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# Residents' Satisfaction with Infrastructural Facilities Provision in Housing Estate Lafia, Nasarawa State, Nigeria

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**Abstract:** The emphasis of this paper is to assess residents' satisfaction with infrastructural facilities provision in housing estate Lafia, Nasarawa State, Nigeria, with a view to improve a level of satisfaction with infrastructures provided. The study adopts survey design using quantitative approach and data were collected through questionnaire survey from 500 housing unit, data were systematically selected from target population in housing estate Lafia. The data collected was subjected to descriptive with mean ranking. The study observed that the residents' satisfaction with provision of drainages facilities, provision of electricity facilities, and provision of portable water supply facilities provision of road networks and Sewage and solid waste management facilities ranked first fifth respectively and they were found to be moderately satisfied in there provision. While provision of health facilities and provision of market facilities were provided in low level in the study area with low mean scores ranked at nine to ten respectively. The study recommended that the government should upgrade existing market or improve infrastructure in existing market, including proper sanitation, waste management to ease the situation of market facilities in the study area. The study recommended that the Government should engage local communities in the planning and development of these facilities to ensure they meet their specific needs.

**Key words:** Infrastructure, Provision, Satisfaction, Residents, Housing, Estate

### INTRODUCTION

A house is a basic human necessity that offers warmth, security, and a place to live. It expresses a person's identity, cultural values, goals, and expectations for the future. Nevertheless, millions of individuals either lack access to housing altogether or live in impoverished

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residential neighborhoods despite the fact that housing is widely acknowledged as being important (Birdwell-Pheasant & Lawrence-Zuniga, 2020). Basic social goals such as shelter and fair access to housing are strongly impacted by public housing policy and the unique requirements of marginalized socioeconomic groups (Mulliner, Riley & Maliene, 2020). Nonetheless, the ongoing urban population growth has created a situation in which affordable housing is still a pipe dream for all income levels.

Even in wealthy nations, there are differences in living standards and poor living circumstances in metropolitan regions. Saidu and Yeom (2020) note, for instance, that the proportion of European urban dwellers that are unable to pay their rent is rising. More than 6% of urban residents in the wealthier, larger cities of Western Europe live in severely unstable housing due to the rising cost of housing in these areas. Trends in other developed countries including North America, Australia and New Zealand, also point to significant proportions of the population that could be classified as residing in poor neighbourhoods (Mouratidis, 2020). Academics and researchers in the domains of providing infrastructure amenities have looked at the topic of residential satisfaction. It has been defined as a gauge of the degree to which locals are content with the neighborhood's surroundings and the availability of infrastructure. It has also been seen as an assessment of how well individuals' needs, expectations, preferences, and goals are being met by their current neighborhood environment (Mouratidis, 2020).

Residents are highly satisfied when their daily needs are met in a residential neighborhood. When residents are happy with their living circumstances, they are less likely to file complaints since the infrastructure they depend on is sufficient to meet their needs, desires, and goals. Residents' attitudes toward their willing living environment are reflected in their satisfaction with the infrastructure provided. The term "environment" in this sense encompasses social and economic aspects in addition to the physical and environmental aspects of infrastructural provision (Mouratidis, 2020). The high dissatisfaction rate towards infrastructural provision will pose a negative impact on the well-being of a family. Some of the negative impacts are the residents moving away, poor neighbourhood, unemployment, insecurity and poor quality of children's education.

#### LITERATURE REVIEW

In terms of whether the service has satisfied the resident's wants, preferences, and expectations, the resident's judgment of the service is called satisfaction. The resident experiences dissatisfaction if performance falls short of expectations, satisfaction if performance meets expectations and ecstasy if performance surpasses expectations. Perceived service quality is a component of resident satisfaction, which happens when a person feels well-taken care of and is not only happy but delighted by the organization's level of service. Services are the acts, procedures, and performances provided by an organization (Ji Chen, Wei & Su, 2021). Bass, Baum and Christiansen (2024) defined residential satisfaction with infrastructural provision as the feeling of contentment that one achieves when one's needs or desires in public infrastructure provision are met. It has been studied by various researchers and the result are viewed as a key predictor of an individual's perception of the quality of a infrastructural provision, and an evaluative measure for judging the success of constructions by public and

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private sectors (Bass *et al.*, 2024). Satisfaction with infrastructural provision conditions signifies the absence of any complaint about one's house, and an indication of congruence between the desired and actual infrastructural provision qualities which implies that satisfaction of a household with her infrastructural provision occurs when the family housing meet the normatively derived needs ((Bass *et al.*, 2024).

