

Market Women Environment, Governance and Food Safety Practices in Ibadan, Nigeria

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Keywords: Market Women, Environment, Market Governance and Food Safety

Abstract

In Ibadan, Nigeria, awareness, disposition, practices and ethno-cultural factors associated with environment, governance and food safety practices among market women as in other developing countries were in astronomical decrease. Low level of awareness on environment and food safety practices in recent times and their poor access to environmental information had some inherent problems in Ibadan North Local Government Area. A cross sectional study design was adopted. Assessment of key environmental indicators, market governance and food safety. The study consisted of data collection with the use of questionnaire and key informant interviews. About 57.3% of the respondents indicated sachet water as their source of water supply. When the respondents are pressed and need to use the toilet 43.3% make use of the market toilets. 18.7% of the market women prefer to give their food wastes to goat and chickens to feed on. In all the market studied, market governance was largely left in the hands of men, despite the fact that women population in the market are very predominant. The study concluded that market environment needs to be improved on, food safety and handling regulated. Market governance is left in the hands of men who are always minority in the markets.

Introduction

Market is indeed an economic institution as well as a social entity. Most of the trading is in the hands of women. To the market women the market not only offers cash reward through trading, but also serves as a meeting ground for social and cultural activities

(Samuel Awoyinfa, 2012)

Women constitute some 60 – 70 percent of the world's poor (Resource Venture, 2010). Women, especially in the developing countries, bear the brunt of pollution, deforestation, desertification and drought. They are managers or environmental users, as hewers of wood and

drawers of water, producer of food and custodians of natural resources. Women's special relationship with the environment makes them victims of unsustainable development. Most of the environmental problems faced by people living in poverty are in their homes, neighbourhood and work/market place. These tend to have immediate impact on women's health. In the home and work environment, discomfort and excessive work arising from the lack of (safe) water and sanitary facilities or decent/adequate shelter expose women to pathogens and health threatening problems such as pollution from cooking fires (firewood, paraffin, charcoal) and overcrowding.

Further problem arises from the use of poor building materials, the hazardous location of houses. Women often combine child care with trying to earn a living and convert their homes into workplace without necessarily being aware of the occupational hazards. People living in poverty especially women in their struggle for shelter, tend to locate near polluting industries, public and waste site, on marginal land and hazardous land. Many women are landless, homeless, illiterate, unemployed or underemployed and this situation further affect their governance status in the market and food safety (Galadima et al., 2011).

The continued astronomical increase in non compliance with environmental sanitation regulations within markets and its implication on food safety, as well as the role of women in market governance are responsible for the basic pervading issues that forms the basis for this study. This study is only attempting to assess market environment, identify food safety issues and determine role of women in market governance.

Materials and Methods

Study area

Ibadan, the capital city of Oyo State is located approximately on longitude $3^{\circ}51'$ North of the equator at a distance of about 145Km north east of Lagos and 659km Southwest of Abuja, the nation's capital city. It is an inland city with an

altitude of 780 feet (237.7m) above sea level. This is a nodal city, and this made it an ideal trading center. However, the types of economic activities undertaken by the people of Ibadan north LGA varies from one area to another. For example, people in the urban area engage mainly in trading while their rural counterparts are engaged in farming. Public service employment is not very common among the rural people. Overall, trading is the most common economic activity in the Ibadan North LGA. The population of Ibadan North LGA according to the 2006 census figure put the population at 306,795. This comprises 153,039 males and 153,756 females (FGN, 2007). In-town transportation comes in a variety of forms. Modes of transportation include, taxis, taxivans commonly called *danfos*, private cars that are hired out by the day with a driver, personal family cars, scooters, and walking. All fares are negotiable depending upon the number in the person and the distance to be traveled (UNDP, 1995).

Study Design

This study design was a descriptive cross-sectional survey.

Study Population

The study population consisted of market women i.e. women within child bearing age living and/or working within the selected markets, aged 15-40years. Key informant interview from heads of markets such as Iyaloja, and Babalojas.

