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Food Security Amongst Juanga Tribes in Nagada: A Study of Deficiencies

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"Food Security exists when all people, at all times, have physical and economic access to sufficient, safe and nutritious food to meet their dietary needs and food preferences for an active and healthy life" __ Food and Agriculture Organization (FAO) of the United Nations¹

Abstract: In the third world including India, a sizeable proportion of population is starving. The most vulnerable are poorer sections of the population in States like Odisha and more particularly the Scheduled Tribe communities. They suffer, despite working very hard, from "food to fuel." They mostly depend on the primary activities of low productivity and market imperfections, resulting in unstable incomes. In this context, this paper seeks to analyse the food security and livelihood opportunities of the Juang tribes of Nagada, odisha.

Keywords: Food Security, Malnutrition, livelihood, Government Policies

Introduction

The concept of food security stands on the four pillars viz., food availability, food accessibility, utilization of food and stability. To live a life with dignity, an individual requires sufficient nutritious and culturally appropriate food. Wasting of food, lack of storage facility, infrastructure, transformation, inaccessibility to market mechanism etc are affecting the availability of food. Insufficient production of food is not the major cause of food unavailability, but inappropriate distribution of food is worrisome. The developing countries are producing more food as compared to the developed countries, but most of the hunger, malnutrition and

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¹ Food and Agriculture Organization. (2012). The state of food insecurity in the world 2012: Economic growth is necessary but not sufficient to accelerate reduction of hunger and malnutrition. FAO. https://www.fao.org/3/i3027e/i3027e00.htm

starvation cases are found in developing countries. Inequitable distribution and lack of purchasing power are become hindrances to accessibility to food of vulnerable people. The climate change and natural disaster have affected the food security. They harshly affected the productivity of food grains. It is a difficult task for the vulnerable tribal people to make a balance among access to nutritious food, spend in health and education.

This paper reviews the present situation in the village named Nagada, situated at Sukinda block in the district of Jajpur, Odisha. In 2016, nineteen children died due to acute malnutrition. The central as well as state governments assured to provide all kinds of facilities for the development of Juang tribes in Nagada. Again in 2017, there were ten malnutrition cases registered in nearby hospital². This paper highlights the major causes of malnutrition in Nagada and how the government schemes and programmes are unable to reach in the hands of the Juanga tribes in Nagada.

A Paradigm Shift: Food Security to Nutrition Security

The definition of food security has changed over the years by various International Organizations such as FAO (Food and Agriculture Organisation), WHO (World Health Organization) and professional groups working in the socio-economic, food and agriculture domain. The concept of food security and nutrition security were the brainchild of a meeting of forty-four forward looking governments in Hot Spring, Virginia, USA. Where they considered freedom from want in relation to food and agriculture.³ They wind up that freedom from want denote a secure, adequate and suitable supply of food for every man, woman and child where secure intend to the accessibility of the food, adequacy express to the quantitative adequacy of the food, suitable signify to the nutrient content of the food supply.

In 1970s the nutritional deprivation, malnutrition were widespread in the world. The multi-sectoral nutrition planning at the national level and the outline for nutritional enhancement as a core component of overall development planning appeared as a distinct new approach to fighting against malnutrition. The International Conference on Nutrition (ICN) in 1992 underlined the food and non-food factor (care and health) which are responsible for malnutrition. The term nutritional security got attention during the mid-1990s which gave emphasis on the consumption of food by individuals and how body employed it. Nutritional security is achieved "when all people at all times consume food of sufficient quantity and quality in terms of variety, diversity, nutrient content and safety to meet their dietary needs and food preferences for an active and healthy life coupled with a sanitary environment, adequate health education and care"4. The inability of vulnerable people to access a minimum nutrition requirement has serious implication on their all-round human development. Deficiencies in protein and energy intake has ushered to higher morbidity and mortality rates among children.

² Scroll.in. (2016, July 18). Why are children dying in Nagada? Because no one had looked at how the Juangs live. https://scroll.in/article/811474/why-are-children-dying-in-nagada-because-no-one-had-looked-at-how-the-juangs-live

⁴ Ibid

Micro-Nutrients and Malnutrition of Jaunga Tribes in Nagada

Good nutrition is a laissez passer to a good life. Dietary deficiency, inadequate vitamins, lack of minerals lead to the micro-nutrient malnutrition. Iron deficiency anaemia, Vitamin A deficiency, Iodine deficiency disorders are the most common forms of micro-nutrient malnutrition. Micro-nutrient malnutrition affected the socio-economic development, health, learning ability and capability of production of under privileged group. More than two-third of the world population suffer from micro-nutrient malnutrition.⁵ Basically, women and children severely suffer from at least one micro-nutrient deficiency. The effects of micro-nutrient malnutrition are found in stunting, physical damage, losses of thinking capability, premature mortality. Poverty, lack of access to variety of foods, ill knowledge about dietary product, lack of health awareness and high susceptibility of infectious diseases are some of the prominent factors which ushered to micro-nutrient malnutrition.

