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NEGLECTED URBAN GREEN SPACES: A TOOL TO FOSTER COMMUNITY INTERACTIONS AND INTEGRATION IN OWERRI URBAN

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Abstract

The need for community interaction and integration among urban residents is still an important factor in the environmental sustainability of urban life in Owerri. Issues of social dynamics make it imperative that any enduring development should be done through an inclusive and participatory process. A well-balanced urban environment can enhance living conditions and the quality of life of urban residents. The pressures of urban life often make it difficult for the residents to find the time for community interactions. Urban schemes and developments in the urban area have pressured out places that could be developed into places for community interactions and have grossly reduced opportunities for interactions among urban residents. Planning authorities have created green spaces within neighbourhoods and layouts in order to enhance the urban environment. However, these spaces have become neglected, misused and negate the urban environment. The study was to find out how the neglected green spaces could be used to ameliorate fractured community interactions in Owerri Urban. The study of these spaces reveals that they could also be integrated into the urban environment as places for community interaction and integration. The study was a survey research using questionnaires administered on residents of some selected layouts in Owerri. Obtained data was analysed using the frequency distribution and the Spearman Rho correlation statistical tools. Findings reveal that if these spaces are integrated into the neighbourhoods, they would serve as community spaces that could enhance community interactions and integrations, hence would improve quality of life of the urban residents. This paper makes a case for more efforts to be made in enhancing community interaction and integration in the layouts in Owerri urban.

Keywords: *Community, green, neglected, interaction, place, rediscover.*

INTRODUCTION

The realization of the ties between man and the resources of the natural environment demands that these resources should be used in a way to also preserve them for the future generations. Consequently, the issues affecting the lives of the urban residents are better handled and resolved by them through interactive processes that will ensure optimum benefits. Resolutions of issues are more likely to succeed when handled and addressed by

people affected by them. A community that improves the quality of life of the residents could be referred to as a healthy community (Work Group for Health and Development, 2016).

The concerns of environment have been found to be intertwined with the dynamics of human relationships. The urban environment has been seen to explore issues among people with competing and complex values as regards economic development, environmental quality and social equity (Schmitz, Stinson, & James, 2010). Research advocates alternative ways to tackle the issues of the urban environment and involve the potential users as instruments of social innovations as a way to transform communities. The concept of community psychology underscores this by advocating the participation of individuals to achieve social change (Leonard A. Jason, 2016). Places that are attractive for community interactions and integration have become essential in our neighbourhoods in order to drive development.

Another area that contributes to the preservation of natural environment are well-managed and attractive green spaces. This would attract urban residents and stimulate the desire in them to have informal meetings in these places. This is because of the relationship between man and nature. Thus, the presence of nature in public spaces is seen as an integral part of the existence of the urban areas, in which residents live, walk and work and the inclusion of nature in public spaces has been evident all thorough the several historic architectural periods.. It has been observed in the urban environment in Owerri that green spaces designated by the planning authorities have been neglected and abandoned and have become place for dumping of refuse, mechanic workshops and has become places used for less than desirable activities.

The objective of this research is therefore to examine the extent of community and cultural activities that take place in these neglected green spaces. The hypothesis chosen to guide this work is that the existence of community facilities has no significant relationship with the frequency of community activities in the neglected spaces. These neglected spaces could be enhanced into well-managed green spaces which can foster community relations and interactions.

Conceptual/Theoretical Framework

Certain theories have been postulated to explain the relationship between man and his natural environment. These theories have presented a framework for research on the place and importance of nature in the built environment. These theories include Organic Architecture, Biomorphism, Biophillic architecture and most recently the Attention Restoration Theory-one of the theories by psychologists which emphasizes the cognitive benefits of nature to the human being. These theories have shaped research on the symbiotic relationship between man and nature. They present a platform for advocacy by researchers for the full integration of nature and its benefits in designs by architects and planners. Research has largely revealed that a lot of problems which affect the quality of life in the urban environment could be mitigated if these theories are considered in the planning of our dwellings and cities.