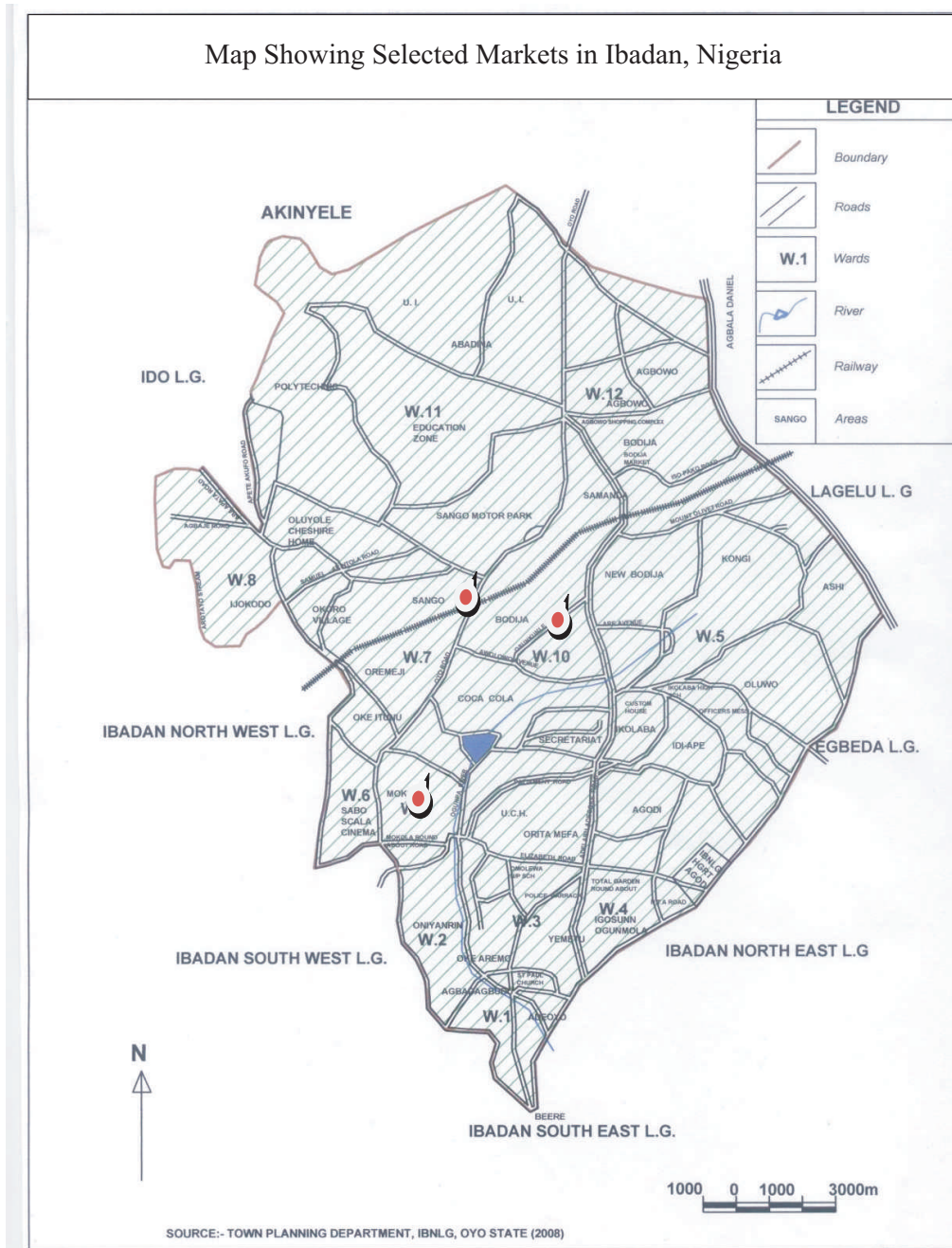


Figure 1: Street map of Ibadan North LGA showing locations of selected study markets

Key: Selected Markets 

Eligibility for Participation (Inclusion/ Exclusion)

Market women doing business within selected markets

- Must be women of child bearing age

- Must be trading within Ibadan North LGA
- Voluntary Participation

Data collection processes

All the eligible participants were interviewed with a structured questionnaire, developed in English.