Food Security in Odisha

According to the National Food Security Act-2013, 75 percent of the rural people and 50 percent of the urban people receive subsidised food grains through the Public Distribution System (PDS). Through the Antyodaya Annna Joyana (AAY), people are receiving 35 kgs of subsidised food grain per month, mid-day meal for school children, Integrated Child Development Services and Maternal benefits are provided by both the central and state governments. All the services in relation to food security which are sponsored by state and central government are basically focused on the food grains like rice and wheat. Only rice and wheat are not fulfilling the nutritional requirement of the people. Even the nutritional food provided under Integrated Child Development Service are not sufficient for children as well as lactating women. Even if food is accessible, it doesn't convert food into nutritional security among the people especially women and children.

According to the National Family Health Survey-5, in Odisha the percentage of underweight children has gone down from 34.4 to 29.7 percent. There is little improvement of 0.2 percentas far as wasting is concerned. The number of severely wasting children under the age of five has increased in the districts like Mayurbhanj, Balasore, Dhenkanal, Nabarangpur, Malkangiri, Subarnapur, debgarh, Kandhamal, Balangir. In Odisha, thirty children are malnourished among hundred. In tribal area, half or even more children are undernourished. The children are underweighting in comparison to their age. In Odisha, malnutrition has decreased only by 4.7 percent in last five years. There are 13,297 children who are severely affected by malnutrition. If we compare national average of malnutrition to Odisha, it is just above the line. In Odisha, Nabarangpur has 46.6 percent of children are mal-nutrient which is highest among other districts. Mayurbhani holding the second position with 45.9 of children are malnutrient. Despite the Government of Odisha providing variety of nutritious food to all the people especially women and children through various scheme but there is hardly any improvement in nutritional standard of people. The nutritional food is not enough to improve nutritional value of people, there are other factors like sanitation, safe drinking water, healthy environment, even the education of parents specially women education plays a crucial role in improvement of nutritional value of

⁵Department of Food Supplies & Consumer Welfare, Government of Odisha. (2016). Making a food secure Odisha: Converging transparency, technology & teamwork for time-bound transformation. Government of Odisha.

their family. The lack of nutritional knowledge and health awareness is also affecting the nutritional security of the people.

Odisha produced much more food grains which are sufficient for its population. However, there are several factors like lack of purchasing power of the poor and vulnerable people, uneven distribution of food which restrained them from accessing the food. Consequently, there is no increase in consumption of food despite high production of food grain in Odisha. Malnutrition is highest among the Schedule Caste population with 45.5 percent stunting, 27.8 percent wasting and 48 percent underweight among under-5 as compared to the other social groups. Lack of income opportunities, heavy dependency on agriculture and low productivity have affected the food basket of vulnerable people. In Odisha, 60 percent of the population depended on agriculture. In Odisha heavy dependence on agriculture is also a factor for malnutrition among the vulnerable tribal people. Even the non-agricultural activities largely involved in low paid causal labour works such as construction which restricted purchasing power of the people. Consequently, per capita per day energy, protein and fat deprivation are highest among those agricultural and non-agricultural labourers (PHDMA, 2020).

Food Security in Nagada

Odisha hosting sixty-two types of tribal communities among which thirteen groups come under the Particularly Vulnerable Tribal Groups (PVTGs). Juanga tribe is one of the tribal communities which comes under the PVTGs. The village of Nagada come under the Chingudipal gram panchayat, Sukinda Valley of Jajpur district in Odisha. The village of Nagada has six hamlets like Uppar Nagada, Majhi Nagada, Tala Nagada, Uhiapala, Naliadaba.

