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## Establishment of Mean Body Measurements for Development of Block Patterns for Functional Apparel for Pregnant Women in Lagos State

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#### **Abstract**

This study established mean body measurements for development of block patterns for functional apparel for pregnant women in Lagos State. Specifically, the study determined the average body measurements (AVBM) of pregnant women in small, medium and large sizes. Research design was exploratory and survey design. The population consisted of registered pregnant women who attended government and private hospitals in Lagos Metropolis. Research instrument was a standard body measurement chart (SBMC) developed by Petra and Blazena (2010). Data were analyzed using mean and standard deviation. Mean body measurement for development of block patterns for pregnant women was established. The study identified 33 measurements of body parts of pregnant women. Measurements were categorized into small, medium, and large size. Anthropometric measurement of pregnant women for development of functional apparels was validated. It was also found that large size was the predominant size of pregnant women in Lagos State. Mean body measurements established in the study were recommended for use by apparel industries and manufactures in Lagos State, for mass production of functional maternity commercial patterns for local use and exportation.

**Keywords:** Mean, Body, Measurement, Pregnant, Women, Functional, Apparel.

#### Introduction

A pregnant woman is one who is carrying a developing embryo or foetus in her womb. In most cases, pregnancy conventionally

lasts for about nine months, counted from the date of the woman's last menstrual period (LMP). Pregnancy is conventionally divided into three trimesters, each roughly three months long. The course of pregnancy involves psychological, emotional and physical changes in women. The metabolic, chemical and endocrine balance of the body is altered during pregnancy. During this period, the woman could be identified through many characteristics, such as her physical shape, look and gait, and her sitting, standing and walking position, (Petral and Blazena, 2010). Other physical characteristics common with pregnant women are fuller and firmer breasts. Often folds in the body especially at the axial (armpit) and neck, even the mid-cliff and the surface of the belly may appear and eventually protruding belly accompanies pregnancy.

period, During this pregnant women need functional apparels that will accommodate the daily protruding stomach (Mohammed, 2011). apparel should also be able to cover the expanded belly and still make the pregnant woman comfortable. There is therefore need for functional apparels that will accommodate the increase in body size occasioned by pregnancy, and also meet the social psychological needs of the users. Functional apparels are those apparels designed to offer practical function and be useful for some purpose rather than be just attractive. Functional apparel process begins with a thorough analysis of the anticipated user who are in different sizes of small, medium or large, and the identification of the physical, emotional and situational needs of that user, climate and other the environment. hazards in Development of the patterns termed block patterns prior to apparel construction precedes designing.

A pattern is the map of the apparel. There are two main types of patterns: the block pattern and the trade pattern (Anikweze, 2013). The block pattern is to the dress designer what the blue print is to the architect (Igbo and Iloeje 2012). Aldrich, (2006) justifies the use of block patterns in the clothing industry because the blocks are constructed to standard (average) measurements for specific groups of people but could also be drafted to fit an individual figure using personal measurements. humans have peculiar shapes and sizes. Sizing and shaping are crucial factors in pattern development. Ohaka and Igbo (2012) asserted that size system in garment production is based on the body and not the garments. Apparels that are sized properly and according to fashion, style and fabric used, and which conform to body measurements, will fit the wearer well. A garment that is well - sized will fit and align with body contours without any strain. No matter the function of any apparel to the user, the size must be proportionate to the wearer to achieve the purpose for which it is constructed.

To address this need, most pregnant women in Lagos state obtain their maternity apparels as custom-made by indigenous tailors whose technology often depend on trial and error. The tailors waste a lot of customers' time by coming and going for trials (Anikweze, 2013). Women with body proportions that deviate from normal have figure flaws. Dresses sewn on standard measurements based on average body measurements for their sizes do not

normally fit them. The dresses require making necessary alterations to take care of the deviations (Ezieke & Bob-Eze, 2019). This calls for the need for of standard size production charts/sizing system using the anthropometric measurements of pregnant women.

Anthropometric requirements pregnant women are very different because there are substantive weight gains which are not uniform around the body. There is prominent growth on the waist, bust, biceps, hips and thighs. This calls for the need to establish specific patterns that can be used to produce functional apparels that will take care of the body silhouettes of the pregnant women in Nigeria. This can be achieved by using the pregnant women's own anthropometric measurements to establish standard specific measurement chart and this is the trust of the present research. Some pregnant women in Lagos state still find it difficult to select apparels from the market due to their peculiar figures such as heavy buttocks, large arms and thighs among others. There is apparent difference in Nigerian women's shape, body structure and postural alignment. Therefore, size charts for Nigerian women is characterized by allowances for freeness. Hence the study is a measure towards meeting the sizing system in Nigeria and establishment of specific standard measurement chart for apparels for pregnant Nigeria women in Lagos State, anthropometric using their own measurements.

#### Purpose of study

The general purpose of study was to establish the mean body measurements for development of block patterns for functional apparels for pregnant women. Specifically, the study determined the average body measurements (AVBM) three categories of pregnant woman size of:

- 1. Small sized.
- 2. Medium sized.
- 3. Large sized.

#### Methodology

Design of the study: The study was exploratory and survey research. An exploratory research is an attempt to lay foundation that would lead to future studies. (kowalczy, 2015).T his is a foundation for future studies as the established mean measurements can be adopted for further studies.

Area of the study: The study was carried out in Lagos State, Nigeria. The state is bounded by Republic of Benin on the West and Ogun state both on the North and East respectively. On the stretches for 180 South, the state kilometres along the coast of the Atlantic Ocean and consists of Lagoon and Creeks. The state has 20 Local Government Areas (LGAs). The study took place in Lagos metropolis. Lagos metropolises have a good mix of people from different parts of Nigeria. (Lagos Island Local Government Area), Lagos Mainland LGAs which is from the middle ring of the metropolis and Ikeja division LGAs were used for the study. There are tertiary health care delivery centres, government and private

maternity centres and clinics in Lagos metropolis.

Population for the study: The population for the study was 1,069,125 registered pregnant women government and private hospitals in Lagos metropolis. Lagos state Bureau of Statistic on Pregnant Woman (2018). These women could be grouped into three categories of sizes; small, medium and large. They were at varying stages of pregnancy.

Sample for the study: To obtain this, six LGA were randomly selected from 20 LGA in the area. Two hospitals were purposively selected from each of the LGA, to give a total of 12 hospitals. Thirty two (32) pregnant women who were willing to participate in the study were purposively selected from each hospital to give a total 384 pregnant women who formed the sample for the study.

Instrument for data collection: The standard body measurement chart (SBMC) by Petra and blazer (2010) was used to take the body measurements of the pregnant women in small, medium and large sizes. Basic measurements of parts of the body required for drafting blouse bodies: burst girth, waist girth, hip girth, neck girth, nape to waist, shoulder length, front length to waist, front length to breast and sleeve.

*Skirt*: Frontal various, round waist, hip girth and length of skirt.

Trouser: Waist girth, hip girth, ankle, length of crotch, thigh girth, outside leg length, front leg length and back leg length. This is the compilation of the different body parts needed to be measured for effective pattern drafting and apparel construction for pregnant

women. For blouse, skirts, gown, and trouser blocks (See Tables 1,2 and 3). The instrument was validated by four clothing experts, two from University of Nigeria, Nsukka, two from Yaba College of Technology, Lagos and two nurses from government hospitals in Lagos metropolis. The trial test of the research instrument was carried out in a study area that did not form part of the study. The reliability of the instruments was established using Crombach Alpha method which yielded 0.84 which indicated high consistency reliability of the instrument.

Method of data collection: Research assistants were recruited to assist the researcher in recording measurements taken and helped the pregnant women where necessary. The researcher used consent form to seek consent of participants prior the study. The entire sample of the pregnant women totalling 384 was measured. The exercise involves taking measurement of each pregnant woman. The data analysed and the average body sizes were categorised into three sizes (small, medium, and large) some of the pregnant women who were very heavy found it difficult to stand up for a long take the static to measurement, but some were very and cooperated with researcher in taking both the static and dynamic body measurements. researcher paid several visit to the hospitals on their ante natal clinic days before the task could be completed. Each measurement was taken personally by the researcher to avoid discrepancies in computation of the correct measurement. Measurements

were taking in the morning hours to avoid interference of emotional and physical balance.

Data analysis: Data obtained on the measurements of the pregnant women were analyzed using means, and standard deviation to establish the mean body measurements. The research questions were analysed using mean

and standard deviation. The high SD of large, medium and small sizes was indications of wide differences in the shapes and figures of the pregnant women within the sizes (Tables 1, 2, and 3).

Finding of the Study

Table 1: Mean and Standard Deviation of Average Mean Measurements of Pregnant Women of Large size in Centimetres

S/	Variables	Large S	Size (cm)				
N		MIN	MAX	Total	AVBM	$\overline{X}$	SD
1	Bust girth	106	156	28378	128	128.407	11841
2	Underbust girth	12	199	24090	109	109.005	23.450
3	Frontal waist width	76	188	23958	108	108.407	15.491
4	Profile waist width	77	175	23911	108	108.195	15.304
5	Frontal hip width	109	165	31037	128	140.602	15.169
6	Profile hip width	17	161	29542	134	133.674	20.146
7	Neck girth	31	56	8921	47	40.367	6.041
8	Across chest	27	67	8309	38	37.597	6.730
9	Across back	28	53	8237	37	37.271	3.982
10	Nape to waist	32	58	8662	40	39.195	5.161
11	Height/full length	100	186	28951/31382	140	206.79/224.16	6.893
12	Frontal length to bust	23	46	6934	31	31.376	5.259
13	Frontal length to ventricose	21	84	10268	67	46.462	15.950
14	Frontal length to waist	21	77	9189	66	41.575	10.438
15	Girth of biggest ventricose	103	419	29713	134	134.448	35.175
16	Frontal ventricose profile	81	139	22741	105	102.901	11.684
17	Profile ventricose	89	140	24210	111	44.692	10.146
18	Armhole circumference	30	66	9877	23	40.149	10.107
19	Upper-arm girth/bicept	20	66	8873	42	52.511	9.952
20	Long sleeve length	33	78	11605	57	29.887	9.082
21	Small sleeve length	20	48	6605	30	29.909	6.937
22	Elbow length sleeve	20	89	6610	31	14.081	6.878
23	Shoulder length	10	18	3112	201	30.362	2.012
24	Crotch depth standing	20	50	6710	31	6.540	6.540
25	Skirt length front	40	74	11435	62	8.353	8.353
26	Skirt length back	40	76	10760	59	6966	6.966
27	Thigh girth	41	79	13145	71	10.223	10.223
28	Crotch depth	20	49	5525	32	4.432	4.432
29	Calf	14	49	8568	39	6.843	6.843
30	Knee girth	35	68	11221	52	7.533	7.533
31	Outside leg length	76	141	22166	91	13.228	13.228

32	Back leg length	80	133	22207	90	10.986	10.986
33	Ankle	21	46	7433	36	4.547	4.547

**Note**:  $\overline{X}$  = Mean, SD = Standard Deviation, N=number of pregnant women = 384, AVBM = Average body measurement, N<sub>L</sub> = Large size =221, N<sub>m</sub> = Medium size = 102, and N<sub>S</sub> = Small size, Min = Minimum, Max = Maximum =61.

The result in Table 1 shows the mean, standard deviation and average mean body measurements (in cm) of the large size of the pregnant women. Out of 384 samples of pregnant women, 221 were categorized as large which is 58%. The highest variation in measurement of body parts for large size are in the under bust girth, waist width, hip width

and girth of biggest ventricose (SD = 23.4, 15.4, 20.1 and 35.1) respectively. The high SD of large size is an indication of wide difference in the shape and figures of the pregnant women within this size. The lowest variation of measurement of large size is found in shoulder length with SD of 2.0.

Table 2: Mean and Standard Deviation of Average Mean Measurements of Pregnant Women of Medium Size in Centimetres

S/	Variables		ım Size				
Ń		MIN	MAX	Total	AVBM	$\overline{X}$	SD
1	Bust girth	90	125	10218	102	102.18	7.732
2	Under bust girth	67	114	9167	92	91.67	8.259
3	Frontal waist width	75	120	10020	10	100.2	10.412
4	Profile waist width	75	153	10027	100	100.27	11.936
5	Frontal hip width	82	160	11275	113	112.75	18.513
6	Profile hip width	36	160	11376	114	113.76	23.435
7	Neck girth	30	55	4141	41	41.41	6.145
8	Across chest	26	48	3686	37	36.86	4.230
9	Across back	30	43	3572	36	35.72	2.885
10	Nape to waist	31	51	3905	39	39.05	3.436
11	Height/full length	125	194	125/194	138	6970.38	8.354
12	Frontal length to bust	21	39	2898	29	28.98	4.183
13	Frontal length to ventricose	20	110	5338	64	53.38	20.893
14	Frontal length to waist	27	110	6048	62	60.48	25.997
15	Girth of biggest ventricose	74	151	11489	115	114.89	16.025
16	Frontal ventricose profile	80	149	10493	103	104.93	13.246
17	Profile ventricose	80	138	11059	110	110.59	12.245
18	Armhole circumference	29	82	5102	22	51.02	10.607
19	Upper-arm girth/bicept	20	66	3665	39	36.65	9.754
20	Long sleeve length	30	96	5739	54	57.39	10.77
21	Small sleeve length	20	54	2910	29	29.1	6.039
22	Elbow length sleeve	21	40	3087	30	30.87	5.193
23	Shoulder length	10	19	1295	19	12.95	2324
24	Crotch depth standing	20	88	3197	30	31.97	7.713

25	Skirt length front	36	83	5766	59	57.7	10.2
26	Skirt length back	40	85	5977	58	60.57	10.451
27	Thigh girth	48	74	6057	67	29.6	6.745
28	Crotch depth	20	42	2959	30	34.86	6.745
29	Calf	21	52	3486	35	50.4	5
30	Knee girth	38	69	5040	51	99.51	6.025
31	Outside leg length	82	171	9951	81	99.05	6.76
32	Back leg length	73	124	9905	80	97.11	12.817
33	Ankle	20	40	3342	34	32.76	7.862

**Note**: X = Mean, SD = Standard Deviation, N=number of pregnant women = 384, AVBM = Average body measurement,  $N_L$  = Large size =221,  $N_m$  = Medium size = 102, and  $N_S$  = Small size, Min = Minimum, Max = Maximum =61.

The highest variation in measurement of body parts for medium size (SD = 23.4, 20.8, 25.9) are in hip width, frontal length to venticose, frontal length to waist respectively. The high SD of hip width of blouses skirt/trouser, frotal

length to ventricose and waist was different in the shape and figure of the pregnant women within this size. The lowest variation in measurement of medium size is also on the shoulder length with SD of 2.0.

Table3: Mean and Standard deviation of Average Mean Measurements of Pregnant Women of Small Size in Centimetres

	Variables	Small	Size (c	m)			
S/N		MIN	MAX	Total	AVBM	$\overline{X}$	SD
1	Bust girth	96	80	4890	86	85.789	4.208
2	Underbust girth	98	70	4697	82	82.404	6.079
3	Frontal waist width	110	76	5481	92	96.158	11.056
4	Profile waist width	111	76	5504	96	96.561	10.406
5	Frontal hip width	109	60	5374	94	94.280	13.493
6	Profile hip width	109	61	5587	98	98.017	9.218
7	Neck girth	90	32	2660	40	46.667	14.731
8	Across chest	59	30	2184	35	38.316	4.983
9	Across back	48	30	2026	35	35.544	4.520
10	Nape to waist	45	33	2211	38	38.789	2.846
11	Height/full length	100	156	7695/6203	135	135/108.82	7.324
12	Frontal length to bust	37	20	1582	28	27.754	3.480
13	Frontal length to ventricose	52	35	2455	61	43.070	4.762
14	Frontal length to waist	112	31	4416	58	77.473	20.048
15	Girth of biggest ventricose	118	79	5762	102	101089	9.991
16	Frontal ventricose profile	118	81	5729	101	100.509	10.352
17	Profile ventricose	123	82	6257	109	109.772	9.252
18	Armhole circumference	80	31	2897	21	50.825	11.224
19	Upper-arm girth/bicept	64	23	2128	36	37.333	8.320
20	Long sleeve length	69	27	3075	52	53.947	11.593
21	Small sleeve length	40	20	1570	26	27.540	5.355
<b>-</b> 1		10	20	1070	_0	_, .0 10	0.0

22	Elbow length sleeve	57	20	1749	29	30.684	6.205
23	Shoulder length	20	10	6892	18	12.088	2.254
24	Crotch depth standing	40	20	1777	29	31.175	4.536
25	Skirt length front	89	38	3313	57	58.123	9.247
26	Skirt length back	95	50	3424	52	60.070	9.619
27	Thigh girth	72	45	3381	59	59.316	6.798
28	Crotch depth	50	20	1754	27	30.772	6.141
29	Calf	43	20	1870	33	32.807	5.743
30	Knee girth	86	31	2845	50	49.912	9.574
31	Outside leg length	102	64	5377	80	94.333	94.333
32	Back leg length	114	73	5572	79	97.754	8.444
33	Ankle	42	26	1946	33	34.140	4.299

**Note**: X = Mean, SD = Standard Deviation, N=number of pregnant women = 384, AVBM = Average body measurement,  $N_L$  = Large size =221,  $N_m$  = Medium size = 102, and  $N_S$  = Small size, Min = Minimum, Max = Maximum =61.

Table 3 shows that the highest variance in measurement body part for small size are SD = 11.0 (waist width) SD = 13.4 (Hip Width), SD = 20.0 (Frontal Length to waist) and SD = 10.3 (Frontal Ventricose). The lowest variation is on the shoulder length with SD of 2.2. The high SD in measurement on the small category indicates wide difference in the shape and figure of the pregnant women within the size

#### **Discussion of Findings**

The mean body measurements for construction of functional block pattern for pregnant women were established. The body measurements taken for drafting the pattern were categorized into small, medium and large sizes. This study identified 33 measurements of the body parts of pregnant women and was categorized into different sizes of large, medium and small. These parts of the were identified body that measured included: bust girth, under bust girth, frontal waist width, profile waist width, frontal hip width, profile neck girth, across chest, hip width,

across back, nape to waist height/full length, frontal length to bust, frontal length to ventricose, frontal length to waist, girth of biggest ventricose, frontal ventricose profile, profile ventricose, armhole circumference, upper-arm girth/biceps, long sleeve length, small sleeve length, elbow length sleeve, shoulder length, skirt length front, skirt length back and thigh girth. This is in line with Igbo and Iloeje (2012) who noted that for a garment to be beautiful, attractive and provide good fit the dress maker must know body measurements. Dressmaking (2014) also reported that the first step in drafting is measuring the different parts of the body required drafting the block patterns. In establishing size categorization for the pregnant women, the study revealed that 58% of the pregnant women fall within the large size category, 26% were medium sized 15 % were small sized. Sizing was based on sized categorization which was based on bust girth, waist width and hip width measurements. A lot of irregularities attended to the shape and figure of

pregnant women. Thompson (2011) again identified creative designs mean body measurements for three size categories (small, medium and large). However, Nkarubule and Klerk (2010) identified clothes sized from size 16 to 28 or size 40 to 52 + in their study. Also MacDonald (2010) reported that the goal of any sizing system is to choose the size groups in such a way that a limited, number of sizes will provide apparel/garments that fit most individuals in the specific population.

#### Conclusion

The mean body measurements of pregnant women in Lagos state have been established in this study. The need for taking anthropometric measurement of individuals while developing new apparel products was confirmed in the research especially due to the disparity between the sizes of users in this study. It was revealed that sizing of maternity apparels should be determined by waist, bust and hip measurements. Based on the findings of this study, it could be assumed that large size predominate size of pregnant women in Lagos State, hence in producing functional apparels for this group of people, large sizes should be more in number than medium and small sizes.

#### Recommendation

Based on the findings, the following recommendations were made:

1.The mean body measurements of pregnant women established in this study should be used by students of clothing textiles, and garments markers for pattern drafting 2. The apparel industries and manufacturers in Nigeria should use the mean body measurements of pregnant women established in this study to form the data base for commercial pattern.

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## Chemical Analysis of Soups Prepared From Processed and Unprocessed Water-Leaf (*Talinium Triangulare*) and Fluted Pumpkin (*Teltaria Ocidentalis*) Vegetables

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Calabar

#### Abstract

The general objective of this study was to investigate the nutrient content of soups prepared with water-leaf and fluted pumpkin leaves processed by two methods. Specifically, the study determined: proximate content of the two soups prepared with vegetables processed by two methods (squeezed and unsqueezed); nutrients contents of the two soups. This was done by the preparation of edikang-ikong (vegetable) soup meal using squeeze-washing method. Fluted pumpkin (Teltaria ocidentalis) and water leaf (Talinum triangulare), used were bought from watt market in Calabar. It was an experimental study. Two treatments unsqueezed and squeeze-washed were employed. Analysis of the nutrient content of the two treatments was done using AOAC, 2005. The findings revealed that there was significant difference in the proximate content of the soup meals. The moisture contents of the squeezed-washed soup meals reduced (UNSVS 18.02 vs 11.11%) and increased fat (36.49 vs 51.93%) and carbohydrate (nfe) (1.93 vs 7.97%). Nitrogen content was reduced (91.27 vs 85.91mg). Most of the mineral contents were reduced after squeeze-washing. The same trend was also observed in vitamin content of the soup meals. Squeeze-washing of the vegetables caused significant reduction in the nutrient contents of the soup meals. Recommendations: shade drying should be used as a processing method and vegetables should be produced using organic fertilizer rather than in-organic fertilizer.

Keywords: Vegetables, Methods, Soups, Nutrients, Squeezed, Unsqueezed

#### Introduction

A soup is a flavourful and nutritious liquid food served at the beginning of a meal or a stock (Cesarani and Kinton 2009). Certain soups are thick and creamy and they could be just pureed or thickened with flour and milk for

example cream soups. Certain shellfish soups are thickened with rice and pureed such as bisques soup. A clear soup will be served crystal clear and thick creamy soups should have a smooth velvety finish. Soups are

broadly classified into two types: thick and thin soups.

The soups are further classified into various categories. This is done based on the texture of the coups. There are certain soups that are neither thin nor thick and so sometimes certain soups are classified into a category called international soups. These soups would essentially be the national soups of different countries. These represent the region or origin. This is where our soups (African) fall into because it is garnished or other ingredients are added to the soup. For example like the lobster bisque it is a shellfish based soup garnished with dices of seafood used traditionally. It is thickened with rice ad furnished with cream.

This is similar to the soups we consume in Nigeria especially Cross River State. We have soups like Afang soup (Gnectum africanum), Edikangikong (vegetable) soup, Ofe Owerri (Owerri soup), Ukazi/Achara soup (Gnectum africanum) soup southeast version. These soups are thickened with addition of ingredients vegetables, fish, palm oil, spices, fish/meat, etc. Hence, these traditional soups represent the places where it originated. Example, Edikang-ikong soup, Calabar (Cross River State), Ofe (Owerri-Imo Owerri; state), Ofe Ukazi/Achara (Ngwa/Umuahia) Abia state, etc.

Methods of preparing vegetables can lead to loss of nutrients (vitamins and minerals). This could occur during cutting, chopping or laceration, squeeze-washing or pounding. These methods are used mostly in the

preparation of vegetables (fluted pumpkin, (Ikong leaves) water-leaf (*Talinium triangulare*), Afang (*Gnetcum africanum*), Lasenthera africana (Editan) for the preparation of popular soups meal such as Edikang-ikong: (vegetables soup). Afang soup (water leaf/*Gnetcum*), Editan soup (water leaf)/*Lasenthera africana*).

These methods remove bitter taste (Lasenthera africana (Editan), sour taste (water-leaf), reduces particle size africanum) (Afang), Gnectum and Lasenthera africana (Editan) vegetables respectively. They may lead to loss of micro-nutrients and minerals that are essential for health, and improve taste and make for nutrient bioavailability by reducing the anti-nutrient substances that are contained in the vegetables. The vegetables are consumed in soup every day especially in Cross River and Akwa Ibom States with the methods employed in the preparation of the vegetables. The continuous consumption of this soup meal may lead to micro-nutrient deficiency among the people of these states especially vulnerable groups (women, children and elderly people). Therefore, this research work was aimed at investigating the effect of some of these traditional processing methods on the processed water-leaf (Talinum triangulare)/Fluted pumpkin for soup meal preparation.

Green leafy vegetables constitute an indispensable constituent of human diet in Africa generally and West Africa in particular. Generally, they are consumed as cooked compliments to the major staples like cassava, cocoyam, guinea corn, maize, millet, rice and plantains. Most of the meals based on

these staples are considered in-complete without a generous serving of cooked green vegetables. The variety of green leafy vegetables utilized is as diverse as both the staples with which they are consumed. It has been estimated that perhaps over 50 species of green leafy vegetables are used in Nigeria alone. These range from leaves of annuals and and the families shrubs of amaranthaceae, compositae, protulacaceae and solanacea, of leaves of trees like the baobab. Many of these vegetables (e.g Amaranth) are common in all areas of the country but some (e.g. baobab) are restricted in their natural distribution. Due to their wide adaptability, vegetables can fit into cropping systems under diverse agro ecological conditions. There is also seasonal variation in the availability of many of these vegetables (Oguntona, 1998).

Green leafy vegetables like other food stuffs used in Nigeria are subjected to quite a variety of processing procedures, include rising, cutting, chopping, or lacerating, washing, squeeze washing drying, blanching, boiling and a combination of some of these, (Oguntona, 1998). The main objective is to reduce the particular size of the vegetables. Keshinro and Ketiku (1979) pointed out the aim, is to eliminate most of the associated "bitter taste" in the tough vegetables. procedure is quite severe and leads to considerable losses of nutrients (Keshinro and Ketiku, 1979) Latunde Dada (1990).

The methods of processing vegetables can lead to loss of food nutrients (vitamins and minerals). This

could occur during cutting, chopping squeezing washing or pounding. This method especially is used in the preparation or their processing certain commonly consumed vegetables such (Gnetcum africanum) (Afang), vegetable soup (Edikang-ikong soup), water-leaves (Talinum triangulare), "Editan" (Lasinthera africanum). vegetables mentioned are either squeeze washed, blanched or pounded before usage. This method may remove bitter taste and reduce particle sizes as in Edikang-ikong and Afang. It also removes sour taste especially in water leaf, before they are used for soup meal preparation. The processing of the vegetables may improve the taste and nutrient bio-availability.

The two vegetables are commonly consumed in soups called "Edikangikong and the processing of the vegetables involved squeeze-washing, this may lead to leaching out of essential micronutrients such as vitamin A, C, E and other nutrients such as Folate, Iron, Zinc etc. Since this soup meal is popularly consumed in Cross River State and Akwa-Ibom State, it means that most of the people of these states may be suffering from micro nutrient deficiencies such as mental retardation (iodine deficiency), night blindness (vitamin A deficiency) Iron deficiency and eventually death. These may cumulate to high maternal and infant mortality in Akwa-Ibom and Cross River State and in Nigeria in general. Therefore this research work was aimed at finding out the nutrient content of the fresh (unsqueezed) and processed (squeezed) vegetables waterleaf (Talinum triangulare) and fluted

pumpkin (*Teltairia occidentalis*) used in soup meal preparation.

This research work would be very important to the citizens of Cross River and Akwa Ibom States who consume this soup meal regularly and other people that enjoy this soup meal. This is because they would know the proper processing technique that should be used in the preparation of the vegetables for the soup meal.

Secondly, using the appropriate method of processing will reduce micro nutrient deficiency diseases prevalent among the people since the nutrient contained in the vegetables are retained using this appropriate technique and the traditional method that had been held strongly by the people would be changed to the appropriate method that conserve nutrients in soup meal.

#### Purpose of the Study

The general objective of this study was to investigate the nutrient content of the soups prepared with water-leaf (*Talinum triangulare*) and fluted pumpkin (*Teltairia occidentalis*) leaves processed by two methods. Specifically, the study determined:

- proximate content of the two soups prepared with vegetables processed by two methods (squeezed and unsqueezed);
- 2) nutrients contents of the soup;

#### Materials and Methods

Design of study: Experimental method was used for this research. Fluted pumpkin and water-leaves (vegetables) were purchased plucked, washed and divided into two. One group of the vegetables was shredded and used for

soup meal preparation (Edikang-ikong) soup while the other group was squeezed, washed after cutting and used for soup preparation.

Materials: The food crops whose leaves were used in this study were fluted pumpkin (Teltairia occidentalis) and water-leaves (Talinum triangulare). These vegetables were bought in the market (Watt market). They were bought fresh from the market. The fresh tender vegetables were analyzed for their chemical contents using standard methods. (AOAC, 2005).

Preparation of Materials (ingredients for the soup meals): The vegetables, fluted pumpkin (Teltairia occidentalis) and water-leaves (Talinum triangulare) were plucked, washed and shredded. It was then divided into two groups of fluted pumpkin 400g and water-leave 500g each. The meat was cleaned by removing fat linings and dirt (sand) and washed with salt and kept in a plate for use. For the fish, the finches were cut off using kitchen knife and the gills and intestines removed and washed and kept in a separate plate for use. The fresh cow skin was washed with salt and scrubbed with iron sponge to remove dirt and kept in a separate plate for use. The stock fish was scrubbed and washed with salt and kept also for use. For the onions, the inedible part was cut off and washed and then chopped into cubes for use. The fresh pepper the inedible part were cut off using knife then washed and put into a blender for 5 minutes and poured into a plate for use. The crayfish was selected and dirt and other things that are not editable were removed and then blended and kept in a plate. The same ingredients

was used except that the vegetables used for the second soup meal was not squeezed. All other ingredients were the same quantity.

Processing of vegetables: The leaves fluted pumpkin (Teltairia occidentalis) and water- leaves (Talinum triangulare) were plucked, washed, shredded and divided into two groups. The first group being (sample I) was unsqueezed and kept for soup preparation. The (sample sample second II) squeezed-washed, that is, was put in a large bowl of water and squeezed by removing the sliming substances from the waterleaf and fluted pumpkin ad used for soup preparation.

#### **Preparation of Ingredients Dishes**

Table1: Recipe for unsqueezed vegetables soup meal preparation (Edikang-Ikong soup)

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	Ingredients	Measurements
1	Pumpkin leaves	s400g
2	Water-leaves	500g
3	Macrel, ice fish	200g
4	Beef meat	200g
5	Cow skin	200g
6	Stock fish	100g
7	Onions	200g
8	Fresh pepper	50g
9	Crayfish	50g
10	Palm oil	3 medium soup spoon
11	Water	1½ medium water cup
12	Star magi	4 cubes
13	Salt	1 tea spoon
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The same recipe was used for the squeezed vegetables.

#### Chemical/Proximate Analysis

The moisture, crude fat, ash, fibre, carbohydrate ad energy content of the

samples of the fluted pumpkin and water leaves soup meals were analyzed using AOAC, (2005). The moisture content of the samples was determined using air oven method of AOAC, (2005). The crude protein content of the samples was determined by automated micro-kjeldahl as described by AOAC, 2005. Fat was also determined by using the soxhlet extraction method AOAC, (2005). Ash content was also determined using AOAC, (2005). Crude fibre was also determined using AOAC, (2005) and carbohydrate was determined by difference. The sum of percentages of protein, fat, ash, fibre and moisture were subtracted from 100% to obtain the value of carbohydrate. The nutrients were determined as follows: folate, copper, iron, zinc, carotene, calcium, potassium, nitrogen and phosphorus were determined by the method of mineral analysis of atomic absorption, spectro photometer of IITA, (2002). The vitamins, vitamin A, C, and E were determined by AOAC, (2005).

