

Appraising the Level of Community Participation in Rural Water Project in Communities, Rivers State, Nigeria

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ABSTRACT

This study explored the level of community participation in a rural water project in Rivers State, Nigeria. The study was guided by two research questions and two hypotheses tested at the 0.05 level of significance. A descriptive survey research design was adopted, with a sample of 153 respondents comprising 58 rural women, 20 Community Development Committee (CDC) members, and 75 registered youths, drawn from a population of 306 respondents using stratified random sampling technique. The data collection instrument was the researchers' structured questionnaire, which was face-validated by three experts, yielding an overall reliability coefficient of 0.89 obtained using Cronbach's Alpha. Findings, among others, show a low level of community participation in the water project. Factors associated with the non-sustainability of the water project include poor representation of community members, the rejection of ideas and suggestions raised by the communities, a lack of transparency on the part of the external agency, and the use of more foreigners in the planning and execution of the project. The researchers recommended adequate integration of key community players into the development programme and the employment of more community members to foster ownership of the project.

Key words: appraising, level, community participation, rural water project, communities

INTRODUCTION

Research has acknowledged that community participation is an essential ingredient in rural water projects in developing countries. It plays a critical role in the conception, design, construction, and maintenance of viable and sustainable projects (NdububaOlufunmilayo & Shuaibu, 2016). Water is an indispensable element for the survival of every creature. The degree of community participation during planning and decision-making has a direct positive impact on community project satisfaction. The satisfaction stems from the accessibility and availability of water by individuals in their immediate environments. Apart from its primary role in enhancing human health and well-being, Olokesusi (1987) posits that it is equally important for industrialisation and commercial development. In terms of health, the World Health Organisation and United Nations Children's Education Fund (2000) noted that over 2 billion people each year suffer from diseases linked to water. They further stated that approximately 3900 children die each day from lack of clean water and sanitation.

In contrast, women and children are denied opportunities for work and education because they are often assigned water-carrying responsibilities. This underscores the important role of water in many aspects of people's livelihoods. Thus, improved water supply can positively impact a range of aspects of people's livelihoods. Moriarty and Butterworth (2003) maintain that better health, the required quantity, and better-quality water contribute to reducing disease. Healthy people can work and live more productive lives; time savings – time and effort spent obtaining water can be reduced by making water access easier for the commoner. This time can be put to other activities; expenditure savings – improved water supplies lead to reduced expenditure on water

provided by water vendors, and less money is spent on the treatment of illness caused by polluted water; food security/ nutrition – improved water supplies can develop backyard kitchen garden or maintain milking cattles, irrigation or keeping livestock easier; productivity and income – improved water supplies can make other productive usage of water possible and generate employment and income (p.47).

On the contrary, Oporoma (2011) posits that a lack of access to portable drinking water leads to high youth unemployment, which in turn leads to frustration among them. This implies that the availability and accessibility of safe drinking water will help ameliorate youth restiveness in the region. Youths will be meaningfully engaged in income-generating activities, thereby reducing restiveness. Consequently, achieving these benefits requires the collective responsibility of all. The World Bank (1994b) opines that participation promotes ownership, fosters long-term attention to human rights issues, improves the sustainability of development programmes, and promotes learning and a results-based orientation. Hence, the involvement of a significant number of people in situations or actions will obviously enhance their well-being.

Accordingly, community participation, as conceived by Oakley and Marsden (1984), is a process by which individuals, families, or communities assume responsibility for their own welfare and develop the capacity to contribute to their own and the community's development. Thus, community participation is an active process in which beneficiaries influence the direction and execution of development projects rather than merely receiving a share of project benefits. Breuer (1999) added that it is a process by which people are enabled to become actively and genuinely involved in defining the issues concerning them, making decisions about factors that affect their lives, formulating and implementing policies, planning, developing, and delivering services, and taking actions to achieve change. The genuine and active involvement of beneficiaries in a water project of this nature in the community will obviously contribute to its sustainability. This invariably suggests that community participation should not only be seen as an avenue for delivering a project, but also as a key to improving decision-making and governance in its planning and management. The ultimate aim of participation, therefore, is to achieve better decisions, that is, decisions that are better informed, more sustainable, owned by stakeholders, and implementable, as people are all carried along, irrespective of their social status and affiliation. In line with this, Reid (2000) identified the importance of people participating in community projects thus: the involvement of people in community activities; the centralisation of power and responsibility; it is openly and widely publicised; all ideas are treated with respect and welcomed as a source of inspiration with potential value for the entire community; distinctions among various groups and types of personalities are absent; it operates openly with an open mind, not being controlled by a single organisation. Leaders are not ego-driven but are focused on operating a high-quality, open decision-making process (p. 7).