The majority of people in Nagada belong to Juanga community. The word Juanga implies sons of man. It is believed that, the Juanga people made an appearance from Gonasika hill near Baitarani River in Keonjhar. Eventually they migrated to Jajpur, Angul and Dhenkanal. Even before 2016, the village was unknown to all. Nagada came to media limelight in 2016, after nineteen children died due to acute malnutrition. There was no electricity, communicative roads to Nagada. The people were using stream water for drinking purposes as well as for their day-to-day life. The Juanga tribes depended on the forest goods for their consumption which were even not sufficient. Lack of livelihood opportunities, less income facilities etc. refrained the Juanga people from buying the nutritional food for their consumption (Panda, S. S. et.al 2021). Industrialization in Sukinda valley ushered the degradation of forest land and forest resources which affected the production of food as well as consumption. Majority of women as well as children of tribal community affected by macronutrients malnutrition, because women are consuming less food against the requirement of their body. The macro-nutrient malnutrition women are giving birth to under-weight children and those prone to vulnerable diseases.

Causes of Nutritional Deficiency Among People of Nagada's Juanga Tribes

The death of nineteen children of Juanga community had attracted the attention of the Government of Odisha. After it grabbed media attention, the Government spent huge amount of money on developmental works such as construction of two roads from Jajpur side and another from Dhenkanal side, providing clean and safe drinking water, establishing primary healthcare canter, establishing three more Anganwadi, initiating electricity and bus facilities, establishing toilet and solar panel, setup water purifier, installing VHF (Very High Frequency) for easy communication etc. The water pipeline connection also setup when Nagada was in limelight but most of the time especially in summer season both tube well and public tabs get dried. The bus facilities also stopped working. Due to lack of transportation facilities the farmers are unable to sell their vegetables in nearest market.

Lack of Education

"Education can act as an important device for eradicating poverty and unemployment, increasing health and nutritional standard and attaining an endured human development-led growth. Literacy and educational accomplishment are the main determinant of socio-economic development of a community (P Mishra and R Gartia 2012). Schedule tribes' communities are far behind of general community as well as schedule caste community in terms of their educational status. Educational backwardness is one of the main causes of their socio-economic deprivation. Educational parameter is the main determinant of economic growth of a country. Educational upliftment of a community not only upgrades economic status but also increases inner strength of the community.

As per the census of 2011, there is only one literate male in Nagada and only 2-person literate males in Chingudipal. There is no single literate female person in six hamlets of Nagada. There are three Anganwadi Centres and one primary school where only two teachers are appointed. Fifty-one students are enrolled in primary school out of which five students are in class-I, seven students in class-II, fourteen students in class-III, seven students in class-IV and eighteen students in class-V. After completing the upper primary schooling the students are required to go Chingudipal Ashram school and Chingudipal High School for accomplishing their matriculation which is eighteen kilometres away from Nagada. There are a few students who have joined KISS (Kalinga Institute of Social Science), a residential school in Bhubaneswar. No one has completed his matriculation till date. Absence of awareness about the education among the parents is one of the prominent causes of absenteeism of children in school. Illiteracy among the parents restrained them to understand the long-term benefits of education. As the education doesn't provide the immediate economic profit so the parents prefer to engage their children in remunerative works. Even the children of 5 to 6 age groups are involved in collecting forest resources with their parents.

The Central as well as State Government adopted numerous programmes for universalisation of right to education. The ministry of tribal affairs has been executing numerous programmes relating to education in schedule tribal dominated areas of the country and the schemes like Eklavya Model Residential School (EMRS), which is implemented in 1997-98 to dispense standard education to Schedule Tribes (ST) students

(from class 6th to 12th) in far-away areas through residential schools. By the Constitution (86th Amendment) Act, 2002 (Article 21A), education became a Fundamental Right. The Government of Odisha also has been rolling out various programmes and schemes like Pre-Matric Scholarship and stipend for ST students, Scheme for Providing Quality education for ST/SC students in partnership with Urban Educational Institution (ANWESHA), Odisha Girl Incentive Programme (OGIP) for Pre-Matric Scholarship to ST Day-Scholars and Village Education Committees (VECs) have been constituted to look-after the functioning of the schools etc. Till now, the tribal people are unaware about it and even the members of VECs are not giving due attention towards increasing the enrolment and attendance of tribal children in primary school. In spite of these programmes, schemes, Acts the people of tribal community are unable to fully access education for numerous reasons like lack of awareness, distance and lack of communication facilities to schools, uneducated parents, economic barriers and involvement of girl child in domestic works etc. Because of absence of educational and social awareness, the child marriage is widespread and even child marriage is a part of the Juanga culture. Early marriage and lack of awareness about family planning have affected the health of mother as well as child.