#### **Data Analysis**

Data generated from work would be subjected to student t-test to compare means between the pre and post treatment, mean, standard deviation standard error of the mean (SEM), P value (0.05) would be an indicative of significance and Duncans Multiple Range Test (DMRT) was used to compare and contrast means.

#### Findings Result of Chemical Analysis

Table 2: Proximate Composition of Soups prepared from Processed and Unprocessed Vegetables

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СНО	UNSVS	SVS
Moisture (%)	$18.02 + 1.88^a$	11.11 <u>+</u> 1.01 <sup>b</sup>
Fat (%)	$36.49 + 0.51^a$	51.93 <u>+</u> 0.9 <sup>b</sup>
Protein (%)	$20.33 + 0.77^{b}$	9.46 <u>+</u> 0.6a
Ash (%)	2.02 <u>+</u> 0.28a	17.83 <u>+</u> 0.6a
Fibre (%)	$2.02 + 0.28^{a}$	1.7 <u>+</u> 0.34a
Nfe (%)	1.93 <u>+</u> 2.31 <sup>b</sup>	7.97 <u>+</u> 2.78 <sup>a</sup>

Table 2 shows the proximate composition of fluted pumpkin (*Telfaira occidentalis*) vegetable and water-leaves

(*Talinum triangulare*) used in soup meal preparation of "Edikang-ikong" (vegetable). The proximate composition of the unsqueezed vegetables soup (UNSVS), were as follows: Moisture (%) 18.02, Fat (%)36.4, Protein (%)20.33, Ash (%)2.02, Fibre (%)2.02 and Nfe (%)1.93 as against the nutrient composition of unsqueezed vegetable soup Moisture (%)11.11, Fat (%)51.93, Protein (%)9.46, Ash (%)17.83, Fibre (%)1.7 and Nfe (%)7.97, respectively.

Table 3: Nutrient composition of soups prepared from processed and unprocessed vegetables

Mineral	UNSVS (mg)	SVS (mg)
Folate (mcg)	10.95 <u>+</u> 1.6a	9.18 <u>+</u> 0.92a
Copper (mg)	12.04 <u>+</u> 1.75 <sup>a</sup>	13.05 <u>+</u> 0.15 <sup>a</sup>
Iron (mg)	0.92 <u>+</u> 0.05 <sup>b</sup>	$0.68 \pm 0.06^{a}$
Zinc (mg)	0.35 <u>+</u> 0.02 <sup>a</sup>	0.35 <u>+</u> 0.03a
Calcium (mg)	25.07 + 1.04	26.49 <u>+</u> 0.47a
carotene (mcg)	125.13 <u>+</u> 40.75 <sup>b</sup>	91.57 <u>+</u> 0.47a
Potassium (mg)	361.06 <u>+</u> 1.019a	342.77 <u>+</u> 8.01 <sup>b</sup>
Nitrogen (mg)	91.27 <u>+</u> 1.78 <sup>a</sup>	85.91 <u>+</u> 8.01 <sup>b</sup>
Phosphorus	45.13 <u>+</u> 3.58 <sup>b</sup>	40.76 <u>+</u> 2.18a

Table 3 shows the nutrient composition of fluted pumpkin (Telfaira occidentalis) and water-leaves (Talinum triangulare) used in soup meal preparation of "Edikang-ikong" soup (Efik), (vegetable). The proximate composition of the unsqueezed vegetables soup (UNSVS), were as follows: Folate (mcg) 10.95, Copper (mg) 12.04, Iron (mg) 0.92, Zinc (mg) 0.35mg, Calcium (mg) 25.07, Carotene (mcg) 125.13, Potassium (mg) 361.06, Nitrogen 91.27, (mg) Phosphorus (mg) 45.13 as against the unsqueezed vegetables; Folate (mcg) 9.18mg; Copper (mg) 13.05mg, Iron (mg) 0.68mg, Zinc (mg) 0.35mg, Calcium (mg) 26.49mg, Carotene (mcg) 91.57mg, Potassium (mg) 342.77mg, Nitrogen (mg) 85.91mg and, Phosphorus (mg) 40.76mg, respectively.

Table 4: Vitamin composition of soup meals prepared from processed and unprocessed vegetables

Vitamin	UNSVS	SVS
A(iu)	201.02 + 2.95a	166.75 <u>+</u> 3.72 <sup>b</sup>
C(mg)	4.18 <u>+</u> 0.95 <sup>b</sup>	2.66 <u>+</u> 0.39 <sup>a</sup>
E (mg)	$0.84 \pm 0.07^{a}$	0.65 <u>+</u> 0.07a

Table 4 shows the vitamin composition of fluted pumpkin (*Telfaira occidentalis*) and water-leaves (*Talinum triangulare*) used in soup meal preparation of "Edikang-ikong" soup (Efik), (vegetable). The proximate composition of the unsqueezed vegetables soup (UNSVS), are as follows: Vitamin A(iu) 201.02, Vit C (mg) 4.18 and Vit E (mg) 0.84 while that of squeezed vegetables were as follows: Vitamin A(iu) 166.75iu, Vit C (mg) 2.66mg and Vit E (mg) 0.65mg.

#### **Discussion of Findings**

There was a significant difference in the moisture content of unsqueezed (UNSVS) (18.02%) and the squeezed (SVS) vegetables used in the preparation of Edikang-ikong (vegetable) soup meals. This difference was due to the removal of water (Udofia and Obizoba, 2005; Watchap, 2005; and Oguche, 2010, 2012). The fat content of the soup meals was also different. The value of the fat content of the squeezed vegetables soup meal (51.93%) was higher than that of the unsqueezed soup meal (36.49%). This also was due to reduction in moisture content which led to increase in dry matter (fat) (Southgate, 2001). The protein content of the soup meals was different at p<0.05 in their protein content UNSVS (20.39%) and SVS (9.6%) respectively. This is due to the fact that fresh vegetables contain nutrients in abundance and the effect of processing (squeezed - washing) (Southgate, 2001 and Ene-Obong 2001). The ash content of the soup meals was also different. The ash content/value of the UNSVS was 21.2% while that of the SVS soup meals was 17.83%. This is showing the adverse effect of squeezed - washing (processing) on the ash content of the vegetables (Udofia and Obizoba, 2005). Fibre content of the UNSVS (2.02%) was higher than that of SVS (1.7%). This is due to the adverse effect of squeezed washing (that broke the fibres of the vegetables into tiny pieces. (Udofia and 2005; Obizoba, Southgate, 2001).Carbohydrate values of UNSVS (1.93%) and that of the SVS (7.97%) was significantly different. This was due to the moisture reduction and consequent increase in dry matter (Udofia and Obizobia, 2005, Oguche 2010, 2012).

The mineral value of the vegetables (folate) was not significantly different (UNSVS 10.95mcg vs SVS 9.18mg). This implied that squeezed washing did not reduce folate value. Copper (cu) value of the soup meals was not also different (UNSVS, 12.04mg and 13.05mg). This may be due to the fact that processing (squeezing-washing) does not affect minerals because they are fairly stable (Southgate, 2001). There was also no significant difference between the zinc content of the soup meals (UNSVS 0.3 mg and SVS 0.35mg). Similarly, there was no significant different in the calcium content of the soup meals (UNSVS 25.07mg and SVS 26.49mg). There was a significant difference in the value of carotene of the soup meals (UNSVS, 125.13mg and SVS 91.57mcg). This is due to the fact that carotene is easily affected during processing (Udofia and Obizoba, 2005, Watchap, 2005).

The potassium value of the soup meals differed significantly (UNSVS,

361.06 vs SVS, 342.77mg). This means that processing (squeezed - washing) had effect. This is contrary due the fact that processing does not have effect on minerals. The phosphorus values of the soup meals were significantly different (UNSVS, 45.13 vs SVS, 40.76 mg). Processing reduced phosphorus mean value in the soup meals. Nitrogen mean values of the soup meals (UNSVS, 91.27 mg vs SVS, 85.91mg). There was due to the fact that fertilizer was used in the production of the vegetable. Processing method reduce the nitrogen content. The effect of this processing method reduced nitrogen content of squeezed vegetables. This is good because nitrogen has effect on health of humans. Plants produced from nitrogen fertilizers, upon consumption, convert to toxic nitrates in the industries. These harmful nitrites react with hemoglobin in the blood stream to methaeglobinaemia, which damages the vascular and respiratory system, causing suffocation and even in extreme (http://homeguides.stgate.com).

Processing (squeezing-washing) decreased the vitamin. A mean values of the soup meals (UNSVS 201,22vs SVS 166.75 lu). This effect on the soup meals was because vitamins are easily affected during processing (Udofia and Obizoba, 2005, Southgate, 2001). The vitamin C content of the soup meals were significantly different UNSVS, 4.18mg vs SVS 2.66mg). This was because vitamin C is water soluble; as such squeeze washing reduced the vitamin c content of the SVS vegetable soup meal (Watchap, 2005, Oguche 2010 & 2012). Vitamin E content of the soup meals did not significantly differ (UNSVS, 0.84 vs SVS, 0.65mg). This was because vitamin E is not easily affected by processing method (Southgate, 2001).

#### Conclusion

Squeeze-washing of the vegetables had effect on the nutrient content of the soup meals. This was because it reduced the nutritional content of the soup meals. However, this method also reduces the nitrogen content of the vegetables, which is the major reason for this processing. However, fresh vegetables contain most of the nutrients in abundance, it should be consumed fresh. Therefore washing processing method for fluted pumpkin (Teltairia occidentalis) and water-leaf (Talinum triangulare)is not good while organic fertilizer is encouraged to be used instead of inorganic fertilizer that have effect on the human body (homeguides.stgate.com, 2017).

#### Recommendations

- 1. Vegetables are at their best for consumption when fresh.
- 2. Farmers should use organic fertilizers (animal dungs) to produce these vegetables for health purposes.
- 3. squeeze-washing should not be used as a processing method for water leaves and fluted pumpkins.
- 4. shade-drying should be used, since it retains more nutrients.

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#### Household Budgeting Practices Needed By Spouses in Enugu State

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#### Abstract

The major purpose of this study was to explore the budgeting practices needed by spouses in Enugu State. Specifically, the study identified factors the spouses should consider in making household budget and procedures spouses should adopt in making household budget. Descriptive research design was adopted for the study. It was carried out in Enugu State. The population for the study was 8,791 married teachers in the area of study. A sample size of 382 was seletcted using multi-stage and random sampling techniques. Questionnaire was used for data collection. Mean and standard deviation were used for data analysis. The findings revealed 12 factors to consider in making a household budget in Enugu State. These include among others, considering the sources of income of the household, considering the money available to the household, consider the size of household, consider time and season of the year. It also identified 13 procedures spouses should adopt in making household budget in Enugu State. These include taking inventory of all available and potential resources, expenses of the household members, expected/available income spent by the spouses; estimate the cost of the needed expenses to be made by the spouses. Three recommendations were made. These include spouses should create joint account as a panacea for eliminating financial infidelity in the family; spouses should endeavour to avoid creating communication gap; spouse should take household budgeting seriously to enable the household make rational and reasonable expenses.

Keywords: Household, Money, Management, Budgeting/Planning, Spouses.

#### Introduction

A household is a group of persons who are related, sharing food, and utilities, found living in the same roof at a given period of time, pursuing individual and/or collective goals. A household is referred to as a person or group of persons related or unrelated, who live together in the same dwelling, unit,

who make provisions for food and regularly take their food from the same pot or share the same grain store, or who pool their income together for the purpose of purchasing food (Isaac, Ephraim, and Chibwana, 2004). OECD (2013) stated that a household is defined as a group of persons who share the same living

accommodation, pool some or all of their income and wealth together, and consume certain types of goods and services collectively.

Money is one of the resources available to households for meeting their needs. This resource is very important because it serves as a medium of exchange. Money is also sought for three other basic reasons which include transactionary reason, that is, for day-to-day household expenses, precautionary reasons, for household emergency purposes, and speculative reasons, for investment purposes. In order to make the best out of available money, households must necessarily manage the resource (money) properly.

Management is defined as the process of assembling and using sets of resources in a goal directed manner to accomplish tasks in an organization (Hitt, Black and Porter, 2020). Management according to Griffin (2013), is a set of activities which includes planning and decision making, organizing, leading, controlling, and evaluating an organization's resources (i.e human, financial, physical and information), with the aim of achieving organizational goal in an efficient and effective manner. Management involves planning, organizing, implementing and evaluating the use of money (Anyakoha, 2015). Money management Ibrahim According to (2012),important without as planned expenditure, it is not possible to achieve sustainability financial household. Planning is a major and primary function of management. No household can operate properly without planning the use of their money. Sharma (2020) stated that planning is the preparatory step for action and a systematized pre-thinking determining a course of action to achieve some desired results. Planning is also the process by which the spouses of a household set objectives, make an assessment of the future, and chart the courses of action, with a view to achieving the household goals. Sharma (2020) continued by stating that a perfect plan can increase profits to their optimal level. Planning household money involves practices such as identifying the family needs, establishing priorities among goals, identifying the resources available to the family and deciding on those to be used in meeting the identified needs or goals and many others. A plan normally requires a number of activities for achieving the goals. These activities need to be organized.

Organizing involves the practices of sharing responsibilities among the household members and delegating authority as well as scheduling and synchronizing activities. Organizing according to Louis (2011) is the process of identifying and grouping the work to be performed, defining and delegating responsibility, authority establishing relationships for purpose of enabling people to work most effectively together in accomplishing objectives. involves practices such as setting up measurable sub-goals, determining who pays the bills, makes the purchasing decisions, who does the shopping and keeps records for the proper implementation.

Implementing is the third in the ladder of management process. entails putting the plan into action. Implementing is the act of carrying out execution or practice of a plan, a method, or policy for doing something (Margret, 2015). The author further stated that implementing is the action that must follow any preliminary thinking in order for something to actually happen. Implementing involves checking the budget regularly, eliminating waste, comparing prices and qualities of goods in different shops before buying and many others. This will make for easy evaluation.

The final stage in management process is evaluating the whole process. Evaluating is also a process of analyzing a completed or ongoing activity that determines or supports management effectiveness accountability, efficiency (Anyakoha, 2015). Evaluating involves practices such as the appraisal of the entire management procedure, that is the planning, organizing and implementing processes, apprasaisal of the performance, checking how effectively the household resources have been used in meeting the family goals. At this stage, assessments are made to see the problems encountered the mistakes made for purpose of learning and avoidance of future occurrence. Evaluating also ensures adjustment where necessary. Salaried spouses like teachers need to learn good budgeting practices so as to keep track of household finances.

Budgeting is the process of creating a plan to spend money, creating this spending plan allows one to determine in advance whether one will have enough money to do things one needs to do or will like to do. To Billy (2020), budgeting is simply balancing one's expenses with one's income. If one fails to balance and spend more than they earn, they slowly sink into debt every year. Billy (2020), further stated that if one does not have enough money to do everything one has in mind, the individual should use this planning process of prioritizing one's spending and focus the money on the things that are most important. Budgeting is a plan for spending and saving money. Budgeting according to Akhiles (2019) is an estimation of revenue and expenses over a specified future period of time and is usually combined and reevaluated on a periodic base. A household budget is the plan for future expenditures of a given household. Budgeting involves practices such as considering the sources of income of the household, considering money available the household, considering the regularity of income to the household, among others. Budgeting calls for consideration of certain factors and involves some procedures. There are certain factors that influence budgeting in the household Anyakoha (2015). These factors are household values, needs and wants of the household. Value is a measure of work; one's value represents one's belief or view of what goals that are important or desirable. Value influences the choice one makes among alternatives. Anyakoha (2015) went further to list the examples of values as freedom, peace, comfort, integrity, orderliness, courtesy, love, respect, patience, among others. These values are not seen but can be

recognized in behaviour Okpala (2006). Needs on the other hand are those reasons or motivations for household management which influence the actions of members of the household. Every household has peculiar needs and so requires a general or acceptable procedure needed to be adopted in making a household budget. It is in the light of this that Ibrahim (2012) stated that it is wise to establish a good money management procedures at an early stage.

The following the ways are procedures for making budgeting: estimating the expected family income, determining expenses, making estimate of expenses to be made and finally creating a plan for action (Anyakoha, 2015). When individuals and households consider the factors and follow the procedures, these constitute budgeting practices. The budgeting practices therefore consider important factors in budget making and following the necessary practices. It is important to make a budget before spending money. This is because budgeting helps in controlling one's spending, tracking one's expenses, helping one to save more money. Zach (2018) viewed budgeting as the process of helping one to make better financial decision, prepare for emergencies, get out of debt, and stay focused on one's longterm financial goals.

In a household, the key persons who earn income for the household are the spouses (husband and wife). Spouses are husband and wife joined together to build a family, Kembe (2005). The spouses need to work together in ensuring effective management of

household finance for effective family living. This effective management by spouses is very crucial when both of them are wage earners like the teachers, and need to live within limited income. Teachers in secondary schools lack training in money management as they fail to budget or do so ineffectively. Teachers in secondary schools buy goods and services on credit before they get their pay/salary. This habit has thrown many teachers into huge debt. Hence they need to learn and adopt workable budgeting practices so as to come out of debts, make better financial decisions and solve many others problems. When spouses fail to manage finances effectively, encounter problems. Evidence abound that financial management practices adopted by spouses have been one of the areas of household conflicts in this area of study. Offiong (2017) posited that marriages in the area of study are numerous besieged by financial constraints that lead to divorce, marital disharmony, hatred, uncertainty, hostility, lack of love, lack of respect, lack of trust and many others.

Reports from the Social Welfare in Nsukka Local Government Area of Enugu State (2019) indicate that there are high rate of marital conflicts between spouses occasioned challenges relating to management of household finances. Moreover, the spouses do not have any form of training or orientation on family finance management practices. They therefore have problems and need help. It is then necessary to find out budgeting practices needed by the spouses in

order to avert marital conflicts in Enugu State.

#### Purpose of the Study

The general purpose of the study was to explore budgeting practices needed by spouses in Enugu State. Specifically, the study determined:

- 1. Factors spouses should consider in making household budget in Enugu State.
- 2. Procedures spouses should adopt in making household budget in Enugu State.

#### **Research Questions**

- 1. What are the factors spouses should consider in making a household budget in Enugu State?
- 2. What are the procedures spouses should adopt in making a household budget in Enugu State?

#### Methodology

**Research Design:** Descriptive survey was adopted to seek the opinion of the respondents on budgeting practices needed by spouses in Enugu State.

Area of the Study: The study was carried out in Enugu State. Enugu State is in the South East geo-political zone of Nigeria. The State is made up of three senatorial Districts namely: Enugu North, Enugu East and Enugu West. Enugu North comprises of six local government areas: Igbo-eze North, Igbo-eze South, Udenu, Uzo-Uwani, Nsukka and Igbo-etiti. Enugu East is also made up of six local government areas: Isi-Uzo, Enugu East, Enugu South, Nkanu West, Nkanu East and Enugu North while Enugu West is made up of five local Government

areas: Udi, Ezeagu, Oji River, Awgu and Aniri local Government areas. Enugu State therefore, is made up of 17 local government areas. The study covered all the 304 public secondary schools in Enugu State.

Population for theStudy: The population for this study was 8,791 teachers. This was gotten from Post Primary School Management Board and Science, Technical and Vocational Management Board Enugu State, (2019). This population consisted of 2,356 married male and 6,435 married female teachers in secondary schools in both urban and rural areas of Enugu State. The minimum education qualification level of the respondents is NCE and who are within 26-60 years of age, and whose income is within thirty-five thousand naira (₹35000) and above.

Sample for the study: The sample size for the study was 382 teachers. A multistage sampling technique was adopted to select this sample size. In stage one, purposive sampling technique was used in the six educational zones that make up Enugu State for the study. In stage simple random sampling technique was used to select ten percent (10%) out of 304 public Secondary schools in Enugu State, giving rise to a selection of seven schools, from Nsukka Educational zone, five from Agbani Educational zone, six from Educational zone, five from Obollo-Afor Educational zone, four from Enugu Educational zone, and six from Awgu educational zone. These gave a total of 33 schools. In stage three purposive sampling technique was used to select only married teachers. This gave rise to a selection of 88 married teachers from

Nsukka Educational zone, 55 married teachers from Agbani Educational zone, married teachers from Udi Educational zone, from Obollo 55 educational 52 from Enugu zone, 66 Educational zone, from Awgu Educational zone. These selections were made from both urban and rural areas.

Instruments for Data Collection: A 4point scale questionnaire was used for data collection. It was developed through literature review and based on the specific purposes of the study. The instrument was made up of three sections which are sections A, personal data of the respondents, section B, the factors to consider making a household budget, section C, steps / procedures needed to be adopted in making a household budget in Enugu State. The instrument was validated by three experts from the department of Home Economics and Hospitality Management Education, and reliability co-efficient of 0.77 obtained based on the experts' ratings of the questionnaire items and this was adjudged to be reliable.

Data Collection Method: Three hundred and eighty two (382) copies of the questionnaire were distributed to the respondents by hand, with the help of trained research assistants. All the 382 copies were duly completed and returned. This represents 100% return rate.

Data Analysis Technique: The data analyzed using mean standard deviation. Any item value of 2.50-4.0 mean (X) considered factors or procedures needed by spouses in making a household budget. Items with mean scores of 1.50-2.49 were considered moderately needed factors procedures spouses consider in making a household budget while any item less than 1.50 were considered not needed factors or procedures spouses in making a household budget.

#### **Results:**

The results obtained from the study were presented as follows:

Factors spouses should consider in making household budget in Enugu State.

Table 1: Mean Responses on the Factors Spouses Need to consider in Making a Household Budget in Enugu State

S/N	Factors to consider in	•		•	•		•	Overal	1	
	making a household budget	$\overline{\overline{X}}_1$	$SD_1$	Rm	$\overline{\overline{X}}_{2}$	$SD_2$	Rm	$\overline{\overline{X}}_3$	$SD_3$	Rm
1	Sources of income of the household	3.62	0.55	HN	3.61	0.56	HN	3.61	0.56	HN
2	Money available to the household	3.58	0.65	HN	3.57	0.58	HN	3.57	0.61	HN
3	Goals of the household	3.38	0.69	N	3.45	0.63	N	3.42	0.66	N
4	Priorities among household needs/goals	3.34	0.72	N	3.26	0.77	N	3.29	0.75	N
5	Regularity of income to the household	3.38	0.69	N	3.45	0.63	N	3.42	0.65	N
6	Size of household	3.31	0.70	N	3.38	0.76	N	3.36	0.73	N

7	Family values	3.18	0.85	N	3.25	0.87	N	3.23	0.86	N
8	Time and season of the year	3.39	0.82	N	3.35	0.76	N	3.36	0.78	N
9	Health of members of the household	3.39	0.75	N	3.39	0.74	N	3.39	0.74	N
10	Number of other dependants on the household	3.19	0.71	N	3.26	0.75	N	3.23	0.73	N
11	Location of the family (environment)	3.08	0.89	N	3.08	0.88	N	3.08	0.88	N
12	Effective communication among spouses.	3.68	0.05	HN	3.79	0.47	Н	3.75	0.52	Н

NB: SD=Standard Deviation; N= Needed; HN= Highly Needed; Rm= Remark

Table 1 shows the factors which the spouses need to consider in making a household budget in Enugu State. The result revealed the respondents in all the 12 items in Table 1 are the factors to be considered in making a household budget.

Procedures spouses should adopt in making household budget.

Table 2: Mean Responses on Procedures Spouses Need to Adopt in Making Household Budget in Enugu State

S/N	Procedures Spouses Need to Adopt in					Overall				
	making household budget	$\overline{\overline{X}}_1$	$SD_1$	Rm	$\overline{X}_2$	$SD_2$	Rm	$\overline{\overline{X}}_3$	$SD_3$	Rm
1	Take inventory of all available and potential resources	.05	0.85	N	.09	0.77	N	3.08	0.79	N
2	List the expenses of the family members.	3.31	0.74	N	3.23	0.80	N	3.26	0.78	N
3	Estimate expected/available income spent by the spouses.	3.42	0.70	N	3.39	0.77	N	3.40	0.75	N
4	Estimate the cost of the needed espenses to be made by the spouses.	3.25	0.78	N	3.28	0.66	N	3.26	0.71	N
5	Decide on how and when the resources will be used to meet the family needs.	3.16	0.87	N	3.22	0.74	N	3.19	0.79	N
6	Decide on the resources to be used in meeting the identified needs/goals	3.21	0.76	N	3.37	0.68	N	3.31	0.72	N
7	Balance the family income and the family expenditure by both spouses	3.34	0.78	N	3.40	0.74	N	3.38	0.76	N
8	Develop a flexible budget so as to provide a means of meeting the numerous family needs such as immediate, long term and	3.28	0.84	N	3.26	0.82	N	3.27	0.82	N
0	emergencies.	2.20	0.66	N.T.	2.24	0.76	N.T	2.26	0.72	N.T.
9	Develop a plan	3.39	0.66	N	3.34		N	3.36	0.73	N N
10 11	Identify spouses' individual needs.	3.30	0.78	N	3.17	0.79	N N	3.23	0.79	
	Make allowance for flexibility.	3.18	0.79	N		0.76		3.12	0.77	N
12 13	Eliminate spouse's argument about finances.	3.25	0.73	N N	3.17 .91	0.82 1.04	N N	3.19	0.70	N N
13	Have a joint account for monitoring the inflow and outflow of the income of the spouses	3.12	0.95	1N	.91	1.04	1N	2.99	1.01	IN
	ND CD Ct 1 1D 't' N N N 1 1 1 INI	TT. 1		1.0	D	1				

Table 2 reveals the respondents' responses on the procedures spouses should adopt in making a household budget. It was unanimously agreed upon that the thirteen items are the steps or procedures needed to be adopted by the spouses in making a household budget.

#### **Discussion of Findings**

The study established factors spouses should consider in making a household budget in Enugu State. Some of them include: considering the sources of income of the family, considering money available to the family, effective decision making in selecting the goals establishing priorities, effective communication among spouses concerned while planning activities to be carried out among needs / goals. The findings of this study are in agreement with Anyakoha (2015) which stated that points needed to be considered when making a household budget are family values, needs and wants among others. Other factors that need to be considered as outlined by Kin (2018) include: establishing the family goals, calculating household income, prioritizing debts, determining needs and wants of the family, documenting expenses and additional income to the family to eliminate financial infidelity among others. The findings of this study also agrees with Poduska (1993) who stated that effective communication about family finances critical goals is to money management. Ibrahim (2012) also stated that the family financial planning is important to maintain a stable financial household. This means that the neglect of these needed household financial practices by spouses throws the family into family financial chaos capable of truncating the peace and stability of the household, thus negotiating for family violence, the result of which is usually disastrous. Okwoh and Kpelai (2008), maintained that planning involves analytical process which involves the assessment future, the of the development of alternative courses of action to achieve such objectives and the selection of course or courses of actions from among the alternatives. Kenyon and Border (2004) asserted that the best way to achieve financial sustainability is to create a budget and develop a spending plan to get rid of debt and save money. The authors went ahead to state that the act of creating budget will allow one to see one's current status as well as where financial expenses can be cut out.

Research question two identified the procedures spouses should adopt in making household budget in Enugu State some of which included: taking inventory of all available and potential resources, listing the expenses of the family members, estimating expected / available income spent by the spouses, estimating the cost of the needed expenses to be made by the spouses, among others. The findings are in agreement with Muhammed (2016) who stated that planning family finance. It involves such practices as identifying family goals, formulating strategies to achieving them, creating the means required, monitoring, directing and controlling all steps in its proper

sequence. The findings of this study is also supported by (Anyakoha, 2015) where she mentioned steps in making household budget as setting a realistic identifying one's goals, income, separating needs and wants, designing your budget, among others. The study also agrees with Woody (2018) who stated that before you begin to manage your money, you need to identify what is important to you. Marshell, and Vann (2014) asserted that hhealthy financial management in a relationship involves learning how to spend and manage your money wisely, using communication and conflict management skills, building maintaining a strong foundation of trust with your spouse. Marshell, and Vann (2014) further stated that spouses who communicate openly and don't spend more than they earn tend to be happier and more stable in their relationships. The authors went ahead to state that spouses who struggle with financial issues often have increased stress and tension in their relationships. Jaggernath (2018) also affirmed that how we use our money should be determined by what is important to us, and the goals we have for our future, not by what others are doing. Josephine, Nayada, Vervil and Michael (2008), assert that a good spending habits foster financial security, develop wise use of money and extends one's buying power.

#### Conclusion

Based on the findings of the study the following conclusions were drawn: The present level of economic hardship and recession requires in-depth knowledge

financial budgeting/planning practices by spouses to mitigate the rising cases of household conflicts, which this study has revealed, are caused by inability to adopt the needed household finance planning practices by the family custodians (spouses). Based on the findings of this study, the spousal teachers in Enugu State need to adopt the planning practices needed for the management of household finances which include effective communication while planning activities to be carried out, considering sources of income to the family, listing the expenses of the family members and many others.

#### Recommendations

Based on the findings of this study, the following recommendations were made.

- 1. Spouses should create joint account as a panacea for eliminating financial infidelity in the family. Joint account helps in instilling household financial discipline.
- 2. The spouses should endeavour to avoid creating communication gap. Every household should be able to communicate effectively about household and individual needs in order to erase any form of financial mismanagement that may cause family conflicts
- 3. Spouses should take household budgeting seriously to enable the household make rational and reasonable expenses.

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### Showcasing Creativity in Home Economics through Utilization of Social Media for Entrepreneurship Development

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#### **Abstract**

The entire principle of Home Economics is to help persons acquire valuable life skills through different means for creativity that will lead to sustainable livelihood through improved economy for the individual, family and the society. Interestingly, methods and times are changing due to the engagement of information communication technology (ICT) via social media on a personal or professional level, or both. This paper focuses on the social media as a feasible tool to showcase the creativity in areas of Home Economics. It covers: technology impacting creativity; some issues in Home Economics; social media concept; types of social media to be utilized in Home Economics; areas of Home Economics that can be promoted via social media; constraints to promotion of Home Economics activities via social media; ameliorating strategies for challenges to enhancing the showcasing of creativity in Home Economics through social media. It made seven recommendations for showcasing creativity in Home Economics through utilization of social media for entrepreneurship development. These recommendations include, among others, social media should be added to the Home Economics school curriculum, teachers should integrate social media learning into existing projects and activities in a more ad hoc basis by individual teachers who have media know-how.

