were selected purposively on the basis of highest average man days per household per year. Using the same criteria from each mandal, 2 villages were selected purposively and from each village, 10 households covered under MGNREGA were selected randomly. Thus the total sample size of the study constitutes to 80. Both primary and secondary data were collected for the study. Primary data was collected from the selected respondents with

the help of pretested schedule. And the secondary data was collected from the website of MGNREGA (www.nrega.ap.gov.in) and District Water Management Authority (DWMA) office.

5.2 MAJOR FINDINGS OF THE STUDY

The composition of family members showed that the average size of the family was 4.32 persons and the total number of family workers was 2.5 including male and female labourers. The literacy of the respondents was 86.25 percent.

The average land holding size of the respondents was 2.06 hectares and the area shared by irrigated land was 1.51 hectares which is 73.30 per cent.

The total value of assets including land value was ₹1789870.60 and the land value alone constituted ₹1625324.75 which is 90.81 per cent.

The cropping pattern includes mango, ground nut, sugarcane and paddy in *Kharif* season and mango and sugarcane in *Rabi* season. The gross cropped area of the sample population was 4.01 hectares.

Growth rates of person days generated through MGNREGA in Chittoor district from the year 2006-07 to 2018-19 for total beneficiaries was 0.72, for women also it was positive of 0.79. But the growth rates of person days generated for SC and ST people were negative of 1.22 and 1.48. The share of person days generated by women was 58.35 per cent which is far more than the minimum share of 33 per cent.

Growth rates of total number of works undertaken was 12.23, number of works in progress was 114.67 and number of works completed was 9.81. But the work completion rate was in decreasing order from the year 2006-07 to 2018-19.

Growth rates of total available funds from the year 2006-07 to 2018-19 at national level, showed a compound annual growth rate of 4.37. The funds released from the centre at a compound annual growth rate of 5.53 and the

compound annual growth rate for the expenditure of funds was 6.31 and the per cent utilization of funds against the funds available for the year 2018-19 was 100.56 percent.

Growth rates of total available funds from the year 2006-07 to 2018-19 for Andhra Pradesh, showed a compound annual growth rate of 1.13. The funds released from the centre was at a negative compound annual growth rate of 1.47 and the compound annual growth rate for the expenditure of funds was 3.41 and the per cent utilization of funds against the funds available for the year 2018-19 was 112.3 per cent.

The growth rates of the households issued with job cards is showing a positive growth of 2.92. The households demanding employment and provided with employment were same and showing a negative growth rate of 0.23. The percentage of total job card holding household which got employment is showing negative growth rate of 3.06.

The number of households completed 100 days of work was showing a positive growth of 5.38. The percentage of households got 100 days work with respect to households issued with job cards is also indicating a positive growth rate. And the percentage of households got 100 days work with respect to households demanded employment and households provided with employment are same with a growth rate of 5.62.

The net change in the annual income of the wage seekers is 20000 due to the implementation of MGNREGA programme. The percentage change in income was 27.75 per cent which is more than one fourth increase in the net annual income.

After the implementation of MGNREGA, the percentage of medium income group (30000-90000) has been increase from 26.25 per cent to 72.50 per cent, the percentage of high income group (>90000) also increased to 23.75 per cent, and the percentage of low income group (<30000) has been decreased drastically from 55 to 3.75 per cent due to the implementation of MGNREGA.

On an average the absolute scarcity of the labour due to MGNREGA was around 0.5 to 6 per cent which was negligible. It was inferred that there was least impact of MGNREGA on labour availability for agriculture.

The opinion survey about the benefits of MGNREGA reveals that 95 to 100 per cent of the responses given by the beneficiaries were positive. They have full awareness about the programme, the implementation of the programme by the gram panchayat was good, the socio economic status of the beneficiaries has been improved, the registration process was also simple and they are enjoying the facilities provided by the programme as they felt that it was a better employment generating programme.

5.3 CONCLUSIONS

Growth rates of person days generated through MGNREGA in Chittoor district for total beneficiaries and women were positive. But the growth rates of person days generated for SC and ST people were negative.

Growth rates of total number of works undertaken, number of works in progress and number of works completed were highly positive. But the work completion rate was in decreasing order.

Growth rates of total available funds at national level, showed a positive compound annual growth rate. The growth rates of funds released from the centre and the expenditure of funds was also positive. The percent utilization of funds was in an increasing rate.

Growth rates of total available funds for Andhra Pradesh, showed a positive compound annual growth rate. The compound annual growth rate of funds released from the centre was negative and the compound annual growth rate for the expenditure of funds was positive. The per cent utilization of funds against the funds available was in varying rates.

The growth rates of the households issued with job cards is showing a positive growth. The households demanding employment and provided with employment were same and showing a negative growth rate. The percentage of

total job card holding household which got employment is also showing negative growth rate.

The number of households completed 100 days of work was showing a positive growth. The percentage of households got 100 days work with respect to households issued with job cards is also indicating a positive growth rate. And the percentage of households got 100 days work with respect to households demanded employment and households provided with employment are same with a positive growth rate.

The percentage change in income after the implementation of MGNREGA was more than one fourth increase in the net annual income of the beneficiaries through all the sources of income.

After the implementation of MGNREGA, the percentage of medium income group has been increased, the percentage of high income group and the percentage of low income group has been decreased drastically due to the implementation of MGNREGA.

The average absolute scarcity of the labour due to the implementation of MGNREGA was negligible and there was least impact of MGNREGA on labour availability for agriculture.

The over all survey about MGNREGA reveals that most of the respondents were satisfied and very positive.

5.4 POLICY IMPLICATIONS

1. The person days generated for the lower section people has been decreased over the years. It has to be taken care that the participation of these people to be increased.
2. The workers and officials need to be trained to work qualitatively so as to improve the work completion rate.
3. The households demanded and provided with employment have to be on par with the households issued with the job cards.
4. The MGNREGA can be linked with agricultural operations so that the cost of production for the crops can be decreased.

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