JETIR.ORG

ISSN: 2349-5162 | ESTD Year: 2014 | Monthly Issue



JOURNAL OF EMERGING TECHNOLOGIES AND INNOVATIVE RESEARCH (JETIR)

An International Scholarly Open Access, Peer-reviewed, Refereed Journal

A study on how Bangladesh Agriculture sector and rural development has become a role model for other underdeveloped countries to reduce poverty and unemployment

¹Dr.Sumanta Bhattacharya Research Scholar at MAKAUT, Public-Foreign-Defence Policy Analyst , C.E , CH.E , CCIO ,M.Tech , MA in Development Studies, LLB , DIA&D , DG&GS ,PGCPP&A , MPI(oxford University) ORCID ID: 0000-0003-2563-2787, Email-sumanta.21394@gmail.com

²Dr. Jayanta Kumar Ray National Research Professor, Ministry of Human Resource Development GOI Former Centenary Professor of International Relation, Department of History, CU, and Institute of Foreign studies, CU and Honorary Consultant for Research in Indo-Bangladesh Relations, Kolkata, Former Chairman, Maulana Azad Kalam Azad Institute of Asian Studies, Kolkata.

³Bhavneet Kaur Sachdev Political Science hons (Calcutta University), Masters in Development studies, Email-bhavneet829@gmail.com

Abstract

Bangladesh rural development and agriculture aims to eradicate poverty from the country, the main occupation in Bangladesh is Agriculture, 87% of the population depend on agriculture for their livelihood, 70% of the population live in rural area, Climate change and floods have been the major issue in Bangladesh and this is a main reason why it is one of the poorest country, the government of Bangladesh has introduced different schemes and policies for the development of Nation, NGOs in Bangladesh contributes to the development and promotion of rural development from awareness programmes to health care facilities to providing female education . With the use of technology and advancement in agriculture the Bangladesh agriculture research institution has been successful in identifying climate, flood and drought tolerant varieties of rice and wheat production and promoting of floating farms to combat climate challenges and DNA based agriculture for sustainable development of the country and eradication of poverty. Improving social and economic conditions of the people are necessary to enhance the rural economy, as growth of rural economy is important for the overall development of the Nation where agriculture contributes maximum to the GDP of the country.

Keywords: Bangladesh, rural development, rural economy, agricultural, climate change, Floating Farms, DNA based agriculture.

Introduction

In South Asia maximum countries depend on farming for their economic especially India and Bangladesh. For every country rural development is paramount to the overall development of the nation, Today people in majority countries across the globe are shifting to Urban areas for their living, However the story is different for South Asian countries . Agriculture is still the backbone of economy and development for majority of the South Asian Countries, In this paper we are going to have a look at the development of rural village in the context of Bangladesh and analysis the role of the agriculture sector to the country's economy. Even since the liberation War of 1971, Agriculture has served as the primary occupation and source of income of its people .Half of the people live in the rural area, where agriculture, animal agriculture forestry, crop production is the primary source of income education at the rural villages differs from geographical region as Bangladesh is home to 700 rivers and is prone to floods. Bangladesh is economically very poor compared to other countries in the world, with a population of 130 Billion people. Bangladesh is famous for its garment industry, 60% of the world garment production takes place here along with that this industry has provided thousands of women jobs and plays a prominent role in foreign exchange and it also one of the largest export of fish in Asia. We have seen many development happening in Bangladesh . Bangladesh is working on rural development as it is an integral part of rural economy . Rural development in the context of Bangladesh includes improving economic and social conditions of the people through empowerment production and equal distribution of resources for sustainable development of its people especially the women and girls who are the most vulnerable people of the society. South Asia tops the list when it comes to gender based discrimination where women are victims of rape, domestic violence, are considered as second citizens and are kept away from rural economy, there sole responsibility comprises of domestic work and bearing child. Bangladesh also has the same story however things are changing with the rise in opportunities in the field of education, today more and more girls are going to school in the rural sector. The main subjects of the development of rural development includes eradication of poverty from rural villages and providing and increasing their standard of living, providing equal access and distribution of income and wealth, providing them greater employment opportunity and involving grass-root people in the decision making process for rural development and empowering them with more economic and political power so that they have authority over resource. There have been a lot development taking places in the agriculture sector to enhance the development of rural economy and also to empower Bangladeshi women in this sector by involving them in the agriculture work.

