

**PUBLIC PERCEPTION AND ATTITUDE TOWARDS MONTHLY ENVIRONMENTAL
SANITATION EXERCISE IN ONITSHA: A STUDY OF FEGGE, ONITSHA SOUTH LOCAL
GOVERNMENT AREA, ANAMBRA STATE**

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ABSTRACT

This study explored public perception and attitudes towards the monthly environmental sanitation exercise in Onitsha, with a focus on Fegge in Onitsha South Local Government Area, Anambra State. The objectives of the study were to examine the major causes of poor participation in monthly environmental sanitation, assess the impact of such poor participation, and proffer solutions for improving participation in Fegge, Onitsha South Local Government Area, Anambra State. The theories used in the study include Nightingale's Theory, Social Control Theory, and the Health Belief Model (HBM). The study adopted a cross-sectional survey design and was anchored on the Health Belief Model to explain factors influencing public perception and participation in monthly environmental sanitation. The sample size was 200 respondents. A multi-stage sampling technique was used in selecting respondents. The instruments for data collection were a structured questionnaire and an in-depth interview guide. Quantitative data were analyzed using descriptive statistics and presented in frequency tables and simple percentages. The study hypotheses were tested using Chi-square (χ^2) inferential statistics. Data from the in-depth interviews were analyzed thematically. The findings revealed that respondents are highly familiar with the monthly environmental sanitation exercise, but they exhibit a negative attitude toward participation. The study recommends intensified public awareness campaigns on the health risks associated with unclean and unsafe environments. It also calls for the enforcement of strict government policies against violators of monthly sanitation regulations in Anambra State, Nigeria.

Keywords: Environmental degradation, Environmental pollution, Refuse disposal, Sanitation

Introduction:

The environmental sanitation has become a prominent, but complex and multidimensional issue on the public policy agenda of states and international organizations recently. This transformation after a long period of benign neglect began in Rio in 1992. Throughout history, the environment and its natural resources have played a defining role in social, political and economic transformations. They have also being a major contention in characterizing Africa as a continent in crisis (Opara & Gerhard, 2018). The environment has been at the receiving end and is over-burdened with the aftermath of the excesses of humans in their struggle for survival. Environment is a complex weave of physical, chemical and biotic factor that interact with each other and impact upon all living things and their surroundings. It is a life supporting system for human existence and survival as well as provides required for socio-economic progress (UNDP, 2021). Environment is the source of global economy that must be protected and managed sustainably. All efforts directed at managing and administering the environment is to ensure the continued existence of the biological diversity entities on the earth of which humans are the prime species and without it, which humans cannot exist (Aluko, 2021).

The problem of solid, liquid and toxic-waste management in Africa has come with urbanization in the developing world. An important feature of the urbanization of the developing world is the rapid growth of cities and metropolitan areas. The high rate of urbanization in African countries implies a rapid accumulation of refuse. Social and economic changes that most African countries have witnessed since the 1960s have also contributed to an increase in the waste generated per capita. As a result, municipal waste management constitutes one of the most crucial health and environmental issues facing most African cities (Kuffor, 2019).

In Nigeria, environmental issues have characterized public discussion recently. There have been efforts to curb the refuse seen on the environment. Environmental sanitation practices refer to residents' involvement in provision, utilization, and maintenance of environmental sanitation facilities and services and adherence to environmental legislation (Daramola, 2015). Nigeria's adequate environmental sanitation practices have not been ensured. They are characterized by lack of basic amenities and poor sanitation habits (Ademiluyi & Odugbesan

2018; Afon, 2016). General access to environmental sanitation facilities and services by citizens remains very poor (Akpabio, 2022). Nigerian cities are characterized by rapid population growth which is not accompanied by a corresponding increase in the delivery of environmental sanitation facilities and services capable of enhancing environmental sanitation practices. The resultant effects of these are unsanitary and unhealthy environmental conditions that are prevalent in Nigerian urban centres (Daramola, 2015).

In Anambra state, especially Onitsha metropolis population surges has given rise to a heavily built up environment wherein houses are closely built than before, which has then resulted in the dumping of more refuse on the streets (Okoye, 2022). Most inhabitants tend to dump refuse indiscriminately. The inadequate management of wastes poses grave danger to environmental health risk on human populations and is also, capable of inflicting permanent damage on the ecological system. Also, considering the magnitude of waste released daily into the environment and, considering the fact that there appears to be no serious organized programme for the efficient management and disposal of these waste, in spite of their environmental effects on human health, there is need for an understanding of the dynamics that are essential for the explanation of the trends and emerging disease epidemics on the human environment in order to ensure the evolution of effective government and public policies and programmes towards controlling the damaging effects of indiscriminate refuse dumping (Amadi & Effiong, 2024).

