Livelihood Pattern in Agricultural Dominant Area: A Case Study in Two Development Blocks of Lakhimpur District

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Abstract

Around 85.90 percent of population in Assam lives in rural areas (as per Population Census, 2011), which is very high as compared to the national level. The agriculture sector dominated the rural economy of the State in terms of employment. But the contribution to the State GDP is very low as compared to the national level as well as other States in India. There are number of reasons found behind it by the researchers and policy makers. For example, traditional methods of cultivation, poor infrastructure facilities and poor skill of workers etc As a result the rural workers moved towards different activities. In this study, an attempt was made to examine the rural livelihood pattern in the Lakhimpur district of Assam. The whole Study based on both primary and secondary sources of data. The primary data was collected through multi-stage sampling technique. The total number of sample of the study was 90. The results of the study found that majority of surveyed households in the surveyed areas dependent on cultivation and allied activities for their livelihood. However, a small portion household found to involve in different non-agriculture activities as well as agriculture for earning income and fulfill their basic needs. But, the available activities in the surveyed areas were found very low. A limited numbers of activities found in the study area where all the workers were involved.

Keywords : 1.Agriculture Worker, 2.Non-agriculture Worker, 3.Gender, 4.Muli-Stage Sampling and 5.Composition of Income.

1. Introduction

Still, rural areas in Assam are in underdeveloped stage as compared to other states in India. Majority of rural people mainly depends on agriculture and allied activities for their livelihood in terms of employment. On the other hand, poor development of basic infrastructural facilities, lack of efficient agricultural policies, frequent floods, seasonal nature of agriculture system and traditional method of cultivation etc. stood as barrier in the path of development in rural areas. Due to this may be a huge portion peoples still lives under the below poverty line (BPL). However, many studies found that some workers in the rural areas move towards the other activities i.e., non-farm activities for fulfill their basic

needs. But, due to poor skill, low education level of the rural workers and lack of available jobs etc., unable to improved their standard of their living as like the urban areas. Therefore, a huge inequality has been seen between the rural and urban peoples in Assam. Hence, an attempt was made in this study to analyze the livelihood pattern of the rural peoples in the study areas and their socio-economic condition.

2. Objectives

The objectives of the study are as follows:
a. To examine the socio-economic condition of rural workers in the study area
b. To examine the nature of employment of rural workers by gender wise in the study area.

3. Data and Methodology

The whole study based on the both primary and secondary sources of data. The secondary data was collected from the various government sources like- population census, basic statistics report etc. The primary data was collected from a survey of 90 sample households in three villages from North-Lakhimpur Subdivision of Lakhimpur District of Assam. The surveyed households were selected through multi-stage sampling techniques. At the first stage, a sub-division was selected purposively on the basis of distance from the district headquarter viz., North-Lakhimpur. At the second stage, two development blocks were selected purposively viz., Nao-Boichya and North Lakhimpur, on the basis of distance from the sub-division head quarter. At the third stage, total three villages were selected purposively on the basis of two criterions: i. distance from block head quarter and ii. size of the total population of the village. Out of this three selected village one from North Lakhimpur block and two from Nao-Boichya block. An attempt was made to include low (less than 500 population), medium (500 to 1000 population) and big (more than 1000 population) size of village. Finally, 25 households from the village with low and medium population size and 40 households from the village with high population size were selected randomly. A well structure questionnaire and open ended interviews method used for collecting information from the sample households.

4. Brief profile of the Study area (Blocks)

Total area of Lakhimpur district is 2277 sq. km including 2240.85 sq. km rural area and 36.15 sq. km urban area. According to population census 2011, total population in Lakhimpur district were 1042137 out of this 91.23 percent were lived in rural and rest 8.77 percent were lived in urban. There are four sub-division found in the respective district viz., North-Lakhimpur, Dhakuakhan, Naraunpur and Bihupuria. On the other hand, the district consisted of 7 development blocks. Out of this 7 development blocks, two blocks viz., North Lakhimpur and Noaboichya had taken in this study. The details of the selected development blocks are shown in Table 1.