Table 1: Procedure for Sample size determination

Markets	No. of Samples
Sango	50
Bodija	50
Mokola	50
Total	150

The questionnaires were divided into two sections: evaluation of food safety and security and the determination of water and sanitation practices among the market women. The key informant interviews were conducted with the heads of markets such as Iyaloja and Babaloja's.

Statistical Analysis

The data were analysed using descriptive statistics (frequency distribution) findings of the study were summarised and presented in tables and charts.

Results

Market Environment

According to Freeman and Akinpade (2010) some of the functions of market leaders are to ensure availability of portable water, waste disposal and toilet facilities. Table 2 highlights selected environmental indicator in the markets under study. About 57.3% of the respondents indicated sachet water as their source of water supply, 13.3 % from borehole, 6.7% get their drinking water from the tanker drivers. Market women bring their cooked food from home as indicated by 44.7% of the respondents, 22% get their food from food vendors, 15.3% from the Canteen, while only 18% prepare their food in

the market. Food waste in the market is mostly disposed in dust bins usually provided by the Local Government as indicated by half (50%) of the respondents, 20% of the respondent take the waste to the refuse collection points, some 18.7% give their food waste to goat and chickens to feed on, while 3.8% and 8% dispose their food waste in drainages and dump site respectively.

When the respondents were pressed and need to use the toilet 43.3% made use of the market toilets, 42% make use of their toilet at home before coming to the market or had to hold on to it until they get to their houses later in the day. However 14.7% of the respondents made use of the bush as their toilet.

Hand washing was a practice that helps prevent bacteria from gaining entrance into our body system through the mouth (Olufemi 2004). Therefore, market women were questioned on the frequency of their hand washing in the market, 49.3% of the women indicated they very often wash their hands, 39% often wash hand, 10% less often while only 2.7% rarely wash hand in the market.

Respondents Housing Status

Table 3 describes the housing status of market women in the study area. Majority (44%) lived in room and parlour apartments, 39.3% in flats and 16.7% of the respondents are living in a room apartment. When probed about house ownership, it was revealed that more than half (75.3%) of the respondents did not own the place they are living where 24.7% are owners of the place they are residing either singly or jointly with their spouse.

Table 2: Market Environment

Variable	Frequency	%
Source of drinking water		
Well	12	8.0
Borehole	20	13.3
Tap	12	8.0
Sachet Water	86	57.3
Stream	8	5.3
Rain	1	0.7
Bottle Water	1	0.7
Buy water from water tanker driver	10	6.7
Total	150	100.0
Source(s) of cooked food while in the Market		
Food vendor	33	22.0
Canteen	23	15.3
Bring food from home	67	44.7
Cook food in the market	27	18.0
Total	150	100.0
Where do you dispose off your food waste in the market?		
Drainage/Drains/Gutter	5	3.3
Dust bins	75	50.0
Dump Site	12	8.0
Refuse collection points	30	20.0
Given to goats/Chicken	28	18.7
Total	150	100.0
Where do you do your toileting?		
Market toilet	65	43.3
At home	63	42.0
In the bush	22	14.7
Total	150	100.0
How often do you wash your hand in the Market?		
Very often	74	49.3
less often	15	10.0
Often	57	38.0
Rarely	4	2.7
Total	150	100.0

Market Women Personal Hygiene

Market women personal hygiene was probed and it was highlighted that majority (71.3%) wear apron while handling food items and 28.7% do not wear apron. When asked about handling food with bare hands 68.7% indicated

the normally handle food items with bare hands, 25.3% do not engage in the practice, while only 6% sometimes engage in the practice. Most (82%) of the respondents do not wear long nails while 18% wear long nails while handling food items. Majority, (81.3%) of the respondents normally cover their hair while handling food

Table 3: Respondents Housing status

Variable	Frequency	%
Type of Housing		
1 room	25	16.7
Room & Parlour	66	44.0
Flat	59	39.3
Total	150	100.0
House ownership		
Yes	37	24.7
No	113	75.3
Total	150	100.0

