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EVALUATION OF THE LEVEL OF INFRASTRUCTURAL DEVELOPMENT IN ADO EKITI, EKITI STATE, NIGERIA

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ABSTRACT

The paper examined the level of development of infrastructural facilities in Ado Ekiti. Data for the study were obtained from five (5) selected areas in Ado Ekiti using purposive sampling technique, which are: Odo-Ado Area; Ajilosun Area; Adebayo Area; Housing Area and Olorunda Area. The instrument used to collect the data was a structured questionnaire. The analyses of the data using a descriptive method of data analysis revealed that the level of development of infrastructural facilities in the study area is average and there are some people that have no access to infrastructaural facilities as they are located far away from them. The study concluded that there is still need to develop the available infrastructural facilities as well creating new ones in strategic places. Therefore the study recommended that government at all levels must make it a priority to invest in the development of infrastructures in their jurisdiction, there should be proper location and distribution of infrastructural facilities, there is also need to award infrastructural developmental projects to competent hands rather than quack among others.

Keywords: Regional, Infrastructure, Development and Facilities

1.1 Introduction

Infrastructure according to Areola, (2017) refers to the basic systems and services that a country needs in order to function properly. The level of economic buoyancy of a nation largely depends on the condition of its infrastructural facilities (Ojoawo, 2016). Level of development is largely measured by the level of infrastructural facilities endowment as well as the condition (Pele, 2015).

In 2008, Engineers Canada conducted this engineering vulnerability assessment on four categories of Canadian public infrastructure: storm water and wastewater, water resources, roads

and associated structures, and buildings. The report provides an assessment of vulnerability based on case studies. In the case of transportation infrastructure (i.e., roads and associated structures), the locations analyzed include the City of Greater Sudbury, Ontario, and the City of Edmonton, Alberta. The engineering vulnerability assessment conducted in these two case studies employed a sophisticated three-dimensional analysis of infrastructure components including how the components respond to climate events and the particular set of climate events under consideration (Luead, 2012).

A Canadian study conducted a case study analysis of pavement sensitivity to temperature and precipitation. Specifically, this report analyzes pavement performance over a 20-year period using the Mechanistic-Empirical Pavement Design Guide (M-E PDG) to determine how climate changes in precipitation and temperature will affect the pavement performance indicators of international roughness index (IRI), longitudinal cracking, transverse cracking, alligator cracking, asphalt concrete (AC) deformation, and total deformation.

1.2 Statement of the Problem

The condition of the developing countries infrastructural facilities is alarming and something that calls for deliberation. Looking critically at many cities in the developing countries, we shall see that infrastructures like transport, power, and housing facilities etc. are nothing to write home about and this has consequentially caused them a lot in terms of economy dwindling, loss of lifes and properties, scaring away investors among others. This case is applicable to Ado Ekiti which is the study area for this research.

1.3 The Study Area

Location and Boundary

Ado Ekiti is located between latitudes 7^031^1 N and 7^047^1 N of the equator and between longitude 5^005^1 E and 5^023^1 E of the Greenwich meridian . (fig 1.1). Ado Ekiti has length and breadth of 32 and 28 km respectively and share boundaries with six (6) of the administrative division of Ondo State. It is about 199km to the northern Ekiti and Erio to the North(43.5km), Ijero to the north east (7.5km), southern and south eastern to the south (59km) and western Ekiti of the west (9km). Politically, Ado Ekiti is the capital city of Ekiti state and has since 1996 enjoyed this status. Ado Ekiti has evolved and continued to enjoy urban status and adequately qualify to be called a city as it reflects a political, economic, social and cultural identity than many modern urban areas lack.



Figure 1: Map of Ado Ekiti

The population of Ado Ekiti was put at 149, 472 (NPC1991) before the State was created after which was put at 308,621 as at 2006 census by the National Population Commission. In 2016, the estimated population of Ado Ekiti can be put at 420,234 using 2.5% growth rate. Root crops and grains are cultivated at near farms while tree crops such as rubber are cultivated in distant farms. Ado Ekiti region show spatial specification of agricultural production while the north east part such as Iworoko, Are, Afao, and Igbemo are noted for rice , the east to southern part specializes in yam and cassava while the western part produces cocoa and plantain.