Table 1: Brief Profile of the Surveyed Blocks

		Nao-Bochiya	North Lakhimpur
Rural Population	Male	75537(50.70)	97407(51.04)
	Female	73436(49.30)	93422(48.96)
Literate	Male	47793(55.85)	69392(55.05)
	Female	37783(44.15)	56662(44.95)
Total Worker	Male	38626(69.49)	50653(67.64)
	Female	16966(30.51)	24236(32.36)

Total Main Worker	Male	30398(83.42)	40505(79.90)
	Female	6042(16.58)	10194(20.10)
Total Main Agriculture Worker	Male	19025(88.95)	22919(81.54)
	Female	2365(11.05)	5190(18.46)
Total Main Non Agriculture Worker	Male	11373(75.57)	17586(77.85)
	Female	3677(24.43)	5004(22.15)
Total Non Worker	Male	36909(39.52)	46754(40.32)
	Female	56470(60.48)	69186(59.68)
	Male	6286(51.16)	27720(50.91)
	Female	5997(48.84)	26726(49.09)
Schedule Caste	Total	(8.24)	(28.53)
	Male	9389(50.72)	10679(51.27)
	Female	9122(49.28)	10152(48.73)
Schedule Tribe	Total	(12.42)	(10.91)

Source: Population Census, 2011.

Table 1 clearly shows that there are marginal differences between number of male and female in the selected blocks. In case of literacy rate, the difference between male and female is found almost same in both the blocks. Regarding the total main worker, the participation of male was around 83.42 percent in Nao-Boichya block whereas 79.90 percent male participant found in North Lakhimpur block. It is also implies that the number of female as main worker is comparatively very low than the male main worker in both the selected blocks. In case of non- workers, the number of female was found high than the male in both the blocks. But, the number of female non-agricultural worker was comparatively very high than the female agricultural worker in both the selected blocks. For example- about 24.43 percent and 22.15 percent female worker engaged in non-agriculture sector in the respective Nao-Boichya and North Lakhimpur blocks whereas 11.05 percent and 18.46 percent female workers found to engage in agriculture sector. It refers that the male workers as well as female workers mainly dependent on non-agriculture sector though the areas dominated by agriculture sector. on the other hand, 8.24 percent of SC people and 12.42 percent of ST people's lives in Nao-Boichya blocks whereas 28.53 percent and 10.91 percent of people's lives in North Lakhimpur block.

4. Result and Discussion

The major findings of the study are discussed and summarised as furnished in the Table 2 below.

Table 2: Details of the Sample Households

Total Sample Household	90
Total Population in the Sample HH	395
Female in the Sample Household	47.6 percent
Male in the Sample Household	52.4 percent
Average Family Size of the Surveyed Household (Person)	4
Average Dependent Member of the Surveyed Household (Person)	2
Number of children less 18 years	3.8 percent
Number of old people (>65 years) living in household	6.1percent

Members of labour force in the households	90.1percent
Members of Work force in the households (Active)	62.12 percent
Average Year of Schooling of the Household Head	8 Years
Average Age of the Household head	54 Years
Average Age of the Sample Household (Overall)	31.71 Years
Average Age of the Female in Sample Household	29.7 Years
Average Age of the Male in Sample Household	32.4 Years
Overall Literate in the Sample Household(excluding less than 7 years person)	94.8 percent
Overall female Literate in the Sample Household(excluding less than 7 years person)	85.7 percent
Overall male Literate in the Sample Household(excluding less than 7 years person)	95.5 percent
Average Years of Schooling of Working Person (18-65 Years) in the sample Household	9.08 Years
Type of House	
Kutcha House	29.6
Semi Pucca House	46.8
Pucca House	23.6
Characteristics of the agricultural holding	
Homestead	22.37 hc
Land operated (both permanent and seasonal land)	100.09 hc
Total Land Owned	122.46 hc
Per Capita Land	0.98 hc

Note: hc indicates hector
Source: Filed Survey, 2019

Out of the total surveyed households in the study area, about 52.4 percent were male and 47.6 percent were female. This included all the population. The overall age of the total sample, irrespective of gender, is 31.71 years. However, the gender specific age is 32.4 years for male and 29.7 for female. The average age of male is marginally higher than that of female. Around 3.8 percent of the member in the sample household found in the age below 18 years and 6.1 percent of member was found in the old aged person (more than 65 years).