Lack of Healthcare Facilities

The necessity of a good health is recognised in all over the world. But most of the time a section of our society is affected by ill-health and unable to access the basic healthcare facilities. Poverty, malnutrition and ill-health are quite common among the tribal people. Underweight at birth, inaccessibility to professional doctor at birth and absence of post-natal care are the prime reasons of high infant mortality rate. In general, the tribal women prefer to deliver at home rather than going to hospital for safe delivery of children. A community healthcare centre is situated at the Sukinda block headquarters which is fifty kms away from Nagada. In 2016 After the death of nineteen children, the Government of Odisha assured to provide 24 hours healthcare facilities. But Juanga people claimed that the doctors are unable to identify the disease and even complained about food and drinking water facilities which are provided for the children and pregnant women. A temporary healthcare centres was established and doctors also visited regularly but after a few months' healthcare centre stopped working as well as doctors rarely visit the village. Recently the people of Nagada faced skin disease and they complained that no single doctor visit the healthcare centre for their treatment. Due to absence of healthcare and health awareness facilities, the skin disease transmitted from three family to most of the family.

The people are using traditional natural medicine which deteriorating their health. Most of the women in Nagada are severely affected by anaemia. Ill health condition of women affected the health status of their children. Despite of three Anganwadi centre in Nagada and the facilities of ICDS, the health conditions of both women and their children have not revamped as expected. Some of the household complained about the quality of Chhatua (baby food) which is provided by the Anganwadi centres. Even the food and services whatever provided under the ICDS scheme is not sufficient to fulfil the nutritional status of the Juanga people. Health development is an essential criterion from human development perspective. The absence of communication facilities to the tribal areas have made difficult in efficient healthcare delivery. Both the central and state governments have been implementing numerous programmes for providing basic healthcare

facilities to all the people irrespective of their region, religion, caste, birthplace etc. Both the governments give special emphasis on dispensing the rural healthcare facilities to the economically and socially vulnerable people. There are several special schemes designed for providing healthcare and medical facilities to the tribal and Particularly Vulnerable Tribal Groups (PVTGs). The central government under National Health Mission dispenses various sub healthcare schemes like National Rural Health Mission (NRHM), Ayushman Bharat-Health and Wellness Centres (HWCs), National Free Drugs Services Initiatives, The ASHA (Accredited Social Health Activists) Programmes, National Ambulances Services, Auxiliary Nurse Midwifes (ANMs), Village Health Sanitation and Nutritional Committees (VHSNC), Janani Suraksha Yojana (JSY), National Mobile Medical Units(NMMUs) etc. for the health security of vulnerable people. The Government of Odisha has also initiated various medical facilities like Biju Swastya Kalyan Yojana (BSKY) for poor and vulnerable people. In spite of all these programmes and schemes, the tribal people are unable to access the basic medical facilities due to unawareness about the facilities and programmes which are assigned for them.

Lack of Livelihood Opportunities

The economic status of a community is based on the employment opportunities and wage structure. The healthcare, education, food security and well-being are largely dependent upon the economic status of the community. The tribal people heavily depend on agriculture, forest resources, hunting etc for their survival. Forests are accepted as main source of food producing habitats that meet the livelihood of a tribal community. Forest and tribals are very close to each other and they are symbiotic to each other. Forests not only fulfil the economic needs but they also fulfil their socio-cultural needs. For livestock, they collect firewood, leaves, timber, mushrooms and for their livelihood, they collect non-timber forest products. Forest is a source of income for them. They collect vegetables, fruits, mushrooms and other forest resources which they sell in nearby market. Due to insufficiency of forest products in their nearby area, it become a challenge for them to totally depend on forest products for their livelihoods. This income source is not enough to fulfil their basic needs. They practice traditional methods of cultivation and scarcely use modern technologies and tools. Generally, the tribal people cultivate once in a year which is mainly in rainy season. The seasonal imbalances and heavy dependence on rainfall affect their agricultural productions. The lack of income opportunities and the absence of assets like land ushered them towards vulnerabilities like illness and poverty.

The absence of basic amenities among the people belonging to Juanga tribes has caused acute malnutrition. Lack of livelihood opportunities and less employment facilities are the major hindrances of food security of the tribal people. Nutritional deprivation is not because of inaccessibility of variety of foods which are required for nutritional security. The people of Nagada live in hilly areas which prevent them of good quality fertile soil suitable for better agriculture. Due to lack of adequate road connectivity to market and lack of storage facilities, they are unable to exchange their products as well as unable to store the same. As they could not earn sufficiently from agriculture, they tried to find some employment opportunities besides agriculture. Even for construction work of roads, Anganwadi, establishing pipe-line, the contractors used the labourers from outside. Therefore, they are unable to get work. The people from Nagada are going to different state for works. Due to capacity deprivation like low literacy-rate, lack of skills and knowledge, they usually do not

get work for sustenance. The breakdown of all kinds of livelihood opportunities ultimately affecting the purchasing capacity of the tribal people.