Onitsha urban in Onitsha South Local Government Area of Anambra State, South-East Nigeria is occupied mostly by traders, civil and public servants as well as students of tertiary institutions with so much commercial activities. The town encounters environmental pollution which remains an issue of a public concern despite end of the month sanitation exercises that takes place in the entire state. This situation has generated the need for this study on public perception of relevance and participation of people in monthly environmental sanitation programme in Onitsha South LGA of Anambra state.

Statement of the Problem

Many international conferences, workshops and seminars have been held on the impact of degraded environment on human beings and the need to promote environmental qualities. It is a known fact that human health is contingent among other things, on the quality of air he breathes, the food he eats, the water he drinks and the environment in which he lives. Importantly, there is serious health implications involved in indiscriminate dumping of refuse in the environment. The disposal or littering of the environment poses a great health danger to the masses. It is said that health is wealth, but most people do not consider the health implications when they dispose waste unlawfully. For instance, some people still defecate or dump refuse on the road sides, some even dump it on nearby streams, while others park waste in cellophane bags and drop it at the middle of highways. Health implications of improper waste disposal are enormous and cannot be ignored. Reports show that if wastes are not properly disposed, it can cause water pollution, which may breed diseases like cholera, typhoid and so on (Bartone, Buckle & Smith, 2020). In most cities, the methods of decomposing rubbish provide breeding ground for rats, flies, mosquitoes, contributing to the unhealthy living environment. Microorganisms can be spread in the air, water, food and contact with people. It can even be through disease vectors, these organisms cause diseases that may have deadly consequences. Indiscriminate disposal of waste is a threat to human health. Cholera, diarrhoea and typhoid fever are among the major killer diseases due to improper disposal of waste (Adelakun, 2023).

On the other hand, the attitude and behaviours of people contribute immensely to the problem of indiscriminate dumping. Most times, people recklessly drop refuse in places they should not. For instance, there are cases of persons who throw things from their windows, not minding the implications of such acts. It is evident that people's attitude towards the disposal of wastes or refuse have not been favourable. Most people prefer to dump things where they are not supposed to just because it is convenient for them to do so. In this case, the attitude or behaviours of people play a big role as to whether the environment would be clean or dirty. The perception of one's capability is said to set a limit to what to do and ultimately what can be achieved (Holland & Rosenberg, 1996). Perception influences how a person views himself and the world around him and how it tends to govern his behaviour.

Also, there have been issues with the designation of refuse dumps in places where they are not supposed to be. Those in authorities sometimes do not provide adequate facilities that would aid in the proper disposal of refuse and also, when they do provide it, they place them where it would be too far for the masses to access. There is lack of commitment from the government and this fact the whole process. Governments at different levels have not shown the willingness to fight the battle against improper disposal of refuse. In some areas, there are no refuse dumps, and in this case, the people struggle so much to find a way of disposing their wastes. They would have no option than to dispose the dirt in places they can (Onyia, 2019).

The inability of the population to pay some levies in order to help the government manage the sanitation issues is another problem. It is evident that the government only cannot cater for all waste disposals. Individuals who are capable can help the government by donating some waste cans and dumping. The burden of refuse has gone beyond the government. Individuals should learn to properly dispose their refuse, not because, it is not a duty, but because if the refuse is not properly dumped, it will adversely affect them too (Saigo, 1999).

In view of these problems, this study wishes to expound knowledge on public perception of relevance and participation of people in monthly environmental sanitation programme in Onitsha South LGA of Anambra State.

Research Questions

1. What is the nature of public perception of monthly environmental sanitation exercise in Onitsha South Local Government Area?
2. What is the level of public participation in monthly environmental sanitation exercise in Onitsha South Local Government Area?

Review of Relevant Empirical Literature

Nature of Public Perception of Monthly Environmental Sanitation

Petriel (2021) examined people's perception of environmental sanitation. A population of Three hundred and a total of 236 sample size were used in the study. They adopted mean score in analyzing the data collected. Questionnaire was used as instrument of data collection. Their finding showed that most person perceive sanitation as a good practice. They further found significant gender similarity in their view. Their study and the current study are related in method of data analysis and purpose of the study. Both studies differ from each other in that while Petriel's study used a sample size of 236, the current study used 241 as the sample size. Chen and Tsai (2015) investigated the influence of environmental sanitation on resident of Oyo. Survey design was employed in the study with population of 98 and sample size of 50. Data were collected using questionnaire and analyzed with mean score. Their study reported that people perceive poor environmental sanitation to affect the health of the resident in oyo. Their results suggested that effective sanitation practices improve good health. This study and the current study are related in method of survey design but differ in term of population size and sample size.