A cursory look at these points shows that the ultimate goal of community participation in any project is to improve living conditions, empower communities, build capacity, and promote sustainability. In consonance with this, Khosa in Olukoton (2008), rightly observed that experience has shown that the more the community contributes to and participates in projects, the more sustainable the development projects are. The importance of community participation in rural development reveals that such engagement not only leads to improved project outcomes but also plays a vital role in strengthening local governance structures (Fagbohun, 2018). Musa (2000) also added that through participation, a community develops skills for collective action, maintenance and sustainability. This presupposes that full representation of the community's different organs in project execution will obviously lead to its sustainability. This was further affirmed by Ford (1993), who found that when local groups are actively involved in project design and implementation, they take ownership and are more likely to continue the project when donor funding ends, compared with externally imposed projects. Thus, the World Bank (1994b) stipulated that community participation includes the following: local people have a great amount of experience and insight into what works, what does not work and why; involving local people can help them to develop technical and managerial skills and thereby increasing their employment opportunities; involving local people helps to increase the resources available for the programme; involving local people is to bring about 'social learning' for both planners and beneficiaries. The term 'social learning' describes the development of a partnership between professionals and local people, in which each group learns from the other (p. 395). Consequently, community based participation and involvement of project beneficiaries transform the attitude of communities towards the effective management and control of their ownership of water supply (Giddens et al., 2013)

Admittedly, the essence of community participation in the sustainability of a project cannot be overemphasised. Sriskandarajah in Ofori (2008) sees sustainability as a measure of the relationship between the community and the project rather than an externally designed goal to be achieved. Research acknowledges that community participation has significantly empower local populations, improve project sustainability, and enhance accountability for rural development initiatives (Awoonor, 2025). It is a crucial factor in every project implementation. It involves a paradigm shift from a top-down to a bottom-up approach to development. Despite the project's crucial role in sustainability, a preliminary investigation by the researchers reveals frequent vandalism of rural projects in communities in Rivers State. One knows why the perceived community project could easily be damaged, irrespective of the need for such a project. Moreover, while several studies have examined the factors responsible for the non-sustainability of projects, little has been done on rural water projects. The absence of such studies has prompted the present study in Rivers State.

The main purpose of this study is to assess the level of community participation in rural water projects in Rivers State. The study sought to achieve the following objectives:

1. identify the extent of community involvement in the rural water project in Rivers State,
2. examine the factors responsible for the non-sustainability of the rural water project in communities in Rivers State.

The following research questions guided the study;

1. To what extent are communities involved in the rural water project in communities in Rivers State?
2. What are the factors responsible for the non-sustainability of the rural water project in communities in Rivers State?

The hypotheses of this study are in null form and tested at .05 level of significance.

H₀₁: There is no significant difference among the mean ratings of women, community development committee and youths on the extent to which communities are involved in the rural water project in communities, Rivers State.

H₀₂: There is no significant difference among the mean ratings of women, community development committee and youths regarding the factors responsible for the non-sustainability of the rural water project in, Rivers State.

METHODOLOGY

The study adopted a descriptive survey research design. The study population comprised 306 people: 117 women, 39 CDC members, and 150 registered youths in the selected three communities in Rivers State. The choice of these three categories is based on their positions in community development. A sample of 150 people (50% of the population) was drawn from the population using stratified random sampling. This includes 58 women, 20 CDC members, and 75 registered youth. The instrument contained two sections. Section A provided demographic information of the respondents with three items. The items are the name of the community, gender and designation in the community. Section B contained a 14-item questionnaire that collected information to address the research questions. Items 1-7 provided information on the extent of communities' involvement in the rural water project. The rating scale for these items was very high extent (4 points), high extent (3 points), low extent (2 points), and very low extent (1 point). Items 8-14 provided information on the factors responsible for the water project's unsustainability. The options are structured as strongly agree (4 points), agree (3 points), disagree (2 points), and strongly disagree (1 point). These items are structured on a 4-point rating scale. This instrument was subjected to face validity by two experts in adult education and one from Measurement and Evaluation from the Faculty of Education, University of Nigeria, Nsukka. Thereafter, the questionnaire was trial-tested with 30 rural dwellers in Emohua, a community not used in the study. However, it shared similar characteristics regarding rural projects and community participation. The Cronbach Alpha Statistical tool was employed to assess the instrument's internal consistency, yielding reliability coefficients of 0.78 and 0.82 for clusters A and B, respectively, and an overall index of 0.80. The administration and retrieval of the completed