Table 4: Market Women Personal Hygiene

Variable	f (%)
Do you wear aprons?	
Yes	107 (71.3)
No	43 (28.7)
Do you handle food with bare hands?	
Yes	103 (68.7)
No	38 (25.3)
Sometimes	9 (6.0)
Do you wear your nails long?	
Yes	27 (18.0)
No	123 (82.0)
Do you have your hair covered when cooking or serving food?	
Yes	122 (81.3)
No	28 (18.7)
Do you blows air into polythene bag before use	
Yes	14 (3.9)
No	127 (84.7)
Sometimes	9 (6.0)

items and 18.7% are not used to covering their hair when handling food items. The question on blowing hair into polythene bag before use is practiced by about 3.9% of the respondents, 84.7 do not engage in the practice, while only 6% sometimes engage in the practice.

Food Safety

Food is a potential source of infection and is liable to contamination by microorganisms, any point during its journey from the producer to the consumer. Food safety, in its widest sense, implies hygiene in the production, handling, distribution and serving of all types of food (Olufemi 2004). Food safety rest directly upon the state of personal hygiene and habits of the personnel working in the food establishment. Proper handling of food, utensils and dishes together with emphasis upon the necessity for good personal hygiene are of great importance.

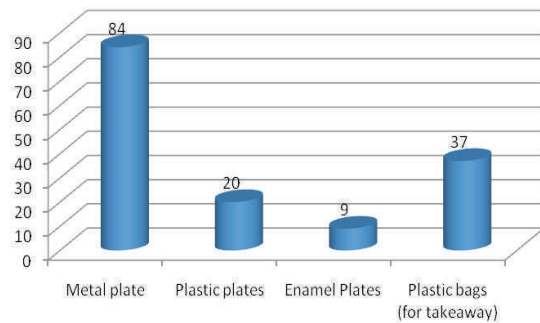


Figure 2: How cooked foods are saved

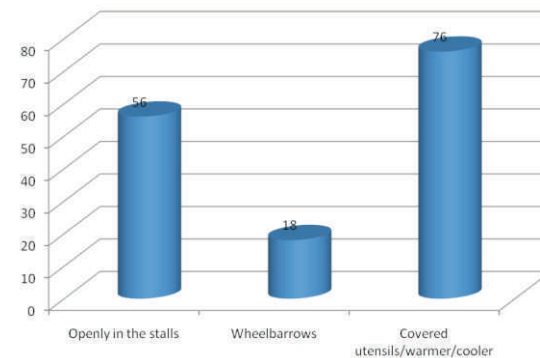


Figure 3: Storage method used to store cooked food

Fig. 3 describes how cooked food were served. 56% of the respondents served their food on metal plates, 13.3 % on plastic plates, 6% on enamel plates and 24.7 % on plastic bags for takeaway. Data from fig.3.23 describes storage methods used to store cooked food in the

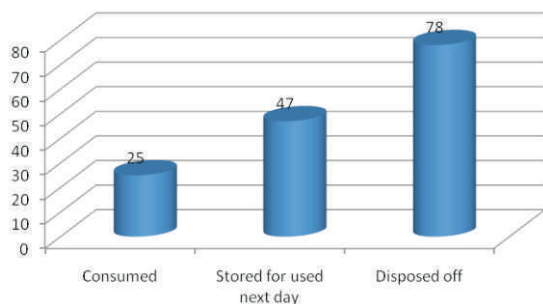


Figure 4: Ways of preserving left over foods

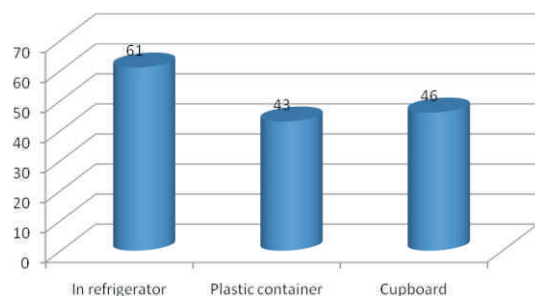


Figure 5: Storage of daily unsold cooked food

market, more than half, 50.7% of the respondents stored their cooked food in covered utensils/ warmer/coolers, 37.3% openly in the stalls and 12% in the wheel barrows.