Climate and Vegetation

Ado Ekiti has tropical wet and dry climate which supports all grasses and other vegetation which is interspersed with short scattered trees (derived savanna). The climate is divided into two parts Northern derived savanna and Southern climatic belt. The city has a mean annual rainfall of about 1.318mm, there are double maximal rainfalls with the peak in June and September the rainfall is mainly concentrated between April and October, it rains for an average of 9-11 days per month during this period except in September when it rains at least once in two days.

The mean monthly temperature is very high ranging between 25° C and 28° C and in March reaching about 29° C the days are very hot during the dry season from November to January with temperature typically between 33° C TO 34° C while from February to April values are frequently between 34.6° C and 37° C.

Under the latter condition, air is generated by mechanical devices like fans, cannot have cooling effect on human body which maintained at a constant temperature of 367° C. the diurnal range of temperature of characteristically high for the city, the most suitable period is from June to October. Daytimes are very sunny with bright sunshine of about 6.5 to 7.7 hours daily from November to May while from June, August and September, the heavy cloud cover of the period reduces the time to between 3.3 to 4.4 hours

1.4 Objective of the Study

The study is to evaluate the level of development of infrastructural facilities in Ado Ekiti.

1.5 Literature Review

Development economists have considered physical infrastructure to be a precondition for industrialization and economic development, where physical infrastructure, in general, consists of two parts: economic infrastructure such as telecommunications, roads, irrigation, and electricity; and social infrastructure such as water supply, sewage systems, hospitals, and school facilities (Servén 2014). Moreover, a number of micro studies have shown that development of infrastructure is one of the indispensable components of poverty reduction (Lokshin and Yemtsov 2005). Macroeconomic theories and empirical studies clearly characterize the aggregate impacts of infrastructure in an economy. But such studies fail to address heterogeneous access to and the impact of infrastructure in individual economies. This is a serious limitation because recent studies show, for example, that access to intra-regional infrastructure is highly skewed toward the richest, due to differences in physical access and affordability (Estache and Fay 2007).

On the other hand, existing micro-econometric studies provide insights into the role of infrastructure in improving productivity and reducing poverty. However, two issues remain to be addressed. The first important issue is the proper identification of the causal effectiveness of infrastructure in reducing poverty. Experimental evaluation, such as randomized control trials (RCT)-based evaluation, which has been developing rapidly, especially in the education and health sectors (Duflo, Glennerster, and Kremer 2008), is difficult to carry out in the context of large-scale infrastructure. A notable exception is a study by Gonzalez-Navarro and Quintana-Domeque (2012), who conduct a randomized street asphalting experiment to quantify the impact of infrastructure development on poverty reduction. Hence, those engaging in rigorous evaluation of infrastructure started employing quasi-experimental methods such as natural experimental approaches (Donaldson 2013).

The second issue is to adopt the broader framework to evaluate the role of infrastructure in reducing poverty because, obviously, infrastructure cannot exist in isolation. All the micro studies conducted so far have focused on the nexus between infrastructure and certain types of poverty outcomes such as income, poverty, health, education, and other individual socioeconomic outcomes. While such micro-econometric studies have provided insights into the role of infrastructure in reducing poverty, the adopted frameworks are rather limited. For example, most of the earlier micro studies on the nexus between infrastructure and poverty reduction employ a static concept of poverty, even though most recent poverty studies have focused on its dynamic and stochastic nature (Dercon, 2005). It has been established that policy analyses based on static poverty can result in inefficient policy interventions (Jalan and Ravallion 1998). Moreover, there is no consensus on the "channels" through which infrastructure development reduces poverty. Access to infrastructure not only increases household income directly by improving production; it also has indirect effects, such as changing consumption, saving, and investment.

