



Evaluating the Problems of Population Resettlement from the Construction of Shiroro Hydropower Project, Nigeria

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Abstract

This study focused on the evaluation on the problems of population Resettlement from the construction of Shiroro Hydropower Project, Nigeria. Two villages (Zumba and GaladimaKogo) directly affected, were selected for the household questionnaire survey and interview schedule. The results indicates that environmental problems such as deforestation, erosion, land degradation and flooding as major problems affecting the livelihood of the communities in the study area were identified. The presence of the lake increased the rate and incidence of water-related diseases such as malaria, Cholera, river blindness and bilharzias. With respect to resettlement only 46% of the populations were compensated, the remaining 54% are yet to be compensated 24 years after the dam commenced operation. Conclusively, the people were only evacuated and displaced from their ancestral homes without been properly resettled and compensated for their social, economic and material loses. It is recommended that dam operators and regulatory authorities meet up their commitments to properly resettle and compensate the affected communities.

Keywords: Hydropower, Resettlement, Evacuees, Dams, Environment, Compensation, Livelihood.



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1. Introduction

Resettlement in developing countries is generally characterized by many controversies. As such therefore, the potentials of resettlement programmes have not been adequately and properly captured. It is well established that in almost all cases, where dam construction has entailed relocation of local populations the financial, social and psychological costs to the people have been unavoidably high [1].

In the process of resettlement some innovative inputs such as infrastructural facilities (roads, public health centre, electricity, new sources of water and schools) were introduced into some of the settlements. One would therefore expect some dynamism in the socio-economic life of the people ten years after relocation, the degree of which would depend on the variation of the inputs.

In the process of settlement relocation, social and environmental attributes are disrupted and people are expected to adjust to the environment. If properly adjusted, the evacuees are expected

to continue their daily life as usual and get used to new housing, new farmland, new sources of water supply, other infrastructures as well as new socio-economic activities in their new locations.

Adjustment level refers therefore to satisfaction with and adaptation to physical, socio and economic changes in new locations as perceived by the evacuees. This also includes getting used to new housing sites, new neighbors, new sources of water supply, new sources of information as well as the cost of living in the new locations.

The argument is that no matter what innovative put into the planning, the legacies of project construction and consequent resettlement exercise could not replace the social and cultural deprivation suffered by the evacuees. This is most seen in the areas of loss of customary rights to land, family affiliation, properties and other socio-economic changes.

However, the advocates of resettlement see it as an opportunity to bring rural scattered settlements together for proper planning and provision of infrastructure such as roads and communication links potable water supply as well as new homes [2].

According to Arungbemi [3], he emphasized that failure or success of any resettlement scheme is not necessarily a question of whether the innovations intended are advanced (developmental) or not, but more of a question of the degree of the successful public participation leading to effective execution.

The continent of Africa is the scene of all kinds of population resettlement processes, including disgraceful and painful displacements of people. Recently, in African, involuntary displacements did not result from developmental programs, but caused by political and social causes generated by civil wars, ethnic, racial and religious persecutions, or by natural causes such as droughts and famines [4].

Involuntary displaced populations are denied of their normal livelihood, pushed to the limits of poverty and starvation thereby becomes a liability to the host community, thus compounding the complexity of the problems. Their presence in the host population may lower the host's standards of living and tend to rapidly reduce the natural resources of the host communities.

According to Cook and Mukendi [5], involuntary resettlement caused due to development programs of government has created, and will continue to create, a distinct set of problems on the continent of African. In Africa, dam construction especially in the 1960s and 1970s, has resulted in population displacements of large numbers in both absolute and relative terms.

Brazil, China and India that are presently involved in massive industrialization and electrification programs, are precisely the countries with the biggest ongoing involuntary resettlement operations. As a result of dam construction alone, over 10 million people were involuntarily displaced within a period of forty years in China. About 14 million were displaced by urban projects and over 7 million by transportation projects [6].

2. Study Area

Shiroro dam is located on latitude 9°58'25" North and Longitude 6°50'6" East. It owned by Power Holding Company of Nigeria (PHCN), and situated 550 meters downstream of the confluence of Kaduna River with its tributary, the Dinya. The dam is about 3km upstream of Zumba town and about 9km of GaladimaKogo respectively. All the settlements on the submergence contour line were submerged and subsequently resettled farther inland. Some of the resettled villages are Zumba, GaladimaKogo, Guni, Kuchi, and SarkinPawa among others.