questionnaire lasted for one month. Data collected from respondents were analysed using descriptive statistics (mean) to answer the research questions and ANOVA to test the null hypotheses at the 0.05 level of significance. The criterion mean of 2.50 was used to accept an item in the questionnaire. Similarly, the degree for determining the level of participation ranges from: 3.50 - 4.00 (very high); 3.00 - 3.49 (moderately high); 2.50 - 2.99 (high); 2.00 - 2.49 (low); 1.50 - 1.99 (very low).

A null hypothesis is regarded as not rejected if the calculated f-ratio is less than the critical f-ratio, but rejected where the calculated f-ratio is greater than the critical f-ratio at a 0.05 level of significance.

RESULTS

1. To what extent are community members involved in the rural water project in communities in Rivers State?

Table 1: Mean ratings of respondents on the extent of their involvement in the rural water project in Communities

S/N	Items	Women (n=58)	C.D.C. (n=20)	Youths (n=75)	Decision
1.	Members of the communities are well informed about the project.	2.24	2.60	2.55	*Low Extent, **High Extent, *** High Extent
2.	Meetings are held with stakeholders in the community to sensitise them about the project.	2.45	2.45	2.36	*Low Extent **Low Extent ***Low Extent
3.	Different responsibilities are assigned to communities as a way of actively involving them in the project.	2.02	2.20	2.16	*Low Extent **Low Extent ***Low Extent
4.	The managerial skills of communities are enhanced due to their active participation.	2.43	2.40	2.25	*Low Extent **Low Extent ***Low Extent
5.	Ideas and suggestions from communities are taken into consideration by external body.	2.07	2.80	2.40	*Low Extent **High Extent ***Low Extent
6.	Participation of the community in the project is more of the informative.	3.24	3.20	2.60	*High Extent **High Extent ***High Extent
7.	The implementation stage of the project is characterised by massive employment of unskilled labours from the communities.	2.28	2.00	2.24	*Low Extent **Low Extent ***Low Extent
	Grand mean	2.39	2.52	2.37	*Low Extent **High Extent ***Low Extent

*represents Women, ** represents C.D.C *** represents Youths

Data in Table 1 indicate that the mean score of 2.24 for women was rated as low, while those for C.D.C and youths were high, with mean scores of 2.60 and 2.55, respectively. Items 2, 3, 4, and 7 have mean scores of low extent (2.45, 2.45, 2.36), (2.02, 2.20, 2.16), (2.43, 2.40, 2.25) and (2.28, 2.00, 2.24) for the women, C.D.C and youths respectively, while item 5 has the mean scores of low extent (2.07, 2.40) for women and youths, but high extent (2.80) for C.D.C. Item 6 has the mean scores of (3.24, 3.20, 2.60) which indicates high extent for women, C.D.C and youths respectively. The grand means of 2.39 for women, 2.52 for C.D.C., and 2.37 for the youths showed that the extent of communities' involvement in the rural water project in Rivers State was low.

2. What are the factors responsible for the non-sustainability of the rural water project in communities in Rivers State?

Table 2: Mean Ratings of Respondents on factors responsible for the non-Sustainability of Rural Water Project in Communities

S/N	Items	Women (n=58)	C.D.C. (n=20)	Youths (n=75)	Decision
8.	Communities are adequately represented in the planning and implementation of the projects.	2.28	2.05	2.35	*Disagree **Disagree ***Disagree
9.	Communities are sensitised about the usefulness of the project to be maintained.	2.16	1.95	2.19	*Disagree **Disagree ***Disagree
10.	The communities are sensitised about the usefulness of the project.	1.93	2.95	2.66	* Disagree **Agree ***Agree
11.	The project addresses the need of the people.	3.05	3.20	3.20	*Agree **Agree ***Agree
12.	The materials used in the execution of the project were originals.	2.29	1.90	2.01	*Disagree **Disagree ***Disagree
13.	Transparency in project execution is absent.	3.00	3.25	3.19	*Agree **Agree ***Agree
14.	The project is characterised by the use of external contractors in its execution	2.97	3.05	3.28	*Agree **Agree ***Agree
	Grand mean	2.53	2.62	2.70	*Agree **Agreed ***Agreed

