

## The Impact Of National Park On Catchment Communities Development: Cross River State Scenario, Nigeria

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### Abstract

In recent times, the concept of National Park development has not significantly impacted on the lives of the rural communities within the area. It is on this premise that this research wishes to evaluate the impact of Cross River State National Park on catchment communities development. Three communities in Akamkpa Local Government Area were selected for this study and include Mkpot, Aking and Oban and ten percent of the projected population was used as a sampled size for the administration of questionnaires in each community. Findings indicate that most of the projects embarked upon by the Cross River State National Park were poorly executed at the same vein there was also a low level of community participation in the park management. Besides, it was noticed that the people were not provided with an alternative source of livelihood and as a result, confrontations between park management and members of host communities are frequent. Against this backdrop, much is needed to be done if effective park management and community benefits from the park must be achieved.

**Key Words:** Catchment, Communities, Executed, National Park, Impact.

### INTRODUCTION

The world's first National park , fellowship was created by an act of congress in 1872 as a "pleasuring ground for the benefit and enjoyment of the people in order to protect for all times outstanding natural area. The major reason for the creation of national parks is to ensure and secure most areas from degradation of excessive exploitation by inhabitants within the zone. Accordingly, the Cross River National park (CRNP) was established in 1991 with the sole aim of conserving the last vestige of the Cross River tropical rainforest from extinction since it inhabit rich flora and fauna species which at the same time improve the livelihood of the catchment communities. The conservation of natural resources have great impact on rural communities especially as it enhance socioeconomic, ecological and cultural benefit of the rural dwellers, Bisong (2001). Anijah-Obi (2001) affirmed the imperial findings of Bisong and opined that sustainable rural development could only be achieved when wildlife conservation programmes provide international source of income and animals proteins to the rural communities. Accordingly, Oga (2011) highlighted the significant impact of forest product which according to him forest products are useful for industrial purposes as most of the industrial purposes are obtained for the conservation of wildlife including honey, and hides and skins. Today, despite the significant impact attributed to the National Park in Cross River State, the catchment communities whose livelihood solely depends on these resources are

deprived from utilizing the natural ecosystem. Besides, these communities whose livelihood solely depend on forest ecosystem rich with forest resources such as Afang, bush mango and animals which constitute the major some of proteins and vitamins, are deprive access and utilization of these laudable resources hence reducing the calorie in take of the rural community dwellers. Moreso, the communities within the National Park are equally deprived from exploiting the forest resources for construction purpose hence, the resultant effect is that majority of their houses and bridges are contracted with material that would not stand the test of time. It is on premises one would ask whether the Cross River National Park is really impacting on the socioeconomic livelihood of the people. What role is the park playing in order to better the lives of impoverish communities whose livelihood solely depend on the forest resources which is the bases of this work to critically evaluate the impact of the National Park on catchment communities development with reference to assessing the benefit from the establishing of the park, the projects executed, problems associated with National Park on catchment communities, and the socio-economic characteristic of the sampled population.

### METHODOLOGY

This study was conducted in Cross River state taking into consideration the impact of Cross River State national park on catchment communities of Akamkpa Local Government Area. Three hypotheses were tested which tried to examine if there exist a significant variation in the project executed in the catchment communities under investigation and also to evaluate whether the benefits derived by the catchment communities varies from one another in the areas. A baseline population was obtained from 2006 National population commission which further projected to 2103. A sample size of Mkpota (273) Aking (251) and Oban (309) was used which is ten percent of the projected population used as the sample size for the study. However, questionnaires were randomly distributed according to the sample size as stipulated in the Table 1 showing the communities and the sampled population.

**Table 1: Population projection and sample sized**

S/N	Community	Existing population of 2006	Projected population of 2012	Sample seize of 10% population
A	Mkpota	2300	2734	273
B	Aking	2110	2507	251
C	Oban	2600	3089	309
	Total	7010	8330	833

*Source: Field survey, 2014*

### LITERATURE REVIEW

#### **An overview of National Park**

The denomination of National Parks arises from the desire to set aside particular areas of terrain from production in the conventional economic sense and to designate them as protected areas (Simmons, (1974) conservation of wildlife of individual plant and animal species, or more commonly of assemblage of species of habitats and groups of habitats are often a major reason for their setting up and subsequent management. Except for a reasonable number of tourist facilities the exploitation and development of natural resources are prohibited. Although exceptions can be made, there can be no mining, hunting, grazing or generation of hydroelectricity in a true National Park. The highest political authority in the nation establishes and enforces this requirement. The needs of education and research are functions of such areas since unaltered or little manipulated ecosystems provide reference

points. There is also their capacity as wilderness areas used for back-country recreation, usually on foot.