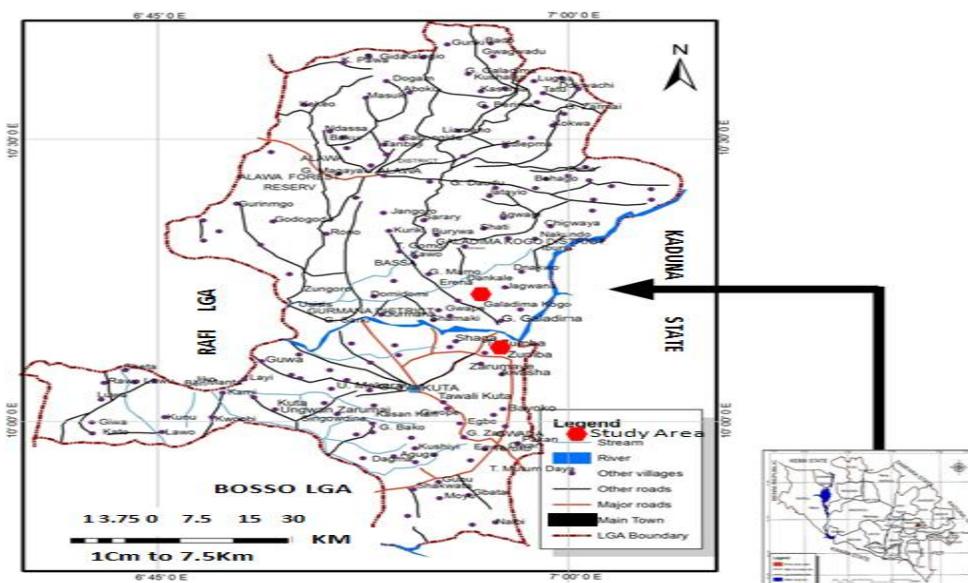


Figure-1.1. Map of Shiroro LGA, depicting the study Area (Zumba and GaladimaKogo)

Source: Adapted from Ministry of Land and Housing Minna with Authors Modification.2013

3. Materials and Methods

Data for this study were derived from both primary and secondary sources. Questionnaires were administered on the affected communities located in the study areas. One hundred and twenty questionnaires were administered in the resettled communities of Zumba and Galadiman Kogo. Descriptive method was used in the analysis. Statistical techniques such as frequency distribution, percentages were used to analyze the data. The results were presented in the form of percentages, charts and tables.

4. Results and Discussion

The survey covered, to an appreciable extent a comprehensive cross-section of the people in the selected villages, in terms of education, compensation, public participation and environmental problems.

Table-1. Educational Status of Respondents

Education Level	Name of villages		Total	%
	Zumba	GaladimaKogo		
None	19	15	34	28
Primary	11	10	21	18
Secondary	19	24	43	36
Post Secondary	11	11	22	18
Total	60	60	120	100

Overall, 28% of the sample population had no formal education, 18% had primary education, 36% had secondary education while 18% had post secondary education. Based on these facts, the population in the selected villages that had low level of education was closed to 50%. This is shown in the Table 1 above.