Public space has been described as a vital part of everyday urban life and this includes the streets passed through on the way to work, the places where children play, or where they encounter nature and wild life, the local parts in which sports are played. They are places to walk the dog and sit at lunch time; or simply, somewhere quiet to get away for a moment from the bustle of a busy daily life. In other words, public space is an open-air living room, or outdoor leisure centre (Commission for Architecture and the Built Environment, 2004). Thus, the presence of nature in public spaces is seen as an integral part of the existence of the urban areas, in which residents live, walk and work and the inclusion of nature in public spaces has been evident all through the several historic architectural periods. Notable architects such as Louis Sullivan, Frank Lloyd Wright, Alvar Alto and many more have used nature as a basis for many of their spectacular designs.

Organic Architecture

The theories of Organic Architecture and Biomorphism have been presented as tools for realizing better buildings and environments in urban areas. In organic architecture, design approaches promote harmony between human habitation and the natural world while ensuring proper integration with the site as well as unified interrelated composition with buildings, furnishings and surroundings (MyDesignSource, 2014). Organic Architecture was propagated by Frank Lloyd Wright, a famous architect that believed that buildings should have a direct relationship with their surroundings and their designs should be united with their environment as a complete organism. Organic architecture was an extension of the teachings of his mentor Louis Sullivan whose slogan “form follows function” became widely known in modern architecture. Frank Lloyd Wright modified this slogan to “form and function are one,” while using nature as the best example (Elman, 2014).

Biomorphism

Wright emphasized that the buildings should complement their natural environment. In other words, a building and the natural environment should function as a cohesive organism and that a building should appear to grow from the site (Guggenheim.org, 2014). This ideology is also closely related to the theory of Biomorphism. This is a movement that began in the 20th century; in Biomorphism, artistic designs seek to model elements on natural patterns and shapes of living organisms. It patterns natural shapes into functional forms (Books LLC, 2015). Artistic abstract forms are based on forms found in nature. The term Biomorphism was coined in 1935 by the British writer Geoffrey Grigson and subsequently used by Alfred H. Barr in the context of the 1936 exhibition of cubism and abstract art (Books LLC, 2015). This theory is strongly connected to the Nouveau Movement. Biomorphism architecture is also referred to as Bio – organic architecture.

Biophilia

A more recent theory linking human activities to the natural world is the Biophilia concept. This describes the innate affinity of man to the natural world (Kellert, 2011). It suggests that there is an innate bond between man and nature (Youssef, 2014). This concept was used first by a psychologist named Erich Fromm in 1964 in which he referred to it as the

passionate love of life and all that is alive (Mocha.uk.com, 2014). It was further propagated by an American Geologist named Edward Wilson. The propagators of this theory carried out convincing studies showing the benefits of interaction with nature. This concept emphasizes that the gains of this interaction with nature by human beings include the improvement of productivity, low stress levels, enhancement of learning comprehension and increase in the recovery rates from illness (Mocha.uk.com, 2014). Biophilia designs are believed to improve the quality of life through their use in the design of interiors and buildings.

Attention Restoration theory

In the Attention Restoration Theory, psychologists state that the time spent in paying attention to natural scenic views such as oceans, mountains, watching a sunset and sitting in a park provides people with opportunity to rest, think and possibly to solve problems. The theory further claims that nature has the ability to ameliorate the loss of mental energy. This theory was postulated by Kaplan in 1995. Researchers on this theory have revealed the role of cognitive benefits of nature in restoring attention. Kaplan explains two attentional systems in this theory utilized by individuals: the directed attention system and the secondary attentional system. The directed attention system is used while concentrating at work and in solving problems. It ignores distractions and requires concentration and as such is susceptible to mental fatigue (Krisch, 2014). In the secondary attentional system, an individual can reflect effortlessly without much concentration. Attention restoration theory postulates that if this type of secondary attention is utilized in natural environments, which are viewed as restorative environments, it would enable the directed attention to recover from mental fatigue and have improved attention. Research has however proven an improvement in attention restoration when exposed to natural environment but has not proven the problem solving skills due to this exposure (Krisch, 2014). According to the proponents of this theory, many activities in urban areas induce stress on urban residents and the adherence to this theory in the design and planning of our urban areas could possibly enable the urban residents to overcome problems and increase their productivity. The challenge is that there is need to provide informal meeting spaces within these neglected spaces with soft landscaping. It is within the framework of the concept of community psychology and the theories of nature that the limits of this research are set.