The average age of household head in the surveyed area was found 54 years. However, the overall mean age of the surveyed areas was 31.71 years. On the other hand, mean age of male and female were 32.4 years and 29.7 years respectively in the surveyed areas.

. While literacy represents minimum formal education, attempt is made to take an account of those who could read, write, and do simple arithmetic. In case of literacy (Table 1), the overall literate population is 94.8 percent and the rest 5.2 percent are illiterate (exclusive of less than 7 years person). However, the literacy rate of male and female were 95.5 percent and 85.7 percent respectively in the overall survey households. On the other hand, average year of schooling of the household head was found 8 years and mean year of schooling of the working people (age between 18-65 years) was 9.08 years.

One important dimension of the household characteristic is the Average family or household size. It can be seen from Table 2 that on the average the family size for the overall study area is almost four individuals per household. It referes that majority of surveyed household was nuclear in nature. However, two members in the surveyed household was found as dependent member. Regarding the dependent member in the surveyed households include children, old-aged or retierd persons.

It is Equally important to examine the condition of rural houses. House types not only reveal the economic status but also highlight the resource dependence of the household. From Table 1, it can be seen that the house types are classified into three categories-Kutcha, Semi-Pucca and Pucca. The majority of surveyed households found to live in the Semi pucca houses, which is relatively high in case of both Kutcha and Pucca house types. It can be seen from the Table 2 that only about 23.6 percent are fully pucca house types. Whereas more than 45 percent are Semi pucca houses. Kutcha house types are about 29.6 percent. It is worth mentioning that almost all the semi-pucca houses were built by the Government Yojona like-IAY and some houses found which was built by ownself.

Land is one of the major factor in determining the resource base of an individual household and thereof the social status in a rural economy. Total own land in the surveyed household was found 122.46 hectar while 22.37 hectar of land was belongs to homestead and rest 100.09 hectar of land was used as operated land by the households. However, the per capita land was found only 0.98 hectar in the study areas. The details are given in Table 2.

For the purpose of examine the land size of the surveyd households in the surveyed areas, the land size classified into four categories. These are Marginal, Medium, Small and Large size of land holdings. The details are shown in Diagram 1.

Diagram 1: Land Size of the Surveyed Households(in percent)
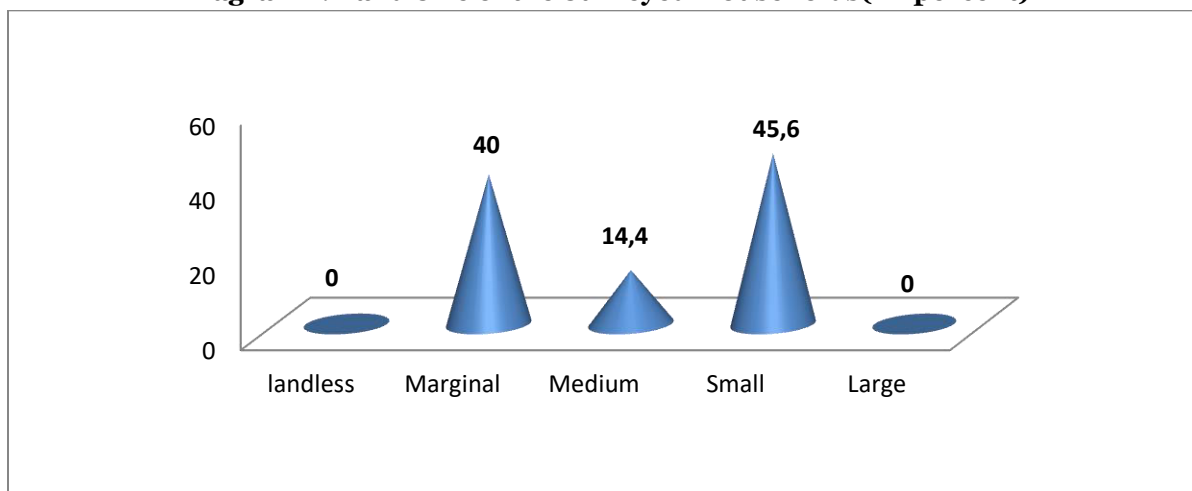
Note: Author categorised the land size on the basis of availability of land
Source: Field Survey, 2019

Diagram 1 clearly shows that majority of surveyd households are belong to Small size of land holding category (45.6 percent), followed by Marginal (40 percent) and Medium size of land holdings

(14.4 percent). But, it is surprising that not a single household is found as landless and large size (4 hectar and above) of land among the surveyd households.