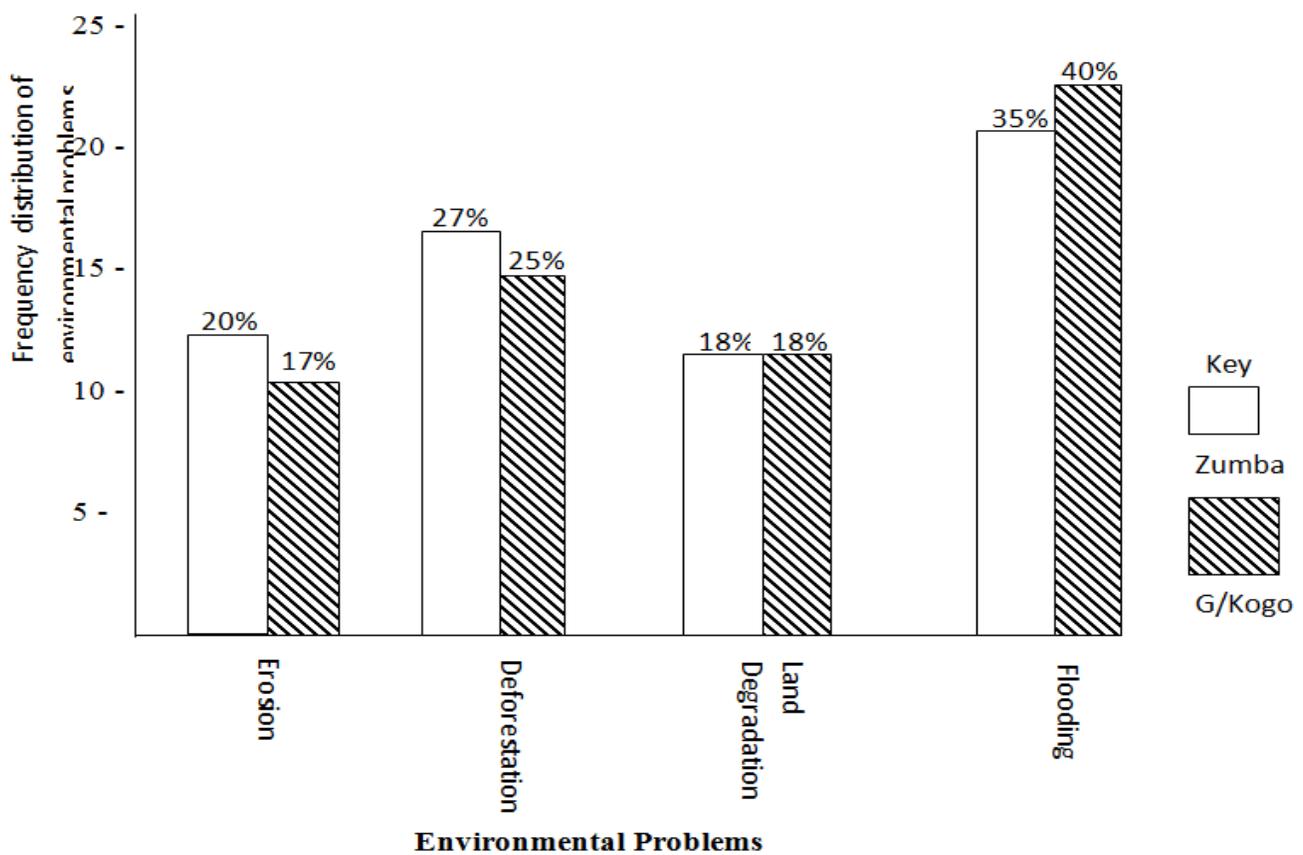


Figure-2. Specific environmental problems of the Settlements.

Figure 2 depicts the environmental challenges which were similar from one village to another. Data collected from the field show that the large number of the respondents indicated the following environmental challenges:-

4.1. Flooding

The explanation given for the flooding could be geographical in character since the areas are located in the downstream of the dam and when the spillway of the dam opens and closes some parts of these villages become inundated and water logged for several hours or several days.

Figure 2. shows that flooding was more predominant with 35% and 40% respectively in Zumba and GaladimaKogo. Deforestation was 25% in GaladimaKogo and 27% in Zumba. The causes of deforestation are common across the globe, however, the most important factor worldwide as well as in the study area are the permanent conversions of forest to agricultural land. The results also showed that erosion in Zumba was 20% while in GaladimaKogo was 17%. The possible contributing factor for the acceleration of the rate of erosion could be the method of farming practices with the removal of catchment vegetation as part of increased land preparation after the dam was built.

Land degradation in Zumba was 18%, while in GaladimaKogo it was also 18%. if this issue of land degradation is not properly addressed for the future, it could lead to the shortage of productive land, shortage of food and eventually migration.