Although, the concept of a National Park does not imply unlimited and uncontrolled public access, the parks do exist for public enjoyment. Outdoor recreation presents the strongest and most easily quantifiable social demand, because of their outstanding qualities and beauty National Parks are special magnets for recreationists. Simmons (1974) identifies the preservation of entire landscape which are particularly valued as another concern of National Park management. Such landscapes are frequently natural but they may also be cultural in which case there are generally some productive uses.

### **National Park history**

Yellowstone, in the United States of America was the first National Park established in 1872 by Act of congress (Kudson, 1974), to protect its 300 geysers, high waterfalls, huge lakes and other wonders in 1890, the Yosemite National Park was designated. When in 1916 the National Park service was established in the United State, there were 17 National Parks and 22 National monuments under it. The idea of National Park spread rapidly by 1917, Mill (1977) could report and Poland huge new parks were made after World War I from confiscated royal lands. Eltringham (1979) reports that President Kruger of what is now South Africa establishments, it is now the famous Kruger National Park about 350kms long and 65kms wide. This and the Par National Albert in the Belgium Congo (1920) remained the only National Parks in Africa until after the war when Kenya gazetted the Nairobi National Park in 1946, Isavo National Park in 1948, the Mount Kenya National Park in 1946, and the Aberadore Park in 1950 (Yeboah, 1991). Tanzania followed in 1951 with the Serengeti National Park and Uganda in 1952 with the Queen Elizabeth and Murchison Falls National Parks (Eltringham, Ibid).

Canada has 29 large National Parks featuring scenic values plus more than 20 national historic parks and sites. Canadian National Park Act states. The parks are hereby dedicated to the people of Canada for their benefit education and enjoyment – and shall be maintained and made use of as to leave them unimpaired for the enjoyment of future generations. The largest of Canada's – and may be the world's National Park in Wood Buffalo in Alberta and the North territories. Its 4,481, 000 has contains 12,000 bison roaming at large (Curry-Lindahl, 1974). By 1972, when the United States of America celebrated the centennial of Yellowstones, the United Nation listed 1,204 parks of equivalent reserves in 140 nations (Curry-Lindahl, Opcit).

### **National Park establishment in Nigeria**

The history of parks in Nigeria can be traced to 1932 when the London society for the conservation of fauna and flora sent Col. A. H. Haywood to survey wildlife resources in Nigeria (Wari, 1993). The same source has it that in 1948, another survey was carried out and the recommendation made to the government of Nigeria for the creation of wildlife Department to cater wildlife in order to check/control the rapid reduction in the number of wild animals. In 1968, there was the African convention for the protection of African wildlife, where resolutions were made to protect wildlife through the establishment of Game reserves and National Park and the introduction of hunting licences in which Nigeria participated. Before and after the African convention, many Game reserves were created in the country but not until 1979 when the former Burgh Game reserve and Zugurma Game reserves were merged and up-dated to the status of the Nation's Lake National Park. Subsequently, other National Parks have been established through Degree 36 of August, 1991 of the Federal Government of Nigeria. They includes the Yankari National Park, Old Oyo National Park, Cross River National Park, Gumti National Park and Chad Basin National Park.

## Park management

As noted earlier, management encompasses a broad range of purposeful decisions, intended to accomplish given objective. Planned action and planned inaction are both management in this case. The basic goal of policy toward park resource management is to offer higher quality experience for the visitor plus maintenance and restoration of high quality naturalistic environment. The United States National Park service program for instance comprises the following categories (Budget of US, 1978).

1. Overall management of park areas to accommodate visitors
2. Maintenance of buildings and other facilities
3. Interpretive programs to enhance the visitor's park experience
4. Law enforcement to protect the visitor's wellbeing and reduce vandalism and other destruction
5. Resource management to protect and preserve the unique natural, cultural and historical features

The need for management of parks resources hinge on several advantages:-

1. There can be little doubt that tourist demand has increased dramatically in the post-war period, particularly since the 1960s. Reasons for growing interest and outdoor recreation are well understood.

## FINDINGS

### Impact of National Park in the area

The people perception on the socio-economic activities/ benefits derived by Catchment communities from the projects of Cross River National Park as presented in table 2 shows that 16.6% of the respondents were of the opinion that conservation of medical plants are the socio-economic benefit derived, 12% respondents agreed that preservation of biodiversity was the socio economic benefits derived from the National Park. More so, 13.6% respondents were of the view that Cross River National Park reduces logging, 16.7% believed that the National Park create employment of indigenes, 11% affirm that the Cross River National Park increases productivity, 5.2% believed that it improve skills. Accordingly, 13.7% respondents were of the view that National Park improved farm output and improved access to information on new technologies by 7.8% while 3.5% respondents concluded the National Park increased access to farm inputs like fertilizers and other facilities. This mean that the host communities derive socio-economic benefit from the National Park.