The government through various programmes like Provisions of the Panchayats (Extension to the Scheduled Areas) Act, 1996 (PESA) and the Forest Rights Act, 2006 (FRA), tried to provide opportunities for self-governance, collection and selling of forest products. The Government of Odisha also has implemented various schemes like Odisha Particularly Vulnerable Tribal Group Empowerment and Livelihood Improvement Programme (OPELIP), managerial subsidy to Odisha Schedule Caste and Schedule Tribe Development Finance Cooperation Corporation (OSCSTDFDCC), Odisha Tribal Empowerment and Livelihood Programme Plus (OTELP) etc. But due to lack of awareness and ill-knowledge about schemes, they are unable to get benefits out of it. Under the Biju Pucca House scheme, most of the households get pucca house who have land papers. But many people those who do not have land patta, are denied of pucca house. For instance, one Manguli Pradhan, a villager of Tala Nagada, was also denied of a pucca house due to land issue.

Traditional Food Habits

The healthy body of an individual depends on the consumption of nutritional food in accordance to the needs. The people of Nagada depend on either local or natural resources for food their consumption. Despite of wide variety of natural resources available for consumption, they only consumed certain variety of food which are prescribed by their traditional social regulations. The food consumed by Juanga are varied from season to season. Generally, the food which they take for their consumption are rice, pulses, horse gram, black gram, and millets. However, they also eat forest mushrooms, spinach, greens, honey and variety of non-timber forest product etc. The making of vegetables for eating is very simple like either foods are roasted or boiled. They rarely eat wheat. Most of the time they use to cook once a day and most of the time they eat Pakhal-bhata (water Rice). Nowadays they rarely eat non-vegetarian food items due to restriction imposed by government on killing of animals. Forest is an important source of their survival. Forest is main source of food materials and they also depend on forest for medicine. Due to these traditional dietary practices, the pregnant women, infants, children and lactating mothers are the worst victims. The pregnant and lactating women are consuming foods like Chuda, Kanda Tasar Pokka, Mandia jau, Baunsa, Dhana Pimpuli Sunthi, etc. which cause nutritional deficiencies and birth of low-weight infants. The children who take birth from these illnutrient mothers are the worst sufferer of malnutrition and prone to various kinds of infectious diseases. The foods, which are usually consumed by Juanga people, do not have sufficient nutrition. The women are found deficient of Vitamin-A, Vitamin-B, Vitamin-C, calories and protein. The deficiency of Vitamin-A among the pregnant women leads to high maternal mortality. They are unaware about the food diversity and nutritional value of food.

Conclusion and Suggestions

The outcome of the study specifies that the malnutrition of the pre-school going children of Juang community are linked with parents' education, livelihood patterns, traditional food habits, socio-economic condition, morbidity and season, lack of nutritional knowledge of foods etc. Due to lack of communication and unawareness about the various government schemes and programmes related to health, food and nutritional security, the people of the tribal areas are unable to achieve the nutritional requirement of their day-to-day life. Thus, promoting maternal education and maternal health awareness, providing better livelihood options, improving socio-economic conditions of households, providing training and enhancing their skills, conducting health awareness programs, propagating Central as well as State Government schemes, programmes, which will help in improving nutritional condition of tribal people, are need of the day. The government should provide additional foods and healthcare facilities under Integrated Child Development Service (ICDS) to the tribal areas. It is essential to include the ASHA (Accredited Social Health Activists) workers and Anganwadi workers in the mainstream primary healthcare system. These workers should be trained and be provided with incentives to take responsibility to deal with the malnourished children and under-nutrient mothers. These workers are first direct instance of connect between state and public. The government should train and provide necessary equipments to these workers, so that they can easily connect with the people of tribal areas. The promotion of nutrition concept can reduce the vitamin-A deficiency among the tribal women. Nutrition garden should be promoted, which means producing varieties of vegetables and fruits in the front and are end of the house. These fruits and vegetables will provide verities in their food consumption. To improve the agricultural production, the government should provide best productive seeds, well developed technology and train them to use developed agrarian technology. Increase in production will reduce the food insecurity of the tribal people. The tribal communities depend on forest for their livelihood, so the government should replant the degraded forests.

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