Data in Table 2 show that items 8, 9, and 12 were rated as disagreed by all respondents, whereas items 11, 13, and 14 were rated as agreed. Item 10 had a mean score for women of disagreed, while the remaining scores for

both C.D.C and youths were agreed. The grand mean of 2.53, 2.62 and 2.70 in the table is an indication that factors responsible for the non-sustainability of the rural water project in communities are inadequate representation of community members in the planning and implementation of the project, lack of sensitisation of communities on the need to maintain the project, use of inferior materials, lack of transparency and the use of external contractor in the execution of the project.

H₀₁: There is no significant difference among the mean ratings of women, community development committee and youths on the extent to which they are involved in the rural water project in communities, Rivers State.

Table 3: Analysis of Variance on the Extent of Community's Involvement in the Rural Water Project in Communities

Source of variance	Sum of square (SS)	Mean square (M.S)	Df	f-cal	f-crit	Decision
Between Groups	.39	.19	2	1.85	3.00	Accepted
Within Groups	15.66	.10	150			

Table 3 shows that the f-calculated value (1.85) is less than the f-critical value (3.00) at 0.05 level of significance. This shows that significant difference does not exist in the mean ratings of women, community development committee and youths on the extent to which they are involved in the planning and implementation of the rural water project in communities, Rivers State.

H₀₂: There is no significant difference among the mean ratings of women, community development committee and youths regarding the factors responsible for the non-sustainability of the rural water project in communities, Rivers State.

Table 4: Analysis of Variance on the factors responsible for the non-sustainability of the Rural Water Project in Communities

Source of variance	Sum of square (SS)	Mean square (M.S)	Df	f-cal	f-crit	Decision
Between Groups	.92	.46	2	5.74	3.00	Rejected
Within Groups	11.98	.08	150			

Data indicate that the f-calculated value (5.74) is greater than the f-critical value (3.00) at 0.05 level of significance, hence the rejection of the null hypothesis. This implies that significant difference is found in the mean ratings of women, community development committee and youths regarding the factors responsible for the non-sustainability of the rural water project in communities, Rivers State.

RESULTS AND DISCUSSION

The findings of research question one showed that community participation in the rural water project in Rivers State was low. Respondents reported that communities were not actively involved in the project's planning. Meetings were not held regarding the project; ideas and suggestions from the communities were not taken into consideration, and participation was limited to information. The finding aligns with the World Bank (1994b), which advocated that local people participate in projects that affect them. Similarly, a significant difference was not found in the hypothesis following its acceptance. This suggests that respondents shared similar ideas about the questionnaire items. Hence, people's involvement in a community's activities entails collective responsibility (Reid, 2000). However, members' participation was merely passive, which further explains their low level of involvement despite the project's importance to communities. The study, therefore,

advocates adequate representation of all segments of the community in community development projects. It is believed that, with their involvement, the project is likely to be sustained as a community-owned project.

In research question two, findings show that factors responsible for the rural water project in communities are diverse. Some of which are uneven representation of the community in project planning and execution, and objections raised by communities in the implementation and maintenance of the project. It was further evident in the rejection of the null hypothesis as a significant difference was found. The existence of significant differences among women, CDC, and youths implies that each community organ differs significantly from the others regarding the items raised in the instrument. The diverse views of respondents support Musa's (2000) suggestion that, through participation, a community develops skills for collective action, maintenance, and sustainability. This further supports the need to involve local people in their projects to sustain them (Ford, 1993). The study, in contributing to the existing literature, submits that a genuine people-oriented community project is one that actively takes into cognisance the suggestions and involvement of the communities. By recognising their views, the project is believed to be sustained.

CONCLUSION

The study underscores the importance of community participation in the planning and execution of rural projects for its sustainability. Underlying this fact, the study concludes that the level of community participation in rural water projects in Rivers State was low. This is evident in the lack of sustainability of rural water projects in communities, despite their pivotal role. Some of the factors responsible for the project's non-sustainability included poor community representation in its planning and implementation, the exclusion of community ideas and suggestions, a lack of transparency in project execution, and a greater reliance on external bodies.

Recommendations

The researchers recommended among others;

1. The various organs of the community should be incorporated in the planning and implementation of projects in order to own the project.
2. Ideas and suggestions made by the community should be seen as a guide for effective delivery of projects in order to sustain them.

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