**Table 2: Impact of National park on catchment communities**

Benefit	Community (A) Mkpot	Community (B) Aking	Community (C) Oban	Total Percentage	
<b>Environment</b>					
Conservation of medicinal plants	45	38	55	138	16.6
Preservation of biodiversity	39	29	32	100	12.0
Reducing logging	33	39	41	113	13.6
<b>Welfare of rural Communities</b>					
Employment generation	38	40	61	139	16.7
Improved skilled	10	12	21	43	5.2

<b>Agriculture</b>					
Enhancement of farm output	37	30	47	114	13.7
Improved access to new and technologies and information	25	21	19	65	7.8
Improved access to farm input	21	4	4	29	3.5
Total	273	251	309	833	100

Source: Field survey, 2014

However, in order to affirm the data collected on the socio-economic activities/ benefits of catchment communities in the National Park, as presented in table 3. The result from the hypothesis revealed a calculated value of 0.012 and critical value of 2.59 indicating the acceptance of the null hypothesis (H<sub>0</sub>) which state that the socio-economic activities/benefit derived by the catchment communities from project by the Cross River National Park does not significantly vary from one community to another" while the alternate hypothesis (H<sub>i</sub>) which state "The socio-economic benefit derived by the catchment communities from project of Cross River National Park significantly vary from one community to another was rejected as presented in Table 3 below.

**Table 3: The impact of the National Park on catchment communities**

Source of variance	Sum of square	Cal. Value		Means of sum square	F
Between sample size	10.75		2	5.375	
Within sample mean	928	0.012	24	38.67	2.59
Total	938.7		26		

Source: Data analysis, 2014

The executed project by Cross River National Park in the catchment communities as presented in table 4 indicates that 7.2% of the respondents agreed that community members received technical training advice on cash crops production, 12.1% agreed that oil palm seedlings were distributed to farmers, 16.6% agreed that bush mango seedling were distributed to farmers. Besides, over 12.4% respondents agreed that rural feeder road were graded. More so, 8% respondent agreed that there were provision of school benches, 11-5% respondents were of the option that donation of bundle of 3mcs for rehabilitation of school buildings were made. 8.2% respondents affirmed that community's health care center were constructed while 4.8% of the respondent were of the view that, there have little or no supply of drugs to community's health center. However, Table 4 below indicates a general low trend in the percentage responses as no percentage responses were up to 50% or above. This may be due to the fact that only feed persons and host communities benefited from the intervention programme.

**Table 4: Project executed by the Cross River National park to catchment communities**

Subject	Community A Mkpot	Community B Aking	Community C Oban	Total	%
<b>Agricultural projects</b>					
Educating farmers on cash crop	17	15	28	60	7.2
Provision of oil palm seedlings to farmers	26	32	43	101	12.1
Provision of bush mango seedling to communities	49	38	51	138	16.6
Training on worldwide observation	36	34	33	103	12.4
Tree planting training	31	32	25	88	10.6
Building of bridges	5	3	10	18	2.2
<b>Educational projects</b>					
Provision of school facilities and equipments	15	21	31	67	8
Provision of building materials to schools	32	30	34	96	11.5
<b>Health care projects</b>					
Construction of community health care center	25	17	26	68	8.2
Supply of drugs to provision of basic community health center	17	10	14	41	4.9
<b>Total</b>	<b>273</b>	<b>251</b>	<b>309</b>	<b>833</b>	<b>100</b>

Source: Field survey, 2014

Accordingly, the tested hypothesis which tries to confirm the data collected on the project executed in the three communities indicate that a calculated value of 0.013 and t-value of 2.53 at 0.05 significant level. This result shows that there is a significant variation in the project execute was the three communities since the f-value was greater than the t-value as indicated in Table 5 below.

**Table 5: Analysis of the impact of the National park on catchment communities**

Source of variance	Sum of square	Cal value	df	Means sum of square	F
B/w sample size	6.88	0.013	2	3.44	2.53
Within sample means	531.16		30	17.7	
Total	538.04		32		

Source: Data analysis, 2014

### Socio-demographic characteristics of respondents

The age of respondents as presented in table 6 indicates that out of 833 sampled respondents in the study area (Mkpot, AKing and Oban) 14% of respondents were less than 20 years 15.7% were between 20-30 years, 31.8% were between 31-40 years, 30.1% were between 41-50 years, while 8.4% were above 50 years. This implies that majority of the sampled respondents

in the catchment communities (Mkpot, Aking and Oban) were young adult who are still in their active years of life. Younger people are adventurous and are much more receptive to new ideas than the older once. This result also revealed that respondents above 50 years were lower in number, this could be due to the fact that most adult of 50 years and above do not have enough strength to continue to participate actively in any rural development projects initiated within their communities. Accordingly, The gender distribution of the respondent in the study are as presented in table 6 shows that 55.8% of the respondent were male while 44.2% respondent were females. This mean that majority respondents in the study are were males. The marital status distribution of respondents in table 6 indicates that out of the 833 respondents in the catchment communities (Mkpot, Aking and Oban) of the study area 232.8% were single, 34.1% were married, 7.9% were divorced, 16.7% widow/divorced while 17.5% of the respondents were separated. This implies that majority of the respondents in the study area (Mkpot, Aking and Oban) are married and have family responsibilities to cope with.