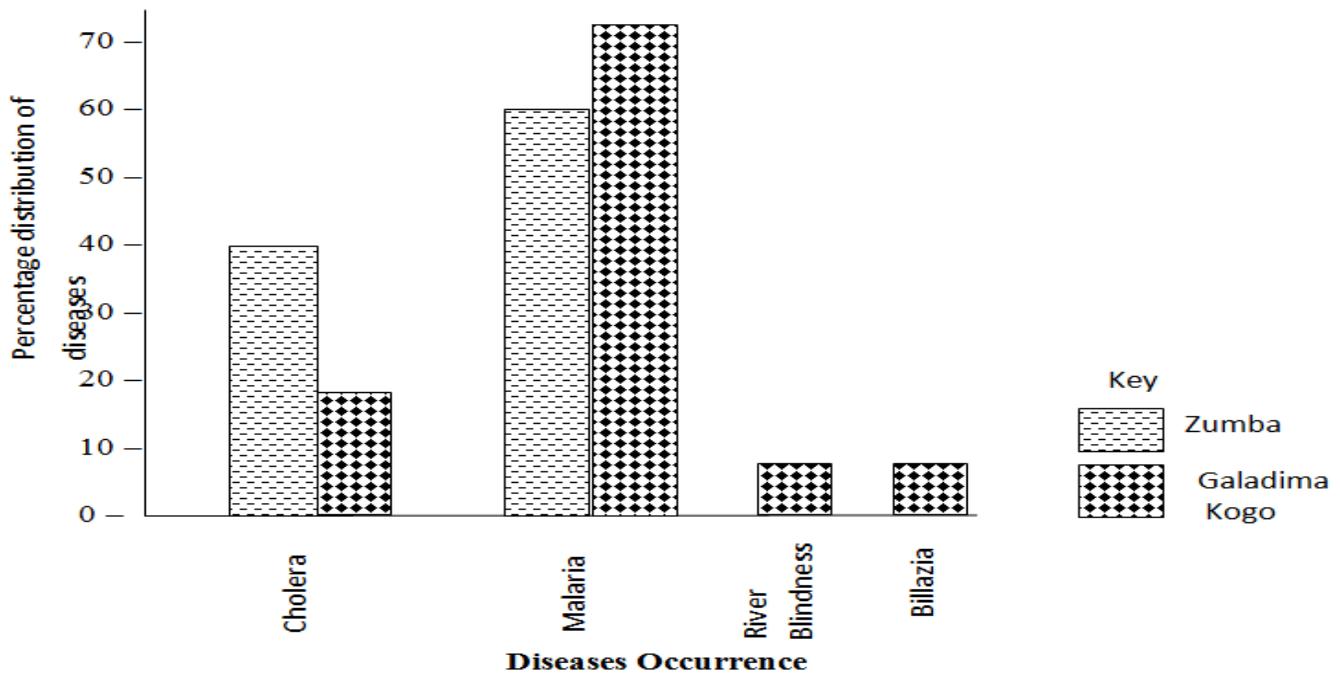


Figure-3. Most Prominent diseases occurring in the Study Areas.

Figure 3 indicates that 67% of GaladimaKogo and 60% of Zumba population have specified that malaria is the major environmental health problem. It was not surprising to identify the disease in the surveyed villages. Malaria is due to protozoan parasite called plasmodium.

Stagnant water and swampy areas are the perfect breeding grounds for mosquitoes. In addition, irrigation schemes, marshy reservoir and ponds area have also been identified as ideal ground for the breeding of the malaria parasites. Data gathered during the field studies also indicated that 40% Zumba and 17% of GaladimaKogo population have specified cholera as another major environmental health problem. This finding with personal observation indicated that the sanitary conditions of the surveyed villages are very poor.

The main reason for this problem is the lack of proper sanitation and waste disposal facilities as well as the lack of proper sources of drinking water. The respondent’s population from GaladimaKogo revealed 8% and 8% of Bilharzias and River blindness respectively.