**Keywords**: Technology, Social, Media, Home Economics, Creativity, Entrepreneurship

#### Introduction

Sustainable Development Goals (SDGs) started as a result of the fact that Millennium Development Goals (MDGs) were not fully achieved at the set time in 2015. The SDGs constitute gallant commitment to finish what was started by the MDGs, and tackle some of the more pressing challenges currently facing the world. All 17 Goals

are interconnected. This means success in one affects success of others. Dealing with the family challenges impact show to manage the fragile natural resources, achieve gender equality or better health, eradicate poverty, and fostering peace and inclusive societies will reduce inequalities and help economies prosper (Food and Agriculture Organization of the United Nations (FAO, 2018). The

national and international Non-Governmental Organisations (NGOs) through the sustainable development goals partners are committed to ending good nutrition, poverty, hunger, promoting good health, well-being and gender equality, providing water and sanitation for all, promoting developing sustainable consumption and production patterns.

the introduction Globally, and communication information technologies (ICTs) has brought huge changes in the approach of idea and responsibility at home and in business circle, in education institutions and in the society especially in developing countries. There had been of introduction of various types systems information and the implementation of policies to facilitate the integration of new technologies in teaching and administration of new curricula (Karen, 2009; Jaffar, Jaffar, Mohammad and Shaher. Sustainable development is a national and global commitment to assist many countries especially the under developed and developing countries achieve sustainable life. This requires that information on global evolution its evolving strategies made available for people and especially for the Home Economist to understand the rights, responsibilities, strength, weaknesses, opportunities and threats (SWOT) for the ever emerging goods and services. The emerging technologies are making the world to be on "information super high way" (ISHW), digitalization. The Economist must possess the ability and capability to operate on the ISHW. The information super high way requires knowledge of information communication technology (ICT) for the Home Economist to soar high using digitalization to make immense impact on research, teaching, goods and influence services and better consumption patterns and practices. It has been emphasized that the use of computers, internet, geographical information systems (GIS), mobile phones, as well as traditional media such as radio or TV can promote creativity, innovations and research for sustainable development (Rahman, and Fong, (2016; Technical Centre for Agricultural and Rural Cooperation (CTA) (2016). The world is a global village where information flows 24/7. Some of the sources and information may be traps, but there can be no current and timely information for promoting creativity, innovation and findings for research sustainable development without the use of ICTs. This calls. It is thus very important for Home Economists to embrace ICT as a tool in social media for discussing all the potential areas of Home Economics. Technology can help the right person become more creative and open up more possibilities (Pippa, 2017). The actual creativity is still up to the person using the technology. Technology is a great thing that has helped the world in many ways (Afërdita, 2015). Many people believe that the epoch of technology has changed many mindsets in different approaches (Gudanowska, 2017; Sakovich, 2018). One of the most commonly asked questions is, has technology affected creativity? Technology does not suppress

creativity, in fact, technology enhances creativity. The difference between the two is that creativity comes from observing the world, interpreting it and bringing new concepts and ideas. Technology enables one to see the world differently, accessing information from anywhere in the world. Interestingly, the truth is that technology and creativity go hand in hand, and complement each other, enabling people to be more creative and productive. Home Economists ought to be creativity. They also need to be aware of technology with all it makes available in terms of social media and utilize same most appropriately.

This paper therefore focuses on:

- Technology impacting creativity;
- Issues in Home Economics
- Social media concept;
- ❖ Types of social media to be utilized in Home Economics
- ❖ Area of Home Economics that can be promoted via social media;
- Constraints to promotion of Home Economics actives via social media.
- ❖ Ameliorating strategies for challenges to enhancing the showcasing of creativity in Home Economics through social media.
- \* Recommendations.

#### **Technology impacting creativity:**

Innovation: Innovation happens by continuously improving a process or product and technology has contributed in improving many of these. Technology is changing the face of innovation. However, as a business, it is important not to place technology at the forefront of innovation, since relying on technology solutions can, at times,

hinder innovation, especially with challenges of under development.

Emerging Tools: It is important to highlight the different tools that have emerged through technology, such as 3D printing, digital content creation and other forms of digital interaction. These give individuals opportunities to explore new things and to express themselves in various ways.

Accessibility: Technology has enabled the world to have high vision. Thus technology has supported creativity in many ways. It promotes progressive desire to invent and to create. With technology people can enter new opportunities easily and connect with information and people around the world.

### Some Issues Relating to Home Economics

Concept of Home Economics: Home Economics can be conceptualized as the combination of human development, social responsibility, a healthy life-style, sustainable use of scarce resources and cultural diversity. Home Economics, as a field of study that deals with the relationship between individuals, families, communities, and environment in which they live, which teaches people of all genders important skills for sustainable (Aburime and Uhomoibh. 2010). Home economics has a wide scope in the areas which go beyond Food and Nutrition, Home Management and Clothing and Textile and cover all areas of human life. The overabundance of names proposed included Domestic Science, Living Science, Home Science, Home Science Education, Human Ecology,

Human Sciences, Practical Life Studies, Household Technology, Science Living, **Family** and Household Nutrition Education, Family and Studies, family and Consumer Education (Anyakoha, 2013). Home Economics is so verse in scope of areas including globalization, food security, local food systems, sustainability, ethical technology, consumption, quality of life, food and nutrition, textiles and clothing, shelter, health and wellbeing for individuals, families and within communities. Home Economics continues to evolve as issues relating to individuals, families and society evolve. It is a borderless field of study to build up a unique multidisciplinary body of knowledge that relates to family and related issues. The bordlessness of Home Economics and it consequent multidisciplinary nature has extensively explored (Anyakoha 2013). All these areas can be projected to the world through social media.

Importance of Home Economics: The importance of Home Economics as an entrepreneurship skill acquisition to the family and the society cannot be overemphasized (Meludu and Njoku 2009; Meludu and EwebiyiI, 2010). It teaches the family consumer economics, how to plan, cook, serve and eat healthy food based on the transdisciplinary nature Meludu, (2014).It helps members of the family prepare for their expected roles in the society, helps the family to manage their homes and resources effectively and also train family members in child care. As the world is becoming dynamic as a village, it requires the application of ICTs skills to go virtual online through the use of social media and this has been embraced by the Home Economics for sustainable living. The following contemporary issues can be tackled from Home Economics perspective through social media:

- Poverty alleviation issues and challenges;
- Resources development, decision making and management;
- Food security and nutrition, malnutrition and hidden hunger;
- Food safety, hygiene and sanitation;
- Capabilities in consumer education and consumerism;
- Hospitality and tourism dynamics issues;
- Life style, grooming, noncommunicable diseases and family health issues;
- Textile for industry and fashion merchandizing;
- Shelter, housing and interior decoration;
- Environmental and climate change issues
- Value addition development and Commercialization of agriculture
- Communication for development and use of ICT
- Rural development issues and challenges
- Capabilities for Entrepreneurship development
- Gender and generational issues
- Curriculum development and education for industry participation and
- Peace and conflict resolution

## Social media concept

Social media allows relationship forming between users from distinct

backgrounds, resulting in a tenacious social structure (Hyesun, Kee-O, 2015). A prominent output of this structure is the generation of massive amounts of information, offering users exceptional service value proposition. However, a drawback of such information overload is sometimes evident in users' inability to find credible information of use to them at the time of need (Hyesun, Kee-O, 2015). Social media sites are already so deeply embedded in everyday lives that people rely on them for every need, ranging from daily news and updates on critical events to entertainment, connecting with family and friends, reviews and recommendations products/services and places, fulfillment of emotional needs, work place management, and keeping up with the latest in fashion. consumer and consumption issues, health and related issues, entrepreneurship development and general life challenges. The social networks are considered as another communication channels that enables people especially the younger generation communicate, share ideas and resources, become creative and acquire skills. The features that are included in these social networks which add benefits for educational environment and encourage teachers and students for more interactive and value added for academic performance entrepreneurship development. The idea is to show why these social media catch the attention of universities' students, so quickly. Social network sites get more attractive to join as more people use them. There are several reasons why people are expect to see

digital social networks adopted in the creative domains, relating to common characteristics of creative activity for sustainable living.

# Research, entrepreneurship and social networking

Research revealed that both entrepreneurship and social networking significantly promote regional economic growth in China. Additionally, the effect of entrepreneurship significantly enhanced after introducing the joint effects of entrepreneurship and social network. Entrepreneurship and social networking exhibit the strongest potential for economic development of the respective Besides areas. entrepreneurship, social networks also play an important role in economic theories. Research has focused on the impact of individual social networks or corporate social networks on output, performance and efficiency on a resource-based view (Yin, Li, Yang, 2015; Li, Zhao, Xue, 2018). Research has shown that social networks comprise a valuable resource, including construction of valuable connections Long-Wang, (Feng-Wen, KaiWang, Sang-Bing and Ching-Hsia, 2018) and the management and resources sharing in rigorous networks, which revolve to assist the associates, accomplish their individual or organizational goals. In general, social network postulation focuses on the vigor and interaction of relationships among network associates. With the attractiveness of mobile internet and the development of information technology, researchers start to pay more attention to social networks at the macro- or regional level.

Social networks are expected to include trust, regulation, and relationship networks, which, when combined, promoted the operational efficiency of social organizations.

## Importance of social media

The use of social media is increasing in society which is reflecting the human expression and recognition. According to Feng-Wen, Long-Wang, KaiWang, Sang-Bing and Ching-Hsia, (2018), the social interaction with educational process have been influenced by the availability of modern techniques of social media. These techniques of social media results to a high-quality learning outcomes among students because it provides more than one channel to communicate with other party to gain and enhance the knowledge, therefore it has a great function to develop the educational progression. Social media have contributed in recent years a for revolution. both its fast generalization and by extension its successive utilization (Feng-Wen, Long-Wang, KaiWang, Sang-Bing and Ching-Hsia, 2018). It is a revolution that is similar only with the introduction and acceptability of e-mail, due to its power to alter human relationships through the network. Therefore, social media have increasingly become powerful interaction between different spaces, some increasingly specialized social groups, where it is possible to get to know people who share the same interests or reacquainted with them (Alwagait, Shahzad, Alim, (2015).

# Types of social media that can be utilize in Home Economics

Interestingly, there is a wide range of social media in which Home Economic activities could be demonstrated. Social media, applications such as Facebook, WhatsApp, Twitter, YouTube, LinkedIn, Pinterest, and Instagram are the most commonly used. applications are driven by generated content, and are highly influential in a myriad of settings, from purchasing/selling behaviours, entrepreneurship, political issues, to venture capitalism (Greenwood and Gopal, 2015). As of April 2017, Facebook enjoys the exalted position of being the market leader of the social media world, with 1.97 billion monthly users (Statista, 2017). In addition to posts, social media sites also have a lot of photo and video uploads and according to the recent numbers, about 400 million snaps a day have been recorded on Snap chat, with around 9000 photos being shared every second. While 50 million businesses are active on Facebook business pages, million businesses are using Facebook advertising. Apparently, 88% businesses use Twitter for marketing purposes (Pippa, 2017). In 2019 Facebook is still enjoying the exalted position of being the market leader of the social media world, with more 2.97 billion monthly users. Many of these domains relate to create activity, for example, the world's largest photo sharing site, Instagram, the sharing site, Sound Cloud, the online publishing site Medium and Chinese social network, Douban, which

related to film, books and music(Fritsch, and Wyrwich, There is also GitHub, the largest open source collaboration and code sharing site, Thingiverse, the largest 3D printer design community for discovering and sharing 3D models, and Open Processing, the algorithmic design sharing site - all of which have social network functionality. Ello, a privacycentred social network, has become a home for individuals showcasing creative projects, and there is also the Dots social network, focused on creative workers and companies (Fotopoulos, and Storey, 2017).

# Areas of Home Economics that could be promoted via social media

The use of social media to showcase what the Home Economists are doing in promoting creativity, innovation and research for sustainable development is very crucial in this digital age. Goods and services are well presented and sold on social media. Such as YouTube, Facebook, Instagram, Twitter, whatsApp, wechat, Qzone and Tumbir. It is used to create awareness on functional food, recipe development, new clothing designs, consumer education, market and shop products, promote brands, connected to current customers and foster new business which can promote sustainable development. Therefore, Fashion merchandising, food preparation, menu/catering services, diet therapy, cosmetology, nutrition education, food processing and preservation are the areas of Home Economics that are already promoted via social media to showcase creativity and entrepreneurship, which should continue.

# Constraints to promotion of Home Economics activities via social media

There are many security risks with social media and youth may think they know it all, some people thought, but adulthood has set straight on many issues. Interestingly, it may be people's children that are helping them set up their new device, but that still does not mean these children know how to manage the information they encounter and how to protect themselves. This is why some people are confused as to why mandatory social media classes have not been implemented in public and private schools.

Academics and practitioners have explored and examined the many sides of social media over the past years. Organizations engage in social media mostly with the aim of obtaining feedback from stakeholders. Consumer reviews are another big part of social media, bringing issues of information quality, credibility, and authenticity to the forefront. To a large extent, online communities have been successful in bringing together people with similar interests and goals, making the concept of micro blogging very popular. While most messages exchanged on social media sites are personal statuses or updates on current affairs, some posts are support seeking, where people are assistance looking for and help. Interestingly, these have been recognized as socially exhausting posts that engender social overload, causing other members to experience negative behavioural and psychological

consequences, because thev feel compelled to respond. Given the relevance of social media to various stakeholders, and the numerous consequences associated with its use, social media has attracted the attention of researchers from various fields, including information systems and Home Economics.

There is also an additional barrier that needs to be overcome, as many teachers themselves are not social media knowledgeable (inclined) and would need to be better educated on the topics and how to integrate social media lessons into the curriculum. There are other limitations with social media which include high cost of data subscription to operate, poor network, lack of power supply (electricity), illiteracy/operation skills, hacking and defrauding of the operators of the social media outfits and lack of awareness on the existence of social media site opportunities by the Home Economist.

## Ameliorating strategies for challenges to enhancing the showcasing of creativity in Home Economics through social media

There are many challenges to enhancing the showcasing of creativity in Home Economics through social media. These include, among others, that many of the practitioner may not be aware and knowledge in social media and related issues. Others may not even interested. Other challenges may include, high cost of data subscription to operate; poor network; lack of power supply (electricity; illiteracy/operation skills; hacking and defrauding of the operators of the social media outfits; privacy fraud/scam; lack of awareness on the existence of such site opportunity by the Home Economists with social media.

Ameliorating strategies could include:

- Buying data in bulk and if there will be reduction in the cost of data;
- Upgrading the individuals system, and locating where the internet access is high;
- Using alternative energy sources, such as solar energy to facilitate the business/activity;
- Training on how to be social media mobile and acquiring skills to operate ICTs that are used to facilitate the operations in social media;
- ❖ Being able to relate to the beneficiaries of the activities being performed in the social media;
- Acquiring necessary capabilities that could be applied to prevent being scammed or be defrauded;
- Putting in place policies that could improve the legal system for venture capital investment and promote the development of information technology protection;
- Training and awareness creation for Home Economists on awareness on the existence of social media site opportunities to engage in for several activities including entrepreneurship.

## Conclusion

The main contribution of this paper is to showcase the creativity in Home Economics through utilization of social media. It explored the different areas of Home Economics already on social media that can impact on on regional, national, family and individual economic growth. There are many online activities especially in the 4. areas of food preparation, clothing construction and fashion merchandising, interior decoration, cosmetology and many others which anybody can tap for self development. The following social networks, such as Instagram, Facebook, Twitter, WhatsApp, Zoom and YouTube have affected behavior. the academic performance of the Home Economics students, social and entrepreneurial development in Home Economics. Therefore, the Home Economists are now utilizing the social media to showcase creativity in the different areas and play a significant role in economic promoting growth and sustainable development individual, family and the nation. Hence, the Home Economists should consciously make the most of the different social media to function.

## Recommendations

Eight recommendations for showcasing creativity in Home Economics through utilization of social media entrepreneurship development:

- 1. Policy makers should establish and improve the legal system for venture capital investment. They should also promote development the information technology as well as multi-level carrv out training. Challenges facing the use of social media should be addressed.
- 2. There is the need to offer cyber security training for the prospective users of social media to be more secured.

- entrepreneurship and social networks \( \beta \). Prospective users should stop using some platforms that they do not have faith in to avoid financial risks
  - Social media should be added to the Home Economics school curriculum. This will equip students to be well aware of how their actions and posts now could affect them in the future and how they can best protect themselves.
  - Teachers should integrate social media learning into existing projects and activities in a more ad hoc basis by individual teachers who have media know-how.
  - Home Economics teachers themselves should be knowledgeable of social media capabilities. They need to be better educated on the topic and how to integrate social media lessons into the curriculum.
  - Government should provide enabling environment (electricity, lower cost data) for business to strive on social media.

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## Strategies for Improving Consumer Utilization of Labels on Processed Food Products in Aba Metropolis, Abia State

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## **Abstract**

This study focused on strategies for improving consumer utilization of labels on processed foods in Aba Metropolis, Abia State. Specifically, it determined strategies to be adopted by: consumers themselves; manufacturers; and distributors/traders. The study utilized descriptive survey research design. Population was made up of three groups: consumers, manufacturers and distributors processed foods products in the area of study. A multistage technique was used to select a sample of 260 respondents (comprising 120 consumers, 45 manufacturers, 95 distributors) who participated in the study. Questionnaire was used for data collection. Mean and standard deviation were used to analyse data. Findings include: eight each of consumers-related strategies with mean  $(\overline{X})$  scores of 2.61-3.14; manufactures related strategies with mean  $(\overline{X})$  scores 2.87-3.17; and distributors related strategies with mean (X) scores of 3.02-3.15. These strategies which could be adopted by consumers, manufactures and distributors, include, among others, consumers to form the habit of reading labels processed foods, manufactures to include manufacturing date on processed foods, and distributors are to display the price tag on the processed foods. Five recommendations were made. These include that regulatory authorities (like NAFDAC) should monitor and ensure that manufacturers fulfil their responsibilities of raising consumers' awareness on the utilization of information on food labels such as ingredients, manufacture/expiration date, NAFDAC and Batch numbers.

**Keywords**: Consumer, Labels, Processed, Foods, Utilization, Manufacturers, Distributors

## Introduction

Over the years, emphases have been made on nutrition or food behaviours by nutritionists in order to promote a sustainable healthy living. Healthy food behaviours include the roles consumers play regarding what they eat at any time. For example, the consumption of organic foods, exercising and positively changing one's lifestyle could help reduce high prevalence of avoidable nutritional diseases (such as diabetes, hypertension, obesity, etc.). However, Affram and Darkwa (2015) stated that globalization has ushered in a new convenient eating pattern due to the busy work schedule and a sedentary lifestyle which has increased the influx

and patronage of foreign processed packaged foods (like corn beef, noodles, tinned fishes, etc.) that now inundate the Nigerian market. In view of this, Themba and Tanjo (2013) reiterate that an important way to get consumers become aware and educated on the reading and using food labels (otherwise nutritional information) would enhance their ability to make healthy food choices. Internationally, food labelling has effectively achieved healthier consumer consumption behaviour and product development which transcends into improved health outcomes and the subsequent reduction in medications (Susannah, 2019).

Petrovici, Fearne, Nayga Drolias (2012) stated that food labels are vital tools that should be used by food industries or manufacturers including distributors and traders to provide the specific ingredients, antioxidants, nutritional values, nutritional risks, manufacturing and expiration dates. Alongside communicating dietary information enticing consumers towards processed foods, it is primarily expected to protect the consumer from avoidable nutritional problems arising from lack of nutrition information. In view of this, researchers reiterate that understanding the ingredients lifespan of processed foods is significant for preventing the consumption of contaminated, poisoned, expired spoilt foods, which would induce nutritional diseases (like obesity, hypertension, diabetes, diarrhoea, dysentery, etc.) and its attendant economic drain on the populace. Fortin, 2017; Igodo, 2019; Lanlord, Obodo, 2018). Alemu (2014) emphasized that processed foods are sourced from agricultural products that have undergone changes into other forms of foods that are parboiled, spiced, and packaged with certain preservatives or additives. These changes make processed foods easy to prepare and less time to be consumed.

The methods of food processing could lead to the destruction of those harmful pathogens including enabling food industries or manufacturers to provide consumers with a greater variety of foods whether alien to the region or even in and out-of-season (Alemu, 2014). This prompted Asouzu (2017a) assertion that the intake of local and natural foods suffices as an effective prescription against nutritional diseases like hypertension, obesity, diabetes, etc. Incidentally, since food processing is linked to the removal of certain nutrients, vitamins and fiber present in the food, this accounts for the criticisms against processed foods for promoting over-nutrition and obesity inducing oils, containing too much sugar and salt, too little fiber, and otherwise being unhealthy (Avag and Uchi, 2016). Kempen, Bosman, Bouwer, Klein and Van Der Merwe (2011) stated that properly utilizing food labels involve five steps of information processing via: exposure, senses stimulation, information processing, relevant information grasping consumers' attention and relating relevant information to a specific consumer purchase need (i.e. health, nutritional, and satisfaction). In addition, Washi (2012) argues that consumers choice of processed or pre-packaged foods is sequel to their preferences and understanding of special diet or nutrition for satisfaction and tackling health problems and diseases (like obesity, diabetics, cardiovascular diseases, several cancers/tumours, etc.).

Non-compliance to nutritional could attributed labelling be manufacturers dishonesty or deceit in the way they use these labels to short change consumers (Thomas, 2011). This scenario inclines manufacturers or food industries intent to deliberately use health claims that are misleading and in some cases downright false. Despite what the label may imply, some of these products are not healthy. This makes it hard for consumers to choose healthy options without a thorough inspection the ingredients list (Tessema, Kasshun and Haile, 2014). Reyes, Garmendia, Olivares, Aqueveque, Zacarías and Corvalán (2019) noted that front labels are often used to lure people pre-packaged buying foods. However, some of these labels are highly misleading and contrary to consumers purchase intention. In view of this, Nestle (2017) stressed that the promotion of awareness of consumers improve their nutritional information, education, and attitudes towards tenaciously or steadfastly utilizing labels on processed foods.

Food labels are inscriptions on processed foods that consumers are expected to read and evaluate in order to be better informed on their dietary choice purchase intention. However, nutritional illiteracy educational alongside lower undermines awareness levels,

consumers interest or enthusiasm on reading food labels contents. This puts the health of consumers in danger since processed foods may be subject to expiration and adulterations (Okojie and Isah, 2014). In Aba metropolis for example, the high patronage processed foods by the inhabitants of this area observed by this researcher prompted the need for this study. More so, the lack of information on food labels which can undermine consumer utilization of labels on processed foods has been identified as a major denial of consumer rights. Manufacturers, distributors and dealers have been found to falter in this regards as many fail their the in primary responsibilities to the consumer by providing information on their products (Igodo, 2019). This is owing to the fact that many consumers do understand what constitute food labels, and as such they reject the ensuing message (Wodts, 2010). In cases, where consumers report understanding most of the information on nutrition labels; they report finding the information confusing and difficult to understand based on what they ascribe as the "technical terms" used in such food labels. Unfortunately, consumers (male and female) with higher education and incomes that are nutritionally illiterate also are easily confused on the ratio of salt and sodium; energy and calories; sugar and carbohydrate; saturated fat and polyunsaturated fat that is healthy for intake. Thus, unhealthy diets among populations are a leading cause of avoidable illness and premature death in developing countries, including Aba in Abia State in South-eastern Nigeria.

Previous studies, by Washi (2012) and Igodo (2019) centred on the awareness of food labelling among groceries consumers for healthy living. However, focuses were centralized on consumers' roles to protect themselves from food dangers, thereby drawing attention to the need for strategies that should be adopted bv manufacturers and distributors/dealers/traders, as well as to improve consumer awareness of food labels. It is against this backdrop that the researcher deemed it necessary to embark on an independent study to examine strategies to be adopted for improving consumer utilization labels on processed foods in Aba metropolis, Abia State.

## Purpose of the Study

The main purpose of this study was to involve strategies for improving consumer utilization of labels on processed foods in Aba Metropolis. Specifically, the study determined adopted strategies to be by the following for improving groups consumer utilization of labels on processed foods:

- 1. consumers themselves;
- 2. manufacturers of the processed food products.
- 3. distributors/dealers/traders

## **Research Questions**

The study was guided by the following research questions:

What are the strategies to be adopted for improving consumer utilization of labels on processed foods by each of the following groups:

- 1. consumers themselves?
- 2. manufactures?

## 3. distributors/dealers/traders?

## Methodology

**Research Design**: This study adopted a survey design.

Area of the study: The study was carried out in Aba metropolis of Abia State, South East Nigeria. The area has an estimated population of 2,277, 300 (National Bureau of Statistics, 2018) and comprising Osisioma Ngwa LGA with 906, 146; Aba North with 672, 803 and Aba South with 698, 351). The area is characterised by numerous commercial activities. Many inhabitants of this area have average education, and engaged in buying and selling. Processed foods abound in this area.

Population of the study: The population was made up of three groups: consumers, manufacturers and distributors of processed food products in the area. The consumers patronize processed foods. They depend largely on those foods r mostly for breakfast and lunch since many of them have limited time for preparing foods at home before going out daily.

were 83 local There manufacturers within this area at the time of the study based on the report of Aba Food Operators Association (2020). The responsibilities of this group but not limited include to production of different food products such as Tummy tummy, Indomie, Golden Pasta, Chikki, Filla, Biggi etc. Also, 100 food distributors in the area (Aba Food Operators Association (2020) completed the population for the study. This group was included because it is responsible for making these foods reach the final consumers or retailers. Sometimes,

distributors are alleged to be responsible for lack of information.

Sample for the study: A sample size of respondents (comprising 45 manufacturers, consumers, distributors) participated in the study. The study adopted a five phase multistage sampling technique. Firstly, purposive sampling technique was used in the selection of all the three Local Government Areas (vis Aba North, Aba South, and OsisiomaNgwa) in Aba metropolis. In the second phase, random sampling technique was used in the selection of 120 consumers from the three Local Government Areas (LGAs) in Aba metropolis, Abia State. Thirdly, 45 manufacturers (staff) were randomly selected 9 each from the 5companies or outlets in the study area. Fourthly, the non-proportionate random sampling technique was used in the selection of 95 distributors from the 3 Local Government Areas in Aba These processes provided opportunities for all stakeholders to participate in the study.

Instrument for Data collection: Questionnaire was used for data collection. It was developed through literature review based on the specific objectives of the study. The instrument had a 4 point scale of "Strongly Agree" (SA, 4), "Agree" (A, 3), "Disagree" (D, 2), and "Strongly Disagree" (SD, 1). It consisted of two sections. Section A

elicited the demographics of respondents (i.e. consumers, manufacturers, distributors, and traders or dealers), while Section B comprised eight items each on the variables of consumers, manufacturers, and distributors/traders/dealers. The questionnaire was validated three experts in nutrition. The reliability or (internal consistency) the questionnaire was determined using (r) method. Cronbach Alpha reliability coefficient of 0.708 was obtained..

Data Collection Method: A total of 260 copies of the questionnaire were distributed by hand to the respondents. Only 229 copies were validly retrieved and used for the analysis. This represents 99.7 percent return rate.

Analysis Techniques: The collected data was scored, tabulated, coded, and analyzed using mean and standard deviation to answer the research questions. A criterion mean cut off of 2.5 was used. Any item with a mean rating of 2.50 and above was rated as "agreed", while any item with a mean rating of less than 2.50 was rated as "disagreed".

## Results

Strategies to be adopted for improving consumer utilization of labels on processed foods by consumers themselves.

Table 1: Mean Responses and Standard Deviation on strategies to be adopted for improving consumer utilization of labels on processed foods by consumers

S/	Strategies to be adopted by consumers	N = 229		Decision
N		Mean	SD	
1	to form the habit of always reading labels rather than relying mainly on the price tag on the processed foods	2.96	.98	#
2	to read carefully the ingredients used in producing the processed foods they want to buy	2.86	.88	#
3	to know how to use batch number to ascertain the authenticity of any product	2.99	.83	#
4	consumers to read fliers from manufacturers and distributors on the importance of labels on processed foods	2.88	.76	#
5	to confirm that NAFDAC number is written on the labels of processed foods	3.14	1.06	#
6	to check the manufacture date written on processed foods before buying the product	3.07	1.10	#
7	to read to know how to dispose the containers of processed foods to avoid adulteration and food poisoning	2.61	.99	#
8	to read and ensuring that the expiry date on processed foods is still valid before purchasing such product	3.06	.92	#
	Grand Mean	2.95	0.94	#

#  $(Agree) = \ge 2.50$  while \* (Disagree) = < 2.50.

Table 1 shows the mean rating and standard deviation on the strategies to be adopted by consumers for improving utilization of labels on processed foods Aba metropolis, Abia State include to: confirm that NAFDAC number is written on the labels of processed foods  $(\overline{\chi}=3.14)$ , check the manufacture date written on processed foods before buying the product ( $\overline{\chi}$  =3.07), read and ensure that the expiry date on processed foods is still valid before purchasing such product ( $\overline{\chi}$  =3.06), know how to use Batch number to ascertain the authenticity of any product ( $\overline{\chi}$  =2.99), form the habit of always reading labels rather than relying mainly on the price tag on the processed foods ( $\bar{\chi}$  =2.96),

read fliers from manufacturers and distributors on the importance of labels on processed foods ( $\overline{\chi}$  =2.88), read carefully the ingredients used in producing the processed foods they want to buy ( $\overline{\chi}$  =2.86), while the least was read to know how to dispose the containers of processed foods to avoid adulteration and food poisoning ( $\overline{\chi}$  =2.61). Furthermore the grand mean score of 2.95 indicates therefore, the strategies to be adopted by consumers for improving utilization of labels on processed foods Aba metropolis, Abia State.

Strategies to be adopted for improving consumer utilization of labels on processed foods by manufacturers

Table 2: Mean Responses and Standard Deviation on strategies to be adopted for improving consumer utilization of labels on processed foods by manufacturers

S/N	Strategies to be adopted by manufacturers are to:	N = 229	)	Decision
		Mean	SD	
1	include manufacturing date on processed foods	2.97	1.04	#
2	specify the expiration date on processed food	2.92	.92	#
3	specify the ingredients used in producing the processed foods	3.17	.81	#
4	indicate the registered name of the manufacturing company on the processed foods	2.94	.96	#
5	specify the nutrient contents derived from the products	2.91	.93	#
6	indicate the NAFDAC and batch number and approval on products	2.87	.86	#
7	include information on how to store the products	3.00	.96	
8	specify information on how to dispose the left-over of the processed foods	2.93	.77	#
Gran	Grand Mean 2.96 0.91			#

 $\# (Agree) = \ge 2.50 \text{ while } * (Disagree) = < 2.50.$ 

Table 2 shows the mean rating and standard deviation on the strategies to adopted by manufacturers for improving utilization of labels on processed foods Aba metropolis, Abia State include to: specify the ingredients used in producing the processed foods  $(\overline{\chi} = 3.17)$ , include information on how to store the products  $(\overline{\chi} = 3.00)$ , include manufacturing date on processed foods  $(\overline{\chi}$  =2.97), indicate the registered name of the manufacturing company on the processed foods ( $\overline{\chi}$  =2.94), specify information on how to dispose the leftover of the processed foods  $(\bar{\chi}=2.93)$ , specify the expiration date on processed food ( $\overline{\chi}$  =2.92), specify the nutrient contents derived from the products ( $\overline{\chi}$  =2.91), while the least was to indicate the NAFDAC and Batch number and approval on products ( $\overline{\chi}$ =2.87). Furthermore the grand mean score of 2.96 indicates therefore, the strategies to be adopted by manufacturers for improving utilization of labels on processed foods Aba metropolis, Abia State.

Strategies to be adopted for Improving Consumer Utilization of Labels on Processed Foods by Distributors/Dealers/Traders.