Level of Participation in Monthly Sanitation in Nigeria

Kirkpatrick and Cuban (2022), investigated the impact environmental sanitation on the resident of Lagos state. The adopted survey design, sample size of 45 and questionnaire for data collection. The data collected were analyzed using t-test. Their findings showed that environmental sanitation prevents the spread of disease and they recommended that adequate attention should be giving to environmental sanitation practices so that the level of participation in monthly sanitation is increase. Their study and the present study are relayed in terms of use environmental sanitation questionnaire as instrument of data collection. On the other hand, both studies differ in sample size use.

Ohakwe, Nnorom and Iwunze (2021) noted that public participation in monthly environmental sanitation programs determine the success of such programs, although studies by Millicent and Ibrahim, (2023) have shown disparity in the level of environmental participation. However, public enlightenment on environmental sanitation improve people's attitude and participation as Afangideh, Joseph and Atu, (2022) noted. According to the study of Achor and Nwafor,(2024), intimidating and confrontational bureaucratic routine of environmental sanitation exercises in Nigeria causes low participation.

Study carried out Mathew, Nweke and Nnanna,(2024) showed that in Nigeria most people tend to excludes themselves from monthly sanitation exercise due to the fact that they feels less concern about making sure that their environment is kept in good and clean hygienic condition.

According to JMP(2023) report the level of participation in sanitation practices in Nigeria was $\frac{3}{4}$ of the total population. The report also indicated show that over a quarter (26%) of the population in Nigeria used improved sanitation facilities; while in 2006 to 2013 almost one third (30%) used improved sanitation facilities in Nigeria to participate in monthly environmental sanitation. This marginal increase on improved sanitation coverage is a clear indication that not much progress has been made in meeting the MDG target.

The proportion of the urban population participating in environmental sanitation in Anambra state was observed to decreased by 7% from the 65% in 2016 and increased to 10% of the total population from 2009-2014. In the rural areas, record shows a decrease in general level of sanitation participation by 4% from the 34% in 1990 to 30% in 2016and increases to 6% in 2015. The low level of participation in environmental sanitation as noted from the data is very significant at a time that the proportion of the population living in urban areas increased from 30% in 1990 to 49% in 2016 and additional increase from 2006 to 2014(W.H.O,2015).

Theoretical Framework

This work study is anchored on Health Belief Model propounded by Irwin & Rosenstock, in 1950's. The theory assumes that those individuals who perceive that they are susceptible to a particular health problem will engage in behaviours to reduce their risk of developing the health problem. Individuals with low perceived susceptibility may deny that they are at risk for contracting a particular illness. Others may acknowledge the possibility that they could develop the illness, but believe it is unlikely. Individuals who believe they are at low risk of developing an illness are more likely to engage in unhealthy, or risky, behaviours. Individuals who perceive a high risk that they will be personally affected by a particular health problem are more likely to engage in behaviours to decrease their risk of developing the condition.

This model explains and predicts health-related behaviours, particularly in regard to the uptake of health services. The health belief model suggests that people's beliefs about health problems perceived benefits of action and barriers to action, and self-efficacy which explain engagement (or lack of engagement) in health-promoting behaviour. It assumes that they should be a stimulus, or cue to action, which must be present in order to trigger the health-promoting behaviour. This model is appropriate in this study in that when people are well informed on the impact of poor sanitation, it will trigger them to take effective action and influence perception for good sanitation practice.

Hypothesis

H1: Residents with high level of incomes have more positive attitudes towards environmental sanitation than their counterparts with low level of incomes in Onitsha South Local Government Area.

Materials and Methods

The study adopted a Mixed Method Research Design. This research design is considered the most appropriate for this study because, it enables the researcher to collect data relevant to the study at a particular point in time. The study location was Fegge in Onitsha South Local Government Area. The sample size for this study was determined using Fisher, Laing, Stockel, and Townsend (1998) formula for generating sample size, when the population under study is unknown at the time of the study. The researcher used the mixed method for data collection in this study, which includes the Questionnaire and In-depth Interview Guide, which are quantitative and qualitative methods of data collections respectively. Structured questionnaire was used to gather information from randomly selected residents in the towns studied. However, In-depth Interview (IDI) Guide was afterwards used to gather more information from some of the residents using purposive sampling method. The collected data was computer-processed and analysed using the statistical package for social sciences (SPSS) software. This involved the use of simple percentage, frequency distribution tables, and graphical illustrations to describe the main characteristics of the study participants. The stated hypotheses were tested using Chi-Square (X^2) statistical tool.