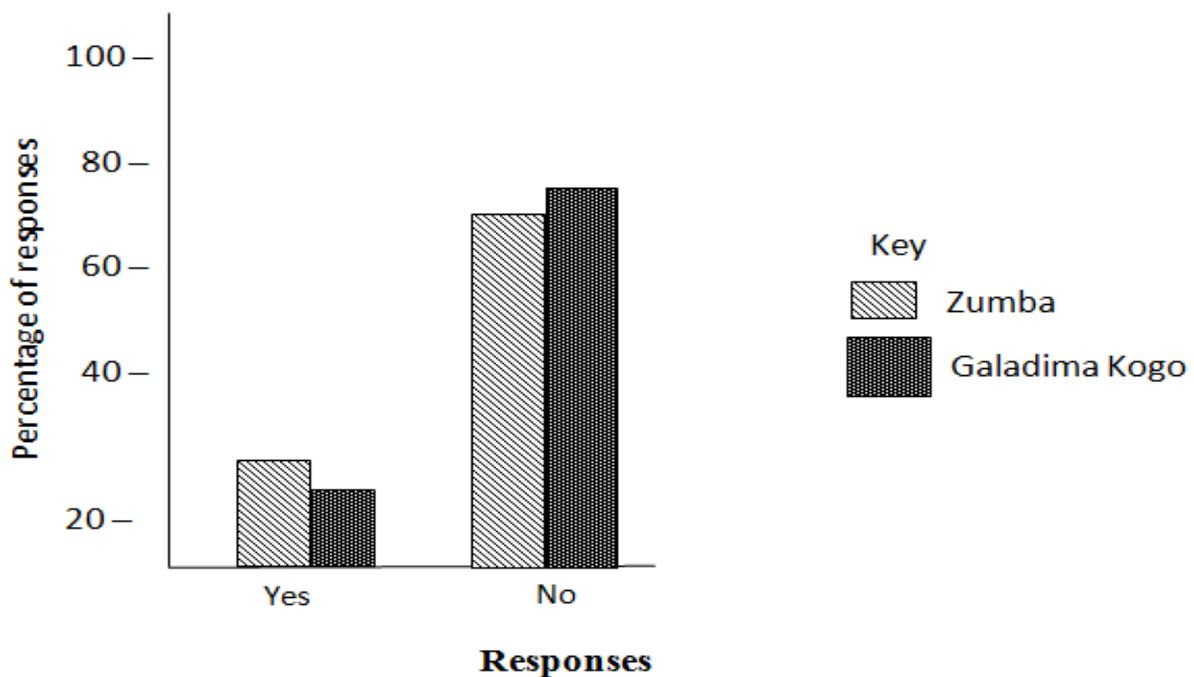


Figure-4. Levels of Public Participation in Resettlement Decisions

Figure 4 Indicate Public Participation in the decision making. Public participation is one of the important aspects of resettlement programme. The Shiroro dam was built in 1990. During that time, the local people of Zumba and GaladimaKogo felt marginalized in terms of access to decision making and public participation. The surveyed results indicated that 90 (75%) of the sample population were not involved in the selection of sites. This clearly shows that the local people were marginalized and excluded from any type of participation concerning the selection of site.

Table-2. Frequency Distribution of Compensation Received by the Respondents

Reaction	Frequency	Percentage
Yes	55	46
No	44	36
Being promised	21	18
Total	120	100

Table 2 indicates percentage distribution of compensation received by the affected communities. The compensation experience was not encouraging in terms of the execution of the whole programme. At an aggregate level, 46% of the respondents confirmed that they have got compensation; however, about 36% indicated that they have not received any compensation, and the other 18% confirmed that they have been promised by the responsible authority. This clearly demonstrates that still the issue of compensation is unresolved to the local people.

5. Self Help

In Zumba and GaladimaKogo, sites for settlement were simply earmarked, allocated and cleared. Cash compensation, then made, as the people affected were left to build their own houses. From the information gathered from the respondents, majority laid emphasis on being cheated by their leaders, saying that their leaders connived with government to cheat them and that was why they were left to build their own houses.

6. Conclusion and Recommendations

In conclusion, some of the major environmental and social challenges such as resettlement, loss of land, deforestation, erosion, flooding and water related diseases were analyzed and the resultant outcome is that the people are not properly resettled and confronted with myriad of environmental and health challenges.

It is recommended that the relevant authorities should meet up with their commitment to the communities to achieve quality life and safe environment.

References

- [1] R. Lightfoot, "Planning reservoir related resettlement programme in N.E Trailand," *Journal of Tropical Geography*, vol. 48, pp. 47-57, 1978.
- [2] R. A. Olawepo, "Resettlement and dynamics of rural change in Jebba lake basin Nigeria," *Journal of Social Science*, vol. 16, pp. 115-120, 2008.
- [3] K. M. Arungbemi, "A pre- impoundment socio-economic survey of Jebba resettlement scheme," KLRI Annual Report, 1983.
- [4] I. P. Ifabiyi and A. Usman, "Socio-economic analysis of the operational impacts of Shiroro hydropower generation in the low land areas of Middle River Niger," *International Journal of Academic Research in Business and Social Sciences*, vol. 2, pp. 57-76, 2012.
- [5] C. C. Cook and A. Mukendi, *Involuntary resettlement in bank-financed projects: Lessons from experience in Sub-Saharan Africa*. In C. Cook (Ed). *Involuntary resettlement in Africa*. World Bank Technical Paper No. 227. Washington, D.C, 1994.
- [6] World Bank, *China: Involuntary resettlement, June, processed*, 1993.

Bibliography

- [1] M. M. Cernea, *Disaster-related refugee flows and development-caused population displacement in anthropological approaches to involuntary resettlement: Policy, practice, and theory*. Boulder, Colorado: Westview Press, 1993.
- [2] R. Lightfoot, "Planning reservoir related resettlement programme in N.E Trailand," *Journal of Tropical Geography*, vol. 48, pp. 47-57, 1978.
- [3] R. A. Olawepo, "Resettlement and dynamics of rural change in Jebba lake basin Nigeria," *Journal of Social Science*, vol. 16, pp. 115-120, 2008.
- [4] A. Usman and I. P. Ifabiyi, "Socio-economic analysis of the operational impacts of Shiroro hydropower generation in the low land areas of Middle River Niger," *International Journal of Academic Research in Business and Social Sciences*, vol. 2, pp. 57-76, 2012.