RESEARCH METHODOLOGY

Data in this research was obtained through survey research design. This was to enable the researcher to obtain reliable and usable data. Data was obtained through primary and secondary sources. Secondary data was obtained from existing government records, books, published and unpublished related materials and maps. Population of study was the 13 settlements in the Old Owerri urban out of which 7 settlements were randomly selected for this study. Data was collected from documented government records on the neglected spaces in the settlements and the questionnaires and interviews administered on the residents in these settlements. This was done through questionnaires and interviews administered on the residents in the 7 randomly selected settlements as well as case studies, observations, photographs, Satellite images and measurements of these neglected spaces.

The samples are expected to gather targeted results through which conclusions can be drawn and important decisions could be made. The research studied the status of government planned green spaces that are neglected or lost and which occurred due to the pressure of

urban expansion. The planning areas/settlements structured by the planning authorities in Owerri were the study blocks. Questionnaires were administered on the residents in these settlements. Data was obtained through primary and secondary data. Secondary data were obtained from existing government records, books, published and unpublished related materials, maps, drays, archives. They were obtained through records of planning authorities on these lost green spaces and documented records on the status of these lost green spaces. Owerri is a twin city made up of old and new Owerri. Layouts in Old Owerri were used because of the high occurrence of these spaces within it. There are 13 layouts in the old Owerri urban (see Table 1). Field studies through questionnaire and interviews were administered on the residents in the 7 randomly selected layouts. Case studies, observations, photographs, Satellite images and measurements of these lost spaces were obtained. The formula for determining the sample size for a yet to be known population size was used to arrive at the 385 respondents for the questionnaires. Random sampling was used in the research. Out of the 13 settlements, 7 were randomly selected for field work. They are as follows: Orlu Road Secretariat Layout, Aladinma Housing Estate, Otamiri South Layout, Aladinma Northern Extension, Ikenegbu Extension Layout, Ikenegbu Layout, and Emmanuel College Layout. In each layout, all the existing neglected spaces were studied. There was the need to determine the sample size for the unknown target human population (Qualtrics.com, 2013).

Table 1: Green spaces in 1987 Owerri layout plan (Old Owerri)

S/N	Layout	No of Designated Green spaces by the Planning Authorities
1.	Government Station layout	5
2	Emmanuel College Layout	1
3	Orlu Road Secretariat	1
4	New Market Layout	1
5	Ikenegbu Layout	4
6	Ikenegbu Extension Layout	1
7	Aladinma Housing Estate	4
8	Aladinma Northern Extension	2
9	Aladinma Prefab	4
10	Amakohia/Akwakuma layout	5
11	Ugwu Orji Layout	1
12	Otamiri South Layout	1
13	Nworie North Layout	2

Source: Ministry of Lands, Survey and Urban development, 2014

The research assumed a 95% confidence level, .5 standard deviation and a margin of error (confidence interval) of +/- 5% sample size expressed numerically for this study. The calculated respondent size was 385 respondents. For the 7 layouts that were studied, questionnaire were administered on these respondents.

The following variables were also studied:

- i. Presence of community halls/facilities in neighbourhoods in the neglected green spaces
- ii. Attendance at social functions in the neighbourhoods in the neglected green spaces
- iii. Attendance at community functions in the neighbourhoods in the neglected green spaces

iv. Frequency of Cultural/ community activities held in the neglected spaces

Univariate and Bivariate analysis were conducted on the results. The univariate analysis used was the aggregation of the frequency distribution for the seven layouts while the bivariate was the pair-wise analysis using the Spearman Rho to test the null hypothesis.