A person's attitude toward a residential satisfaction, which consists of behavioral, emotive, and cognitive components, is characterized by resident satisfaction. Residential satisfaction has been defined multiple times in various studies due to the fact that it is a complex and cognitive construct. Some have defined the idea using the entire set of components that make up attitude, while others have only included the cognitive components. The idea of residential infrastructural provision satisfaction has been developed to represent the discrepancy between people's desired and actual housing arrangements (Archambault, Leary & Rice, 2022).

Such a definition recognises resident's infrastructural satisfaction to be a function of how closely an individual's current housing corresponds to housing expectations and preference. In this case, the evaluation of satisfaction is considered relative to a set of felt needs, aspirations and preference. Studies on residential infrastructural satisfaction serve various purposes, including the assessment of residents' present housing conditions, needs and preferences and their quality of life. They also help in improving our understanding of housing adjustment and mobility behaviours of residents. Thus, it can be inferred that even though those who conduct research on residential satisfaction have different rationales and objectives, studies on resident's satisfaction promote better understanding of the key sources of satisfaction or dissatisfaction. Besides these studies, others have investigated the factors which impudence infrastructure provision satisfaction, for instance, Tariq, Pathirage & Fernando (2021) identify age as one of the most significant predictors of infrastructure satisfaction. In fact, Ferreira, M., Martinsone and Talic (2020) pointed out that the younger people are likely to be less satisfied with their infrastructural facilities provision conditions than the older people. Ferreira et al. (2020) opined that this is probably due to the fact the younger people have higher expectations, aspirations and preference than the older people. Income status has also been identified as having positive effect on residential satisfaction.

In Nigeria, Sule, Esidene and Adadu (2024) investigated housing infrastructural satisfaction amongst the residents of public housing in the Federal Capital Territory-Abuja, and found out that they were satisfied with the neighbourhood facilities but dissatisfied with the physical and spatial characteristics of buildings and the general management of the housing estates. Other study Jambol (2016) however found that the residents in public housing in Lagos were most satisfied with housing unit characteristics and least satisfied with the layout of the Estate, access to public infrastructural facilities and services. Jambol (2016) also corroborated the ending. Generally, an owner is said to have a high satisfaction level towards infrastructures as compared with a tenant. This has been proven through a study carried out on European countries by (Waziri, Yusof & Salleh, 2013). This empirical study was divided into 3 groups of countries; firstly countries whose lingua franca was English – Ireland and England; secondly countries with an established tenanted housing sector namely Austria, the Netherlands and Denmark; and finally; Southern European countries namely Spain, Italy and Greece. The study was done to prove whether housing ownership will give more satisfaction to owners or tenants

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with regard to infrastructural provision. Findings of the study indicated that house ownership gives more satisfaction to the owners in terms of safety, power or freedom to make decisions and also a symbol of prestige and personality. This study was compatible with the findings of Maina (2021) study which also indicated that owners have a higher housing satisfaction as compared to tenants.

Although housing ownership gives a higher satisfaction to owners, not everybody can enjoy comfortable housing. It is only within the reach of those who can afford it, the rest are relegated to renting in more affordable housing areas. Findings of a study done in the past has led to the formulation of a study structure to measure housing satisfaction which is divided into four main categories amongst which are satisfaction towards the dwelling unit, satisfaction towards neighbourhood qualities, satisfaction towards the management and satisfaction towards the infrastructural services and facilities provided by the housing management whether by the developer or by the land owner; and satisfaction towards the facilities and amenities provided in the dwelling unit and its surrounding area (Agbola & Adegoke, 2017).