Research Methodology

For the purpose of this exploration, I have used a amalgamation of two of the archetypical social sciences research tools application—as they are authentic and brilliant method to assemble statistics from multiple appellant in an methodical and convenient way. Question were asked to the parents and their children, survey, interviews—consisting of several interrogation which were dispersed among representative of each contender group.

Objective of Research

In this Research paper the main area of studies include

- 1.Bangladesh development since Independence
- 2. What has the Bangladesh government done for the growth of agriculture and rural development .
- 3. What are the issues that the Country is facing in the development of rural and agriculture.
- 4. How the country is coping with the issues of climate change.

5. What are the measures taken by the country to remove the conditions and challenges .

Literature Review

The government of Bangladesh in 1972 formed the unified village enlargement Programme to replace and spread the Comilla imitation in certain areas of the country which was later transmuted into an organization called Bangladesh Rural enlargement Committee. The rural development aims to amplify the productivity and the quality of product. Improve standard of living and provide equal opportunity, modernisation of farms, reducing the gap between rural and urban gap in income and economic opportunity and meeting the environmental challenges, the government has introduced many programmes over the years for the development of rural development and rural economy which incorporates Revolving micro credit programmes, Integrated poverty alleviation, one house one farm project, Ensure employment of ultra poor of northern region project, credit programme of the women development wing, productive, employment and awareness building project for rural women followed by many training programmes like entrepreneurship development, mainstreaming gender in development planning, reproductive health rights HIV and AIDS, gender and development, environmental impact assessment of rural development project , irrigation management and land use development planning. We also have Bangladesh Academy for Rural Development, the first successful project was Comilla Model, followed by which we have training programmes for creating employment for rural women, generating income for the unemployment rural women, generating income for the unemployment of the youth. There have been many NGOs who have been working for years for the development of rural and have taken by many initiatives and programmes like development of return and job, health and disinfection, farming and rural occupation, professional pedagogy, family planning, mother and child care and relief and rehabilitation. we have Proshika which works for building self-awareness and confidence, development of education out of which 40% groups are formed by women. TMMS - develop the socio economic status of women, improve the condition of the poorest and the poor people by involving grass root people in the decision making process, utilising local human and material resources, raising awareness programme a few more project undertaken for the development of the rural development Swamirvar Rural Housing Construction project to work for the general welfare of the family, skill development, health care, literacy nutrition among the people. The Grameen Bank has been working towards microcredit programs, village phone program, Grameen Kolyan Health program, Grameen International Dialogue Program, Grameen Basic training programme, struggling members programme. ASA, which undertakes subjects like loan, savings, insurance, health awareness, higher education and partnership building among rural people which the objective to create jobs through women engagement to ensure women participation, providing access to financial services, to provide human rights to improve the situation of the society . NGOs provide door to door health care services in rural development by village based community health workers, education programmes especially for the poor and poor girls., we also Participatory Rural Development Project to enhance self – employment provisions, rural physical and social infrastructural development and development of small and landless farmers and many more initiatives have been taken by both the government of Bangladesh and NGOs of Bangladesh for their rural development.

Finding

Bangladesh is surrounded by India , Myanmar and Bay of Bengal . The country comprises of three farming — aman , aus and boro . Aman is regarded as the chef monsoon time where the farmers grow conventional and contemporary types of rice , during the time of boro modern rice of short duration are growth which rely on irrigation and tube wells and aus is a pre-aman period where under rainfed conditions rice is grown , food security and self —sufficient are the principal elements of Bangladesh food scheme . Rice is the highest production crop of Bangladesh due to its access to ample amount of water . The four primary crops of Bangladesh are rice , wheat , mango and Jute . It is the $10^{\rm th}$ substantial producer

of tea which contributes to 3 % of the globe tea making and employs 4 million people . 90% of the people are farmers and 87% people working in the agrarian industry and develop on it for its living.