On the other hand, about 90.1 percent of peoples were found in labour force category. But, only 62.21 percent laboures were found to engage in different economic activities directly or indirectly in surveyd areas. Table 3 shows the employed workers in different economic activities. In this study, the activities of the workers are classified on the basis of available in the surveyed villages. The details are shown in the Table 3.

Table 3: Occupation among the Surveyed Households (in percentage)

Activities	Percent
Cultivation & allied activities	63.3
Agricultural Daily Labour	2.3
Agriculture Sector (Overall)	**65.6**
Petty Trade & Business	12.8
Salaried job (Both Public & Private)	16.5
Non- Agriculture Daily Labour	1.8
Other	3.2
Non-Agriculture Sector (Overall)	**34.4**
Total (Agriculture and Non-Agriculture)	**100**

Source: Field Survey, 2019

Table 3 reveals that majority of the workers in the surveyed villages mainly involoved in Agriculture sector (65.6 percent) and rest 34.4 percent were engaged in non-agriculture sector. Among the non-agriculture sector, around 16.5 percent workers found to engage in salaried jobs (both public and private sector job). But, the majority of salaried job workers were found in the private sector (like- private company and salesmann etc.). It is followed by petty trade and business (12.8 percent), other activities(3.2 percent) like- carpenter, plumber, electrician, cook etc., and daily wage labour in non-agriculture sector (1.8 percent). On the other hand, among the agriculture sector a huge portion of peoples dependent on cultivation (63.3 percent) and only 2.3 percent workers engaged as daily wage labourer in farm sector.

Education is a very important determinant for examined developed of the society. Therefore, an attempt was made to examine the education level of the surveyed households by gender wise. The details are shown in Table 4.

Table 4: Education level among the Surveyed Household by Gender wise (in percent)

Schooling	Female	Male	Overall
Illiterate	14.3	4.5	8
Lower Primary(Class I-V)	16.7	15.6	16.1
Middle School(ClassVi-Viii)	15.7	25.6	20.9
High School (Class IX-X)	29.4	20.1	25.2
Higher Secondary School (Class XI-XII)	15.3	20.6	18.2
Bachelor Degree	8.0	12.6	10.8
PG & Others	0.6	1.0	0.8

Source: Field Survey, 2019

Table 4 clearly shows that out of the total population in the surveyed villages 85.7 percent female was literate and 95.5 percent literate was male. Among the female, 29.4 percent were belongs to High school category followed by Lower primary (15.7 percent) and higher secondary (15.3 percent). Only 8.6 percent female have higher education degree. Regarding the Males, 13.6 percent found to have higher education degree which is comparatively high than the female in the surveyed households. Rest 81.9 percent of male have education up to or under the class 12.
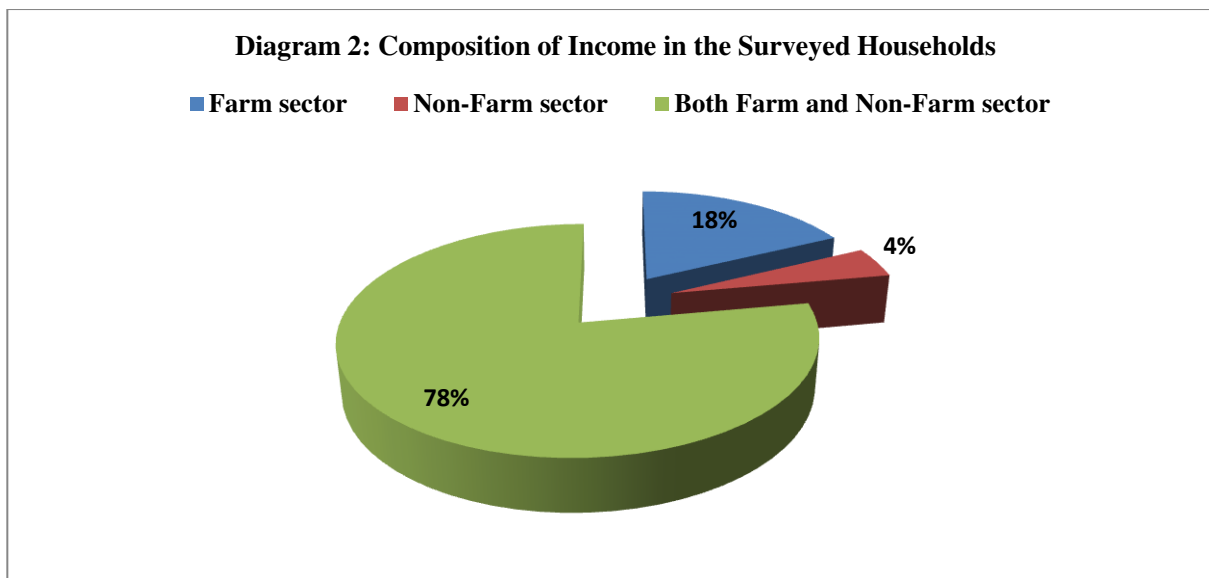
An attempt was also made to analyse the different economic activities among the surveyed households by Gender wise. The details are shown in Table 5.