Table 3: Mean Responses and Standard Deviation on strategies to be adopted for improving consumer utilization of labels on processed foods by distributors/ dealers/ traders

	distributors, dearers, traders			
S/N	Strategies to be adopted by distributors/traders/dealer	N = 229		Decision
	are to:	Mean	SD	
1	display the price tag on the processed foods	3.07	.82	#
2	ask consumers to check the expiry date of the products before purchase	3.06	.91	#
3	give consumers fliers on the benefits of reading labels on variety of processed foods	3.15	.85	#
4	encourage consumers to check the manufacture date of the products before buying	3.08	.94	#
5	advise consumers that food labels help them know the ingredients, calories, and health benefits of the processed food	3.02	.97	#
6	encourage consumers to dial the product batch number in their phones to determine the product's originality	3.09	.94	#
7	stack the products with the branded product logo	3.10	.88	#
8	encourage consumers to read the NAFDAC number showing the approval of the product	3.04	.95	#
Gran	d Mean	3.08	0.91	#

#  $(Agree) = \ge 2.50$  while \* (Disagree) = < 2.50.

Table 3 shows the mean rating and standard deviation on the strategies to adopted be by distributors/traders/dealers for improving utilization of labels processed foods Aba metropolis, Abia State include to: give consumers fliers on the benefits of reading labels on variety of processed foods ( $\overline{\chi}$ =3.15), stack the products with the branded product logo  $(\overline{\chi}=3.10),$ encourage consumers to dial the product Batch number in their phones to determine the product's originality ( $\overline{\chi}$  =3.09), encourage consumers to check the manufacture date of the products before buying ( $\chi$ =3.08), display the price tag on the processed foods  $(\overline{\chi}=3.07)$ , asking consumers to check the expiry date of the products before purchase  $(\overline{\chi}=3.06)$ ,

encourage consumers to read the **NAFDAC** number showing the approval of the product  $(\overline{\chi}=3.04)$ , while the least was to advise consumers that food labels help them know the ingredients, calories, and health benefits processed food  $\overline{(\chi}=3.02)$ . Furthermore the grand mean score of 3.08 indicates therefore, the strategies to be adopted by distributors/traders/ dealers for improving utilization of labels processed foods on Aba metropolis, Abia State.

## **Discussion of the Findings**

The result in Table 1 revealed a grand mean score of 2.95, which indicated that the strategies to be adopted by consumers for improving utilization of labels on processed foods Aba metropolis, Abia State include: confirming that NAFDAC number should be written on the labels of processed foods, checking the manufacture date written on processed foods before buying the product, reading and ensuring that the expiry date on processed foods is still valid before purchasing such product, knowing how to use Batch number to ascertain the authenticity product, forming the habit of always reading labels rather than relying mainly on the price tag on the processed foods, consumers reading fliers from manufacturers and distributors on the importance of labels on processed foods, reading carefully the ingredients used in producing the processed foods they want to buy, and reading to know how to dispose the containers of processed foods to avoid adulteration and food poisoning.

These findings are in agreement with previous studies. For example, Darkwa (2014) noted that consumers' awareness, knowledge, understanding usage of information manufacture, expiration, ingredients, Batch number) placed in food labels would enhance their consumers purchasing decisions of healthy, nutritious, and safe foods or products. In line with this, Okojie and Isah (2014) suggested that encouraging consumers to read ingredient information, identify brand logos, and method of disposing used containers and products is a way of enhancing consumers nutritional literacy. Hence, Hiths (2012) assertion that consumers need to develop interest and ability to effectively and patiently read information (like manufacture and expiry) contained in processed foods

they consume would help prevent foodrelated problems that emanate from the consumption of inappropriate, spoilt contaminated poisoned or processed foods. These findings aligns with the researcher's position that consumers promoting the utilization of labels or tags in processed foods would help them developing the consciousness of always reading and becoming aware important information ingredients, nutritional content, manufacture and expiry dates. NAFDAC number and Batch number) they need to know before purchasing processing foods that are healthy, safe and free from causing any complication and inducing any dietary ailments.

The result in Table 2 revealed a grand mean score of 2.96, which indicated the strategies to be adopted manufacturers improving for utilization of labels on processed foods Aba metropolis, Abia State include to: specify the ingredients producing the processed foods, include of information on how to store the products, include of manufacturing date processed foods, indicate registered name of the manufacturing company on the processed foods, specify information on how to dispose the left-over of the processed foods, specifying the expiration date on processed food, specify the nutrient contents derived from the products, and indicate the NAFDAC and Batch number and approval on products. These findings are consistent with the views of Habu (2015) which noted that manufacturers are major determinants of food safety for consumers, therefore should be active in

promotion of label utilization. In view of this, manufacturers should responsible for the welfare of consumers through the provision of adequate information (like production date, ingredients, expiration date, and NAFDAC number) on food products. Jegede (2017) and Obodo (2018) added that manufacturers utilize food labels as a strategy of drawing the attention of consumers to imbibe the practice of always reading and effectively utilizing the information contained in the food labels. Also, Petrovici et al. (2012) stated that food industries, producers or manufacturers embark on the provision of comprehensive nutrition information, tag or label on processed foods as tools important used communicating dietary information to consumers. Hence, manufacturers should primarily be responsible to encourage the utilization of food labels as a deliberate way of promoting consumers nutritional awareness in the society (Okojie and Isah, 2014; Lanlord, Igodo, 2019). Deductively, manufacturers need to constantly create consumer awareness on usage processed foods labels through fliers instructing or educating consumers that the reading of tags or information (like ingredients, NAFDAC number, and manufacture/expiry dates) rather than the hitherto price tag on processed foods is an effective strategy that would help consumers purchase safe, healthy and genuine food products.

The result in Table 3 revealed a grand mean score of 3.08, which indicated the strategies to be adopted by distributors/traders/dealers for improving utilization of labels on

processed foods Aba metropolis, Abia State include to: give consumers fliers on the benefits of reading labels on variety of processed foods, stack the products with the branded product logo, encouraging consumers to dial the product batch number in their phones to determine the product's originality, encourage consumers to check the manufacture date of the products before buying, display the price tag on the processed foods, ask consumers to check the expiry date of the products before purchase, encourage consumers to read the NAFDAC number showing the approval of the product, and advise consumers that food labels help them know the ingredients, calories, and health benefits of the processed food. These findings are in tandem with the reports of Danilola, Omotesho and Animashaun (2019) that the quest for showing that safe, healthy wholesome, authentic or genuine food products are marketed underscores distributors or traders encouraging consumers towards emphasis interest on reading information (like manufacture date, expiry date, Batch number, NAFDAC number, ingredients, target population, stated or contained on food labels to their purchase decision processed foods. In view of this, Opoku (2017) reported that local distributors, wholesalers and retailers owe the consumer some explanations on the safety of a product. Therefore, Okojie and Isah (2014) and Igodo (2019) added that a responsible dealer will inform a customer on the importance of checking for safe information on the tag or label on every processed food products is

indeed vital to ensure the purchase and consumption of safe, authentic and healthy food.

## Conclusion

This study has revealed strategies to be adopted by consumers, manufacturers, distributors/traders/dealers towards the utilization of labels, tags or information (like manufacture date, date, NAFDAC number, ingredients, disposal technique, and Batch number) as a strategy for raising awareness of the purchase consumption of safe, healthy and genuine processed food metropolis, Abia State. This will enable manufacturers distributors and embark on the production and distribution of fliers in order to help consumers understand the importance of reading carefully information stated on labels prior to the purchasing of processed foods in the marketplace, stalls or shops.

## Recommendations

Based on the findings of the study, the following recommendations were made:

1. Consumers should be encouraged by relevant agencies such as the mass media and religious organizations sensitization through and enlightenment programmes to develop interest or form the habit of always reading and information like manufacture and expiry date, ingredients and **NAFDAC** number (rather than emphasizing on the price tag) to inspire their decision of buying and consuming processed foods.

- 2. Regulatory authorities (like NAFDAC) should monitor and ensure that manufacturers fulfil their responsibility or obligation of raising consumers' awareness on utilization of information on food labels (like ingredients, manufacture/expiration date, NAFDAC and Batch number) prior to their purchase of food products.
- 3. Distributors, traders or should be encouraged to provide consumers with fliers containing the information on the benefits labels reading on variety of foods processed towards the purchase and consumption of safe, healthy and genuine foods products.
- 4. Food industries or manufacturers should indicate the type of processes foods they undergo on labels in order to enhance the proper nutrition of patients with special dietary advice and/or avoidance of certain type of food (like frying).
- 5. Enlightenment programmes, jingles, adverts about food labels should be carried out by governmental and non-governmental agencies in order to spread the benefits of using information on food labels.

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## Influence of Cloud Computing on Teaching Effectiveness of Business Education Courses: A Case Study of University of Calabar, Cross River State

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## **Abstract**

The main purpose of this study was to investigate perceived influence of cloud computing on teaching effectiveness of Business education courses in University of Calabar. Specifically it determined ways cloud-based delivery and cloud-resource sharing could influence teaching effective effectiveness as perceived by Business education Lecturers. It was a descriptive survey. Two research questions guided the study. Population comprised all the 22 Business education lecturers from University of Calabar, Calabar. Questionnaire was used to collect data. A 24- item Mean  $(\overline{X})$  and standard deviation were used for data analysis. Findings reveal 11 ways  $(\overline{X} \ge 2.50)$  and 11  $(\overline{X} \le 2.50)$  cloud based delivery and cloud resource sharing have respectively influenced teaching effectiveness of Business education lecturers in University of Calabar. Based on these findings, three recommendations were made, among others that awareness of the importance of cloud computing should be created in University of Calabar, and other institutions.

**Keywords:** Cloud, Computing, Delivery, Resource, Teaching, Effectiveness and Business education.

## Introduction

Business education is one of the vocational courses offered in Universities. It plays a vital role towards the economic growth and development of the society. Business education according to Federal Republic of Nigeria

(FRN) (2013) is a conglomerate of courses that is concerned with the acquisition, development and inculcation of the proper values for the survival of the individual and the society. Otamiri (2014) defined business education as education that involves the

study of technologies and related sciences and the acquisition of practical skills including teaching skills, attitudes, understanding and knowledge related to occupation in various sectors of our economy and social life.

Okoli and Azih (2015) explained that business education is the education for the acquisition and development of skills and competencies, attitudes and attributes which are necessary for efficiency of the economic system. Thus, business education helps individuals to acquire saleable skills that will enable them fit into various business organizations or be self employed in the absence of paid employment. Business education in Nigeria is offered in the universities at undergraduate and post graduate levels. Business education as a course houses various options namely: Office technology and management option, accounting option, marketing option, and entrepreneurship option.

Ovinlole and Mamman (2018)observed that the growth in human population and technology advancement has revolutionised the process of teaching and learning. Hence the 21st century is referred to as a global village where knowledge acquisition has gone beyond the confine of a classroom. Business education is not left out in these technological changes. Currently businesses are experiencing high technological changes as a result of the globalized nature of business. These days we talk of electronic accounting, use of modern office technology, electronic marketing, electronic books etc. Accordingly, the universities must carry out these changes in order to be service oriented and to fulfil excellence in performance, and this will not be achieved unless the institutions do their best to apply modern trends in Information Technology (IT) services, such as cloud computing as an aspect of e-learning.

Cloud computing is a general term that deals on sending of hosted services through the internet. Cloud computing refers to manipulating, configuring and accessing applications online. It offers online data storage, infrastructure and application. It is the provision of vital information technology capabilities like software and hardware from a third party over a network. Cloud computing is a type of computing that is highly scalable and uses virtualized resources can be shared by Virtualization is one of the prerequisite for the realization of cloud computing. It enables the resources to be used when they are necessary (Hasan, 2019) A client using cloud computing can communicate with a lot of servers simultaneously these and services exchange information between themselves. This is based on the fact that cloud computing has distinct characteristics that differentiates it from traditional web hosting (Rouse, 2019). Through an Internet service connection, cloud storage enable users access to download data on any chosen device like a laptop, a tablet or Smartphone. Cloud storage users can also edit their documents simultaneously with other users as well, making it easier to work outside the classroom. Usage of Cloud computing in education is vital as recognized bv many educational institutions around the world hence the use of cloud based delivery ir institutions of learning.

Cloud-based delivery is seen as a process of presenting the planned lesson over the cloud. This Cloud based delivery is vital for effective teaching and learning of undergraduate and post graduate business education courses in the various options offered in business education department. The teaching can be done without the physical presence of the teacher in the classroom but by connecting the internet so that he can participate in the learning process online. As observed by Huang and Liu (2013) using cloud-based learning systems, students and lecturers benefit from the advantages of collaborative learning, virtual laboratories, virtual libraries, online storing, constant communication and most importantly equal educational chances. Salome and Udukeke (2018)defined Cloud instructional delivery as an area where cloud computing can be deployed to ensure effective teaching and learning which relates to the impartation of ideas, values, competencies, knowledge and skills by the lecturer to students. This involves the use of various applications and tools such as voice videoconference, YouTube, WhatsApp etc. A videoconference is a live, visual connection between two or more people residing in separate locations for the purpose of communication. Contributing on relevance of video conferencing in teaching effectiveness, Salome Udukeke (2018) see teaching through video conferencing as a unique method providing real-time face-to-face interaction that enables immediate

students and lecturers' interaction and feedback. Srinivasan and Getov (2011) explained that cloud based delivery through video-conferencing is a unique method of providing real-time face-toface interaction that enables immediate and lecturer interaction and feedback. For instance, a guest lecturer teach students from remote locations using video-conferencing tools and applications such as SKYPE which can also be projected on a large screen. Resources used for teaching and learning can equally be shared during cloud based learning.

Cloud resource sharing which entails many students and lecturers using the materials provided in the web irrespective of the location of the users and lecturers gives students opportunity of making use of different reading materials for teaching and learning of Business education courses. The data or software applications are accessed through the web from any device irrespective of the user's location unlike the traditional form of learning where the information is stored on the device of the user. Nicholson, (2015) rightly observed that by using cloud based e-learning, students, lecturers and other academic members in tertiary institutions can access online storage, e- mail, databases, educational applications and software laboratories) and e-resources, anywhere, any time and by any device. Teaching and learning resources can adequately be shared through the cloud.

Sunita and Sing (2012) contended that cloud resources sharing create interactive communication links where the teacher manages the human, material, time and space to make sure that instructional events are recalled, provide feedback and provide access to learning order enhance in performance of both lecturers and students. According to Pranay, Sumitha and Umay (2013), Cloud computing can be used in both teaching and sharing learning materials. For instance, a lecturer needs to share a journal paper or lecture materials with fifty of his students, using this method, he can email this materials to his students.

Considering the current financial problems experienced in Nigeria, cloud computing is a good alternative for educational institutions that limited financial resources to operate their information systems effectively without incurring much acquisition of computers and network machines. With the use of Cloud computing, IT operations are expensive since the need for licensing and software updating will be reduced and functional capabilities are achieved. This will help the institutions to become more competitive due to availability of high-performance resources and highly reliable and available applications made available to the lecturers and students.

using cloud-based systems school-aged learners instructor's benefit from the advantages collaborative learning, virtual laboratories, virtual libraries, online storing, constant communication and most importantly equal educational chances. For all these reasons, it is that higher education suggested institutions should base their e-learning system on cloud to achieve teaching effectiveness.

Teaching effectiveness is paramount to ensure that the objective of a program is achieved. Effective teaching can be seen in many forms including teacher's knowledge of subject matter, method of lesson presentation and nature of interaction between him and students, his colleagues, management, parents etc. Effective teacher has a good knowledge of the learning pattern of his students in terms of their strengths and weaknesses. This helps him to plan his lesson well so that there will be good mastery of the subject matter presented to the students. Effective teaching has to carefully pass through three basic steps viz: planning the instruction, delivering the instruction planned and assessing learning outcomes. Instructional methods, communication approaches and assessment techniques can be adequately organized using computing. Instructor made videos, online discussions can be utilized for teaching and learning. Integrity can be maintained during on-line examinations by the use of multiple version of question paper, multiple step problem solving questions and the use of lock down browsers.

For several years now, performances of students in business education have been below average (poor). The quality of teaching and the strategies used by the lecturers in teaching Business education courses in Calabar University of could described as inadequate considering that we are in an electronic era and much emphasis is placed on on-line teaching and learning. In fact, it has become a major concern for stakeholders such as parents and policy makers (Chukwura, 2013). It has been observed by the researchers lecturers in the university seem to still attach to the traditional method of teaching (lecture method) and are recycling outdated materials which make them lag behind in contemporary demand for an improved delivery approach in business education courses. However, the Federal Ministry of Education had in 2007 advocated for change in the strategies of imparting knowledge in all courses to students. This required lecturers to embrace computer and internet technologies as teaching tools to transform the present isolated, lecturer-centred and textbook bound classroom into student-centred and computing environment. It is on this background that this study was carried out to find out the perception of lecturers on the influence of cloud computing on effective teaching and learning of business education courses in University of Calabar.

## Purpose of the study

The purpose of this study was to investigate Business education lecturers' perception of the influence of cloud computing on teaching effectiveness in University of Calabar. Specifically, the study determined ways each of the following could influence teaching effectiveness among Business education Lecturers in University of Calabar.

- 1. Cloud-based delivery.
- 2. Cloud resource sharing.

## **Research questions**

The following research questions were raised to guide the study:

What are perceived ways each of the following could influence teaching effectiveness of business education lecturers in University of Calabar:

- 1. Cloud-based delivery?
- 2. Cloud resource sharing?

## Methodology

*Design of the study:* The design adopted for the study was a descriptive survey.

Area of the study: The study was conducted in University of Calabar, Cross River State. There are government owned tertiary institutions in Cross river state. Two of the tertiary institutions are University of Calabar University and River Cross Technology, Calabar. The two universities are federal and state universities respectively and both offer business education. The choice of University of Calabar is because it is an older school and a federal university.

*Population of the study:* The population of the study comprised 22 Business education Lecturers from University of Calabar, Cross River State. In the university they have 12 male and 10 female lecturers. The Lecturers comprises of 2 Professors, 1 Senior Lecturer, 7 Lecturer II, 9 assistant lecturers and 3 Graduate Assistants. The researchers made use of all population as it was considered manageable.

Instrument for data collection: A 24 item questionnaire titled "Lecturers' Perception of influence of Cloud Computing on Teaching Effectiveness of **Business** education Questionnaire (LPCCTEBEQ) was used for data collection. The instrument was constructed on 4-point scale of Strongly Agreed (SA) - 4.00, Agreed(A) - 3.00, Disagree (D)-2.00 and Strongly Disagree (SD) - 1.0

Data collection method: Data required for this study was collected through the use of copies of a questionnaire administered to the Business education lecturers in the department of Business education, University of Calabar by the researchers and the research assistants. All the copies of the questionnaire were returned by the respondents after responding to the questions.

Data analysis technique: The data collected for this study were analyzed

using descriptive and inferential statistics. The research questions were answered using mean (X) and standard deviation (SD). Any item with mean score equal to or greater than 2.50 was regarded as "Agreed", while any item with mean score less than 2.50 was regarded as "Disagreed".

## Research question 1 Ways Cloud-Based Delivery Influence Teaching Effectiveness of Business Education Lecturers in University of

Table 1: Mean  $(\overline{X})$  Responses and Standard Deviations Perceived Influence of Cloud-Based Delivery on Teaching Effectiveness of Business Education Lecturers in University of Calabar.

Calabar.

S/N	Ways Cloud-based Delivery influence Teaching	X	SD	DEC
	Effectiveness			
1	Lecturers ensure that adequate instructional	3.50	0.51	Α
	objectives are selected in line with the course content.			
2	Lessons are planned appropriately to ensure that	3.50	0.51	Α
_	they are in line with the instructional objectives.	3.50	0.51	7.1
3	Students have access to technologies that are	3.50	0.51	A
	previously not affordable			
4	Cloud based delivery afford lecturers and students easy access to requisite information	3.54	0.50	A
5	Cloud computing technology facilitates the use of	3.40	0.51	A
	a wide variety of instructional strategies designed			
	to maximize learning			
6	Through cloud based delivery data can easily be stored and retrieved when required.	3.45	0.50	A
7	Enrich your students with technology enabled	3.54	0.50	A
	education especially in the teaching of skilled			
	business courses	2.40	a <b>=</b> 4	
8	Educational delivery is enhanced at reduced cost	3.40	0.51	A
9	Cloud computing provides lecturers and students with relevant research materials.	1.59	0.50	D
10	Using competent lecturers of business education	3.40	0.51	A
	to teach students from remote locations.			
11	Ensure evaluation of students through virtual means at the end of the semester	3.40	0.50	A

12	Giving of assignments to students and receiving	3.50	0.51	A
	same from students through e-mail.			
13	Incorporating cloud computing technology into	1.59	0.50	D
	instruction enable students access their results			
	easily.			

 $\overline{X}$  = Mean; SD= Standard deviation, N = Number of respondents (22); DEC= Decision

Table 1 shows that all the items except items 9 and 13 were answered in affirmative with their mean score above 2.50(≥2.50). This means that the lecturers in both institutions believe that cloud-based delivery would be of great benefit if used in teaching Business education courses in their university. While the responses in items 9 and 13 had their

mean scores lower than 2.50 which showed that some of the lecturers in the institution do not support the fact that cloud computing provide lecturers and students with relevant research materials and incorporating cloud computing technology into instruction enable students access their results easily.

Table 2: Mean  $(\overline{X})$  Responses and Standard Deviations on Perception of Business Education Lecturers on Ways Cloud Resources Sharing Influence on their Teaching Effectiveness.

S/N	Ways Cloud Resource Sharing Influence Teaching	X	SD	DEC
	Effectiveness			
1	Sharing course materials with students through email.	3.31	0.47	A
2	Accessing the teaching resources of leading vocational based	3.45	0.50	A
	institutions.			
3	Facilitating of class discussion through online chat group.	3.68	0.47	A
4	Making recent publications in the field of business education	3.54	0.50	A
	available to students on WhatsApp			
5	Making recent publications in the field of business education	3.40	0.59	A
	available to students on email			
6	Sharing lecture materials with students through WhatsApp.	3.45	0.51	A
7	Easy and unrestricted access to services and resources by	3.50	0.50	A
	lecturers and students.			
8	Learners can use their own devices to access lecturer's lesson	3.40	0.50	A
	notes.			
9	Sending of assessment scores to students through email.	3.54	0.50	A
10	Support sharing of learning resources such as lesson notes,	3.54	0.50	A
	project reports etc.			
11	Creating interaction and communication links between	3.45	0.50	A
	teachers and students.			

 $\overline{X}$  = Mean; SD= Standard deviation, N = Number of respondents (22); DEC= Decision

Table 2 reveals that all the lecturers in the institution agreed that cloud resources sharing can influence their

teaching effectiveness positively. All the items in table 2 above have their mean scores greater than 2.50 ( $\overline{X} \ge 2.50$ ). These

are therefore 11 ways cloud resource sharing influence teaching effectiveness of Business education Lecturers in University of Calabar.

## **Discussion of Findings**

The researchers discussed the findings of the study based on the research questions that guided the study.

The findings from the result of the analysis of research question one in table 1 showed that the respondents agreed that cloud-based delivery will enhance the teaching effectiveness of **Business** education lecturers University of Calabar. This finding is in line with that of Bora & Ahmed (2013), who maintained that Cloud computing according to its terms is the most appropriate way to improve teaching and learning by reducing implementation and maintenance costs of computer laboratories, increasing mobility of classroom and teaching materials, and quick access to learning materials. This is because cloud based delivery affords the learners the ability to receive lectures irrespective of their location. The finding is in line with the explanation of Sunita and Sing (2012) that cloud delivery techniques help to expand access to education, strengthen the relevance of education to the increasingly digital workplace; raise the educational quality by enabling knowledge to be spread electronically wider range of innovative, informative and educational purpose in order to bring global world into the classroom.

The finding also agreed with that of Srinivasan and Getov (2011) who said that teaching through video-

conferencing is a unique method of providing real-time face-to-face interaction that enables immediate peer and lecturer interaction and feedback. A guest lecturer can teach students from remote locations using videoconferencing tools and applications such as SKYPE which can also be projected on a large screen. Supporting the influence of cloud based delivery on teaching and learning, Huang & Liu (2013) stated by using cloud-based learning systems, school-aged learners instructors benefit from advantages of collaborative learning, virtual laboratories, virtual libraries, online storing, constant communication and most importantly equal educational They also chances. asserted students of 21st century use the technology constantly in their daily life, lecturers can use this habit as a way to gather their student's attention more on their study. Although traditional elearning limited students and lecturers communication, collaboration resources, cloud computing technology will be a platform that can make this limitation disappear. By using this technology, lecturers can be more involved with student's group activities, communications and controlling their real-time online work and by that it makes it easier for the lecturers to evaluate the students. This finding is also in line with the report of Pranay, Sumitha and Uma (2013) that Cloud Computing provides a new solution to establish a unified open and flexible network teaching platform and reduce the hardware input. Cloud computing can help education institutions improve productivity, education maintain

institutions own data centres and enhance hardware and software resources management, which needed to provide educational quality, scientific and research activities and students projects (Al-Rousan and Al-Ese, 2019). This will enhance the availability of relevant research materials for Business education students.

Huang & Liu (2013) ascertained that students of 21st century use technology constantly in their daily life and lecturers can use this habit as a way to gather their student's attention more on their study. Although traditional elearning limited students and lecturers communication, collaboration resources, cloud computing technology will be a platform that can make this limitation disappear. By using this technology, lecturers can be more involved with student's group activities, communications and controlling their real-time online work and by that it makes it easier for the lecturers to evaluate the students. This is because information technology has brought radical changes to many aspects of current life and the education sector in general, and to academic institutions in particular. Cloud computing has been proved to be attractive to academic institutions due to the benefits that it offers. Cloud computing offers academic institutions the opportunity to concentrate more on teaching and research activities rather arrangements complicated ΙT software systems (Al-Rousan and Al-Ese, 2019)

Cloud-based services can be available free or with a quite lower-cost

platform; students and lecturers can use it in their daily activities and because of the nature of cloud computing, all the system is centralized and so much easier and faster to monitor and maintain. Bora and Ahmed, (2013) observed that cloud computing technology has given many advantages in their communication and learning strategies and lecturers. students computing according to its terms is the most appropriate way to improve teaching and learning by reducing implementation and maintenance costs of computer laboratories, increasing mobility of classroom and teaching materials, and quick access to learning materials. At the end, by using cloud based e-learning, students, lecturers and other academic members in tertiary institutions can access online file storage, e- mail, databases, educational applications and software(virtual laboratories) and e-resources, anywhere, any time and by any device (Nicholson, 2015). For all these reasons, it is suggested that universities should base their e-learning system on cloud. Teaching and learning resources can adequately be shared through the cloud.

The use of this technology would enable instructors to be more involved with student's group activities, communication and controlling their real-time online work and by that it makes it easier for the instructors to evaluate the students (Huang & Liu, 2013). In addition to that, cooperation is improved by using cloud computing because the hardware is not limited and internet connection there are students and instructors to get strong multimedia capabilities such as video

conferencing and group game-based competition with any device that they own.

Tan; Chen; Li; Li; Wang; & Hu (2014) maintained that creating doubts on the validity of assessment methods, lack of live interaction and trust issues are amongst the critics raised by old school of educating against e-learning. Therefore, it is crucial to find simple and effective solutions to contain these critics, provide concrete evidences for the validity of evaluation method, and gain the trust of all users of e-learning systems. Therefore, cloud-based learning system was introduced and adapt to e-learning platform. This has imperative become Business Education lecturers to get themselves abreast with cloud computing as a teaching technique for effective and flexible lesson delivery.

The findings from the result of the analysis of research question two in table 2 showed that lecturers believe that cloud resources sharing positively influence the teaching effectiveness of Business education lecturers in tertiary institutions. In confirmation of the above findings, Salome and Udukeke (2018) reported that cloud can facilitate sharing of learning resources, activities professional collaboration between all participants in the learning processes through sending and receiving of Cloud information. computing according to them supports remote storage, sharing of learning resources, collaboration and interaction between lecturers and students, which are prerequisites for achieving higher efficiency in the educational process.

This finding is in line with Sunita and Sing (2012) who contended that cloud resources sharing creates interactive communication links where teacher manages the the human, material, time and space to make sure that instructional events are recalled, provide feedback and provide access to learning order to performance of both lecturers and students. This will enhance adequate provision of learning resources in business education for teaching and learning irrespective of the number of users and their location. In line with this view Bora and Ahmed (2013) explained that, as the cloud computing is internet based, it provides us with the ability to share the resources, software, application and information. Salome and Udukeke (2018) equally opined that cloud can facilitate sharing of learning resources, activities and professional collaboration between all participants in the learning processes through sending and receiving of information. It also supports remote storage, sharing of learning resources, collaboration and between interaction lecturers and students, which are prerequisites for achieving higher efficiency in educational process.

Kreljakuleloric, Raco and Tomlijanovic (2013) affirmed that cloud computing allows for greater flexibility and mobility in the use of resources for teaching and learning, greater degree of collaboration; communication and sharing of resources and creates a personalized learning environment or virtual communities of teaching and learning. For instance, a student is asked to share some journal papers with a

lecturer and forty students based on a client-server computing model, the student can share the papers with the lecturer by uploading the papers to SPIN. However, the student needs to use e-mail to share the papers with other students. This is because SPIN uses the concept of one-way partnership where a lecturer can share materials with his students and vice-versa.

Salome and Udukeke (2018) equally agreed that cloud can facilitate sharing of learning resources, activities and professional collaboration between all participants in the learning processes through sending and receiving of computing information. Cloud according to them supports remote storage, sharing of learning resources, collaboration and interaction between lecturers and students, which are prerequisites for achieving higher efficiency in the educational process. Cloud computing has a lot of benefits in teaching and learning in schools. It enables the students perform their academic tasks, delivers computing and storage resources to users/customers, gives students access to many technologies, and enrich the students with technology enabled education.

## Conclusion

On the basis of statistical analysis and the findings of the study, the researchers concluded that:

The application of cloud computing as an instructional technique will improve and ease business education lecturers in lesson notes preparation and presentation. Cloud computing will provide lecturers and students with the

ability to share the resources, software, application and information as well as facilitate sharing of learning resources, activities and professional collaboration between all participants in the learning processes through sending and receiving of information through cloud.

## Recommendations

In the light of the findings and conclusions drawn from the study, the following recommendations are made:

- 1. Awareness of cloud computing importance at University of Calabar and other tertiary institutions in Nigeria should be created by putting a mechanism in place to activate cloud-in the institutions.
- 2. Government should make sure that the institutions networking environment is ready for cloud computing in addition to offering the necessary financial support to activate cloud computing at tertiary institutions in Nigeria.
- 3. Lecturers in University of Calabar and other tertiary institutions at all levels should embrace the cloud computing approach to ensure teaching effectiveness.

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# Content Needed for Development of Self-Instructional Manual for Learning Interior and Exterior Decoration Within Home Economics Programme in Colleges of Education in South-East Nigeria.

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## **Abstract**

The major purpose of the study was to evolve content items of selfinstructional manual for learning interior and exterior decoration within Home Economics programme of College of Education in Nigeria. Specifically, the study determined cognitive, affective and psychomotor contents necessary for the development of the self-instructional manual. Area of the study was South East Nigeria. Population was 77 Home Economics lecturers in Colleges of Education and 130 interior and exterior decoration entrepreneurs in South East Nigeria. There was no sampling because the population was small. Questionnaire was used for data collection. Mean and t-test were used for data analysis. The major findings are 10 components of cognitive content, namely; colure scheme and harmony, feasibility study, principles of design, guide lines for fabric selection, among others. Other findings are 15 components affective content which include: appreciation, honest, patience, and creativity. There are also 20 components psychomotor content, namely, carry out feasibility study, choose appropriate fabric for decoration, plan decoration design and care of decoration fabrics, and others. Five recommendations were made, including that the content identified be utilized in teaching and learning interior and exterior decoration in NCE Home Economics Programme.