Agriculture contributes 22.25% to Bangladesh GDP which has an impact on macroeconomic, employment generation and eradication of poverty. Due to the fertile soil and available of ample amount of water rice can be grown 3 times in a year, we have also seen a steady increase in labour-intensive agriculture despite regular changes in the weather condition because of the above factors followed by effective use of fertilisers and equal distribution of resources. Bangladesh is one of the leading producer of rice, potatoes, topical fruits, jute and farmed fish. There has been many advances in agricultural research, Bangladesh Rice Research Institute has invented 82 varieties of rice till now out of which 72 are high yielding, 6 are hybrid and 11 are hostile climate change, there are salt tolerant, high and low tide tolerant, flood tolerant and drought tolerant variety where as there are some who are tolerate all kinds of things Bangladesh Institute of Nuclear Agriculture has also invented 18 varieties of paddy out of which 6 are holistic climate tolerant varieties and also the Bangladesh Agriculture Research Institute have invented 32 varieties out of which 8 are holistic climate tolerant.

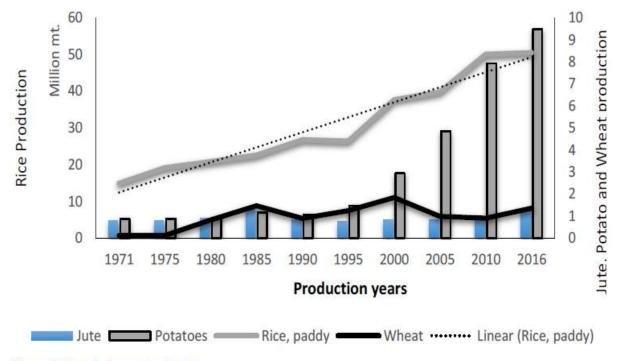


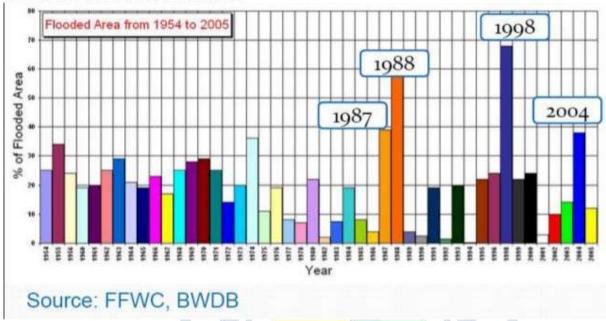
Figure 3. Trend of crop production. Source: FAO (2018, analyzed by authors).

However Crop cultivation in Bangladesh has to face many challenges like Loss of productive, fertile land , the main reasons for the lost of land include urbanization, construction of edifice, human settlement and river corrosion, Population growth, as the population increases the demand for resources also increases, which acts as a great challenge to the over all development of the country and people are unable to have access to the basic needs like food, health and shelter, moreover birth control pills and other materials are imported in the country and the supply is not sufficient and religious fundamentalist also adds to the problem of increase in population, climate change is one of the biggest problem which countries across the globe are suffering from which has an impact on the agriculture, moreover Bangladesh is prone to floods, with change in climate conditions for which human beings are responsible results in loss of soil fertility, food security and crop productivity, the country is affected by floods, cyclone and drought, There is no proper use of fertilisers, 60% of the arable land in Bangladesh are deficient in Potassium, Nitrogen and Phosphorus . cost of the high prices of fertilisers , chemical fertilisers are not integrated with organic manure there is imbalance in the use of fertilisers, followed by this we have inefficient use of water, water used is very low in Bangladesh as 30 % of the irrigated water are used for cultivation of crops and rest flows away due to rapid flood. Pests and diseases have become a major issue in Bangladesh, because of constant climate change and rise in temperature. Bacteria Lead Blight and Nematode are now becoming serious use and the use of technology to control such diseases is restricted to rice and absences of quality seeds. Moreover there is lack of credit support to farmers, 90% of the famers are have small or marginal land they are often confined by financial issue and can't afford high cost of management followed by there is unfair price in agricultural produces which adds to the main problem in the field of agriculture for these people.



History of Floods in Bangladesh

Bangladesh floods on a regular basis, catastrophic floods have occurred in 1987, 1988, 1998, 2004, 2007 and 2010.