Table 5: Economic Activities among the Surveyed Households by Gender wise (in percent)

Activities	Female	Male	Overall
Cultivation & allied activities	61.9	64.4	63.3
Agriculture Daily Wage Labour	3.1	1.7	2.3
Petty trade & Business	11.3	14.0	12.8
Salaried Job	19.6	14.1	16.5
Non-Agricultural Daily Wage Labour	1.0	2.5	1.8
Others	3.1	3.3	3.2

Source: Field Survey, 2019

It has been found that majority of both male (64.4 percent) and female (61.9 percent) workers in the surveyed households engaged in Cultivation and Allied activities. But, participation of male is comparatively high than the females. In case of agricultural daily wage labour, females workers (3.1 percent) are comparatively high than males (1.7 percent). This may be due to female workers mostly demanded in rural areas during the harvesting time of cultivation and for that no need much skill. Regarding the salaried jobs (both public and private), 19.6 percent of workers are female whereas 14.1 percent are male. But majority of salaried job workers found to relate with private sector job like-company job, salesman, and security guard basically engaged in low skilled jobs. In case of petty trade and business, 11.3 percent of workers are female and 14 percent are male. It shows that marginally high than that of female workers in trade and business.

Diagram 2: Composition of Income in the Surveyed Households

■ **Farm sector**　　■ **Non-Farm sector**　　■ **Both Farm and Non-Farm sector**

Source: Field Survey, 2019

Regarding the composition of income in the surveyed households found that majority of the surveyed households depends on both farm and non-farm income sources (77.8 percent). However, 17.8 percent households found who completely dependent on farm sector. This may be due to lack of alternative jobs, small size of family, low level of schooling of the workers and also low numbers of dependent members etc. Around 4.4 percent surveyed households found as dependent on non-farm sector. It may be due to poor skill and techniques, lack of capital, Lack of credit facilities, poor infrastructure in areas etc. The details are given in Diagram 2.

5. Conclusion

From the whole study, it is clear that a major portion of the surveyed family were nuclear and number of dependent member on an average only 2. Most of the dependent members in the households found either students or aged persons. Though, more than 90 percent of peoples in the surveyed villages were literate but average years of schooling of the peoples found only 9. On the other hand, around 65 percent worker in the surveyed villages is found to involve in agriculture sector and rest 35 percent is engaged in non-agriculture sector. It is clear from that that the agriculture and allied activities are dominated the majority of surveyed households. However, non agriculture sector is also played an important role in case providing employment. For example- around 16.5 and 12.8 percent of workers are found to involve in salaried jobs and petty trade & business respectively. On the other hand, more than 75 percent of surveyed household is found to depend on both farm and non-farm income sources for fill up their daily needs. Hence, it could be seen that though the agriculture sector dominated the surveyed areas but non-agriculture sector also assist the surveyed households in case of earning income.