**Table 6: Socio-demographic characteristics of respondents**

<i>Age of respondents</i>	<i>Community (A) Mkpot</i>	<i>Community (B) Aking</i>	<i>Community (C) Oban</i>	<i>Total</i>	<i>Percentage</i>
Less than 20	35	29	53	117	14
20-30	53	37	41	131	15.7
31-40	93	76	96	265	31.8
41-50	62	88	100	250	30.1
Above 50	30	21	19	70	8.4
<b>Total</b>	<b>273</b>	<b>251</b>	<b>309</b>	<b>833</b>	<b>100</b>
<i>Marital status</i>	<i>Community (A) Mkpot</i>	<i>Community (B) Aking</i>	<i>Community (C) Oban</i>	<i>Total</i>	<i>Percentage</i>
Single	61	49	88	198	23.8
Married	84	91	109	283	34.1
Divorced	20	15	31	66	7.9
Widow/widower	46	53	40	139	16.7
Separated	62	43	41	146	17.5
<b>Total</b>	<b>273</b>	<b>251</b>	<b>309</b>	<b>833</b>	<b>100</b>
<i>Occupation of respondents</i>	<i>Community (A) Mkpot</i>	<i>Community (B) Aking</i>	<i>Community (C) Oban</i>	<i>Total</i>	<i>Percentage</i>
Farming	129	112	145	386	46.2
Small scale business	37	45	62	144	17.2
Worker (government/private establishment)	15	24	41	80	9.5
Hunting	25	24	20	66	7.9
Fishing	25	20	20	65	7.8
Logging	10	10	18	38	4.8
Other fairest resource user like non-timber forest resources	32	19	3	54	6.5
<b>Total</b>	<b>273</b>	<b>251</b>	<b>309</b>	<b>833</b>	<b>100</b>
<i>Level of income (N)</i>	<i>Community (A) Mkpot</i>	<i>Community (B) Aking</i>	<i>Community (C) Oban</i>	<i>Total</i>	<i>Percentage</i>
Below 1000	21	33	41	95	11.4
1001-2500	88	85	72	245	29.4
2501-4000	78	69	102	249	29.9
4001-5500	20	14	16	50	6
<b>Total</b>	<b>273</b>	<b>251</b>	<b>309</b>	<b>833</b>	<b>100</b>

Source: Field survey, 2014

Nevertheless, the occupation distribution of respondents as presented in table 6 reveals that 46.3% were farmers, 17.2% were engaged in small scale enterprises, 9.6% were workers either with the government establishment of private companies 7.9% hunters, 7.8% were engaged in fishing, 4.6% were engaged in logging activity, 6.5% were engaged in other forest resources which includes, rattan pal, canes, chewing sticks, forest foods, wrapping leaves, mushroom and medicines etc. This shows that farming is the primary and dominant occupation of the people in the study area (Mkpot, Aking and Oban) this further shows the land forest and communities.

### CONCLUSION

It is clear from the empirical findings on the impact of the Cross River State National park, that although the park has significantly impacted on the catchment communities in the area as evidenced in the data collected and the tested hypotheses which shows F-value greater than the t-value indicating that there was high significant impact of the National Park on the catchment communities in the area. However, despite the significant impact of the park on the communities its activities are not devoid of socio-economic problems such as lack of community involvement, lack of government commitment and poor project execution.

### Recommendations

Today, despite the significant impact of the National park on catchment communities in the area, the communities are still impoverished. Besides, the communities are deprived from effective utilization of the forest resources which is their only source of livelihood sustenance. However, in order to avert this scenario, this study put forward the following recommendations:-

- The government should provide adequate infrastructures to the catchment communities. This would help to alleviate the suffering and also better their livelihood socio-economically
- The various stakeholders should adopt a sustainable approaches to development which include participatory Rural Appraisal (PRA) and the Participatory Learning Action (PLA), which employs a bottom-up strategy that ensures the full involvement of the grassroots in providing solutions to environmental issues
- The government and other stakeholders involved in park management should provide an alternative source of livelihood, this could help reduce pressure on the forest resources within the National park ecosystem
- The catchment communities within the National park zone should be enlightened on the dangers associated with excessive exploitation of the forest resources in the area.
- The government should provide a framework to evaluate the success of all the measures provided to enhance community's livelihood in the area.

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