1.6 Sampling Techniques and Procedures

The study employed the use of purposive sampling method to select five areas in the study area, these include: five selected areas in Ado Ekiti, and the selected areas include: Odo-Ado Area; Ajilosun Area; Adebayo Area; Housing Area and Olorunda Area. Simple random sampling technique was use to administered a total of One hundred and twenty five (125) copies of questionnaire in which each area got 25 copies of questionnaire.

1.7 Data Analysis

The research employed both descriptive analysis techniques in order to proof the researcher's validity and reliability. The techniques employed include Simple percentage table.

1.8 Results and Discussion

The research findings are discussed below with the tables containing information from the survey carried out by the author in 2019.

TABLE 4.3.1:	Empirical Ana	lysis of Infrastruct	tural Development

ITEMS	RESPONSES	FREQ	%
HOW LONG HAVE YOU LIVED	1-5 YEARS	49	39.2
IN THIS AREA?	6-10 YEARS	18	14.4
	11-15 YEARS	22	17.6
	16-20 YEARS	20	16
	21 YEARS & ABOVE	16	12.8
	TOTAL	125	100%
IF PIPE BORNE WATER IS	EVERYDAY	45	36

AVAILABLE, HOW OFTEN DO	ONCE A WEEK	25	20
YOU GET THE SUPPLY?	TWICE A WEEK	32	25.6
	ANYTIME	23	18.4
	TOTAL	125	100%
WHAT IS THE DISTANCE	LESS THAN 50M	33	26.4
BETWEEN YOUR HOUSE AND THE NEAREST SOURCE OF	50M-100M	53	44
WATER?	101M-200M	23	18.4
	201M-300M	7	5.6
	ABOVE 300M	7	5.6
	TOTAL	125	100%
WHAT IS THE CONDITION OF	VERY BAD	21	16.8
	BAD	15	12
	FAIR	22	17.6
	GOOD	55	44
	VERY GOOD	12	9.6
\mathbb{C}	VERY GOOD TOTAL	12 125	9.6 100%
IS THE ROAD IN YOUR AREA	VERY GOOD TOTAL YES	12 125 84	9.6 100% 67.2
IS THE ROAD IN YOUR AREA TARRED?	VERY GOOD TOTAL YES NO	12 125 84 41	9.6 100% 67.2 32.8
IS THE ROAD IN YOUR AREA TARRED?	VERY GOOD TOTAL YES NO TOTAL	12 125 84 41 125	9.6 100% 67.2 32.8 100%
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL 2	VERY GOOD TOTAL YES NO TOTAL OPEN	12 125 84 41 125 48	9.6 100% 67.2 32.8 100% 38.4
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED	12 125 84 41 125 48 47	9.6 100% 67.2 32.8 100% 38.4 37.6
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED SURFACE	12 125 84 41 125 48 47 10	9.6 100% 67.2 32.8 100% 38.4 37.6 8
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED SURFACE NONE	12 125 84 41 125 48 47 10 20	9.6 100% 67.2 32.8 100% 38.4 37.6 8 16
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED SURFACE NONE TOTAL	12 125 84 41 125 48 47 10 20 125	9.6 100% 67.2 32.8 100% 38.4 37.6 8 16 100%
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL? WHAT IS YOUR PREFERED MODE OF TRANSPORTATION?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED SURFACE NONE TOTAL COMMUTER BUSES	12 125 84 41 125 48 47 10 20 125 18	9.6 100% 67.2 32.8 100% 38.4 37.6 8 16 100% 14.4
IS THE ROAD IN YOUR AREA TARRED? WHAT IS THE TYPE OF DRAINAGE CHANNEL? WHAT IS YOUR PREFERED MODE OF TRANSPORTATION?	VERY GOOD TOTAL YES NO TOTAL OPEN COVERED SURFACE NONE TOTAL COMMUTER BUSES TAXI/CAB	12 125 84 41 125 48 47 10 20 125 18 49	9.6 100% 67.2 32.8 100% 38.4 37.6 8 16 100% 14.4 39.2