The differing socio-economic backgrounds of residents also contribute to different levels of satisfaction towards infrastructure, owners, not everybody can enjoy comfortable housing. It is only within the reach of those who can afford it, the rest are relegated to renting in more affordable housing areas. The differing socio-economic backgrounds of residents also contribute to different levels of satisfaction towards infrastructure (Hussaini, Abubakar, Danmaraya, Sumaila & Ibrahim, 2019). Infrastructural facilities provided that fulfils one's daily needs provide a high satisfaction rate to residents. Satisfaction towards the living conditions means no complaints are made since the housing units fulfil the needs and aspirations of the residents (Ahmed, 2020).

#### **Determiners of Residents' Satisfaction**

A few elements that have been found in the literature have been linked to household satisfaction with the availability of infrastructure facilities. These include social variables, those pertaining to residents' attitudes, physical aspects pertaining to the features of the neighbourhood and the housing units, and personal factors relating to the particular characteristics of the occupants. Socio demographic characteristics like age, income, education, gender, household size, and family life cycle stage are examples of personal factors. This category also includes lifestyle considerations, resident tenure status, and residential tie to the location. "Residential attachment" refers to the positive, sentimental connection that people have with a place because of how they see and feel like they belong there (Okopi, 2022). Home happiness was also found to be influenced by contentment with the quality of homes and the physical attributes of neighborhoods.

Neighbourhood factors considered include physical features of the setting (general appearance, infrastructure, and locational characteristics), nearness to needed facilities and the presence of other services. Social factors have also been found to affect satisfaction among housing residents. Individuals filter environments through cognitive and evaluative perceptions and because of this, factors related to the residents" perceptions have featured in recent studies as being determinants of residential satisfaction with infrastructural provision (Akinola *et al.*, 2024). According to Unah (2021) a number of factors representing housing and neighbourhood

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characteristics, personal characteristics, neighbourhood characteristics and their effect on neighbourhood satisfaction have been examined by different studies. Unah (2021) conducted a path analysis in Cork, Ireland on the determinants of neighbourhood satisfaction. The result establish neighbourhood satisfaction to be a direct result of four neighbourhood attributes including appearance, life style, quality of life, and stability of the community; and two personal characteristics (number of children in each household and residence in public housing apartment), which together explain 38 percent of variation in satisfaction. It clarified the influence of personal characteristics on residential satisfaction.

Unah (2021) revealed that satisfaction is determined by the characteristics of the individual and household, the characteristics of the residential location, and attachment to the home and community. In contrast, Mao and Chen's (2021) survey of Shanghai residents, which included both displaced and non-displaced inhabitants, found no significant relationship between home satisfaction and demographic or socioeconomic characteristics. It proposed that improved housing conditions were the cause of the disparity in satisfaction levels. While agreeing, Wu and Song (2021) discovered that wealthier neighborhoods had a larger difference in neighborhood satisfaction ratings between homeowners and Tenants than did impoverished ones. Wu et al. (2021), on the other hand, claimed that there is no difference in the aspirations of Tenants and owners and that homeownership has no effect on neighborhood satisfaction.

Wang (2015) asserted that tenure has no bearing on neighborhood contentment, despite contesting the significance of homeownership in terms of satisfaction. While the existence of public infrastructures, such as a water supply, energy supply, educational facility, etc., influences resident satisfaction, the physical state of the home is not the primary factor determining resident contentment. Furthermore, a few research found that the contentment with residential dwelling is not significantly influenced by ownership, gender, or wealth.

#### **METHODOLOGY**

The exploratory and descriptive designs were chosen for the study because it will employ unbiased techniques to gather information about its history and issues. Since this study collected and analyzed numerical data, the quantitative study design was thought to be the most appropriate. In this study, a survey research approach was used, which collects data through the use of questionnaires. For the purpose of this paper, the targeted population consists of house hold heads living in 500 housing units in Lafia, Nasarawa State. The sample frame of this paper is 500 housing units. The total sample frame is 500 housing units in Lafia. The sample size for this study will determine by using Krejcie and Morgan table (1970). The sample size is (217) based on the sample frame of (500). The study was adopt 350 questionnaire to be administered. The data obtained from the questionnaire survey were statistically analyzed using the Statistical Package for Social Science (SPSS, version 22). Since the study included descriptive research questions and mean ranking, the data collected via questionnaire survey was carefully filtered, analyzed, and sorted out for analysis displaying the information responses from the respondent.