PRESENTATION OF DATA, DISCUSSION AND ANALYSIS

Community halls in the neglected spaces are not significantly existent in the layouts, hence, the use of other neglected spaces are not easily available in the layouts (24.925%) as seen in the figure 1. This figure shows that in 74.547% of the layouts no community hall existed in the neglected spaces. Hence a few meetings took place on the streets in the vicinity of these spaces but most of them took place in alternative venues (if any), primary schools or compounds of residents which existed in different parts of the layouts. Semi-enclosed outdoor meeting places in these neglected green spaces could serve the purpose for these meetings. This will create a meeting point for urban residents as well make it possible for man to unite with nature within these spaces. The outdoor meeting places could offer them the type of setting the residents experience in their traditional village squares and environment.

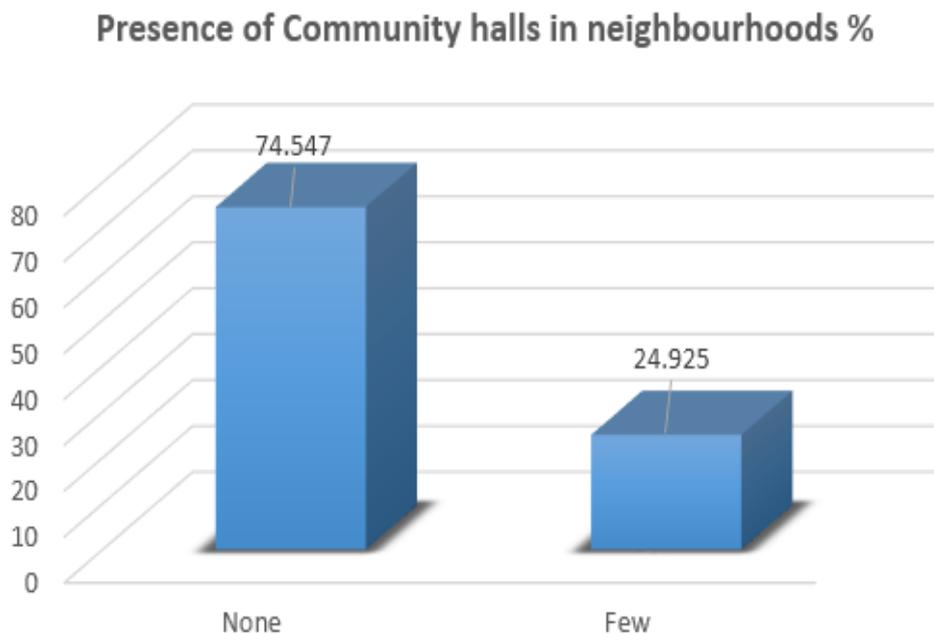


Figure 1: Presence of Community halls in the neglected green spaces in the neighbourhoods studied

Source: Fieldwork, 2015

Residents of the different layouts are fairly regular in attendance of social and communal functions within the layouts. Figure 2 shows that no 40% of urban residents do not attend social functions in the neglected spaces in the layouts, 50% of residents attend few social functions in the neglected spaces in the layouts while 10% of urban residents attend many social functions in the neglected spaces in the layouts. This is because the outdoor facilities for these activities do not exist in the layouts. Figure 3 shows that 24.229% of urban residents

attend communal functions in the neglected green spaces in the layouts while 50.071% of urban residents attend communal functions in the neglected green spaces in the layouts. There is the need to provide the spaces to hold the social and communal activities within the neighbourhoods. This could be done very well within these neglected green spaces thus uniting the urban residents with their natural environment. This will enable the urban residents to enjoy the benefits of nature in their neighbourhoods.