In Bangladesh the literacy rate is 74.7% as of 2020, Rural primary education of Bangladesh witness decrease in the number of students, there is poor infrastructure facilities followed by absences of teacher, Bangladesh is prone to floods almost through the year because of this most of the schools and colleges have to remain close, to overcome this Bangladesh has started with the system of boat schools, where boats are transformed into classroom and people are through there, primary and secondary education is compulsory, we see a decrease in gender discrimination with more girls are being admitted to schools for studying at the primary and secondary level. Women comprises of half of the population in Bangladesh many women have entered the agriculture sector and are earning, with the rise in Industrialisation, most of the men are travelling overseas in search of better jobs and lifestyle, so women in their absence go to the farm and do the work, along with it the government have introduced many schemes and programmes for the development of women. Moreover, Bangladesh has ended 99% of the open defecation problem along with basic sanitation is 64% in the rural are and safety managed is 34%. The government has also started mSTAR Mobile financial in Bangladesh to improve livelihoods by inking farmers to inclusive financial systems. Bangladesh rural and agricultural development have been successful to a great extent in eradicating poverty.

Future perspective

Floating farms for sustainable solutions, Bangladesh is facing constant flood, erosion and salinity to combat this famers are using floating pads, the problem is during high tides this regions get flooded and during low tides very less water remains, that is why they are using floating pads to grow vegetables, Floating platforms offers 40% extra land providing opportunities for poor and landless farmers,

Bangladesh is coming back with old tradition method of cultivation, with a rise in environmental change and global warning, the country is adopting environmental friendly systems, They use organic fertilizers on the seeds and keep them in a shed area to mature and later plant them in floating pads with natural fertilizers and sell them when ready in the market, they do not use chemical fertilizers or pesticides using this method so they is greater demand. It has been used of 209 hectares of land, there are around 50,000 people who are directly or indirectly involved in this type of farming in the district, this type of farming is getting popular and is practiced in 15 to 20 other district and farmers are gaining profit out of it, Today many poor Bangladesh farmers have been given a financial lifeline by depending on the tradition technical ways to protect their livelihood. In the last decade the Bangladesh has been able to stabilize their economic and have brought million of people out of poverty. New challenges are coming due to rise in sea levels, floods and cyclone and decrease in agriculture production, climate change is visible in Bangladesh as it affects each and every sphere of an individual life, heavy rains in less period of time and simultaneously we have the dry days in Bangladesh , because of cyclone many people have lost their livelihood, Sustainable development have been approached which are resilience to climate change. Adopting climate change projects, promoting green economy.

Conclusion

Bangladesh has been successful in improving its agricultural sector and coping with its economic issues . With the use of technology and development in science, the Bangladesh agriculture research institution has been successful in finding new varieties of rich and other wheat which are climate tolerant and flood tolerant. In Bangladesh 90 % of the population are farmers, with the adoption of floating farms which is a tradition method of cultivation has provided immense opportunities for poor and small farmers and also improved the lives of many rural people. Bangladesh being an agricultural country with 700 rivers and prone to floods, it becomes very difficult for the people to promote agriculture and rural development in the country, however with the introduction of garment industry in Bangladesh which has provided employment to thousands of women and also empowered women, the government of Bangladesh has introduced many schemes for the development of its people and women empowerment, with increase health care facilities with the help of different NGOs who play a significant role in the rural development by organizing awareness programmes and promoting education among the people.

Reference

- 1.Bangladesh: Growing the Economy through Advance in Agriculture, The World Bank.
- 2. Mohammad H. Mondal , Crop Agriculture of Bangladesh : Challenges and opportunities .
- 3.BASF, Agriculture and Farmer Problems in Bangladesh.
- 4.Md.Tahidur Rahman, Role of Agriculture in Bangladesh Economy: Uncovering the Problems and Challenges.
- 5. Habib Zafarullah and Mohammad Mohabbat Khan, Introduction to Rural Development in Bangladesh.
- 6.M.Gautam, Dynamics of Rural Growth in Bangladesh, Sustaining Poverty Reduction.
- 7.Mst .Esmat Ara Begum , 2015 , September , Rural Development in Bangladesh since Independence : A study on Progress and performance, ResearchGate.
- 8.Rehan Dastagir, 2015, March, Sustainable rural Development in Bangladesh by Education Loan and Graduate Entrepreneurship: A case Study of RCE Greater Dhaka.