**Keywords:** Content, Development, Self-instruction, Manual, Interior, Exterior, Decoration,.

## Introduction

Decoration involves the process of making things look more attractive. Interior and exterior decoration is the art of beautifying rooms and other interior areas of a house so that they become attractive, comfortable useful (Anyakoha 2015). It entails the appropriate application of furnishes and decorative materials in the home by persons charged such responsibilities. (2008) it covers Ozougwu decoration of ceilings, walls, doors and windows, stair caves and floors of homes, offices, tent canopies, halls, among others, using light flowers, chair covers and fabrics. Exterior decoration the application of furnishing involves and decorative materials to beautify public places like house compound, porch or portio, galleries, fields, villages squares, school quadrangle, church arena, parks and other spaces either for everyday living or for ceremonial activities like parties, get together weddings, house opening, traditional marriage, funerals, political rallies (Anyakoha 2015). Fabrics are the most vital interior and exterior decoration accessory that adds exciting appealing, thrilling and relaxing look and feel to the decoration. To select and use any of these decorative materials the principles of art and design should be considered. The principles of design artistically guided the creation of elegant decoration. The principles include balance, proportion, emphasis rhythm and harmony.

Interior and exterior decoration plays very crucial roles in the social psychological, physical and economical well being of individuals and families. The nature of interior decoration helps to beef up the aura of individuals, families and bring about good sense of belonging to a person or group of persons. Multiple streams of income can be generated through creativity and maximum exploration of diversified decoration designed and styles. Many educated individuals are venturing into interior and exterior decoration or sales of decoration accessories (Ozougwu 2008, Nwaokamah 2010, Beth 2010, Ossai 2019).

Interior and exterior decoration is one of the subjects offered under entrepreneurship in NCE Home Economics Education. The course content includes concept of decoration, elements and principles of design, flower arrangement, care of fabrics, pricing, promotion, equipment tools feasibility study, types decoration accessories, fabric storage, record keeping, practical decoration of homes, offices venue for different ceremonies, field trip among others (National Commission for College of Education (NCCE) 2012). **Students** studying Home Economics in Colleges of Education have to take courses in interior and exterior decoration as well as other areas in Home Economics, Education and General studies. Due to the number of the courses to be taken, as well as compulsory six months teaching practice, interior and exterior decoration is not allotted adequate time despite the voluminous nature of the content. There is therefore the need to develop and use self-instructional manual which students can use after the official school time schedule (Ugwu 2018, Offor 2018, Ossai 2019).

The components selfof instructional manual include; the specific objective, content, instructional materials, tools and equipment and evaluation activities that should be used in assessing the objectives. The first developing the selfstage in instructional manual for learning interior and exterior decoration is to determine the specific objectives of the manual. This study however focused on determining the content needed for achieving the objectives of interior and exterior decoration self-instructional manual.

described Content is knowledge, skills, attitudes and values to be learnt in a course. Enemuoha (2010) stated that content is a totality of what is to be taught and learned by the students. The development of the content is deeply guided by the specific objectives of the manual. Eze(2010) viewed content as the subjects and subject matter taught in Contents includes; ideas, facts. Concepts, principles and generalization to which the learner is exposed for the purpose of attaining the expected objectives (Ughamadu 1992, Shilong 2015, Enem 2019). Content is divided into three parts namely cognitive, affective and psychomotor.

Cognitive content focused on the aspects of interior and exterior information that students are expected to know such topics includes guidelines for feasibility study, colour scheme, principles of design, equipment and tools among others. Affective content are the expected feelings and emotional consideration in interior and exterior decoration which includes appreciation,

creativity, Innovation, self-confidence, honest, patience, initiative, networking, competent, bearing uncertainty among others. Psychomotor content on the other hand deals with manipulative skills involved in interior and exterior decoration such as carrying out feasibility study, operate necessary equipment and tools, select appropriate fabric, select appropriate colour decoration, plan the decoration design, accurate fabric measurement, nailing of batten among others (Okpara 2012, Eyibe 2009, Ossai 2019).

Content is selected based on some criteria (Eyibe 2009), Offorma (2013) Davidson, (2019) these criteria include validity which ensures that the content is closely related to the desired of the self-instructional manual for leaning interior and exterior decoration. Significance ensures that the content selected reflects the various domains in learning and it is believed that it will enhance their achievement performance of NCE Home Economics students in the area of interior and exterior decoration.

Utility ensures that the interior and exterior decoration content selected should help the entrepreneur in the performance of his/her daily task of decoration. Interest ensures that the contents selected must be capable of generating sufficient interest. Learnability ensures that Content selected considered what the students know already and what they need to know. It is believed that the content selected in this study will greatly enhance the development of selfinstructional manual for interior and exterior decoration which

students can use after the normal class schedule.

## Purpose of the study

The main purpose of this study was to evolve possible content of self-instructional manual for learning interior and exterior decoration within Home Economics Programmes of Colleges of Education in Nigeria.

Specifically, the study determined the following compentes of content for developing self-instructional manual for learning interior and exterior decoration in Colleges of Education:

- 1. Cognitive
- 2. Affective
- 3. Psychomotor

## **Research Questions**

This study sought answer to the following research questions:

What component of content should be included in self-instructional manual on interior and exterior decoration in the following domains:

- 1. Cognitive?
- 2. Affective?
- 3. Psychomotor?

## Hypothesis (HO)

The following null hypothesis was tested at 0.5 level of significance. There is no significance difference in mean responses of the NCE Home economics lecturers and interior and exterior decoration entrepreneurs on the content (cognitive, affective and psychomotor) components of self-instructional manual for learning interior and exterior decoration.

## Methodology

*Design of the Study*: The study adopted a survey research design

Area of Study: the study was carried out in South East geo political zone of Nigeria. The zones is made up of five states, they are: Abia, Anambra, Ebonyi, Enugu and Imo State. Many of the inhabitants of the zone engage in interior exterior decoration and business. South East has six Colleges of Education that offer Home Economics include Federal College Education Eha-Amufu, College Education (T) Enugu, Alvan Ikoku Federal Colleges of Education Owerri, Nwafor Orizu College of Education Nsugbe and College of Education (T) Arochukwu.

Population Study: of the Population for this study comprises two categories of respondents (a) Home economics lecturers in Colleges of education and (b) Interiors and exteriors decoration entrepreneurs in the states used for the study. Records showed that a total of 77 Home economics lecturers were employed from the colleges of Education in the area of the study. All the Home economics lecturers were involved in the study since they were not many. Information from small and medium scale enterprise development offices in the area of study showed that there were 130 interior and exterior decoration entrepreneurs in the area of the study. All the entrepreneurs were involved in study. The total number of respondents was 207.

Instrument for Data Collection: Questionnaire was used for data collection. Responses to the items were based on a 4-point scale of highly required, moderately required, slightly required and not required. The instrument was subjected to face validation. Furthermore, the reliability of the instrument was determined using Cronbach alpha. A reliability coefficient of 0.70 was obtained.

Method of Data Collection: Two hundred and seven copies of the questionnaire were administered to 77 Home Economies lecturers and 130 and exterior decoration interior entrepreneurs of five colleges Education and interior and exterior business through personal contact by researcher and six research assistance. All copies of the questionnaire were dully filled and returned, representing one hundred percent (100%) return rate.

Method of Data Analysis: Data collected were analyzed using mean and t-test. A mean of 3.50 and above were considered highly required (HR);

2.50 – 3.49 moderately required (MR), 1.50 -2.49 slightly required (SR) and 140-0.50 not required. For the test of hypothesis with p <0.5 level of significance were considered significant while p>0.05 were considered not significant. Computations were done using SPSS version 16.0 to ensure the accuracy of their analysis

#### Results

The following findings were made by this study. 10 cognitive, 15 affective and 20 psychomotor content components needed of self-instructional manual for learning interior and exterior decoration **Economics** within NCE Home Programme (Tables 1, 2 and 3) There was no significant difference in the mean response of NCE Home Economic lecturers and interior and exteriors decoration entrepreneurs on 45 of the cognitive, affective and psychomotor content components of the instructional manual (Tables 1, 2 and 3).

Table 1: Mean Responses on (cognitive) content needed for achieving the Selfinstructional manual for Learning Interior and Exterior Decoration in Colleges of Education.

S/N	Components of Cognitive Content	$\overline{X}$ L	RE	<i>X</i> e <i>X</i> e <i>X</i> e <i>X</i> e <i>X</i> e	Re	P-Value	Decision
1	Colour scheme and Harmony	3.81	HR	3.78	HR	0.62	NS
2	Characteristics of a decorator	3.81	HR	3.83	HR	0.73	NS
3	Feasibility study	3.61	HR	3.60	HR	0.89	NS
4	Principles of design	3.74	HR	3.71	HR	0.63	NS
5	Equipment and tools	3.18	MR	3.20	MR	0.87	NS
6	Guidelines for fabric selection	3.34	MR	3.55	MR	0.06	NS
7	Types of Decoration Design/Styles	3.45	MR	3.41	MR	0.63	NS
8	Storage of decoration fabrics	3.65	HR	3.71	HR	0.46	NS
9	Types of decoration accessories	3.32	MR	3.68	HR	0.57	NS
10	Guidelines in flower	3.66	HR	3.68	HR	0.76	NS
	Overall mean	3.56	HR	3.62	HR	0.62	NS

 $\overline{X}L=$  Mean scores of lecturers  $\overline{X}E=$  Mean scores of interiors and exterior decoration entrepreneurs, Re-Remark P-Value = Probability value, HR = Highly required, MR - Moderately required, SR = Slightly, NS = Not Significant.

Table 1 reveals that the respondents (lecturers) in Colleges of Education and interior and exterior decoration that items (1-10) are the contents (cognitive needed for achieving self-instructional manual for learning interior and

exterior decoration within NCE Home Economics Education. This is because the mean ratings of items are between 3.50-4.00 (highly required (HR) and 2.50-3.49 moderately required (MR).

Table 2: Mean responses of Respondents on content (affective) needed for achieving the objectives of self-instructional manual for learning interior and exterior decoration.

	and exterior decoration	•					
S/N	Components of affective	$\overline{X}$ L	RE	<b></b> ₹e	Re	P-Value	Decision
	Contents						
1	Appreciation	3.81	HR	3.83	HR	0.73	NS
2	Creativity	3.81	HR	3.78	HR	0.62	NS
3	Innovativeness	3.61	HR	3.60	HR	0.89	NS
4	Self confidence	3.74	HR	3.71	HR	0.63	NS
5	Task orientation	3.81	HR	3.83	HR	0.73	NS
6	Aggressiveness	3.66	HR	3.65	HR	0.06	NS
7	Honest	3.81	HR	3.78	HR	0.62	NS
8	Taking initiative	3.61	HR	3.60	HR	0.89	NS
9	Patience	3.74	HR	3.71	HR	0.63	NS
10	Good Networker	3.87	HR	3.83	HR	0.75	NS
11	Cheerfulness	3.81	HR	3.83	HR	0.73	NS
12	Politeness	3.66	HR	3.65	HR	0.06	NS
13	Optimism	3.61	HR	3.60	HR	0.89	NS
14	Self-control	3.74	HR	3.71	HR	0.63	NS
15	Risk-taker	3.87	HR	3.83	HR	0.75	NS

 $\overline{XL}$  = Mean scores of lecturers  $\overline{Xe}$  = Mean scores of interior and exterior entrepreneurs, P-Value = probability value, HR = Highly required, MR = Moderately required, SR = slightly required NS = Not significant.

Table 2 shows that the respondents all agreed that items 1-15 are the contents (affective) needed for achieving self-instructional manual for learning interior and exterior decoration within

NCE Home Economics Education. This is because the respondents mean rating were between 3.50-4.00 highly required (HR) and 2.50-3.49 moderately required (MR)

Table 3: Mean responses of Respondents on contend (Psychomotor) needed for achieving the objective of self-instructional manual for learning interior and exterior decoration.

ć	ina exterior decoration.						
S/N	Components of Psychomotor	$\overline{\mathbf{X}}1$	Rc	Xe	Re	Pvalue	Decision
1	Content	2.01	TID	2.70	TID	0.62	NIC
1.	Carry out feasibility Study	3.81	HR	3.78	HR	0.62	NS NG
2.	Select appropriate colored for	3.81	HR	3.83	HR	0.73	NS
2	interior and exterior decoration	0.45	TID	0.67	TID	1.00	NIC
3.	Choose appropriate fabric for	3.47	HR	3.67	HR	1.00	NS
4	decoration	2.00	TID	0.70	TID	0.77	NIC
4.	Operate necessary equipment	3.80	HR	3.78	HR	0.77	NS
_	and tools	2.67	TID	2.70	TID	0.10	NIC
5.	Plan the decoration design	3.67	HR	3.78	HR	0.12	NS NC
6.	Care of decoration fabrics	3.76	HR	3.78	HR	0.75	NS NG
7.	Targeting the interior and	3.66	HR	3.68	HR	0.76	NS
	exterior customers and						
0	customers relationship	0.50	TID	0.55	TID	0.00	NIC
8.	Select the appropriate numbers	3.53	HR	3.55	HR	0.83	NS
0	of fabrics for decoration	2.52	TID	2.50	TID	0.62	NIC
9.	Nailing batten	3.53	HR	3.59	HR	0.63	NS NC
10.	Pleating the fabrics	3.93	HR	3.88	HR	0.23	NS NG
11.	Folding of the fabrics	3.80	HR	3.77	HR	0.69	NS NG
12.	Pining of fabrics on the batten	3.67	HR	3.64	HR	0.80	NS
13.	Joining of fabrics	3.33	MR	3.35	MR	0.89	NS
14.	Separation of the fabrics	3.47	MR	3.48	MR	0.94	NS
15.	Accurate measurement of the	3.66	HR	3.68	HR	0.76	NS
	fabrics for decoration						
16.	Demonstration of pin decoration	3.73	HR	3.78	HR	0.46	NS
	design/style						
17.	Demonstration of rose	3.76	HR	3.78	HR	0.75	NS
	decoration design/style						
18.	Demonstration of spider web	3.39	MR	3.39	MR	0.89	NS
	decoration design/style						
19.	Demonstration of dove	3.56	HR	3.61	HR	0.16	NS
	decoration design/style						
20.	Demonstration of masquerade	3.54	HR	3.52	HR	0.59	NS
	decoration design/style.						

 $\overline{X}L$  – Mean scores of lecturers  $\overline{X}e$  = Mean scores of interior and exterior entrepreneurs, P-Value = probability value, HR – Highly required, MR = Moderately required, SR = slightly required NS = Not significant.

Table 3 reveals that the respondents mean ratings of items (1-20) are between 3.50-4.00 highly required (HR) and 2.50-3.49 moderately required (MR). This implies that all the items are

(psychomotor) content needed for achieving self-instructional manual for learning interior and exterior decoration.

## **Discussion of Findings**

The findings of this study show that all the 40 components content (cognitive, affective and psychomotor) obtained scores mean above (3.50). This implies that each of the components of contents is "highly required". Thirteen of the components are "highly required", with mean  $(\overline{x})$  scores of 3.81-3.93. These "highly required" content components include: scheme and harmony, characteristics of decorator, appreciation, creativity, task orientation, cheerfulness, carry study, feasibility select appropriate colour for interior and exterior decoration, operate necessary equipment and tools, pleating the fabrics and folding of fabrics. These high-mean  $(\overline{x})$  responses tend to suggest that these identified content components (cognitive, affective and psychomotor) are very likely to produce desired educational change in the area of interior and exterior decoration. This is consistent with report of Ogbuanya and Takorede (2008) which emphasized relationship the importance and affective between cognitive, psychomotor content. These finding of high mean responses recorded by the content components (cognitive, affective and psychomotor) ( $\overline{x} \ge 2.50$ ) are in line with the principles of learning outlined by Offorma (2013) as well as the criteria for selecting content outlined Ememoha 2010 and Enem (2019) were all considered during the course of planning the content.

The content components identified in the study are necessary for development of self-instructional manual for learning interior and exterior decoration in NCE Home **Economics** Programme. These components are closely related to interior and exterior decoration competences identified by Okpara (2012), Beth (2010) and Ossai (2019). The content with the highest mean response of  $\overline{x}$ = 3.93 is that concerned with pleating the fabrics. Similarly, good content concerned with networking and characteristics of the decorator recorded  $\overline{x}$  = 3.87 and  $\overline{x}$ = 3.83. This is expected because to successfully established and operate interior and exterior decoration business, the entrepreneur need to posses such characteristics (Nwaokaomah 2010, &Shilong 2015). Offor (2018) and Ugwu (2018) equally agreed that would be interior and exterior decoration entrepreneur should have a reasonable knowledge of interior and exterior decoration before attempting to go into

The study also revealed that only in types of decoration accessories and types of decoration design/styles that Home Economics lectures and interior and exterior decoration entrepreneurs had little differences this may likely be due to their training.

#### Conclusion

The following conclusions were made based on the findings of the study. The Home Economics lecturers and interior and exterior decoration entrepreneurs all agreed that all the 45 content identified were important in developing self-instructional manual for learning interior and exterior decoration in Colleges of Education in South East Nigeria. The cognitive aspect of the

content includes colour scheme and harmony, equipment and feasibility study types of decoration, design/styles. The affective domain aspect of content identified domain content identified aspect of appreciation, honest, creativity, innovation, self-confidence, patience and psychomotor content as carrying feasibility study, select appropriate colour for interior and exterior decoration, plan decoration design, select the appropriate numbers of fabrics for decoration, demonstration of dove, pin, rose, spider web and masquerade decoration design and styles.

## Recommendations

Based on the findings of the study the following recommendations were made:

- 1. The content (cognitive, affective) be utilized in the teaching and learning interior and exterior decoration in NCE Home Economics Programme.
- 2. The content (psychomotor) identified should be used in the practical teaching and learning activities in NCE Home Economics Programme.
- 3. The content (cognitive, affective and psychomotor) identified in the study be utilized in reviewing interior and exterior decoration content in NCE Home Economics programme.
- 4. National Commission for Colleges of Education (NCCE) should increase the theory and practical time for teaching and learning interior and exterior decoration in the official time schedule.

5. The content (cognitive, affective and psychomotor) identified in this study should be used in teaching and learning by other tertiary institutions that offer interior and exterior decoration.

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# **Enhancing Entrepreneurial Activities of Women in Rural Areas of Anambra State: Implications for Home Economics Education**

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#### **Abstract**

This study focused on strategies for enhancing entrepreneurial activities of rural women in Anambra State. Specifically it identified entrepreneurial activities of rural women in Anambra State; determined factors militating against the entrepreneurial activities; and ways of improving the activities. The study made use of survey research design. The population for the study was 115 made up of 35 lecturers of Entrepreneurial Studies and 80 selected rural women in Anambra State. Questionnaire was used for data collection. The instrument was validated by three experts. Mean and standard deviation were used for data analysis. Findings reveal 15 entrepreneurial activities of the rural women including, food service business (X=3.55), palm oil processing (X=3.56); other findings are nine constraints to their entrepreneurial opportunities, including inadequate funds to start a business ( $\overline{X}$ =3.98), lack of advanced market place to do business ( $\overline{X}$ =3.73) and nine ways of promoting the entrepreneurial activities of the rural women entrepreneurs, include, provide financial linkages to rural women  $(\overline{X}=3.70)$ , train women on how to run a small business  $(\overline{X}=3.76)$ . Four recommendations were made. These include that Anambra State Ministries of Women Affairs, Commerce and Industry should adopt the strategies identified in this study to encourage rural women to become entrepreneurs, train them on skills so that they can be able to sustain their livelihood through their income generating ventures.

**Keywords:** Rural Women, Entrepreneurship, Activities, Strategies, Enhancement.

#### Introduction

Rural women are key agents for achieving the transformational economic, environmental and social changes required for sustainable

development. Women play important roles in the rural economy as farmers (production and processing of food), wage earners and entrepreneurship activities such as petty trading, production of household items including family care. In the view of Adesua (2010)women take responsibility for the well-being of the members of their families, including food provision and care for children and the elderly. Women indigenous and grassroots communities are often also custodians of traditional knowledge, which is key for their communities' livelihoods, resilience and culture. Yet, women in rural areas face constraints in engaging in economic activities because of gender-based discrimination and social norms, disproportionate involvement in unpaid work, and unequal access to education, healthcare, property, and financial and other services.

In the opinion of Afza, Hassan and Rashid (2010) rural women workers are likely engage in to employment compared to men and to women in urban areas, and when they do, they tend to earn less than their male counterparts. The author asserted that rural women, on average, are paid 25 per cent less than men and they typically work longer hours. They are also often engaged in labour-intensive work in difficult conditions, which lack occupational safety measures, and social protection. Akanji (2006) stated that women agricultural workers are particularly vulnerable to sexual or other violence and harassment and this sometimes leads to selfdefeatism accompanied with inferiority complex. In the contributions of Blattam et-al (2015) rural women has limited access to credit, health care and education and this have further aggravated by the current global food

economic crises and The author posited empowering them is key not only to the well-being of individuals, families and rural communities, but also to overall economic productivity, given women's large presence in the agricultural workforce worldwide. To sustain these important roles of rural women according to Brush and Cooper (2012) there is every need for rural women to seek opportunities for improving the wellbeing of the families through engaging in entrepreneurial activities.

Entrepreneurship is recognised globally as a critical economic development strategy for job wealth creation. According to the report of the Sustainable Development Goals (SDGs) of UNDP (2016), women's entrepreneurship can make particularly strong contribution to the economic well-being of the family and communities, poverty reduction and women's empowerment. According to Halkhias et.al (2011), entrepreneurship is the pursuit of opportunities without paying much attention to the resources that are currently under control. In the authors view, entrepreneurial means things-managerial skills entrepreneurial attitudes. The growth of the economies of many countries according to Adoram (2011) is due to the increasing participation of women entrepreneurial activities. It is because of guidance and counselling extended to the women in Self Help Groups to unearthen their hidden entrepreneurial capabilities providing skills, knowledge, adoptability and sensitizing towards socio-economic status in the

society. The author posited that a woman who can accept challenges, adventures and an urge to become economically independent transform in to an 'Entrepreneur'. Hafizullah et al (2012) described an entrepreneur as one who operates a new venture and also inherits some risks, and is able to understand the environment where he operates his enterprise. The primary objective of an entrepreneur according to the authors is to make profit and is also prepared to assume responsibilities and bear the risk when it occurs. Akanji (2006) classified rural women entrepreneurs into four groups according to their activities as (1) Producers (2) Sellers (3) Processors (4) Marketers. The author asserted that these rural women either chooses to engage in cultivation of vegetables, fruits, cash crops for food and income, others involve in sales of fruits, nuts, leafy vegetables. Others engage in managing petty shops, bakery, food vending, cassava flour processing among others, while little to none goes into manufacturing for lack of knowledge and skills.

The entrepreneurial activities of the rural women in Anambra State range trading, petty vocational enterprises, handicraft, and farming to agro-processing. The women engage in these entrepreneurial activities for the purpose of earning a living. These entrepreneurial activities include; production and sales of fruits and vegetables, processing of foods (cassava flour), paddy rice parboiling processing, local soap making, broom making and marketing, palm oil marketing, processing and among others. In the view of Nkom (2000), it is incomes yielding informal economic activities by women that make them indispensable in the process of rural development. Most of the women are found in various women groups in the rural areas and they engage in exchange of labour, production, processing and marketing of farm produce. Others include: social groups and consumer cooperatives (Morris and Little, 2005). Some women members engage in voluntary financial contributions which they revolve among themselves and spend them on buying consumer goods at wholesale prices and then selling to members with very little profit. The processing women groups engage in the processing of agricultural products to ready markets and for local consumption. Labour involved women groups are exchange and mutual support on laborious tasks and social pleasure of working together. According to Lakwo (2008), the women groups members to increase their farm output and farm income, increase their opportunity for capital formation, provide services to the members at low cost, ensure sales of the farmer's agricultural produce and other commodities to their best possible advantage and ensure equitable distribution of bonuses to the members from annual profits.

The main challenges these rural women face in business are educational and work background, balancing their time share between work and family, problems of raising start-up capital, difficulty in borrowing fund. In the view of Gupta (2000) due to gender

discrimination girls are socialized differently controlled by social norms, morals, beliefs, practices without any rights and decision-making powers. The author stated that because of these reasons' women entrepreneurs facing many constraints like lack of confidence, dual roles, rigid and male dominated market conditions, lack of proper training, lack of access to financial support, lack of exposure, information about training programmes, lack of access to resources among others. All these according to the author affect the entrepreneurial activities of the women and so affect their income capacity and livelihood. According to Nwachukwu in Osakwe (2012) most rural women in the study area due to lack of proper education remain in dark about the development of new technology, new methods of production, marketing and other governmental support which encourage them to flourish. In the opinion of Tanbunan (2008) economic empowerment of women by micro entrepreneurship led to the empowerment of women in many as things such socio-economic opportunity, property rights, political representation, social equality, personal right, family development, market development, community development and at last the nation development. The author further stated that rural women can do wonders by their effectual and competent involvement entrepreneurial activities. Therefore, in other to enhance the entrepreneurial activities of these rural women in the study area, there is need for a strategy that will enhance their entrepreneurial

capacity and invigorate their businesses for a better living.

Strategy according to Imhonopi and Utrim (2011) is a carefully devised plan of action to achieve a goal. In the view of the authors, strategy is actions resulting from intended plan accomplish a specified goal. Strategies in the context of this study are certain actions that can be carried out to enhance the entrepreneurial activities of rural women for income generation and better livelihood. In the view Annekova (2001),better business education for women, training of women on managerial skills, provision of business counselling, effective microcredit scheme for women are some of motivational strategies successful entrepreneur. The author highlighted some strategies necessary for promoting entrepreneurial activities in rural places as ability to provide farm inputs such as fertilizers to improve agriculture, adequate infrastructural facilities like good roads for evacuation of farm produce for sale, electricity provision for processing of foods, and importantly building of vocational skills centres where potential entrepreneurs will be trained.

Most women small holders in the study area engage in entrepreneurial activities just to take care of their immediate household needs which sometimes are not met. Some of them have been in petty enterprises for years without much success stories to narrate. During an interaction with some of the women petty business owners in the study area, the researchers observed that some of these women have traded for over a decade and had continued to

maintain the same status of living from hand to mouth. There has not been significant growth in their business enterprise. Further inquiries by the researchers revealed that these rural women had maintained their original status because of lack of financial aids to buy farm inputs, no attention of the agricultural extension agents whose responsibility is to educate the farmers, lack of business information, low startup capital coupled with insensitivity of the government over the plight of the small holder farmers and women traders and lack of incentives. This study therefore is premised on these factors to identify the various strategies for necessary enhancing entrepreneurial opportunities/activities of these women in the study area.

## Purpose of the Study

The main purpose of this study was to evolve ways of enhancing entrepreneurial activities of women in rural areas in Anambra State. Specifically, the study:

- 1. identified the entrepreneurial activities of rural women in Anambra state.
- 2. determined factors militating against the entrepreneurial activities of rural women.
- 3. determined ways for promoting entrepreneurial activities of rural women in the study area.

## **Research Questions**

1. What are the entrepreneurial activities of rural women in Anambra State

- 2. What are factors militating against the entrepreneurial activities of rural women
- 3. What are the ways of promoting entrepreneurial activities of rural women in the study area.

## Methodology

Design of the study: The study adopted s survey research design. Survey research design in the opinion of Okafor and Mordi (2010) is that in which the same information is gathered from an unbiased representative group interest. It is a very valuable tool for assessing opinions and trends from representative group of population being investigated through the use of questionnaire. The design considered suitable since the study solicited information from Registered women entrepreneurs and lecturers of Entrepreneurial studies with the use of questionnaire on the strategies for enhancing entrepreneurial activities of rural women in Anambra state.

Area of the Study: The study was carried out in Anambra State, Nigeria. The state comprises four agricultural zones, namely; Aguata, Anambra, Awka and Onitsha. Anambra State is one of the five states of the Southeast geopolitical zones of Nigeria. The State has 21 local government areas (LGA). The climate is suitable for production of different kinds of crops which yam, rice, cassava, include maize, cocoyam and potatoes. Production and processing of these crops are the major farming activities of women and in the rural area. From such activities they earn their living.

Population for the Study: The population for this study was made up of two groups. The first group was made of 80 rural women who were with registered Anambra State Chambers of Commerce and Industry in 2018. The second group was made of 35 lecturers of Entrepreneurial studies in Anambra State University and Nnamdi Azikiwe University, Awka, Anambra state (University Academic Reports (2018). Both groups gave a total of 115 respondents. The entire respondents were involved in the study, because of the manageable size and so sampling.

Collection: Instrument for Data Ouestionnaire was used for collection. It was developed from literature and based on the specific The purposes of the study. questionnaire was structured on a fivepoint likert scale of: Strongly Agreed (SA), Agreed (A), Disagree (D) Strongly Disagree (SD) and Undecided (UD). It was validated by three experts in Entrepreneurial studies. Cronbach Alpha coefficient method was used to test the reliability and a coefficient of

0.78 was obtained for the entire instrument.

Method of Data Collection: A total of 115 copies of questionnaire were distributed to the respondents by hand with the help of three research assistants as follows: Eighty (80) copies were administered to the rural women under the guidance of the research assistants, out of which a total of 72 copies were properly filled, returned and used for data analysis. Also 35 copies were given to the lecturers of Entrepreneurial Studies. All the 33 copies questionnaires were properly filled returned.

Method of Data Analysis: The data were analyzed using mean and standard deviation to answer the research questions. In taking decisions, any item with a mean of 3.50 and above was considered as agreed while any item with a mean of 2.49 and below was considered as Disagreed.

#### Results

Entrepreneurial activities of the rural women in Anambra State

Table 1: Mean Responses and Standard Deviation responses of Rural Women and Lecturers of Entrepreneurial Studies on the Entrepreneurial Activities of the Rural Women in Anambra State

S/N	Entrepreneurial activities	X	SD	Remarks
1	Food service business	3.55	1.00	Agreed
2	Palm Oil processing	3.56	1.13	Agreed
3	Palm kernel sales business	3.73	1.20	Agreed
4	Weaving of cloths	4.09	0.93	Agreed
5	Beancake (Akara)frying business	3.77	1.12	Agreed
6	Plaiting of hair for money	3.98	1.18	Agreed
7	Local soap making	4.02	0.93	Agreed
8	Petty trading of household items	4.06	1.09	Agreed
9	Sales of food condiments	4.10	1.13	Agreed
10	Vegetable/fruits business	3.88	1.11	Agreed

11	Red Palm Oil marketing	3.67	1.16	Agreed
12	Paddy Rice parboiling & Processing	4.03	0.76	Agreed
13	Cassava flour (Garri) Processing	3.71	1.14	Agreed
14	Marketing of Firewood	3.66	1.12	Agreed
15	Making and marketing of brooms from	4.10	1.15	Agreed
	Palms			

Grand mean= 3.8

Table 1 above shows that the respondents agreed to all the item statements listed (1-15) with mean scores ranging from 3.55 -4.10. With the grand mean rating of 3.8 by the respondents, this indicates that developing the business acumen of the rural women on entrepreneurship activities in Anambra State if highly necessary. The standard deviation for

the items for this cluster ranges from 0.76 – 1.18 indicating that the respondents were close to one another in the entrepreneurial activities of the rural women in the study area.

Factors Affecting the Entrepreneurial Activities of the Rural Women in Anambra State

Table 2: Mean Responses and Standard Deviation responses of Rural Women and Lecturers of Entrepreneurial Studies on Factors Militating Against Entrepreneurial Activities of Rural women in Anambra State.