	TREKKING	14	11.2
	TOTAL	125	100%
WHAT ARE THE	ELECTRICITY	60	48
MAJOR SOURCES OF	GENERATOR	48	38.4
QUARTER?	LAMP	16	12.8
	NONE	1	0.8
	TOTAL	125	100%
HOW OFTEN DO YOU	1-6 HOURS PER DAY	92	73.6
GET ELECTRICITY IN YOUR AREA	12 HOURS PER DAY	11	8.8
	24 HOURS PER DAY	2	1.6
	TWICE A WEEK	17	13.6
	NONE	3	2.4
	TOTAL	125	100%
DOES THE ABSENCE OF	YES	78	62.4
INFRASTRUCTURES IN ANYW	NO	47	37.6
POSE ANY PROBLEM TO		\mathbf{U}	
YOUR QUARTER?			
	TOTAL	125	
			100%

Source: Author's Field Survey, 2016

Table 4.3.1 above shows particularly the development of infrastructural facilities in the study area. The result showed that 12.8% of the respondents have long lived in the area under study for about 21 years and above. The result further revealed that 16% of the respondents have lived in the area for about 16-20 years, while other categories of the respondents have spent between 1-10 years in this area. The result further revealed that 45% of the respondents have access to pipe borne water supply daily while 20% agreed that they have access to it once in a week and other respondents of about 23% agreed that they have access to it anytime. Moreover, the distance between household's settlement and the source of water is represented in the next segment. The result however showed that the larger percentage of the respondents in the population 55% agreed to the act that the distance is about 50-100meters. This implies that sources of water is not too far from household's residential areas.

Moreover, the road infrastructural development is represented in the next segment of the above result. The result showed that, 67.2% of the respondents agreed to the fact that the roads in their areas are tarred while 41% says that the road in their area is not tarred.

Consequently, it can be concluded that the road network is not so much is in average condition in which 44% of the respondents agreed that the road network is good while 16.8% of the respondents agreed that the road condition is very bad, also about 17.6% and 12% agreed that the road condition is fair and bad respectively. As a result of the above development, it's evident that the type of drainage in the area is good to a considerable extent, where 38.4% agreed that the drainage system in their area is open, while 37.8 believed that the drainage system in their area is covered while 8% said that the drainage is surfaced and 16% agreed that they have o drainage system.

Moreover, the preferred mode of transportation in the study area is mostly by commuter buses as the highest percentage the respondents agreed on. However, 48% of the respondents agreed that the source of light in the area is via electricity while 38.4% agreed that their source of lightening is generator. However, about 0.8% of the respondents agreed that they have no source of light while 12.8% agreed that lamp is their source of light. However, 73.6% of the respondents agreed that they only enjoy electricity 1-6 hours per day while 8.8% agreed that they enjoy light in just about 12 hours per day, while just 3% agreed that they have no enjoyment of light at all. This implies that electricity supply in these areas is stable to some extent.



However, the majority of the respondents in the population 62.4% agreed to the fact that absence of these basic infrastructures pose problem in their quarter.

1.9 Summary of Findings

The study revealed that some of the infrastructural facilities in the study area were in average condition and many were located far from the reach of the people. Some places are still also experiencing inadequate infrastructures; it could be seen in the way some of the respondents revealed that inadequate infrastructural facilities pose serious problems on them.

1.10 Conclusion

It can be concluded that in the study are, there is still need to develop the available infrastructural facilities as well creating new ones in strategic places in order to make it accessible to the people in need of them within the study area.

1.11 Recommendations

There is dire need to ensure the proper distribution of infrastructural facilities in the study area in order to boost the livelihood of the people residing in this area, hence it is recommended that government at all levels must make it a priority to invest in the development of infrastructures in their jurisdiction. It is also important to note that, the concept of proper location and distribution of infrastructural facilities should be employed in any developmental activities within a place, there is also need to award infrastructural developmental projects to competent hands rather than quack.

Finally there should adequate public sensitization on various ways of using infrastructural facilities to avoid incessant damages.

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