Fig. 4 shows ways the market women preserve leftover food, indicating more than half (52%) normally disposed their leftover food, 31.3% store them for use the next day and 16.7% consume their leftover food. Figure 5 describe how market women store their daily unsold cooked food. Majority, (40.7%) store their unsold cooked food in the refrigerator, 30.7% of the respondents inside the cupboard and 28.7% in plastic containers. Market women in the studied markets suggested ways to improve market environment and food safety. This is presented in fig. 6, as 21% of the respondents suggested that the local government and market executives through their task forces enforce laws on personal hygiene and the environment, 14% would like the market to be sectionalized so as to provide adequate facilities for each section, 7% would like more health education for food handlers, 13% suggested food sellers

should prepare food with clean water and protect their food from flies, another 21% did not have any suggestion(no idea) as to ways of improving the market environment and food safety, however, 12% of the respondent did not respond to the question.

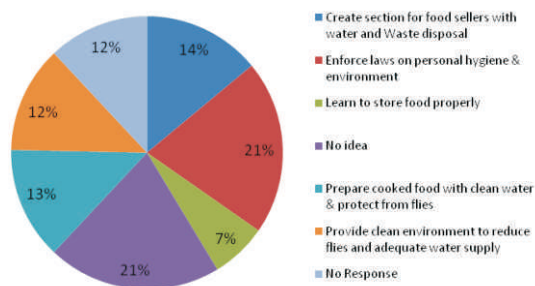


Figure 6: Suggested ways of improving sanitary and food safety in selected market

Market Governance

Market governance is concerned with activities of planning, organising, development and control of buyers and sellers day to day transaction in a market situation. Market governance is indispensable for smooth running of all types of markets external, internal, classical, modern, and formal or in formal markets respectively. The reasons are: it helps to ensure safety of life and property of buyers and sellers; sustenance of good sanitation and hygiene through provision of functional toilets and proper disposal of solid wastes generated in the market; control of traffic and people coming in and out of the market and assisting government in the generation of revenue in the market. The composition and structures of Ibadan Food Sellers Association (IFSA). The IFSA of Bodija market as a central Trade Association (CTA) is made up of over twenty (20) Sub- Trade Associations and representatives of food stuff dealers from Oja-Oba, Mapo, Ayeye, Oritamerin and onisiyun all in Ibadan.

Membership Criteria for IFSA, membership is not open to all comers, to be a member of the group a prospective trader has to undergo a mandatory apprentice scheme for an agreed period of months or years under a business



Figure 7: Showing environment of a canteen within Bodija Market

mentor. During the apprenticeship, the apprentice trader would be taught and exposed to technicalities of buying and selling of food stuff at profit maximizing and cost minimizing rates. Organisational structure of IFSA, it is made up of four (4) organs namely: Executive Arm; Advisory board; Council of Chairman of sub-trade Associations and Adhoc Committees. The Executive arm is the highest decision making organ of the Association. It is vested with powers for ensuring administration of the sub market of Bodija market. The organ is headed by a chair and assisted by other executive members. The executive arm holds its weekly meetings every Monday by 9.00am. They also hold meetings as occasion demands. The Officers are a.) President b.) Vice President c.) Secretary d.) Public Relations Officer. The Advisory Board is made up of 20 members and it is headed by a chair. Their function is to play supervisory role, mediatory and advisory roles to the Executive arm of the Association. The Council of Chairman of Sub-trade Associations is made up of Executive arm and 20 Chairmen of sub-trade Association of food stuff dealers. The roles of the council are to generate policy and codes for reward and punishment for deserving and erring members respectively.

The Adhoc Committees are the taskforce that enforce compliance and implementation of policies generated by the executive arm of the Association. Meetings of IFSA, there are four types of meetings recognised by the constitution of IFSA of Bodija Market, Ibadan. 1. Executive meetings 2. General meetings 3. Council of Chairs meetings 4. Sub-trade association meetings (Freenam and Akindele 2010).