S/N	Factors Affecting Entrepreneurial Activities of the	X	SD	Remarks
	Rural women			
1	Inadequate funds to start a business	3.98	1.11	Agreed
2	Individual ownership of lands affects agricultural businesses	3.66	1.11	Agreed
3	Lack of advanced market places to do business	3.73	1.07	Agreed
4	Poor electricity supply to preserve their goods in the villages	4.05	0.92	Agreed
5	Lack of access to credit facilities to expand business operations	3.57	1.11	Agreed
6	Too many farming activities affects other businesses	3.87	1.02	Agreed
7	Poor business expansion due to dependency on one stream of income	4.18	0.98	Agreed
8	Too much debts from customers	3.89	1.19	Agreed
9	Lack of good roads to market their produce	3.60	1.12	Agreed

Grand mean= 3.8

Table 2 shows that the respondents agreed to all the item statements listed (1-9) with mean scores ranging from 3.60 - 4.18 and were above the cut-off

point of 3.50. A grand mean rating of 3.8 indicates positive perception of the respondents on the item statements listed in that cluster. The standard

deviation (SD) for the items for this cluster ranges from 0.92 indicating that the respondents were close to one another in their opinion on the factors militating against

entrepreneurial activities of women in the study area.

Ways of enhancing the entrepreneurial activities of the rural women in Anambra State

Table 3: Mean Responses and Standard Deviation responses of Rural Women and Lecturers of Entrepreneurial Studies on Strategies for Enhancing Entrepreneurial Activities of Rural women

C/NT	Strategies for enhancing entrepreneurial activities	X	SD	Remarks
S/N	0 1	Λ	SD	Kemarks
	of Rural women			
1	Provide financial linkages to rural women	3.70	1.10	Agreed
2	Train women on how to run a small business	3.76	1.11	Agreed
3	Provide Micro-credit loan scheme for the rural	3.63	1.20	Agreed
	women			
4	Form women into cooperative groups for	4.06	0.95	Agreed
	government intervention			O
5	Construct market stalls for the women in a local	3.87	1.01	Agreed
	market			
6	Provide family and relative support to assist the	3.89	1.13	Agreed
	women			O
7	Link the rural women to local NGOs for assistance	4.08	0.98	Agreed
8	Link the women to Agric. Extension Agents to train	4.16	1.19	Agreed
	them on agricultural produce processing as business			O
9	Attract produce off-takers to buy their goods in the	4.20	1.16	Agreed
	local area			-

Grand mean = 3.9

Table 3 reveals that the respondents agreed to all the item statements listed (1-9) with mean scores ranging from 3.63 - 4.20 and were above the cut-off point of 3.50. A grand mean rating of 3.9 indicates positive perception of the respondents on the item statements listed in that. The standard deviation (SD) for the items for this cluster ranges from 0.95 - 1.19 indicating that the respondents were close to one another in their opinion on strategies for enhancing the entrepreneurial activities of the rural women in the study area.

## Discussion of findings

The findings of the study in Table 1 revealed that all the entrepreneurial activities identified are what exist in the rural and among the women in the study area. All these activities recorded quite high mean responses  $(\overline{x} \ge 3.50)$  which is the cut-off point). The findings are in consonance with the findings of Dimelu and Olaitan (2010) in a study on motivational activity initiatives for enhancing skill empowerment of youths in Home Economics occupation for work towards peace in Niger Delta where it was found that 11 motivational activity initiatives could be provided by the

people, 12 activities could be provided by the government to ensure peace in the region.

The findings of the study in Table 2 also revealed that the 9- item-identified are factors militating against the entrepreneurial activities of the rural women in the study area. This finding agrees with the findings of Akanji (2006) on the study on the Challenges and Prospects of aquaculture practices in Enugu State, where it was found out that financial inadequacy, lack of training, lack of adequate water supply, poor marketing channels, inadequate skills in running an enterprise were some of the factors affecting the smooth running of successful fish farming enterprise in the study area.

In Table 3 the findings revealed the strategies for promoting entrepreneurial activities of the women in the rural areas of Anambra State where they receive income for livelihood. The activities identified by the study is in consonance with the findings of Okafor (2010) in a study on Motivational Strategies for enhancing women's active involvement in root crops processing enterprises in Enugu State, where the author discovered that women are mostly engaged in petty agricultural businesses, hair-do, catering services, fruit/vegetable sales, clothing among others with little involvement agricultural processing (cassava, rice) and marketing enterprises which was found to be more income yielding than petty trades common in the area The study also observed that these women knowledge through their gained projects in managing and controlling productive resources, skill, and experience, and an increase in their ability to source relevant information and solve problems that equip them to become successful entrepreneurs under the guidance of the government and Non-governmental organizations.

## Conclusion

Women in the rural areas play vital roles in the upkeep of their families and in ensuring wellbeing. They also contribute to economic development of the rural areas. They engage in various entrepreneurial activities so as to generate the much needed income for family survival. In doing these they face various constraints. This determined the constraints and ways the entrepreneurial activities of the women could be enhanced for women in the rural areas of Anambra State of Nigeria.

## Recommendation

- 1. The women need be given some training in entrepreneurship in order for them to succeed in their The training ventures. should cover areas such as risk taking, creativity and innovativeness, problem and solving skills and multi-tasking so on.
- gained through These can be workshops, training programmes, mentoring or self-advancement courses. The governments Anambra State and associations (such as NGOs and development partners) in their respective status should play an active role in nurturing these entrepreneurial skills within these women to mould

- successful women entrepreneurs. Whether or not the businesses of these individual women entrepreneurs.
- 3. The women entrepreneurs should form strong associations for their own benefit.
- 4. Government can help the women associations with training in skill acquisition and access to soft loans economies.

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## Divorce Issues among Spouses in Onitsha North Local Government Area of Anambra State

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#### Abstract

The study investigated issues relating to divorce among spouses in Onitsha North Local Government Area (LGA) of Anambra State. Specifically, the study identified causes of divorce in the area; determined perceived effects of divorce on children's development; and ways of curbing divorce. Three research questions were formulated to guide the study. Descriptive survey research design was used. Population was made up of male and female secondary school teachers in Onitsha North LGA. One hundred and forty (140) married male and female teachers were randomly sampled from the secondary schools in the area.. Questionnaire was used for data collection. Data were analyzed using mean. Findings of the study include: 18 causes of divorce in the area; including bareness/childlessness (X=3.56), husband's physical abuse on the wife ( $\overline{X}$ =3.90); 19 perceived effects of divorce on development of children aged 11-15 years, including emotional and difficult to handle ( $\overline{X}$ =3.23), usually unhappy, sad and depressed ( $\overline{X}$ =3.32), among others. Other findings are 12 possible ways of curbing divorce in the area, including divorce should not be legalized so that couples will be discourage from ending their marriage ( $\overline{X}$ =3.64), couples should learn to resolve their differences by themselves (X=3.63), and so on. Six recommendations were made, including, among others, that couples should get premarital training from churches and/or other religious organizations before proceeding with the marriage; there should be at least a one to two years period of courtship before marriage.

Key words: Spouses, Divorce, Causes, Children, Effects, Curbing.

## Introduction

Marriage is very important in any society. This is because stable marriages produce stable families. The society has set up norms and procedures that can guide young people in making decisions which lead to stability in marriage. Marriage is the union of a

man and a woman who have agreed to come together to build a family. Anyanwu and Abiogu, (2012) defines marriage as the union of a man and a woman as husband and wife. Marriage is intended to be a stable and enduring relationship. Marriage marks the beginning of the family since marriage

and procreation are intertwined and inseparable. In fact, married people are accorded more respect and honour as they get to share their love with others, give birth to children, rear them and contribute meaningfully continuity of their various communities. The family, on the other hand is the child's first place of contact to the world. Ezedum (2012) perceived family as the building blocks of all known communities. It is the most important group to which people ever belong. According to Obodomu (2005), it is the unit that remains when all other forms of human organization collapse. The family is a set up which permits parents to provide the children with different types of stimulating interactions that for their equip them future responsibilities (Oshadumo, 2010). The child as a result acquires initial education and socialization from the parents and other significant persons in the family (Igbinosa, 2014). According Anyakoha Souzey and children are seen as great companies in the family as well as taking care of their aged parents. Structurally, Igbinosa (2014) affirms that the family (home) is either broken or intact. A broken home according to Igbinosa is one that is not structurally intact, as a result of divorce, separation, death of one parent and illegitimacy. To be precise, Mole and Dim (2012) affirm that families where children are well spaced and trained by both parents would boast of brighter future and higher socio-economic placement for the children.

Most broken marriages end in divorce. Hence, Iwuagwu and Ogbuji (2015) noted that intimate partner violence which occurs as a result of misunderstanding can lead to divorce. Divorce according to Bubelwa (2014) is a legal process through which a marriage is dissolved. Traditionally, divorce implied that one of the parents is guilty of some transgressions in the marriage and that one was at fault. Historically, adultery and physical cruelty were the only basis for divorce, number later a of transgressions were added such as abandonment, habitual drunkenness and mental cruelty. Divorce considered as unmitigated evil. Broken homes occur when husband and wife separate from each other through either natural causes (death) or by human cause (divorce), leaving the care and responsibility of the children to one parent. According to Keswet and Dapas (2010), single parenthood could result from the death of a spouse. Death is natural cause of why homes tear apart. It is unpredicted phenomenon that has gone beyond anybody's control. It can occur as a result of war, illness, accident and through natural disasters such as flooding, earth quake and plane crash bomb blast. Unfortunately, Nwachukwu (1998) laments the number of children born into broken homes is on the increase by the day especially in Nigeria. According to Bubelwa (2014), children from broken homes are nearly five times more likely to suffer damaging mental troubles than those who live with both parents. This shows that two parents are much better in bringing up healthy children than one. This equally implies that children from broken homes will most likely have difficult time in life. The effects of

broken homes on children traumatic. Broken homes make children to question their self- worth, experience unnecessary grief, guilt or confusion. Young children especially, have difficulty understanding rationalities of their parent's decision to divorce. In a broken marriage, it is difficult for children to find a sense of security because experience shows them that what seemed stable and good fell to pieces and left them empty (Bubelwa, 2014).

Ezeobele and Anyakoha (2010) contend that relationship is a very important part of family life. Parental relationship plays a very important role determining the academic performance of their children in school. Family harmony can easily be affected due to parental conflicts. In fact, Igbinosa (2014) establishes that any laxity on the part of the parents in assisting and guiding the adolescents may result in academic backwardness and development of unwholesome behaviours. The foundation of what a person becomes in the society is laid in the home and at the initial stage of life. Parents therefore have important roles to play in ensuring that their children acquire the appropriate psychological, moral and academic development. They are required to be alive to their responsibility in guiding their children academically and in providing sex and moral education for their children at home.

Unfortunately, the family which is the most important social unit that provides social and economic security to its members such as children is under threat due to rising cases of divorce and separation (Kasoma, 2012). For this reason, schools are likely to have more pupils whose parents have been divorced or separated than ever before. According to Nwachukwu (1998), children from broken homes are more hostile, aggressive, anxious, fearful, hyperactive and distractive children from families that are intact. Most often, such children lack proper guidance and thus take part in obnoxious and anti-academic activities that would leave the ear tingled and nerves frayed.

In Onitsha, most homes are not intact as a result of issues incompatibility of the couples, death of parents and the quest for oversea trips to make money. Some men, who travel abroad, abandon their homes and would not communicate with them for so long thereby leaving such children in dilemmas and the whole family in shambles. Currently, the public outcries of teachers in Onitsha North is on the increase as the secondary schools within the area of study record more negative attitudes of the students towards their school work, drop-out, stealing, fighting, wilful damage of the school properties, poor nutrition and dietary conditions and other emotional problems and disturbances (Ileagu, 2019). When interviewed by Ileagu (2019), ninety five percent (95%) of the teachers traced the origin of the aforementioned problems students' homes, with eighty percent the teachers (80%)of stating categorically that most of the illmannered students in their various secondary schools within the area of study came from divorced homes. It therefore becomes pertinent that a research of this nature be conducted in other to find out the causes of divorce, its implication on the development of the students and to proffer solutions to the problem. Therefore, the present study examines the issues on divorce among spouse in Onitsha North L. G. A. of Anambra State.

## Purpose of the study

The major purpose of this study was to investigate divorce issues among spouses in Onitsha North L.G. A. of Anambra State. Specifically, the study:

- 1. identified causes of divorce among spouses in Onitsha North Local Government Area.
- 2. determined the perceived effects of divorce on development of children aged 11 to 15 years.
- 3. determined the ways of curbing divorce among spouses in Onitsha North Local Government Area.

## **Research Questions**

The following research questions guided the study:

- 1. What are the causes of divorce among spouses in Onitsha North L.G.A?
- 2. What are the perceived effects of divorce on development of children aged 11 to 15 years?
- 3. What are the ways of curbing divorce in Onitsha North Local Government Area?

## Methodology

Area of the study: The study was carried out in Onitsha North LGA of Anambra State. The LGA is a very heavily populated commercial centre. There are civil servants in the area, but

most of the inhabitants are business men and women. There 28 secondary schools in Onitsha North L.G.A (Source: Field work, April 2019). The area of the study was chosen due to the high rate of divorce among the married couples in Onitsha North which affect all round development of children in Junior Secondary Schools.

Population of the study: The target population of the study comprised of all the married secondary school male and female teachers from Onitsha North L.G.A of Anambra State. The accessible population consists of married teachers in public secondary schools in the area of the study. There are 289 married female teachers and 123 married male teachers in public secondary schools in Onitsha North L.G.A (Source: Education Office, Onitsha North L.G.A Headquarters, April, 2019). The population of the study had varied educational qualifications ranging from Nigeria Certificate of Education (NCE) to B.Ed and M.Ed. Their academic exposure and marital status made them more suitable in answering the research questions. They were 25 years of age and above.

Sample for the study: Ten public secondary schools were purposively selected. The sample size for this study consisted of 140 married male and female teachers sampled with the use of stratified sampling technique from the schools. Fourteen (14) married teachers comprising four (4) males and ten (10) females were randomly sampled from each school. In total, 40 male teachers and 100 female teachers were sampled.

*Instrument for data collection*: Questionnaire was used for data collection. It had two sections namely

Section, A and B. Section A contained items eliciting the bio-data of the participants. Section B contained the questionnaire items arranged on a four point scale of Strongly Agree (SA), Agree (A), Disagree (D) and Strongly Disagree (SD). It was validated by three Home Economics lecturers.

Reliability of the instrument was determined through test-retest. Data obtained were correlated using Pearson Moment Correlation technique. Coefficient index of 0.80 was obtained. Data Collection Method: A total of 145 copies of the questionnaire were distributed by the researcher and one research assistant. Only 142 copies were

properly filled and retrieved. This represents 97.93 percent return.

Data Analysis Techniques: Data were analysed using mean. A mean score of 2.50 was used as the criterion mean for decision making for each questionnaire item. Thus, any item with a mean score of 2.50 and above was regarded as "agree" while any item with a mean score below 2.50 was not agreed as an item.

#### **Results**

Causes of Divorce among Spouses in Onitsha North LGA.

Table 1: Mean Responses on Causes of Divorce among Spouses in Onitsha North LGA of Anambra State

		N = 140			
S/	Causes of Divorce	$\overline{X}_{g}$	$\overline{\overline{X_f}}$	$\overline{X}_{g}$	Remarks
Ń		Ö		O	
1	Abandonment by any of the couples	2.20	1.88	1.97	Disagreed
2	Bareness/ Childlessness	3.25	3.69	3.56	Agreed
3	Husband's physical abuse on the wife	3.75	3.97	3.90	Agreed
4	Financial problems/Poverty	3.75	3.60	3.64	Agreed
5	Interferences from parents or in-laws	3.90	3.83	3.85	Agreed
6	Lack of maturity	3.88	3.94	3.92	Agreed
7	Sexual incompatibility/Lack of intimacy	3.88	3.94	3.92	Agreed
8	Cultural and lifestyle differences	2.0	2.0	2.0	Disagreed
9	Religious beliefs and differences	2.5	1.86	2.04	Disagreed
10	Sex of children/Absence male children	3.25	3.66	3.56	Agreed
11	Unemployment	3.83	3.91	3.90	Agreed
12	Loss of job	3.08	3.35	3.27	Agreed
13	Unfaithfulness/ Infidelity or extramarital affairs	2.96	3.34	3.23	Agreed
14	Less education by any of the couples	1.90	1.77	1.80	Disagreed
15	Lack of commitment to their marital	3.50	3.91	3.79	Agreed
	responsibilities				
16	Too much conflict or arguing	3.86	3.90	3.89	Agreed
17	Early marriage	2.93	3.41	3.27	Agreed
18	Substance abuse/addictions	2.10	1.86	1.86	Disagreed
19	Domestic violence	3.56	3.65	3.63	Agreed
20	Lack of support from couples' families	1.90	1.77	1.80	Disagreed

21	Little or no pre-marital education	3.43	3.44	3.93	Agreed
22	Lack of communication between spouse	3.43	3.44	3.93	Agreed
23	Physical appearance of spouse	2.20	1.88	1.97	Disagreed
24	Getting married for wrong reasons/ Wrong marital decisions	3.75	3.97	3.90	Agreed
25	Weight gain by a spouse	2.50	1.86	2.04	Disagreed
26	Unrealistic expectations	3.88	3.94	3.92	Agreed
27	Pre-marital cohabitation by any of spouse before marriage	1.90	1.77	1.80	Disagreed
28	Pre-marital childbearing and pregnancy	2.0	1.93	1.95	Disagreed
29	Divorce on the side of the couple's Parents	1.63	1.80	1.75	Disagreed

 $\overline{X}_m$  = Mean Responses of male teachers;  $\overline{X}_f$  = Mean Responses of female teachers;  $\overline{X}_g$  = Grand Means

Table 1 shows that alcohol addiction, physical abuse, financial problems, interferences from parents in-laws, lack of maturity and sexual incompatibility, absence of male children, unemployment, loss of job, unfaithfulness/infidelity or extramarital affairs, lack of commitment, too much conflict or arguing, early marriage, domestic violence, little or no pre-

marital education, lack of communication, getting married for wrong reasons and unrealistic expectations are the causes of divorce in Onitsha North LGA. of Anambra State. Each of these items has a mean of  $\geq 2.50$ .

Teachers' Perceived Effects of Divorce on the Development of Children Aged 11 To 15 Years

Table 2: Mean Responses of Male and Female Teachers on their Perceived Effects of Divorce on Children

		N=140			
S/N	Perceived effects of divorce on children	$\overline{X}_{m}$	$\overline{X}_{\mathrm{f}}$	$\overline{X}_{g}$	Remarks
1	have problems in concentrating or paying attention in	3.0	3.38	3.27	Agreed
	class				
2	are emotional and difficult to handle	3.28	3.22	3.23	Agreed
3	are not helped with school work	3.83	3.86	3.79	Agreed
4	become truant at school	3.89	3.90	3.89	Agreed
5	Have academic below average performance always.	3.33	3.76	3.63	Agreed
6	are usually unhappy, sad or depressed	3.13	3.27	3.32	Agreed
7	are usually uncooperative and disobedient in class	3.40	3.45	3.93	Agreed
8	usually don't complete their education or drops out of school	3.83	3.60	3.80	Agreed
9	look unhealthy and are hunger stricken (especially those not in boarding schools)	3.60	3.20	3.45	Agreed
10	lose family traditions, celebrations and daily routines	3.25	3.69	3.56	Agreed
11	lose their friends, school environment and other support systems	3.28	3.22	3.23	Agreed

12	get increased verbal aggression and violence from other children	3.0	3.33	3.23	Agreed
13	are anxiety and depressed seem to worsen after divorce	3.0	3.23	3.27	Agreed
14	increased approval of pre-marital sex, cohabitation and	3.75	3.60	3.64	Agreed
	divorce	3.70	3.00	3.04	rigicca
<b>15</b>	have earlier sexual debut	2.0	2.0	2.0	Disagreed
16	increased rate of sexually transmitted infections	2.50	1.86	2.04	Disagreed
<b>17</b>	experience less trust and satisfaction in romantic	1.40	1.24	1.28	Disagreed
	relationships				O
18	are less likely to view marriage as permanent and	2.10	1.86	1.86	Disagreed
	lifelong commitment		_,,,	_,,,	
19	are less likely to cohabit and do so at younger ages	1.53	2.15	1.97	Disagreed
20	are more likely to abandon their faith	3.28	3.22	3.23	Agreed
	,				_
21	have less language stimulation	2.10	1.86	1.86	Disagreed
22	experience increased abuse and neglect of children	3.83	3.86	3.79	Agreed
23	experience increased psychiatric disorder	2.10	1.86	1.86	Disagreed
24	are likely to commit or attempt suicide	2.50	1.86	2.04	Disagreed
25	are likely to developing addiction such as alcohol, drug,	3.50	3.91	3.79	Agreed
	and substance abuse				O
26	dress indecently	2.0	2.0	2.0	Disagreed
27	are prone to stealing/armed robbery	3.83	3.60	3.80	Agreed
28	indulge in heinous crimes such as cyber crimes and	3.25	3.69	3.56	Agreed
	kidnapping				S

 $\overline{X}_m$  = Mean Responses of male teachers;  $\overline{X}_f$  = Mean Responses of female teachers;  $\overline{X}_g$  = Grand Means

Table 2 shows that 19 out of the 28 items have mean  $(\overline{x})$  responses  $\geq 2.50$ . This implies that the respondents agree that 19 items are their perceived effects of divorce on children aged 11 to 15 years.

## Ways of Curbing Divorce in Onitsha North LGA.

Table 3: Mean Responses of Male and Female Teachers on the Ways of Curbing Divorce N=140

	21.0166				1, 110
S/N	Ways of curbing divorce	$\overline{X}_{m}$	$\overline{X}_{\mathrm{f}}$	$\overline{X_{ m g}}$	Remarks
1	Couples should learn to establish mutual commitment	3.83	3.60	3.80	Agreed
	to live together forever.				
2	Couples should get premarital training from churches	3.60	3.20	3.45	Agreed
	and/or other religious organizations before proceeding				
	with the marriage				
3	There should be at least a one to two years period of	3.25	3.69	3.56	Agreed
	courtship before marriage.				
4	Divorce should not be legalized so that couples will be	3.75	3.60	3.64	Agreed
	discouraged from ending their marriages				
5	Religious organizations and marriage counsellors	3.50	3.91	3.79	Agreed
	should educate couples on benefits of making sacrifices				
	in marriages				

6	Children should learn to pray for their parents.	3.86	3.90	3.89	Agreed
7	Wives should learn to submit to their husbands.	3.56	3.65	3.63	Agreed
8	Husbands should learn to treat their wives with respect.	3.13	3.27	3.32	Agreed
9	People wanting to get married should look for partners that share the same beliefs and values with them	3.86	3.90	3.89	Agreed
10	Couples should learn to resolve their differences by themselves.	3.56	3.65	3.63	Agreed
11	Parents-in-laws should not interfere with their children's marriages.	3.13	3.27	3.32	Agreed
12	If there are cases that need the attention of friends, friends should be neutral and not taking sides.	3.83	3.86	3.79	Agreed

 $\overline{X_m}$  = Mean Responses of male teachers;  $\overline{X_f}$  = Mean Responses of female teachers;  $\overline{X_g}$  = Grand Means

Table 3 shows that divorce can be curbed with the joint efforts of the couple, their parents, children, churches, religious organizations, marriage counsellors, friends and the entire society. The Table also shows that each of the 12 items obtained a mean response of ≥2.50. This implies that each item is a possible way of curbing divorce in the LGA.

#### Discussion

Research question No1 sought to find out the causes of divorce among spouses in Onitsha North Local Government Area of Anambra State. **Findings** revealed that bareness, physical abuse, financial problems, interferences from parents or in-laws, lack of maturity and sexual incompatibility are the causes of divorce in Onitsha North Local Government Area. The above findings agreed with the observations made by Kasoma (2012). Furthermore Sondashi (1977) says that marriage is not for weaklings. This seems to be true considering the hardship and problems encountered by married couples. Findings also revealed that absence of male children, loss of job, unfaithfulness/infidelity, domestic violence, lack of communication and getting married for wrong reasons are other causes of divorce in Onitsha North L.G.A. The above findings are in harmony with the submissions made by Fagan and Zill (2011) who uphold that unemployment and unrealistic expectations can lead to an untimely end of marriage. They further insist that people who get married for wrong reasons are likely to separate early, especially when the reasons are not forthcoming. For instance, Raley and Megan (2020)discovered that materialistic women who get married to rich men because of their wealth are likely to ask for annulment if eventually the wealth vanishes.

Research question No2 sought to examine the perceived effects of divorce on the development of the Junior Secondary School Students aged 11 to 15 years in Onitsha North L.G.A. Findings revealed that pupils whose parents have divorced or separated have problems in concentrating with their studies which negatively affects the educational performance of the students since such children are not

helped with school work and sometimes drop out from school. The above view has been previously promulgated by Nwamadi (2018) who upheld that pupils whose parents are divorced or separated are usually unhappy, sad or depressed. To be precise, Bubelwa (2014) affirms that psychological problems which emanate as a result of broken homes invariably lead to poor academic achievement of children in schools. Furthermore, it was discovered that divorce makes children loose their family traditions, celebrations and daily routines. At the event of divorce, Cohen (2019) discovers that the life of the children is interrupted. They may have to move in with one of their parents who may decide to drop some traditions and introduce new routines. Getting used to the new routines may become a challenging task to the children who see it as changes they must get used to whether they like it or not. For instance, Pett, Lang and Gander (1992) stated that the change in residence may lead to loss of friends, school environment and other support systems. Findings also revealed that divorce leads to increased verbal aggression and violence. increased approval (by children of divorced parents) of premarital sex, earlier sexual debut and increased abuse and neglect of children. The above findings are in agreement with the submissions made by Jeynes (2001), Jonsson et al (2000) and Ellis et al (2003). They stated that parents' divorce leads children into having sexual relationships earlier in life, since it is capable of changing the child's outlook on sexual behaviour. In line with the

findings made in this study, Rostosky, Regnerus and Wright (2003) argue thus: "since religious practice has benefits in areas such as sexual restraint, the child of divorced parents may lose this protection". In fact, Myers (1996) clearly stated that children of divorced parents may lose their religious faith and practice. Emotionally, findings revealed that children of divorced parents may be devastated, experience increased verbal aggression and violence on other children. Anxiety and depression seem to worsen after divorce. No wonder, Kelleher et al (2000) & Rings-back-Weitoft et al (2003) conclude that children of single parents are twice as likely to have emotional and behavioral problems. On the other hand, such children are not free from abuse from other children, neighbors and care givers. Hence, CDC reported an adverse family experiences among children in non parental care. They found out thus: "children living with one biological parent were between 3 and 8 times as likely as children living with two biological parents to have experienced neighborhood violence, caregiver violence or to have lived with a caregiver with mental illness or alcohol or drug problem" (Bramlett and Radel, 2014).

Research question No3 sought to recommend the ways of curbing divorce among spouses in Onitsha North L.G.A. Findings revealed that such feat can only be achieved with joint efforts of the Curriculum planners, Ministry of Education, Guidance and Counsellors, Government, School managers and the entire community. The above findings have been previously promulgated by

Lin, Brown, Wright and Hammersmith (2018). Furthermore, Kasoma (2012) suggested that school managers should make every effort to strengthen the relationship between the home and school. Furthermore, the findings are in agreement with the submissions made by Jeynes (2001), Jonsson *et al* (2000) and Ellis *et al* (2003) who insist that the entire society should be involved in waging war against divorce. Hence, they stated that the entire community should be sensitized on the effect of divorce on school going children.

#### Conclusion

The following conclusions were drawn based on the findings of the study: Significantly, the study revealed that bareness/abandonment, physical abuse, problems/poverty, financial interferences from parents and in-laws, lack maturity, incompatibility/lack of intimacy, sex of children/absence of male children, unemployment, loss of job, unfaithfulness/infidelity or extramarital affairs, lack of commitment, too much conflict or arguing, early marriage, domestic violence, little or no premarital education, lack of communication, getting married for wrong reasons and unrealistic expectations are the causes of divorce in Onitsha North Local Government Area State. It was further of Anambra discovered that children from broken homes are not helped with school work, are unhappy, sad or depressed and generally perform poorly academically. Findings also revealed that such children suffer emotional problems such as increased verbal aggression and violence and may abandon their religious faith entirely. Such children may grow wild due to inadequate parental advice and guidance.

#### Recommendations

Based on the findings, the following recommendations were made:

- 1. Husbands and wives should learn to establish mutual commitment to be together and not to stay in a relationship because of constraints such as signing a rent agreement or purchasing furniture together.
- 2. Couples should get premarital training from churches and/or other religious organizations before proceeding with the marriage. In fact, there should be at least a 1 to 2 years period of courtship so that the intending husbands and wives will get to understand themselves before deciding on whether to marry or not.
- 3. Religious organizations and marriage counsellors should educate the couples on the benefits of making sacrifices in their marriage.
- 4. Wives should learn to submit to their husbands and not to argue with them all the time.

On the other hand, husbands should learn to treat their wives with respect so that peace will reign.

5. People wanting to get married should look for partners that share the same beliefs and values with them. Couples should also learn to resolve their differences within themselves and not to invite third parties as the invitation of such may worsen the situation.

6. Parents and in-laws should not interfere with their children's marriages especially when they are not invited. If there are cases that need the attention of friends, friends should be neutral and not taking sides with a view to uniting the couple and making the union stronger.

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## Meal Management Practices of Low Income Households and Related Conflict Issues in Port Harcourt Metropolis

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#### **Abstract**

This study focused on meal management practices of low income households in Port Harcourt Metropolis of Rivers State. Specifically, it determined practices related to meal planning considerations; food purchases, and other issues. Meal preparation and service, as well as related conflict issues. Population for the study was made up of all petty traders, artisans and hired-bus drivers (low-income households) in the area of the study. Purposive sampling technique was used to select the sample. A 4point scale questionnaire was used to collect data. Data were analyzed using mean and standard deviation. Findings of the study include 13 meal planning related considerations of the low income household. There are, among others, financial resources available  $(\overline{X}=3.24)$ , foods that the family members like( $\overline{X}$ =3.34). Other findings are 13 food purchasing and related practices, including making bulk buying  $(\overline{X}=2.33)$ , buying of non-perishable foods ( $\overline{X}$ =3.32), and so on. There also 11 practices relating to meal preparation and service, including; ensure that the environment is clean before cooking ( $X=\overline{3}.33$ ), ensure that vegetable are not over-cooked ( $\overline{X}=3.32$ ), and others. There are further 20 conflict and issues relating to the meal management practices, including individual food choices cause disagreement,) ( $\overline{X}$ =3.63), shortage of rations cause heated arguments  $(\overline{X}=3.22)$ , among others. Five recommendations were made based on the findings.

Keywords: Household, Meal, Management, Conflict, Low-income, Practices

#### Introduction

Food is any substance consumed to provide nutritional support for an organism. It is usually of plant or animal origin, and contains essential nutrients, such as carbohydrates, fats, proteins, vitamins, and minerals. Food is of great importance to man. Food is a basic human need. Bashiru (2018) observed that food is so important that

individuals and families must give it serious attention. Its importance makes meal management a major household concern. This concern is more of a challenged to the low-income households.

A low-income household is one whose income is low, relative to other households of the same size (Winton, 2003; Ahmed, 2018). A household is

commonly classified as low-income, and can be eligible for certain types of assistance, if its income is less than twice the poverty threshold. Foodinsecure and low-income people are subject to the same often challenging influences as other populations in trying to consume a healthful diet and maintain a healthful weight (e.g., more sedentary lifestyles, increased portion sizes) (Edin, 2013; Gable & Lutz, 2011). But those who are food-insecure or low-income also face unique challenges in adopting and maintaining healthful behaviors, as described below.