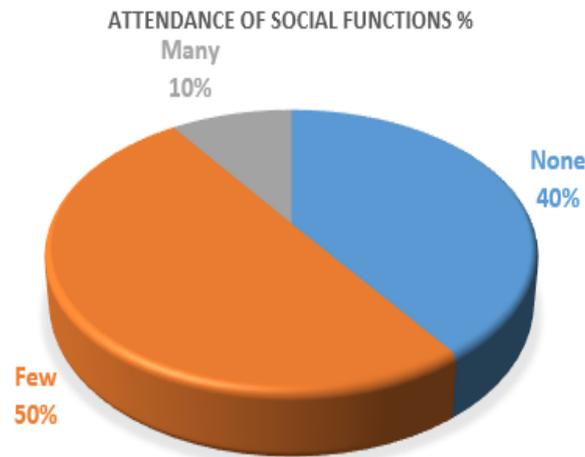


Figure 2: Attendance of social functions in the neglected green spaces in the neighbourhoods studied
Source: Fieldwork, 2015

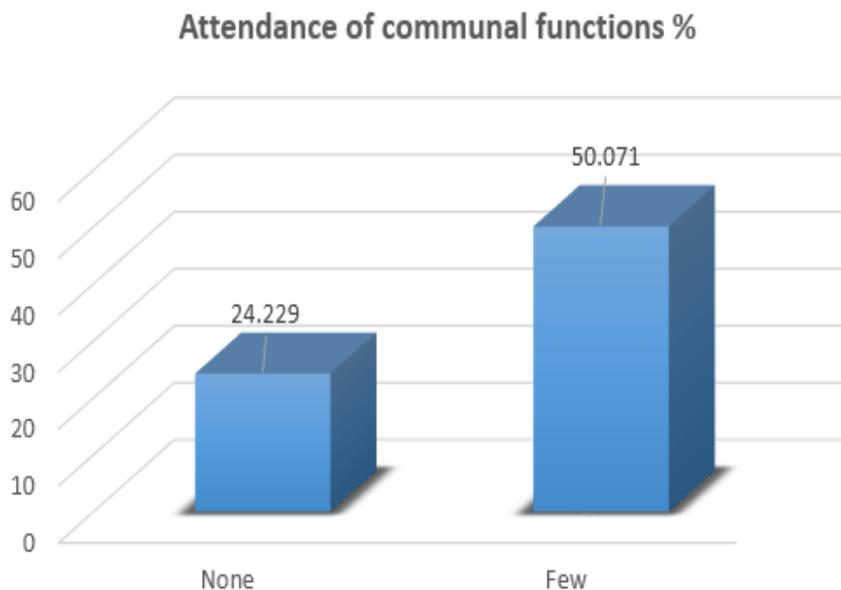


Figure 3: Attendance of communal functions in the neglected green spaces in the neighbourhoods studied
Source: Fieldwork, 2015

Cultural activities are also not frequently held in the neglected spaces within some of the neighbourhoods and do not hold at all in two of the layouts. This was found to be due largely to the absence of the outdoor facilities for these activities. Figure 4 shows that the outdoor facilities for these cultural activities are not present in the layouts. It shows that 83% of these cultural activities take place in a few of the neglected spaces in the layouts. Only 13% of these cultural activities take place in a few of the neglected spaces in the layouts while only 4% take place in many of the neglected green spaces. The residents attend these functions sometimes outside their layouts, go back to their villages to hold them or cordon off the streets around the neglected spaces or close to them in order to hold these activities which are mainly outdoor. Residents' desire more organized spaces for these activities, particularly outdoor spaces. Integration of these activities into the neglected green spaces would create possible spaces for these activities within the respective layouts while enhancing the relationship of the urban residents with their natural environment thus improving the quality of their lives.