In all the market studied, market governance was largely left in the hands of men, despite the fact that women population in the market are very predominant.

Entry into the market is either by buying a shop/stall /space and start selling, however, if what you are selling has a trade association you will be required to join the trade union and abide by their rules and regulation. These rules and regulations are different from one trade union to the other. Some of the trader unions available are bean sellers association, fish sellers association. Factually all the items sold in these markets have there traders association. Exit from the market is usually, when a trader decide not to trade in a particular item again or as a result of expulsion from a particular traders association or death of the trader.

Discussions

Market Environment

According to Freeman and Akinpade (2010) some of the functions of market leaders are to ensure availability of portable water, waste disposal and toilet facilities. Table 3.1 highlights selected environmental indicator in the markets under study. About 57.3% of the respondents indicated sachet water as their source of water supply, implication for this development is the possibility of respondent developing water borne illness as most sachet water though may be clean but the water used in icing them are not always clean, resulting in users of sachet water coming down with diseases such as typhoid fever (UNIFEM 1995). Market women bring their cooked food from home as indicated by 44.7% of the respondents, is a good habit as food cooked by the owners are mostly well prepared when compared to food prepared for commercial purposes. This also indicate that market women may not have trust in the food prepared in market canteens, as only about 15% of them obtain their food from the market canteens. Food waste in the market is mostly disposed in dust bins usually provided by the Local Government as indicated by half (50%) of the respondents, this is very impressive as a lot of awareness had been created to encourage market women to properly dispose off their food waste, while the market executive made it mandatory for every shop to have it own dust bin. It is also amazing to find out that 18.7% of the market women prefer to their food waste to goat and chickens to feed on, this is an aspect of waste recycling using biological mean (Vagale 1974).

When the respondents are pressed and need to use the toilet 43.3% make use of the market toilets, factors responsible for this may be due to distance and/or the adequacy in terms of numbers as well as the sanitary state of the market toilets. The 42% that make use of their toilet at home before coming to the market or had to hold on to it until they get to their houses later in the day, have reasons as to the cleanliness of the toilets available in the market. This finding in

agreement with Samuel Awoyinfa (2012) submission stating the unhygienic conditions of public toilets in Lagos state (Wikipedia 2010)

Food Safety

Food safety rest directly upon the state of personal hygiene and habits of the personnel working in the food establishment. Proper handling of food, utensils and dishes together with emphasis upon the necessity for good personal hygiene are of great importance (Olufemi 2004). Fig.3 describes how cooked food were served. 56% of the respondents served their food on metal plates, this finding agrees with (Parks, 2007) which established that proper handling of food, utensils and dishes together with emphasis upon the necessity for good personal hygiene are of great importance, metal plate visually display the cleanliness or other wise of the plates/utensils used in serving food in the market. However, evidence from figure 7 reveals that surroundings of the canteen is not well kept or arranged for good quality food to be served, this could account for why market women prefer to bring their food from home as indicated by 44.7% of the respondents. Data from fig. 4 describes storage methods used to store cooked food in the market, more than half, 50.7% of the respondents stored their cooked food in covered utensils/ warmer/coolers, while keeping the food in moderate temperature in warmer/coolers will make the food more attractive to the buyer.

Market women in the studied markets suggested ways to improve market environment and food safety. Fig. 6, indicates that 21% of the respondents suggested that the local government and market executives, through their task forces, should enforce laws on personal hygiene and the environment, implication for this is that most market women may not be willing to abide by the rules unless it is enforced by task force. Putting the markets into sections as suggested by 14% of the respondents will ensure adequate provision of facilities for each section, while more health education for food handlers suggested by 7% of the respondents was in line with (Parks, 2007) submission on food safety issues.

Conclusions

The study concluded that market environment needs to be improved on, food safety and handling regulated. Market governance is left in the hands of men who are always minority in the markets.

Acknowledgements

The authors thank the executives of markets included in the study. They are also grateful to the Master of Public Health program students in environmental health at the College of Medicine, University of Ibadan, who participated as research assistants.

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