When available, healthy food may be more expensive in terms of the monetary cost as well as (for perishable items) the potential for waste, whereas refined grains, added sugars, and fats are generally inexpensive, palatable, and readily available in low-income communities (Aggarwal, 2012; Darmon & Drewnowski, 2015). Households with limited resources to buy enough food often try to stretch their food budgets by purchasing cheap, energy-dense foods that are filling - that is, they try to maximize their calories per dollar in order to stave off hunger (Edin, 2013). While less expensive, energy-dense foods typically have lower nutritional quality and. because overconsumption of calories, have been linked to obesity (Kant &Graubard, 2005; Perez-Escamilla, 2012).

Meal management is a process of attaining family food security for proper family functioning. It is a broad process that involves the proper oversight of food selection, preparation, presentation, and preservation (Mmadu, 2016) to ensure satisfaction for

members of the family. Family has a great impact on the foods people eat and how they eat them (McBride, Brotherson, Joanning, Whiddon and Demmitt, 2003). Family meal can also influence family functioning, thereby affecting family relationships (Ibrahim, 2019). Hence, researchers identified effective meal management as a determinant positive family cohesion (e.g. Ibrahim & Mobolaji, 2017; Ibrahim, 2019). Whether for the simplest family meal or for an elaborate dinner, meal management involves the consideration of a number of factors: adequacy and availability of foods, traditions and customs, economic resources, personal likes and dislikes, suitable combinations, seasonability, staying foods, food quality of ease of preparation and meal patterns (Bashiru &Ubah, 2018; Gbenga, 2018; Ibrahim & Mobolaji, 2017).

Poor meal management can result in obstructed family relationships, leading to conflicts in the home. For example, Buchi (2018) noted that proper food management involves making sure that food that is past its prime is not served in the home in order to preserve the health wellbeing of members of the family. In another account, Aldair (2019) reported family conflicts or instabilities resulting from poor food management. The management household foods involves the prevention of food wastage, proper handling, strict buying rules and prevention of spoilage through proper preservation techniques. Abagana, Azizza and Tobiasi (2018) observed tensions in homes which are unable to

provide adequate meals for their members.

Foods often play important roles in family traditions and special occasions. Changing lifestyles such as high standard of living combined with harsh economic circumstances characterize modern cities such as the Port Harcourt metropolis. These circumstances have had a tremendous impact on family eating or meal patterns thereby giving concerns about how they affect family relations. Lifestyle is the way one usually lives. Years ago, many families lived on farms, and their lifestyles focused on daily tasks around the farms. Families tended to be large, and children were viewed as economic assets because they could help with farm tasks (Duru, 2012; Ahmed, 2018). Family eating patterns at that time often involved eating three meals together each day (Winton, 2003). Family members used mealtime as a chance to share the day's events and discuss problems. Many of the foods families ate were produced right on the farm. Mothers generally prepared the family meals. Dishes were hearty to provide family members with the fuel they needed to do physical farm work. In contemporary time, few families live on farms. There are more dual-income families, in which both parents earn a check (Litchfield, Brotherson, Oakland and McClintic, 2005).

In Port Harcourt, as in many urban areas in Nigeria, members of low-income households face high levels of stress and poor mental health (e.g., anxiety, depression) due to the financial and emotional pressures of food insecurity, low-wage work, lack of

access to health care, inadequate transportation, housing, poor neighborhood violence, other factors (Buchi, 2018; Aldair, 2019). While food insecurity remains a major challenge in social milieus such as Port Harcourt metropolis, food, which is a basic need of man, is at the center of concern for many households. Despite the struggle to have access to quality food in the appropriate quantity, the low income families are also confronted with serious meal management problems which usually culminate in strained family functioning usually resulting in conflicts in the home. More so, despite the poor access to quality food by the low income households in Port Harcourt, Rivers State, food crisis remains major challenge determinant of peaceful coexistence amongst the households. While a number of recent studies find associations between food insecurity and stress, depression, psychological distress, and other mental disorders; as well as focusing on the importance of food; ways to manage meals for the optimum family functioning remain a gap in literature. This study was aimed to fill this lacuna.

#### Purpose of the Study

This study focused on meal management practices of low income households and the conflict issues related to such practices in Port Harcourt metropolis of Rivers State. Specifically, the study determined the following meal management practices of low income households:

- 1. meal planning (points to consider);
- 2. food purchases, and other issues.

- 3. meal preparation and service.
- 4. it also determined conflict issues meal management practices of the low-income households.

## **Research Questions**

The study was guided by the following research questions:

What are the low-income households' meal management practices related to:

- 1. meal planning?
- 2. food purchasing, and other issues?
- 3. meal preparation and service?
- 4. what are the conflict issues related to the meal management practices of the low-income households?

## Methodology

*Design of the Study:* The survey design was adopted for the study.

Area of the Study: The study was carried out in the Port Harcourt Metropolis; has an estimated population of over one million according to the United **Nations** Development Programme (UNDP, 2018). This area includes the main local government areas of Port Harcourt - Obio/Akpor and Port Harcourt Municipal. The metropolitan nature and harsh economic circumstances which confront of the inhabitants make the area ideal for the study.

Population of the study: The population for the study was all petty traders, artisans and hired-bus drivers within the Port Harcourt metropolis. Petty traders include small store owners on the street, foodstuffs sellers food peddlers; while the artisans include smaller tailor shop owners, vulcanizes hairdressers and barbers. The last group are the hired-bus drivers who either run

on higher purchase agreement or daily returns. These groups of persons depend on the minimal daily incomes that accrue to them in order to care for the families. This is the reason they were chosen for this study.

Sample for the Study: The sample for the study was 120 petty traders, artisans and hired-bus drivers within the Port Harcourt metropolis. The simple random sampling technique was used select 10 towns namely: Oroworukwo, Rumuobiakani, Borokiri, Marine Base, D'Line, Rumuokwuta, Rumuola, Amadi-Ama, **GRA** Choba from the 32 towns that constitute the Port Harcourt Metropolis. This was done to provide equal opportunities for all the towns to participate in the study. A ballot system was used in which 10 towns were picked at random. Subsequently, the purposive random sampling technique was used to select 4petty traders, 4 artisans and 4 hiredbus drivers from each of the 10 towns within the Port Harcourt Metropolis. The main goal of this sampling technique was to focus on the particular characteristics of the populations of interest.

Instrument for Data Collection: A structured questionnaire form was used to collect data. The questionnaire contained 71 items and was designed on a 4-point rating scale of Strongly Agree (SA) – 4; Agree (S) – 3; Disagree (D) – 2; and Strongly Disagree (SD) – 1. The questionnaire developed from the research and questions and review. The questionnaire was validated by three Home Economics lecturers. The reliability of the research instrument was established using Cronbach Alpha

method. A trial test was carried out using 10 *keke* drivers and 15 market women from Owerri in Imo State. This area has similarities with the study area. This population was not involved in the main study. Date collected were subjected to Cronbach Alpha statistical reliability test to determine the reliability index of the instrument. The overall reliability index was  $0.87^a$  was appropriate for the study.

Data Collection Method: One hundred and twenty copies of the questionnaire were distributed by hand and a hundred percent retrieval of the questionnaires; this was because they were administered by hand and the researcher waited to retrieve them.

*Data Analysis Technique*: Mean and standard deviation were used to analyze the data.

The cut-off score was 2.50 items with mean scores equal and above  $(X \ge 2.50)$  were regarded as agreed, while items with mean below  $(X \le 2.50)$  were regarded as disagreed. All statistical computations were done using the Statistical Package for Social Science (SPSS) 20.0.

## **Results**

The results of the study were presented in the following the Tables 1-4.

Meal Planning Practices of Lowincome Households

Table 1: Mean Responses and Standard Deviation on meal planning considerations of low-income households

S/N	Meal planning considerations	$\overline{\mathbf{X}}$	SD	Remark
	In meal planning low-income households consider:			
1	Children and their food needs	2.42	0.83	D
2	Members and the feeding	2.49	0.81	D
3	Foods that the family members like.	3.34	0.94	A
4	Financial resources available	3.24	0.91	A
5	Pregnant women and their special needs	2.44	0.83	D
6	Quality and quantity of the food	2.38	0.82	D
7	Number of person in the home	2.89	0.91	A
8	How long meal can last	2.71	0.88	A
9	Age of the members	2.17	0.89	D
10	Location of the home (environmental issues) rural/urban	3.10	0.99	A
11	Family food and feeding culture	2.22	0.83	D
12	Keeping family meal time	2.18	0.96	D
13	Identify persons of concern	2.09	0.79	D
14	Keeping members informed of any changes in ingredients	2.15	0.88	D
15	Keeping members informed about changes in rations	2.22	0.82	D
16	Informing members of any challenges on family feeding	2.44	0.97	D
	Grand Mean	2.53	0.80	

Keys:  $\overline{X}$  = mean; SD = Standard Deviation; A=Agreed; D = Disagreed; N= 120

Table 1 shows the mean ratings and standard deviation on low income households' practices related to meal planning considerations. These also represent the considerations that guide them in meal planning. The data reveal that the respondents agreed with items 3, 4, 7, 8 and 10 because these items had grand mean scores of 2.5 and above (X ≥2.50) which is the cut-off mark, while other items were disagreed with

because they had mean scores lower than the cut-off point for decision making. The standard deviation ranged between 0.79 and 0.99. The Table also shows that the highest mean score was 3.34 (item 3) while the lowest mean score was 2.09 (item 13).

Low-income Households' Practices Related to Food Purchasing and Other Issues

Table 2: Mean Responses and Standard Deviation on Low-income Households' Practices Related to Food Purchasing and Other Issues

S/N	Food purchasing practices and related issues	$\overline{\mathbf{X}}$	SD	Remark
1	Making bulk buying	2.33	0.86	D
2	Buying of non-perishable foods	3.32	0.93	A
3	Avoiding purchase of expired foods	3.22	0.92	A
4	Buying fish instead of meat when there is few income	3.23	0.92	A
5	Buying dried vegetables (e.g okra) for use on	3.33	0.93	A
	emergencies			
6	Making large quantity of soups to store in the fridge	3.45	0.95	A
7	Spending time in the processing process	2.01	0.89	A
8	Washing foodstuffs thoroughly	2.91	0.91	A
9	Cleaning the environment before processing	2.88	0.88	A
10	Minimizing quantity for cooking	3.01	0.99	A
11	Avoiding storing food for too long in the refrigerator	2.18	0.79	D
12	Avoiding serving cold foods	2.09	0.98	D
13	Cooking without vegetables when they are expensive	3.62	0.97	A
14	Warming soups constantly to avoid spoilage	3.71	0.98	A
15	Covering stored foodstuffs	3.88	1.01	A
	Grand Mean	2.80	1.37	A

Keys:  $\overline{X}$  = mean; SD = Standard Deviation; A=Agreed; D = Disagreed; N= 120

Table 2 shows the mean rating and standard deviation on the low income households' practices related to food purchases, and related issues. The data reveal that the responses to items 2-6, 8-10, 13-15 were agreed because they had grand mean scores of 2.5 and above ( $\overline{X} \ge 2.5$ ) while item 1 has "disagreed" because it has a mean ( $\overline{X} \le 2.5$ ) score

lower than the cut-off mark. The standard deviation ranged between 0.79 and 101. The Table shows that the highest mean score was 3.88 (item 15) while the lowest mean score was 2.01 (item 7).

Practices Related meal Preparation and Service

Table 3: Mean Responses and Standard Deviation on the Income Households' Practices Related To Meal Preparation and Service

S/N	Practices in Meal Preparation and Services are:	X	SD	Remark
1	ensure that the environment is clean before cooking	3.33	0.93	A
2	ensure that vegetables are not over-cooked	3.32	0.93	A
3	reduce excessive ingredients	3.45	0.95	A
4	avoid talking while cooking	2.22	0.85	D
5	restrict crowd in the kitchen	3.23	0.91	A
6	serve foods in enticing forms	2.20	0.84	D
7	avoid excess rations	3.30	0.92	A
8	serve food in the presence of visitors	2.20	0.87	D
9	ensure the family eats together	2.10	0.90	D
10	allow eating while cooking	3.71	0.99	A
11	eat with children	3.21	0.95	A
12	minimize ingredients that can cause low appetite	2.87	0.81	A
13	minimize salt for older members	2.91	0.86	A
14	wait for spouse before eating	2.08	0.88	D
15	encourage children on eat vegetables	2.01	0.97	D
16	include fruit in diets	1.26	0.93	D
17	ensure cutleries rinsed before service	2.61	0.79	A
18	clean dishes immediately after a meal	2.44	0.76	D
19	encourage adequate water consumption	3.17	0.97	A
20	avoid talking while eating	2.18	0.86	D
	Grand Mean	2.70	0.80	$\mathbf{A}$

Keys:  $\overline{X}$  = mean; SD = Standard Deviation; A=Agreed; D = Disagreed; N= 120

Table 3 shows the means scores and standard deviation of respondents on the low income households practices related to meal preparation and service. The data reveal that the responses to items 1,3,5,7,10-13,17 and 19 were agreed with because they had mean scores 2.5 and above which was the cutpoint while other items (4,6,8,9,14,15,16,18,and 20) were disagreed with because they had grand mean scores of less than 2.5. The standard deviation ranged between 0.97. The Table also shows that the highest mean score was 3.71 (item 10) while the lowest mean score was 1.26 (item 16)

Conflict Issues Relating to Meal Management Practices of Low-income Households

Table 4: Mean Responses and Standard Deviation Conflict Issues Relating to Meal Management Practices of Low-income Households

S/	Conflict Issues Relating to Meal Management Practices of	X	SD	Remark
N	Low-income Households			
1	individual food choices cause disagreement	3.63	0.99	A
2	storage of rations cause heated arguments	3.22	0.93	A
3	cooking without vegetables can be resisted	3.41	0.95	A
4	serving food late causes conflicts in the home	3.28	0.93	A
5	allowing foods to spoil cause conflicts in the home	3.23	0.93	A
6	poor management of food resources cause conflicts	3.29	0.94	A
7	serving the presence of visitors	3.88	1.28	A
8	serving tasteless foods cause disagreements in the home	3.28	0.93	Α
9	poor service causes problem from households	3.01	0.90	A
10	excessive buying causes heated arguments	2.61	0.72	A
11	inability to address specific groups in the planning process	2.82	0.85	A
	causes frictions			
12	serving cold food causes arguments	2.79	0.97	Α
13	food poisoning causes conflicts among members	3.19	1.05	Α
14	allowing food to waste is a source of crisis between couple	2.66	1.07	A
15	cooking/processing meals in a dirty environment breeds conflicts	3.33	0.94	A
16	spending on perishable foods causes frictions	3.26	0.88	A
17	lack of communication in the planning process causes	2.90	1.08	A
	arguments			
18	conflict will erupt from under-fed members	3.22	0.81	Α
19	cooking late is resented in the home	2.898	0.93	A
20	repeating meals consecutively causes conflicts	2.52	0.87	A
	Grand Mean	3.12	1.00	A

Keys:  $\overline{X}$  = mean; SD = Standard Deviation; A=Agreed; N= 120

Table 4 shows the mean scores and standard deviation of respondents on the conflict issues in the various low-income households' practices. The data reveal that the respondents agreed with all the items (1-20) because they had grand mean scores of 2.5 and above ( $\overline{X} \ge 2.5$ ). The standard deviation ranged between 0.72 and 1.28. The Table also shows that the highest mean score was 3.88 (item 7) while the lowest score was 2.52 (item 20).

## **Discussion of the Findings**

The findings on the low income households' practices related to meal planning revealed that the respondents disagreed with the following: consider children in meal planning; the sick is considered in meal planning; pregnant women are considered in planning meals; age of the members; family food culture; keeping to time for meal; identify persons of concern; inform members on changes in ingredients;

inform members on rations; explain challenges to members; and the quality of the food is put above the quantity; while the following were agreed with: consideration for foods that the family like more; financial resources available; the location of the home. These findings are in consonance with Kalwij (2004) who noted that a major challenge for poor families is the inability to make provisions for vulnerable populations such as children, pregnant and lactating women. Ibrahim (2019) and Bashiru and Ubah (2018) also added that low incomes are constantly confronted with inability to make choices when it comes to foods.

special provisions Making special groups in a family's meal plans requires adequate resources. availability of resources to the family has also been found as a major planning determinant of effective (Aldair, 2019). Hence, is arguable that low income families undermine the advantages in adequate meal planning due to weak access to financial resources. However, low income households have limited access financial resources (Houthakker, 2007) hence; they are unable to prepare special provisions for special groups in the midst of inadequate resources. findings revealed helplessness of specific members of the family in meal planning, and this may have tremendous implications family cohesion.

From the research question on the low income households' practices related to food purchases, processing, preservation and storage, the findings revealed that respondents agreed with following: buying of non-perishable foods; making large quantity of soups to store in the fridge; avoiding purchase of expired foods; buying fish instead of meat when there is few income; buy dried vegetables (e.g okra) for use on emergencies; cook without vegetables when they expensive; warm soups constantly to avoid spoilage; and store cover foodstuffs when not cooking. These findings are in agreement with Aggarwal's study (2012) which noted that healthy food may be more expensive in terms of the monetary cost as well as (for perishable items) the potential for waste, whereas refined grains, added sugars, and fats are generally inexpensive, palatable, and readily available in low-income 2012; communities (Aggarwal, Darmon&Drewnowski, 2015).

Households with limited resources to buy enough food often try to stretch their food budgets by purchasing cheap, energy-dense foods that are filling - that is, they try to maximize their calories in order to stave off hunger (Edin, 2013). While less expensive, energy-dense foods typically have lower nutritional quality and, because overconsumption of calories, have been linked to obesity (Kant &Graubard, 2005). However, the respondents disagreed with bulk buying which requires more money; avoid serving cold foods, and avoid storing foods for too long in the refrigerator. These findings are indicators that the low incomes families struggle to effectively manage limited resources. Gbenga (2018) and Aldair (2019) had opined that low income families in urban

centers were more affected by economic disparities.

From the research question on the income households' practices related to meal preparation and service, findings revealed that respondents agreed with the following: ensure that the environment is clean before cooking; ensure that vegetable are not over-cooked: reduce excessive ingredients; avoid excess rations; allow eating while cooking; eat with children; minimize ingredients that can cause low appetite; minimize salt for members; ensure cutleries are rinsed before service; and, encourage adequate water consumption. The results showed that most low-income meal preparers are aware of some but not all key relationships between diet and health; hence the observance of important food safety principles reported in the study. The results are further substantiated by the notion of Abagana et al (2018) who noted that families benefit from existing nutrition education programmes. One of the general knowledge available to many populations irrespective of socioeconomic status is how to ensure vegetables are not overcooked. This ensures the preservation nutrients.

Meanwhile, the results revealed that the respondents disagreed with the following items: avoid talking while cooking; serve foods in enticing forms; ensure the family eats together; clean dishes immediately after a meal; include fruits in diets; encourage children to eat vegetables; wait for spouse before eating. These results are similar to the reports of Mmadu (2016) that at mealtime, families naturally face the

conflicting priorities of time, taste, cost, and nutrition, and they often make decisions that undervalue nutrition. The visual presentation of foods is often considered by chefs at many different stages of food preparation, from the manner of tying or sewing meats, to the type of cut used in chopping and slicing meats or vegetables, to the style of mold used in a poured dish (Buchi, 2018). The results also showed low vegetable and fruits consumption for low income families which show the absence of essential nutrients such as vitamins and minerals. Ibrahim (2019) had opined that fruits and vegetable are significant for optimum health.

Lastly, from the research question on the conflict issues in the various low income households' practices, findings revealed the respondents agreed with all the items as follows: individual food choices cause disagreement; shortage of rations cause heated arguments; cooking without vegetables can be resisted; serving food late causes conflicts; allowing foods to spoil; poor management of food resources cause conflicts: serving in the presence of visitors; serving tasteless foods cause disagreements in the home; and poor service causes problem from husbands. Other results include: excessive buying causes heated arguments; inability to address specific groups in the planning process causes frictions; serving cold foods causes arguments; food poisoning causes conflicts amongst members; allowing food to waste is a source of crisis between couple; cooking/processing meals in a dirty environment breeds conflicts; spending on perishable foods

is causes frictions; lack of communication in the planning process causes arguments; conflict will erupt from under-fed members; cooking late is resented in the home, and, repeating meals consecutively causes conflicts.

These findings are in agreement with the assertions of Mmadu (2016) Ibrahim (2019)that family expenditures and resource management patterns are significant to maintain family cohesion, especially between and wife, husband and amongst members of the family. The implications of the findings are that the patterns of management food can cause disagreements among family members when members do not apply appropriate food management practices, especially among low income families. For example, improper food rationing, consumption of foods that are stale or expired can cause health problems which may result conflicts between couples (Gbenga, 2018). A man can pick up a quarrel with wife over the decision to allow children eat wrong foods that can subject their health to avoidable sicknesses. Also, when any member of the family is sick (especially children), the whole family may be in disarray (Charles&Danziger, 2006b). More so, eating out is a major factor for quarrels between couples. Women generally dislike their husbands eating out, as this is seen as being risky to the relationship, or could cause harm on the family resources. These findings indicate high awareness on how food can cause conflicts in the home.

### Conclusion

This study has shown that there is a strong relationship between family meal management and family peaceful living amongst members of the family. Specifically, the study showed that low income household practices in meal management planning, food purchases, processing, preservation and storage; meal preparation and service practices are affected by their income status. The study validated earlier claims that family cohesion is dependent on families' ability to manage limited resources, as well as the absence of resources. The study further revealed helplessness of specific members of the family in meal planning, and this may tremendous implications family cohesion. More so, it is significant to note that this study has shown that vulnerable populations in low income households may be endangered by poor access to adequate nutrition, resulting from poor meal management practices.

#### Recommendations

Based on the findings of the study, the following recommendations were made:

- 1. Low income households should be enlightened on the significance of prioritizing the nutrition of vulnerable populations such as pregnant women and the sick in their meal plans. This can be done by focusing on low-cost nutrient-rich foods such as vegetables.
- 2. Low income families should be enlightened on the need for food

- safety especially during food preparation.
- Finance education should be encouraged for families through formal and informal means such as community meetings.
- 4. Family communication should be encouraged to resolve avoidable conflict issues regarding food in the home.
- 5. Meal managers should be sensitized by interest groups such as religious organizations, community groups and other stakeholders on methods of food presentation to avoid tension in the family.

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## Promotion of Responsible Consumption for Family Survival: Role of Home Economics

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#### **Abstract**

Families need to consume goods and services in various ways and dimensions in order to survive. This consumption has to be responsible and based on decisions that take cognisance of sustainable development. This is a serious concern for Home Economics which is a family-oriented and multidisciplinary field of study. This paper examined this concern. It presents an overview of the SDGs, discusses Goal 12 which focuses on responsible consumption and development. It also identifies ways of promoting responsible consumption. These ways include, among others, promoting sustainability literacy; changing consumer behaviour and promoting high involvement by industry. It further deals with role of Home Economics in promoting responsible consumption. The role encapsulates research on responsible consumption, awareness creation, teaching consumer education, among others. Eight recommendations for promoting responsible consumption were made. These include, among others, Home economics practitioners should acquaint themselves with the content. Sustainable Development Goal 12, responsible consumption. The paper makes seven recommendations for promoting responsible consumption.

**Keywords:** Responsible, Consumption, Family, Survival, Sustainable, Development, Goals.

### Introduction

The family is a consuming unit. It consumes vital goods and services in order to survive. Preponderance of such goods and services abound in the society. Families need to consume available goods and services with caution as some of them could be inappropriate for human consumption.

Consumption has to be responsible and be based on informed decisions that take into cognisance sustainable development. This is done by ensuring that the current consumption does not ieopardise ability the of future generations to meet their consumption needs. Such consumption would require that consumers be well informed about

their rights and responsibilities, the threats and opportunities of the emerging technologies. Responsible consumption is so important that in features prominently in the Sustainable Development (SDGs) as Goal 12.

Since Home Economics is primarily concerned with family wellbeing, evolving ways of promoting survival becomes a crucial concern for Home Economics. Home Economics is multidisciplinary and an evolving field of study that according to pendergast (2008) deals with the relationship between individuals, families, and communities, environment which they live in. It draws from a range of disciplines to promote optimal and sustainable living for individual, families and communities. It teaches peoples of all gender important life skills for management.

This paper focuses on promotion of responsible consumption for living survival. It covers

- a review of the SDGs
- \* major targets of Goal 12
- ways of promoting responsible consumption.
- role of Home Economics in promoting responsible consumption.

# Sustainable Development Goals (SDGs)

The sustainable development goals offer a vision of fairer, more prosperous, peaceful and sustainable world where no one is left behind. The sustainable development goals (SDGs) are a collection of 17 global goals set by the United Nations General Assembly in 2015 for the 2030. The SDGs include:

- No poverty
- Zero Hunger
- Good health and well being
- Quality education
- Gender Equality
- Clean water and sanitation
- Affordable and clean Energy
- Decent work and Economics Growth
- Industry innovation and infrastructure
- \* Reducing Inequality
- Sustainable Cities and Communities
- Responsible consumption and production
- Climate action
- Life below water
- Life on land
- Peace, Justice and Strong Institutions
- Partnership to achieve the goals

These goals are broad based and interdependent. They all have a list of targets that are measured with indicators. Looking at the 17 SDGs the SDGs goal 12 which is Responsible Consumption and Production is the one that relates to this paper. It basically encourages industries, business and consumers to recycle and reduce waste.

Responsible Consumption can be seen as a transition to sustainable consumption and production of goods and services. It is required to reduce the negative impact on the climate and environment, and people's health.

- Developing countries are greatly affected by climate change and other environmental impacts, which lead to increased poverty and reduced prosperity.
- It involves using resources to affect the ecosystem and reducing the impact of dangerous chemicals in order to ensure not only

environmental benefits but also social and economic benefits.

# SDGs Goal 12: Responsible Consumption and Production

CSR and Sustainable development Commitments Media Platform (2019) defined responsible consumption as a way of consumption that is beneficial to the economy, it has a positive impact on society and acknowledges the impact of products' different stages. It is beneficial to the economy as it allows goods and services to be traded, benefitting the agents involved in the trade. It has a positive impact on society as the products or services are linked to a workforce that has fair wages, working conditions and they are also positive goods or services for the buyers such as health. It also acknowledges the impacts associated with products' different production, stages (from its transportation and disposal) and tries to buy the ones with a lower impact (United Nations, 2019).

Responsible consumption means being mindful about what, how and how much is produced and consumed so that the earth resources are used judiciously and are preserved for future generations. It is important because human being's exert extreme stress on the planet and its resources. (Lama, 2018)

The consumer is an individual who pays some amount of money or the thing required to consumer goods and services produced. She/he could also be a person or organization that use or consumes economic service or commodities (Wikipedia, 2019).

**SDGs** Goal 12: Responsible consumption and production is geared toward achieving economic growth and sustainable development by reducing ecological food print that is changing the way we produce and consume goods and services. Noting Agriculture is the biggest user of water worldwide, and irrigation now claims about 70% of all freshwater for human use. The efficient management of our shared natural resources, and the way dispose of waste toxic pollutants, are important targets, to achieve the goal. Encouraging industries, businesses and consumers to recycle and reduce waste is important, as is supporting developing countries to towards more sustainable patterns of consumption by 2030.

It also states that a large share of the world population is still consuming far too little to meet even their basic needs. Halving per capital of global food waste at the retailer and consumer levels is also important for creating, more efficient production and supply chain. This can help with food security, and shift us towards a more resource efficient economy

SDGs Goal 12 is important because it underpins every other sustainable Development Goal, from zero poverty to peace and justice. Its idea creates lots of resistance since it poses a significant threat to the status-quo despite being a great social environmental and economic opportunity. People must now look for ways of doing better and more with less. It is vital to note that particular SDGs cover the consumers and business sectors, and also basic services supply chains. Better jobs and

an improved life quality for all (MDG Monitor, 2016).

Going further it stated that the key proposal of SDGs 12 is to reduce the with the inequality associated utilization of essential natural resources. Developed nations are asked to lead the adopting sustainable way consumption and production practices. In effects it will be possible to enhance the livelihoods. For example, reducing food waste may have an effect on lowering worldwide food prices thus benefitting the poor, improving the purchasing power of poor people must ideally be changed with increased sustainable consumption awareness.

global simply looks at a population with deteriorating natural resources and increased urbanization which implies that more people to feed with less water, farmland and rural labour. To achieve the expected increases in water, energy and food means shifting needs more sustainable production and consumption approaches. Food and Agricultural Organization of the United Nations (Food and Agriculture Organization of the United Nations, 2019).

### **Major Targets of SDGs Goal 12**

The major target of SDGs Goal 12 as stated will, require essential change on how the society operate, including issues relating to livelihood. It involves a collective societal transformation. Proposed targets for SDGs Goal 12 are to:

 successfully implement the proposed 10-years guideline of programs on sustainable production and

- consumption, with every country taking action to their best capacity.
- achieve the efficient use and sustainable management of all-natural resources by 2030.
- reduce universal food waste in the consumer and retail levels and also lessen food losses in supply chains and production, including losses related to-harvesting.
- achieve the eco-friendly management of chemical waste throughout its life cycle, based on determined global frameworks, and considerably reduce their pollution of soil, water, and air to reduce their negative effects on our environment and human health.
- profoundly lower the generation of waste through recycling, reuse prevention and reduction.
- encourage companies, particularly large transnational organizations to use sustainable practices like integrating sustainability data in their reports.
- promote sustainable public procurement policies in line with national priorities and policies.
- Ensure that everyone in the world has awareness and relevant knowledge of sustainable lifestyles as well as development in agreement with nature.
- support developing nations to increase their technological and scientific capacity so as to moving towards sustainable production and consumption patterns.
- develop and adopt tools for monitoring effects of sustainable development for a more sustainable tourism, which creates employment

- opportunities and promotes the local products and culture.
- Streamline inefficient subsides for fossil fuels that promotes wasteful consumption through eliminating market distortions based on the national context, through phasing out the harmful subsides and restructuring taxation.

SDGs Goal12 seeks to open a new world to humankind, where not just a few people undertake sustainable consumption, but when reducing, reusing preventing and recycling will be common for everyone. The effects of such a sustainable lifestyle go beyond preserving the earth's natural resources as it can help in reducing the increasing widening gap between the rich and the poor (MDG Monitor, 2016).

# Ways Promoting of Responsible Consumption for Family Survival

Responsible consumption for sustainable family survival could be promoted in the following ways:

**Promoting Sustainability Literacy**: This can be described as the knowledge, skill and mindset that allow individuals to become deeply committed to building a sustainable future and assisting, in making informed and effective decision. It is a way of raising awareness and assessing Sustainable literacy on SDGs 12.Today's complex problems require solution based on the integration of social quality, ecological integrity and economic systems. According education Awuzia (2019),higher institutions play a salient role in shaping the attitude and disposition of graduates sustainable towards

aspirations. He goes further to say that this makes it imperative that these institutions adopt Sustainability tenet as a common thread across the entirety of their activities- research, teaching and learning as well as other operational facets. Such integration will lead to further enlightenment and knowledge concerning sustainable development members the among of higher educational institution. More sustainable ways of operation in Home Economics should be introduced and taught to families to help them adopt responsible consumption patterns.

Convening Partnership for Sustainable Development: This is to cover gaps and create a more coherent response at scale by pooling expertise and assets across United Nations entities. Success partnership for SDGs Goal 12 will necessarily include industries to achieve target through wide scale implementation on the supply side.