Findings and Results

Table 1: Distribution of Respondents by Socio-Demographic Characteristics (n = 160)

Sex	Frequency	Percentage
Male	78	48.75
Female	82	51.25
Total	160	100.0
Marital Status	Frequency	Percentage
Single	63	39.37
Married	75	46.88
Divorced	11	6.88
Separated	5	3.12
Widowed	6	3.75
Total	160	100.0
Religious Affiliation	Frequency	Percentage
Christianity	105	65.63
Islam	48	30
ATR	7	4.37
None	0	0
Total	160	100.0
Place of Residence	Frequency	Percentage
Urban	86	53.75
Rural	74	46.25

I don't know	0	0
Total	160	100.0
Academic Qualification	Frequency	Percentage
FSLC	26	16.25
SSCE	30	18.75
OND/NCE	78	48.75
HND/BSC	18	11.25
PGD/MSc/PhD	8	5
Total	160	100.0
Occupation of Respondents	Frequency	Percentage
Civil Servant	31	19.37
Artisan	70	43.75
Unemployed	3	1.88
Student	23	14.38
Trader/Farmer	32	20
Total	160	100.0
Monthly income range of respondents	Frequency	Percentage
Below N30,000	55	34.37
N31,000 – N60,000	76	47.5
N61,000 – N90,000	4	2.5
N91,000 – 120,000	11	6.88
N121,000 and above	14	8.75
Total	160	100.0

Field Survey, 2025

Table 1 shows that out of the returned questionnaires, 78 were males and 82 were females. Majority (51.25%) of the respondents fall within the age bracket of 28-32 years, while the minority (48.75%) of the respondents was within the age bracket of 53-57 years. The mean age of respondents was 39.7 years old. Most of the respondents of about (46.88%) were married, while the minority (5%) of the respondents is separated. Majority of the respondents which represent (65.63%) of the sample were Christians, while (4.37%) minority of the respondents responded to belong to African Traditional Religion (ATR). Majority of the respondents which represent (53.75%) live in urban areas, while (46.25%) minority of the respondents live in rural areas. Most of the respondents (51.96%) have low level formal education, while the minority (11.73%) of the respondents possesses high level formal education. Most of them (43.75%) were artisans, while the minority (1.88%) of them were unemployed. Majority of the respondents (47.50%) said their monthly income is between N31, 000 - N60, 000; while (2.5%) of the respondents said that theirs is within N61, 000-N99, 000.

Table 2: Frequency Distribution of Respondents awareness of monthly sanitation (N = 160)

S/N	Options	Frequency	Percentage
1	Yes	87	54.38
2	No	73	45.62
	Total	160	100

Source: Field survey 2025

Table 2 shows that 87 (54.38%) of the respondent are aware of monthly environmental sanitation programme while 73 (45.62%) said they are not aware. This implies that good number of the respondent are fully aware of environmental sanitation programme in Onitsha South LGA as indicated by the high respondent value of those that agreed.

Table 3: Distribution of Respondents according to the extent they participate in environmental sanitation

Living condition	Frequency	Percentage
Very high	10	3.63
High	12	6.98
Low	100	67.93
Very low	17	12.88
I don't know	21	22.58
Total	160	100

Field Survey 2025

Table 3 shows the frequency distribution of respondents on the way they participate in the monthly environmental sanitation. Majority (67.93%) of the respondents rated it as low; while minority (3.63%) of the respondents saw it as very high. It is therefore, observed that there is a low level of participation in the monthly environmental sanitation among residents in Onitsha South LGA.

One of the IDI respondents in Fegge agued thus:

As far as they are concerned, do not engage in the monthly environmental sanitation. But the issue is not just the fact that, but the fact that our community leaders do not monitor or enforce the process on those days designed by the government for the environmental sanitation, thus people don't take the programme serious (Male, 36 years old, Bricklayer, Fegge).

Another member of IDI respondents in Fegge admitted to poor absence of environmental sanitation in Fegge, she maintained thus:

There are gross abuses of the environmental sanitation programme in this town. We are most times chosen to clean up our immediate environment, but as for complying with the month end sanitation, nobody does that here. The only thing we do is just sweep our compound at our convenient and nobody make town for cleaning of markets and street in this community (Female, 44 years old, Haberdasher, Woriwo).

Table 4: Frequency Distribution of Respondents participation in monthly sanitation (N = 160)

Options	Frequency	Percentage (%)
Yes	93	58
No	66	42
Total	160	100

Table 4 shows that 93(58%) of the respondents do participate in monthly environmental sanitation while 66(42%) do not. This indicated that good number of the respondent devoted time to environmental sanitation monthly, due to the fact that they are aware of the positive effect of it.