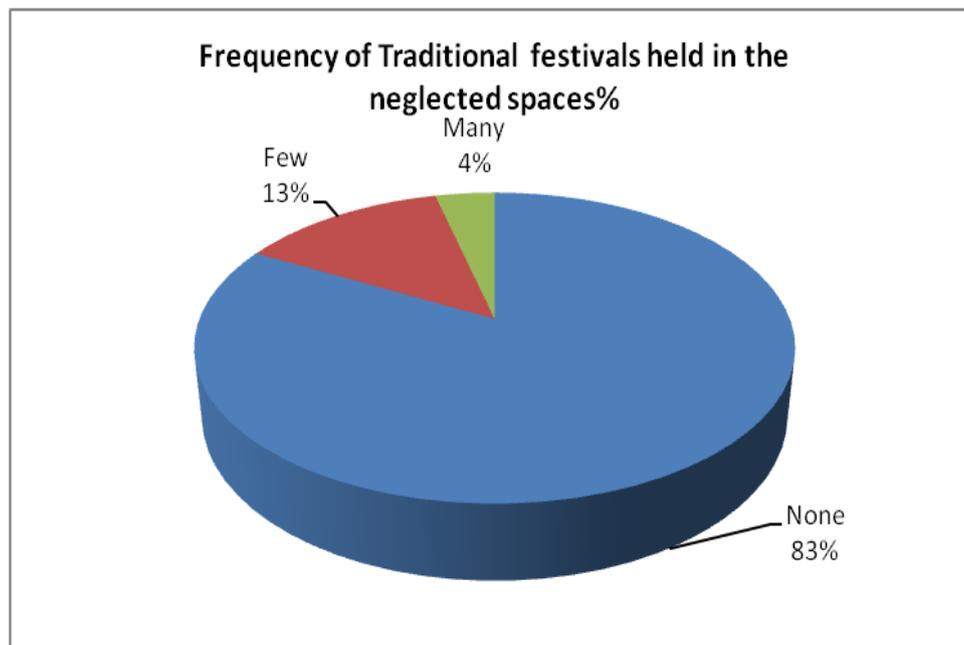


Figure 4: Frequency of Traditional / cultural festivals held in the neglected green spaces in the neighbourhoods studied

Source: Fieldwork, 2015

Here, the hypothesis of interest H_0 is 'the existence of communal facilities has no significant relationship with the frequency of cultural activities held in the stranded spaces in the layouts'. The two variables in focus were ordinal variables so Spearman's rho correlation analysis tool was used to test the nature of relationship. The result of the analysis showed a correlation coefficient value of 0.265**. This implies a moderate, positive relationship exists and is correlation is significant at the 0.01 level (2-tailed) i.e. 99% compliance. The null hypothesis that 'the existence of communal facilities has no significant relationship with the frequency of cultural activities held in the stranded spaces in the layouts' is therefore rejected and the alternate hypothesis accepted. The results are shown in Table 2

Thus, availability of community facilities halls in the neglected green spaces in the layouts has a significant relationship with the frequency of cultural activities held in the neglected green spaces. This shows that the presence of community facilities/ halls in the neglected green spaces in old Owerri urban will promote the frequency of cultural activities and enhance social cohesion.

Table 2: The results of Spearman Rho correlation analysis

Variable			Corr Coefficient	Remarks on hypothesis
Ho	i	iv	.265**	Rejected at .265** corr. coefficient

Source: Fieldwork, 2015

CONCLUSION

The research shows that the absence of spaces for social, cultural and general community activities have made cohesion and interaction among urban residents quite challenging. This has made it almost impossible to hold community meetings, which could have provided several fora for deliberations and cross-fertilisation of ideas. Social capital which is important for community benefits is formed from interpersonal relationships and dedicated support of people. The presence of landscape and green spaces tend to promote community connections and perceptions of well-being and neighbourhood satisfaction (Wolf, 2017). Facilities such as spaces for outdoor meeting facilities in these neglected green spaces would be more useful to the residents and improve their interaction with nature as well the quality of their daily lives. Activities that could be held by the residents in these spaces include neighbourhood meetings, town hall meetings, development unions, end-of-year parties, political meetings and discussions during elections, age-grade association meetings, local government association meetings and celebrations of personal achievements. If these neglected green spaces in Owerri are developed into communal spaces and facilities such as bush bars, semi-enclosed halls and other demountable structures coupled with a lot of greenery, they can inspire residents to come together and relate in in order to foster community integration (Young, 2015).

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