Reference

1. Babatunde, R.O. and Matin, Q (2009). Patterns of income diversification in rural Nigeria: determinates and impacts. Quarterly Journal of International Agriculture. 48(4): 305-320.
2. Ahmed, T and et.al (2015). Diversification of rural livelihoods in Bangladesh. Journal of Agricultural Economics and Rural Development, Vol. 2(2), pp. 032-038.

3. Bhumik, S. K. (2007): 'Diversification of Employment and Earnings by Rural Households in West Bengal', Indian Journal of Agricultural Economics, Vol. 62, No. 4, Oct.-Dec., pp.585-606.

4. 4.Bhuyan,D. and Mitra, A (2018). Composition and Determination of Rural Non-Farm Sector at Household Level-Evidences from Undivided Sonitpur District of Assam. Social Change and Development, Vol. XV, No.2.

5. Ellis, F. (2000): 'Rural Livelihoods and Diversity in Developing Countries', Oxford University Press, Oxford, U.K.

6. Hossain, M. and Bayes, A (2010). Rural Economy and Livelihoods: Insights From Bangladesh. A H Development Publishing House. Dhaka, Bangladesh.

7. Kumar, N.P. (2007). Trends in Rural Diversification and Its Determinants in Uttar Pradesh. The Indian Journal of Labour Economics. Vol. 50, No. 4, pp. 703-714.

8. Kumar, A. (2009). Rural Employment Diversification in Eastern India: Trends and Determinants. Agricultural economic Literature Review, Jan-June, Vol. 22, pp.47-60.

9. Kumara, A. et al. (2011). Rural Employment Diversification in India: Trends, Determinants and Implications on Poverty. Agricultural Economics Research Review, Vol. 24, pp. 361-372.

10. Kumar, D. and Bhatt, V. (2012). Employment Trend in India 1983 to 2009-10. Voice of Research, Vol. 1, Issue. 1, Jan-Mar, pp. 58-66.

11. Kumar, D. and Srivastava, S. K. (2017). An Analytical Study of Rural Livelihood Diversification at Farm Households of Different Altitude of Kumaun Hills. Indian Research Journal of Genetics and Biotechnology , Vol.9, No.1, pp.172-178.

12. Lama, S. and Kuri, P. K. (2015). Livelihood Diversification, Rural Poverty and Income Inequality: A Study in the Hill Regions of Darjeeling District in West Bengal. International Journal of Current Research, Vol. 7, Issue No. 04, April, pp. 15425-15435.

13. Mahapatra, S (2007). Livelihood Pattern of Agricultural Labour Households in Rural India: Evidence from Orissa. South Asia Research, Vol. 27(1), pp. 79–103.

14. Madu, I.A. (2010). The Structure and Pattern of Reality in Nigeria. Geo Journal, Vol. 75, No. 2 , pp. 175-184.

15. Mishra, S. B. (2014). Growth and Structure of Rural Non-Farm Employment in Maharastra: Reflection from NSS data in the Post Reform Period. Procedia Economics and Finance, Vol-11, pp. 137-151.

16. Nath, G. B. (1996). Farm/off-farm Labour Market Participation and Workforce Restructuring in Rural India: A Micro Study. Globalization and Indian Labour Market. SSDN Publishers & Distributors New Delhi.

17. Nochi, L and Bhuyan, D (2020). Livelihood Portfolio and designed Intervention: The case for Arunachal Pradesh. International Journal of Recent Technology and Engineering (IJRTE), Vol.8, Issues 6.

18. Saleth, R. M. (1997). Occupational Diversification among Rural Groups: A Case Study of Rural Transformation in Tamil Nadu. Economic and Political Weekly, Vol. 32, No. 30, Jul. 26 - Aug. 1, pp. 1908-1917.

19. Sharma, H. (2016). Seasonal Employment: A Study Agricultural Labourers in Punjab, India. International Journal of Development Research, Vol. 06, Issue. 06, June, pp. 8024-8028.

20. Wilson,B. and Wyn, J (1985). Livelihood and Social Division. British Journal of Sociology of Education, Vol. 6, No. 3, pp. 273-288.