Table 7: Frequency Distribution of Respondents extent of participation on monthly Sanitation (N = 160)

Option	Frequency	Percentage (%)
Very High	53	33
High	41	26
Low	21	13
Very low	44	28
Total	160	100

Table 7 shows that 53(33%) of the respondents agree that to very high level they participate in environmental monthly sanitation, 41(26%) agree that they participate on it on high level, 21(13%) to low level while 44(28%) said it's to a very low extent. The high responses of the respondent that agree to very high is an indication that most of the respondents participate in environmental sanitation.

3 Test of Hypotheses

In this section, the researchers tested two hypotheses formulated for this study using Chi-square (X^2). The Hypotheses were stated as follows:

H₁: Residents with high level of incomes have more positive attitudes towards environmental sanitation than their counterparts with low level of incomes in Onitsha South L.G. A.

Data in H₀ table 1 and 2 forms the basis for hypothesis 1.

Table 12: Cross Tabulation on whether Residents with high level of incomes have more positive attitudes towards environmental sanitation than their counterparts with low level of incomes in Onitsha South L.G. A.

	Level of Income						Total	χ^2
	Very rich	Rich	Poor	Very poor	I don't know	No response		
Positive	4	24	92	91	8	0	97	Df = 5 P =0.00 N=160 113.861
Negative	9	1	8	84	37	0	63	
Total	13	25	100	175	45	0	160	

(Field Survey, 2025).

$$X^2 = 113.861, df = 5, N = 160, P < 0.000$$

The computed value of chi-square is 113.861 while the value of chi-square at 0.05 level of significance with a degree of freedom (df) of 5 is 11.07. Since the computed value of chi-square is greater than the table value, the researcher accepted the alternative hypothesis. It follows therefore that respondents with high level of income significantly differ in their opinions on their attitude towards environmental sanitation than their low income counterparts. Thus there is no significant relationship between residents with high income from their low income counterparts in Onitsha South LGA. Hence, the low income residents have more positive attitudes towards environmental sanitation than those with low income.

Discussion of Findings

The study found that residents of selected towns in Onitsha South Local Government Area exhibit negative attitudes towards environmental sanitation. This is reflected in respondents' views, where many indicated poor attitudes toward environmental sanitation practices. This finding aligns with Muoneke (2008), who observed that residents' attitudes toward environmental sanitation are poor and largely unsatisfactory. Consequently, it was found that poor sanitation practices significantly undermine the standard of living of residents in Onitsha South Local Government Area.

The study also identified inadequate waste management facilities in Onitsha South. For instance, liquid waste and urine are discharged through drainage channels constructed along expressways, thereby contributing to environmental pollution. In addition, solid waste is not effectively collected and disposed of by the relevant waste management authorities, resulting in environmental degradation and making parts of the area unhealthy and difficult to inhabit. Residents expressed dissatisfaction with the poor management of waste and its adverse effects on their health. Furthermore, the study revealed that environmental sanitation positively contributes to socio-economic activities. This finding agrees with Chaile and Peterson (2023), who reported that poor environmental sanitation accounts for nearly 50% of underweight cases in children due to its direct link with diarrhoea, and that poor sanitation negatively affects socio-economic development.

The findings also show a strong link between sanitation and good health, as proper sanitation helps prevent water-borne diseases and reduces medical expenses. This is consistent with Afangideh, Joseph, and Atu (2022), who found that public enlightenment on environmental sanitation improves attitudes and participation, while also promoting better health outcomes. In addition, the study revealed that the public holds a positive perception of environmental sanitation practices and demonstrates favourable views toward participation in monthly sanitation exercises. This aligns with Petriel (2021), whose study on public perception of environmental sanitation found that most people view sanitation as a beneficial practice, with no significant gender differences in perception.

Policy Options:

1. The urgent need for the government to create more jingles on various media outlets encouraging the proper waste management ideology.
2. The need for the various communities and stakeholders to rise up to the challenge of making and implementing laws that would guard against indiscriminate dumping of refuse.
3. The need for environmental sanitation practice in primary and secondary schools in Nigeria to be encouraged.
4. The need for the government to make and enforce environmental laws on environmental sanitation.

5. Provision of facilities for environmental sanitation practices should be made available by government and individual in order to enable adequate participation of the public in environmental sanitation.
6. Government should make provision to monitor the level of environmental sanitation practices and make policies that will ensure that all persons irrespective of social status of the person to engage in environmental sanitation. This will ensure that environmental sanitation participation of the public is enhanced.

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