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## **FINDING**

Descriptive statistics based on mean ranking was carried out to explore the level of residents' satisfaction with Infrastructural facilities provision in public housing estate Lafia, Nasarawa state, Nigerian. The results showed the ranking, mean standard deviation and remark for each Item. This study adapted the mean score decision interval based on the works Very low (1.00 - 1.5); Low (1.51 - 2.49); Moderate (2.50 - 3.49); High (3.50 - 4.49) and Very High (4.50 - 5.00) (Rakhshani & Rahati, 2017).

Table 1: Level of residents' satisfaction with Infrastructural facilities provision in public housing estate

Residents' satisfaction with public	Mean	Std.	Ranking	Remark
infrastructural provision		Deviation		
Electricity infrastructure	3.44	.938	1	Moderate satisfied
Drainages infrastructure	3.41	1.044	2	Moderate satisfied
Water supply infrastructure	3.33	.865	3	Moderate satisfied
Road networks infrastructure	3.24	1.000	4	Moderate satisfied
Solid waste management	2.99	1.954	5	Moderate satisfied
infrastructure				
School facilities infrastructure	2.73	.948	6	Moderate satisfied
Communication infrastructure	2.66	1.369	7	Moderate satisfied
Security infrastructure	2.63	1.225	8	Moderate satisfied
Health infrastructure	2.27	1.239	9	Low satisfied
Market infrastructure	1.97	1.212	10	Low satisfied

Table 1 shows the results of the level of residents' satisfaction with infrastructural provision in public housing estate Lafia, Nasarawa state, Nigerian. The results observed that the residents satisfied with provision of provision of drainages infrastructure, provision of electricity infrastructure, and provision of Water supply infrastructure provision of road networks and Sewage and solid waste management infrastructure with mean scores of M = 3.44, STD =.938, M = 41, STD = 1.044, M = 3.33, STD = .865, M = 3.24, STD = 1.000 and M = 2.99, STD = 1.954 ranked first fifth respectively. While provision of health infrastructure and provision of market infrastructure were provided in low level in the study area with low mean scores of M = 2.27, STD = 1.239 and M = 1.97, STD = 1.212 ranked at nine to ten respectively. Residents' satisfaction isn't solely based on objective infrastructure existence (moderate provision). Reliability, efficiency and maintenance also play a big role. For instance, a study by Ascelibrary (2018) found that residents' satisfaction with water infrastructure is more highly correlated with efficient service delivery than simply having access to piped water. Perhaps the provided water, electricity, or drainage systems are unreliable or poorly maintained, leading to resident dissatisfaction despite their presence. The quality of infrastructure also matters. A moderate road network might be a series of narrow, poorly maintained roads, leading to frustration and safety concerns for residents. Similarly, moderate access to healthcare facilities might not translate to adequate staffing, equipment, or service quality Research by Wang (2015) highlights how limited access to quality healthcare

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disproportionately impacts lower-income residents. However, the low satisfaction with health facilities and market facilities is particularly concerning. As mentioned previously, access to quality healthcare is essential for a healthy population (Akinola *et al.*, 2024).). Well-functioning markets provide essential goods and services, contributing to economic development and food security (World Bank, 2020). These areas should be prioritized for improvement to address resident needs and improve overall well-being.

## **CONCLUSION**

The study observed that the residents satisfied with public infrastructural provision of drainages facilities, provision of electricity facilities, and provision of portable water supply facilities provision of road networks and Sewage and solid waste management facilities ranked first fifth respectively and they were found to be moderate satisfaction in there provision. The study also concludes moderate satisfaction level in the provision of drainages facilities, provision of electricity facilities, and provision of portable water supply facilities provision of road networks and Sewage and solid waste management facilities and ranked first fifth respectively. While the study concludes low satisfaction in the provision of health facilities and provision of market facilities in the study area. The study recommended that the government should upgrade existing market or improve infrastructure in existing market, including proper sanitation, waste management to ease the situation of market facilities in the study area. The study recommended that the Government should engage local communities in the planning and development of these facilities to ensure they meet their specific needs.

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