Changing consumer behaviour: This is very important. It helps people to adapt new methods of doings things, their operations, and overall business. They are very relevant in the overall operation of how human and material resources are employed, how consumer preferences and how markets are shaped or designed.

Promoting High Involvement / Commitment by Industry: Here the industry should be interested in eradicating pollution of water, air and land on which people/ communities depend, especially those in slums, and

poverty particularly with regard to chemicals and waste management.

Creating Joint Awareness Creation and Capacity Development: It is necessary to create enhanced awareness of responsible consumption among all stakeholders.

Evolving integrated policy- making and implementation at the national level: This can be done to ensure responsible consumption.

Promoting advocacy for corporate responsibility: This calls for join campaigns calling out businesses with unsustainable practices.

*Being committed to the SDGs*: All stakeholders need to stay in touch with the global goals (The Global Goals, 2019).

*Financing the shift*: There is the need to finances a shift or movement to sustainable consumption and production. Sustainable finances, coupled with capacity building, to equity, ensure inclusiveness and identify and address other outstanding issues and string to achieve the relevant SDGs Goal 12 targets.

Focusing on supply chain: It is also necessary to focus on supply chain, involving everyone from producer to final consumer. This requires educating consumer on sustainable consumption and life styles, providing them with adequate information through standards and labels and engaging in sustainable activities.

Other consumer education related ways of promoting responsible consumption include:

- Shop, eat and drink locally supporting neighbourhood business keeps people employed and circulate money back into your community.
- ❖ Be conscious of packaging the less the better
- Buy from companies you know have Sustainable practices and don't harm the environment.
- Decrease the amount of food waste you produce through planning and preparation of the exact quantity of food you can eat.
- Choose reusable products. Use an eco-bag for shopping, a reusable water bottle or a cup to reduce your plastic waste.

## Role of Home Economics in Promoting Responsible Consumption for Family Survival

Informed and responsible consumption is vital for family survival. Home Economics is a multidisciplinary familyoriented field which is continually evolving new ways of enabling family enhance their survival (Anaykoha 2013). Thus, the promotion of responsible consumption which the **SDGs** emphasise, among other things, should be an important concern for Home Economics and the practitioners. They should respond to this concern in as many ways as possible, including but not limited to:

**Research:** Home Economic research should focus on all issues relating to family, including the issues relating to responsible consumption for families. Findings from such research should be

used for advocacy, also inform relevant curriculum, practices, etc.

Awareness creation: Home Economics programmes, teaching, workshops, seminars, etc, should promote awareness for individuals families and communities on responsible consumption practices.

**Consumer education:** Home Economics education programmes at various levels of education should promoted sound consumer education.

Teaching responsible consumption: This concept and related practices should be emphasized in teaching all aspects of Home Economics at all levels of education.

### Conclusion

Responsible consumption is very important for family survival. It also has positive influence on the environment and economy. Since it relates to the family, it is a serious concern for Home Economics. There is need to evolve promoting responsible ways consumption. This paper has discussed relating to responsible issues consumption for family survival. It covers a review of the SDGs, major targets of Goal 12, and ways of promoting responsible consumption. It further enumerated some of the roles of **Economics** in promoting responsible consumption

## Recommendations

To ensure promotion of responsible consumption; the following recommendations are made:

❖ Home economics practitioners should acquaint themselves with the content, substance of the Sustainable

- Development Goal 12 which deals with responsible consumption and production.
- ❖ There should be frantic effort to achieve the stated targets of Goal 12.
- Home Economics curriculum at all levels should emphasize responsible consumption, along other things.
- More research work on issues of responsible consumption and production as it affects energy, waste and pollution management in the homes and communities, should be encouraged.
- Home economics professional development programmes /seminars, workshops should be regularly organised on issues of sustainability, responsible consumption and family survival.
- ❖ A responsible consumer should try to avoid as much waste as possible. In doing so, one is likely to favour a more ecologically friendly consumption of food.
- Consumers should be conscious of the fact that daily purchases have impact on the environment and be mindful of this impact when making purchasing.

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## Utilization of Textile Stencil-Printed Articles for Interior Decoration by Households in Okigwe Local Government Area, Imo State Nigeria

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#### **Abstract**

This study focused on utilization of textile stencil-printed articles for interior decoration among households in Okigwe Local Government Area (LGA) of Imo State. Specifically, it identified textile stencil-printed articles utilized by households in the study area, determined constraints to utilization of the articles, and ways of enhancing utilization of the articles. Survey research design was used. Population for the study comprised of homemakers in 2049 households. Questionnaire was used to collect data. Means and standard deviations were used for data analysis. Findings include 24 types of textile stencil-printed articles used for interior decoration, including curtains, throw pillows, bed sheets/bed covers, among others; 18 constraints to utilization of textile stencil-printed articles, including, inadequate skills, high cost of the textile stencil-printed articles, inadequate materials for textile stencil-printing, and so on. 16 ways of enhancing the utilization of textile stencil-printed articles. These include, among others, enlightenment/reorientation for homemakers on patronizing textile stencil-printed articles, improvement of available skills on producing textile stencil-printed articles. Five recommendations were made for enhancing the utilization of textile stencil-printed articles for interior decoration.

**Keywords:** Interior, Decoration, Utilization, Textile, Stencil-printed, Articles.

### Introduction

Man has always sought for ways to create for himself pleasant environment that would relatively give him a sense of satisfaction and pride. Hence, the conscious effort to decorate and produce wide range of interior decoration articles is one of the ways (Onwuasoanya, 2013). According to him, decoration means all that makes up the appearance of a room or the stage. A house always has interior and external areas. Interior means situated within while interior decoration is the dual art

of planning and producing interior structures for basic function, comfort, convenience and aesthetic appeal (Ford, 2016). It is the art of decorating a residential home. commercial business area according to personal preferences and style. Amirkasra (2019), stated that the focus of interior decoration is to use interior details. which involve surface treatment like, flowers, selecting colours, use accessories, flooring materials, artwork, furnishings and other articles to create a beautiful space that meets the physical and psychological needs of those that will live there. The goal of interior decoration is to improve the user experience by better managing the space available in the intervened environment area. It plays a key role in shaping the spaces we live in and therefore have the liability obligation to create spaces that meet those needs.

Limited space calls for interior design and decoration to make the living and working space comfortable, beautiful and practical (Kusum and Surender, 2017). It is made up of walls, floors, windows and doors, and these are the main parts shaping interior spaces. They are gathered together to define the space enclosure as they are functionally related to each other (Ching, 2005). Butterworth (2000) asserts that spaces and buildings are more than just props in people's lives. Thev are embedded with deeper and cultural personal meaning, resonance and simultaneously personal symbolize customs, relationship, people's interpersonal values and sense of belonging. As a basic necessity, it should cater for safety and shelter. However, in order to cater for people's wellbeing, a place needs to be able to give its inhabitants a sense of belonging and a sense of identity, a place for both privacy and social interaction and this is what interior decoration tends to accomplish. It transforms an area into an aesthetically pleasing and budget friendly design.

In planning and designing for interior decoration in the home, one must basically consider the content of quality design for the person and purpose of decoration (Ford, 2010). The decoration of the interior of the home provides a revealing portrait of its inhabitants (Alan, 2013) and 2013), because homes are often perceived as an enclosure of comfort where objects of interests satisfaction are displayed to make for relaxation and enjoyment. Thus, there is usually the desire to make the interior of a home become a source of aesthetic pleasures, decorated with items that are beautiful, affordable as well entertaining. The interior decoration of homes may be considered as suitable opportunity for demonstration of one's culture, skills and potentials of various crafts. Often, the products of various designing techniques are mostly the items used to ignite beauty and excitement in the interiors of the homes (Magnani and Rivista, 2000). In the modern society, interior decoration of the home goes beyond decorating only with our commonly used flowers and ornamentals but involves different types of decorative materials in the entire rooms such as living room, kitchen, bathroom, toilet and bedrooms.

Other articles used for interior decoration include pottery, greeting cards, pictures, sculptures, collage wallpapers, wall hangings and textile crafts, among others.

Textile crafts are produced and beautified using different techniques. Such techniques include crocheting, quilting, weaving, tie dyeing, batik, printing, and others. Printing is a technique of expressing ideas, activities or emotions in pictures on any possible surface through manual or mechanical means, such surfaces can be textiles, papers and others. Printing is widely used in various styles on different surfaces which includes textiles. Textile printing according to William et al, 2015), is the application of colour ants in definite repeated patterns to a fabric, yarn or silver Stewart(2012) (Shelton, 2013), asserted that there are multiple hand printing techniques that can be used to add cute patterns to everything one owns. According to Banjoko, (2000) in Kuso (2018), there are various types of printing techniques such as block printing, roller printing, screen printing stencil printing and others.

Stencil-printing is one of the printing methods and it uses an angled blade called a squeegee to press a viscous material through pre-defined aperture in a solid foil on to a substrate. It is a method of transferring a pattern by blushing, spraying or squeegeeing ink or paint through open areas of a stencil cut from metal or cardboard. Stencil printing of fabric, apparel, wall hangings and room dividing screens, is an inexpensive easily performed and versatile art. The versatility shows its

use on surfaces of papers, woods, cardboards, metals, glasses, leather, plastics and textiles among others. Stencil-printed textiles can be used to produce different articles for interior decorations, such as quilted sheets/covers; curtains, cushion covers; and others it can provide employment for homemakers and other interested people, thereby providing additional income to the family. The art of stencil printing is not new, it has been applied to the decoration of different surfaces such as textiles for a very long time by the Japanese and the usage has increased employment in Europe for certain class of decorative work on woven goods for furnishing purposes (Kuso 2018).

Utilization means to make profitable or effective use of items or materials, which is textile. Textile utilization involves, deciding how to purchase or obtain and use it which includes sewing it for purposes such as articles for interior decoration which the homemaker uses to decorate the home interior. However, from observation and some literatures, homemakers use different products in beautifying their homes but textile stencil-printed articles for interior decoration are one aspect that has not been properly explored in Nigeria especially in Okigwe LGA of Imo State. The introduction of imported textiles and its products changed the taste of Nigerians. This has affected indigenous contemporary hand and crafted products which include interior decoration articles produced textile stencil-printed articles. This has resulted to hand crafted crafts, which

include textile stencil printed articles gradually losing its value and identity. Therefore, to promote the hand crafted crafts, there is need to bring it to the fore and it is on this premise that the researchers find it pertinent to embark on the study: Utilization of textile stencil-printed articles for interior decoration by households in the study area.

## Objectives of the study:

The main objective of this study was to assess the utilization of textile stencil-printed articles among households in Okigwe LGA of Imo State. Specifically the study;

- 1. identified textile stencil-printed articles used by households for interior decoration in Okigwe LGA.
- 2. determined the constraints households encounter in the use of textile stencil-printed articles in interior decoration
- determined ways the use of textile stencil-printed articles for interior decoration could be enhanced among households in Okigwe LGA of Imo State

## **Research questions**

- 1. What are the textile stencil-printed articles for interior decoration used by households in Okigwe LGA?
- 2. What are the constraints encountered in the use of textile stencil-printed articles for interior decoration by households in Okigwe LGA.?
- 3. What are the ways to enhance the use of textile stencil-printed articles for interior decoration by households in Okigwe LGA?

## Methodology

*Design of the study:* The study was carried out using survey design involving the use of structured questionnaires to collect data from respondents.

Area of the Study: The geographical location of this research work is Okigwe Local Government Area of Imo State. Okigwe is the third largest city, after Owerri and Orlu, in Imo State. The city lies between the Port Harcourt-Enugu and Maiduguri rail line. It has a population of 132,237 (2006, Census). Most of the inhabitants are mainly civil servants and Abia State University students from other states. The city was the primary host site of the old Imo State University (now, Abia State University). Okigwe has various tourist The historical sites. Federal Government College in the city has remained one of the best unity schools in Nigeria. The city remains one of the food baskets of Nigeria with terrace cultivation practiced on its farmlands. The inhabitants use different materials in interior decorations among which are wall papers, floor coverings, curtains, bed sheets/ bed covers made of different designs.

Population for Study: the The population for the study comprised 2049 households. The female homemakers were the unit of observation/respondents .In Okigwe Local Government Area of Imo State; most occupants are mainly immigrant workers who are mainly middle income earners. Some are traders followed by

servants and some peasant farmers. A large number of the occupants are literate. Okigwe LGA comprise five Autonomous of Communities and twenty five villages. Sample for the Study: Multi-stage sampling technique was adopted. Okigwe Local Government Area of Imo five Autonomous Communities (ACs). These are made up of 25 villages. The five Autonomous Communities were involved in the study. The second stage involved purposive selection of five villages from each autonomous communities and this gave a total of 25 villages. In the third stage, simple random sampling technique was used to select 13 households from each of the 25 villages to give a total of 325 households. From each household, a female homemaker was selected for the study, giving a total of 325 home makers.

for Data Collection: Instrument Questionnaire was used for collection. It wasmade up of two sections: A and B. Section A had auestions on bio data of the respondents. Section B comprised of questions based on the three research questions. A four point scale was used for rating thus: Strongly Agreed (SA), Agreed (A), Strongly Disagreed (SD), and Disagreed (D) with values. 4, 3, 2, and 1 assigned respectively. The Instrument was validated by three experts (Lecturers) from Home Science

Department, Michael Okpara University of Agriculture, Umudike. The contributions of validators were reflected in the final draft of the instrument. determining the In reliability of the instrument, a pilot study of the research instrument was carried out to ascertain the adequacy of the instrument. To achieve this, ten questionnaires were distributed to ten female homemakers in Ikwuano L. G .A, which was not part of the research area. The questionnaires were collected analyzed to determine effectiveness of the research instrument. The reliability coefficient value for the pilot study was 0.89.

Data Collection: Three hundred and twenty five copies of questionnaire were distributed to the respondents with the help of research Assistants. Three hundred and fifteen copies were properly filled and returned.

Data Analysis Technique: Means and standard deviation were used for data analysis. The mean was calculated by assigning nominal values to the response categories. Strongly Agree (SA); Agree (A); Strongly Disagree (SD); Disagree (D) with values 4, 3, 2 and 1 assigned respectively. The criterion level was 2.5 and any value below 2.5 was regarded as disagreed while above 2.5 was regarded as agree.

Findings of the Study

Table 1: Means Responses on Types of textile stencil-printed articles utilized by households for interior decoration in Okigwe L.G.A

S/No	Stencil-printed textile articles	utilized	by	X	SD	Remarks
	households for interior decoration					
1	Curtains			3.31	1.09	Agreed
2	Table mats			3.30	1.08	Agreed
3	Pillow cases			3.08	1.05	Agreed
4	Wall hangings			3.11	1.17	Agreed
5	Table cloths/covers			3.13	1.05	Agreed
6	Headrest for chairs			3.31	1.02	Agreed
7	Quilted Bed sheets			3.32	0.97	Agreed
8	Shower curtains			3.09	1.05	Agreed
9	Wall tidy bags			1.54	1.02	Disagreed
10	Television covers			3.07	1.04	Agreed
11	Oven gloves			3.11	1.16	Agreed
12	Pot holders			3.06	1.02	Agreed
13	Table napkins			3.08	1.05	Agreed
14	Glass cup covers			3.11	1.17	Agreed
15	Bed covers			3.30	1.08	Agreed
16	Mattress covers			3.13	1.06	Agreed
17	Draperies			3.25	1.16	Agreed
18	Cushion Covers			3.34	1.00	Agreed
19	Armrest			3.35	1.04	Agreed
20	Throw pillows			3.36	0.98	Agreed
21	Food covers			3.06	1.02	Agreed
22	Foot mat			3.08	1.05	Agreed
23	Sewing machine covers			3.11	1.16	Agreed
24	Computer covers			3.24	1.15	Agreed
25	Cupboard covers			3.11	1.16	Agreed
26	Keyboard/organ covers			158	1.05	Disagreed

**Foot note:** Mean ( $\overline{X}$ )=, SD=Standard Deviation

Table 1 shows the result of stencil-printed textile articles utilized by households for interior decoration in the study area. The mean  $(\overline{X})$  scores ranged from 1.54-3.36 and standard deviation of 0.97 to 1.17. Item no 20 throw pillows, had the highest mean response of 3.36 and SD of 0.98 while items no 9, wall tidy bags, had the least mean responses of 1.54 and SDs of 1.02. The mean scores in 24 items out of the

26 items identified were above the criterion level which is 2.5 while the standard deviation in all the responses showed that SD dispersion is low, therefore, it is agreed that the respondents utilized 24 printed articles identified. Items no 9 and 26 had mean responses below the criterion level. This signifies that the articles were not utilized by households in the study area.

Table 2: Mean Responses on constraints to the use of textile stencil-printed articles for interior decoration among households in Okigwe L.G.A.

articles for interior decoration among households in Okigwe L.G.A.						
S/	Constraints to the use of textile stencil-printed articles	X	SD	Remark		
N	for interior decoration among households in Okigwe					
	LGA					
1	Lack of knowledge about the textile stencil-printed	3.11	1.16	Agreed		
	articles by home makers					
2	High cost of the textile stencil-printed articles	3.09	1.05	Agreed		
3	Inadequate skills in utilizing textile stencil-printed	3.13	1.06	Agreed		
4	articles Inadequate production of the stencil- printed textile	3.25	1.16	Agreed		
1	articles	0.20	1.10	rigicca		
5	Inadequate skills in stencil-printing	3.30	1.08	Agreed		
6	Inadequate materials for stencil- printing	3.74	0.73	Agreed		
7	Inadequate equipment for stencil -printing	3.06	1.02	Agreed		
8	Articles not produced within the city	3.73	0.76	Agreed		
9	Lack of interest in the use of textile stencil- printed	1.56	1.16	Disagreed		
	articles.					
10	Inadequate income of households	3.06	1.02	Agreed		
11	Home makers dislike textile stencil-printed articles for	1.67	0.96	Disagreed		
	home decorations.					
12	Inadequate enlightenments on the uses of textile stencil-	3.32	0.97	Agreed		
10	printed articles	2.20	1 00	A 1		
13	The articles fade easily.	3.30	1.08	Agreed		
14	Low quality of the textile stencil-printed articles.	3.08	1.05	Agreed		
15	Lack of diverse creativity in design of textile stencil- printed articles.	3.31	0.89	Agreed		
16	Stencil-printed textile articles are not attractive.	1.45	1.05	Disagreed		
17	People question the durability of the textile stencil-	3.25	1.16	Agreed		
	printed articles.	o. <b></b>	1,10	1181000		
18	Inadequate awareness of the existence of the textile	3.06	1.02	Agreed		
	stencil-printed articles.					
19	Lack of technological knowhow	3.53	0.79	Agreed		
20	Too many family responsibilities	3.34	1.00	Agreed		
21	The articles are very scarce	3.11	1.16	Agreed		

**Foot note:**  $\overline{X}$  =Mean, SD=Standard Deviation

Table 2 shows the results on the constraints in the utilization of textile stencil-printed articles for interior decoration in the study area. The mean responses ranged from 1.45 - 3.74 with standard deviation of 0.73 - 1.16. Respondents agreed that nineteen (19) constraints affect the use of textile

stencil-printed articles in the study area. This was arrived at based on fact that nineteen (19) constraints in the use of textile stencil printed articles for interior decoration in the study area listed, had mean responses above the criterion level (2.5) and the standard deviation values were low in all the responses,

which signifies that the values are close to the means. Item no 6,inadequate materials for stencil-printing had the highest mean response of 3.74 followed by item no 8,articles are not produced within the city with the mean response of 3.73 and standard deviation of 0.76 while item no16, stencil-printed textile articles are not attractive, had the lowest mean response of 1.45 and standard deviation of 1.05. The results also revealed that the responses on three of the constraints had low mean responses.

These items are no 9, lack of interest in the use of textile stencil- printed articles with the mean response of 1.6, item no 11,lack of interest in the use of textile stencil-printed articles with the mean response of 1.56, and item no16, textile stencil-printed articles are not attractive with the mean response of 1.45 This shows that the respectively. respondents disagreed that these constraints mentioned do not affect them in the use of stencil-printed articles.

Table 3: Means Responses on Ways the Use of Stencil-Printed Textile Articles for Interior Decoration could be Enhance

S/N	Ways To Enhance The Use Of Stencil Printed Articles.	X	SD	Remark
1	Introduce the stencil-printing skill in the skill acquisition centers, primary secondary and tertiary institution entrepreneurial education.	3.32	0.99	Agreed
2	Improvement of available skills on stencil-printing of textiles	3.06	1.02	Agreed
3	by incorporating into poverty alleviation programmes . Enlightenment/Reorientation on patronizing stencil-printed textile articles	3.11	1.17	Agreed
4	Organizing workshops where people will learn how to make stencil-printed textile articles.	3.36	0.98	Agreed
5	Conduct exhibitions to showcase different articles made of stencil-printing.	3.74	0.73	Agreed
6	Value addition to textile stencil-printing.	3.73	0.76	Agreed
7	Organizing training on textile stencil-printing skills.	3.08	1.05	Agreed
8	Developing the interest of homemakers through home economics education from the grass root.	3.04	1.03	Agreed
9	Encouraging innovations and creativity among the youths through sponsorships by government and non-governmental agencies.	3.74	0.73	Agreed
10	Job creation by government to improve homemakers' income.	3.73	0.74	Agreed
11	Empowering the homemakers and youths through skill acquisition in textile stencil- printing.	3.74	0.75	Agreed
12	Producers should improve on the colour fastness of the articles.	3.24	1.17	Agreed
13	Durable fabrics should be used in producing stencil-printed textile articles.	3.32	1.03	Agreed
14	The technical knowhow for stencil-printing should be taught in Nigerian schools.	3.07	1.06	Agreed

- Different designs of the articles for decoration should be 3.11 1.17 Agreed produced using stencil-printed fabrics.
- Articles that promote indigenous cultural heritage should be 3.33 0.98 Agreed produced.

**Foot note;**  $\overline{X}$ =mean, SD=standard deviation

Table 3 shows the mean and the standard deviation of the respondents on ways of enhancing the utilization of textile stencil-printed articles for interior decoration in Okigwe LGA. respondents agreed to all the items listed as ways of enhancing utilization of textile stencil-printed mean responses articles with the ranging from 3.08 to 3.74 and SD values of 0.73 to 1.17. The responses to the items were all agreed on, since their means were above the criterion level 2.5 and the SD is close to the mean values. The item no 3, enlightenment on patronizing homemade textile stencilprinted articles had the highest mean score of 3.74 and standard deviation of 1.15, while item no (6) which stated that value should be added to textile stencilprinted articles had a mean response of 3.73 and SD of .0.76. Item no (2), improvement of available skills on textile stencil-printing articles by poverty incorporating alleviation programme, had the least response of 3.06 and standard deviation of 0.73.

### **Discussion of findings**

The findings of the study on textile stencil-printed articles used by households for interior decoration in Okigwe L.G.A, revealed that the articles utilized include, pillow cases, curtains, table clothes and wall designs among others. The findings were in line with Alan (2013) ,Onwuasoanya (2013),

Dalhar, et.al, (2017) and Kusum et al (2017), conceded to the fact that pillow cases, sofa, curtain, table cloth, wall design and headrest are among the major ways of utilizing textiles and its products for interior decoration in the homes. Also Gbadebe, et al, also supported that textile fabrics made of indigenous and contemporary methods are used for interior furnishings such as table cloth, napkins, and curtains among others.

Also revealed from the findings, the respondents agreed that the possible constraints on the use of textile stencilprinted articles for interior decoration in the homes are; lack of knowledge about the textile stencil-printed articles, high cost of the printed articles, inadequate skills in utilizing the textile stencilprinted articles, low quality of the printed articles among others. This was supported by Alozie (2017), who asserted that these are the main constraints that affect the use of textile stencil-printed materials in interior decoration. The findings of this study is also in agreement with Anyakoha (2015), who reported that inadequate finance, inadequate skills, others, are some of the constraints on the use of stencil products for interior decoration in the homes. Gbadebe et.al, (2019), in his work pointed out that decline in the use of some indigenous fabric where due to lack of funds for the producers, high cost of raw materials,

original designs been copied by foreign companies such as china and produced cheaply

further revealed The findings possible ways the use of textile stencilprinted articles for interior decoration could be enhanced. The respondents agreed that the following measures; enlightenment/reorientation patronizing textile stencil-printed articles is one of the ways of enhancing the use of textile stencil-printed articles. This is supported by Onwuasoanya (2013), who stated in his work that, though few people make use of window blinds, bed sheets, armrests, table cloths and pillow cases made of textiles, that there is need for the general public to be enlightened on the role and usefulness of textiles and its products for interior decoration in our homes. Improvement of available skills on stencil-printed articles is another way of enhancing the use of stencil- printed textile articles as revealed from the findings of this study. This is in line with (Oluwambe, et al, 2020), who stated that skill acquisition is a key factor of production and textile industries Cottage provide opportunities for the development of local skills and technology acquisition. The authors further stated that it is an avenue for the creation of local entrepreneurs in several areas of cottage textile production which includes stencil textile printing. The study as well revealed that value addition, innovations and creativity to stencilprinted articles will help to enhance the utilization of stencil- printed textile articles. This is supported by Emmanuel (2014), Richard et al, (2018) and Onwuasoanya (2013), who their in

works stated that innovation and creativity are the hallmark to the survival of handcrafted textiles which has been affected by the influx of imported textiles. Other findings as revealed by the study are as follows, incorporating poverty alleviation programme, value addition to hand printed textiles by using the textiles to produce different articles for interior decoration so as to encourage people to patronize the stencil-printed articles among others, should be adopted in enhancing the utilization of textile stencil- printed articles for interior decoration in the study area.

#### Conclusion

Textile stencil-printing should be used in producing varieties of interior decoration articles like wall hangings and room dividing screens, curtains, wall papers, armrests, among others. It is an inexpensive easily performed and The skill in making versatile art. stencil-printed articles could enhanced through entrepreneurial education, exhibitions, among others, to enable people learn the skill and equally develop interest in utilizing the items.

## Recommendations

Based on the findings, the following recommendations were made

1. Conferences, seminars and workshops should be periodically organized on stencil- printing techniques for households by NGOs' that handle crafts and skill acquisition, Home Economists and other concerned agencies in Okigwe Local Government Area of Imo State.

- 2. Entrepreneurial education on the use of stencilling techniques should be pursued with vigour in all Colleges of education and other tertiary institutions where Home science is offered.
- 3. The products of the local crafts should be popularized by producing varied intricate designs so that they could enjoy wide patronage from many Nigerians.
- 4. The skills in stencil printing techniques should be incorporated into the entrepreneurial studies of schools from primary school to tertiary institutions.
- 5. Creativity and innovations should be introduced to stencil- printed textile articles by producers.

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## Nutrient Composition and Sensory Properties of Cake Made From Wheat (*Triticum Aestivum*) and African Yam Bean (*Sphenostylis Stenocarpo*) Flour Blends

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#### Abstract

The general objective of this research was to assess nutrient composition and sensory properties of cakes made from wheat (Triticum aestivum) and African yam bean (Sphenostylis stenocarpo) flour blends. Specifically, it determined the proximate composition, sensory evaluation and general acceptability of the cakes. Experimental design was employed. Wheat flour (WF) was supplemented with African yam bean flour (AYBE) and used to bake queen cakes at various ratios (WF/AYBE 100:0, 80:20, 75:25, 50:50, 0:100). The 100% WF cake served as control. A 9-point hedonic scale was used for data collection. Proximate analysis was carried out using standard methods. Results of proximate analysis showed significant increase (p<0.05) in protein content (9.2-17.4%), ash (3.7-5.5%) and crude fiber (0.14-1.80%) in AYBE supplemented cakes. There was also significant decrease (p<0.05) in carbohydrate (70.26-63.1%) and fat (17.7-13.2%) contents. There was no significant difference (p<0.05) in moisture contents (14.4-14%) of test samples. Sensory evaluation results showed that all cakes samples had high rating for all evaluated attributes. The 20% and 25% AYBE supplementation compared favourably with control (100% WF). Cakes form other supplementation levels were generally acceptable as they were neither liked nor disliked.

**Keywords**: Flour, Cakes, Attributes, Blends, Proximate, Sensory, Evaluation.

### Introduction

Most snacks are poor sources of protein and the protein that is present is often of poor nutritional quality. This is because they are prepared mostly from plant food products especially cereals wheat (*Triticum aestivum*) or starches. It is possible to improve the nutritional quality of starchy combination with

more available plant protein like legume (Akpapunam and Darbe, 1993; FAO, 1988). Therefore baking with wheat or starchy crops alone does not provide the necessary amino acids, thus the need to blend with legume flour.

Legumes belong to leguminosae family which is the largest family seed plants. It has about 600 genera with

13000species but only twenty species are wildly cultivated in various part of the world and form a part of human diet in appreciable amounts (Mudambi, Rajagopal, 2009). There are rich in protein, iron, B vitamins which makes them excellent food when eating in small amount. Some contain carotene (vitamin A); some also have extra value of being rich in oil. Examples are the various groundnuts ad probably most valuable underexploited food crops which can be promoted are the legumes ad the nuts (Subbulakshmi and Udipi, 2008).

The diversification of food use of some unknown and uncommon legumes for families is imperative considering the ranging high cost of living and inflationary rates in Nigeria. One of the consequences is that low and middle income families in Nigeria cannot afford the other first class proteins like meat, fish, milk, etc. There is therefore need to explore the use of some unknown and known legumes as foods in the production of snacks especially for children and adults.

African yam (Sphenostylis bean stenocarpo) is one of the less known legumes that are commonly traditionally prepared from moistures of grains, legumes, cereals and small amount of vegetables or animal protein consumed in many tropical countries. In west Africa other legumes like cowpea are eaten or consumed with cereal in dishes like rice and beans, jollof rice, yam pottage, akara and pap, maize and beans, moin-moin, etc. (Ihekoronye, and Ngody, 1985).

There are some special forms legumes are consumed traditionally.

However, not many people know these forms. Consequently the consumption rate of the legumes tends to be low in spite of their high nutritional values. There is therefore need to evolve ways of processing some of these legumes to diversify their food use and value. This is because the availability of processed legumes forms primarily whole, husked legumes and flours can promote legume increased consumption. Traditional methods of dehulling in West African involve sundrying and wet milling or soaking. The African yam bean used drying method, since it was processed into flour.

Cake is a conventional snack produced from wheat (Triticum aestivum) flour with other ingredients. In a country like Nigeria where there is malnutrition due to deficiencies in protein and calories which contributes to more than half a million deaths of newborn (Onyezili, 1999). African yam bean can be utilized as a complementary protein in carbohydrate based foods to their nutritional Incorporation of African yam bean flour into wheat based products make the foods useful protein and energy sources with good nutritive value. This study thus seeks to prepare and evaluate the nutrient composition as well as the acceptability of cakes produced from wheat and African yam bean blends. The aim is to promote the diversification and utilization of African yam beans

The study is expected to create awareness on the diversified food use of the known legumes especially African yam beans. This is because as this beans is used in the preparation or production of cakes which is different from the traditional uses (boiling, it would provide information that may enhance the maximum utilization and diversification and diversification of the available use of the beans. This would be through seminars and workshops, in churches, local communities, nutrition talks in schools and cooking demonstrations.

## **Objectives**

The general objective of this research was to assess the nutrient composition and sensory properties of cake made from wheat (*Triticum aestivum*) and African yam bean (*Sphenostylis stenocarpo*) flour blends. Specifically the study determined:

- 1. proximate composition of the cakes
- 2. sensory characteristics and general acceptability of the cakes.

## **Materials and Methods**

**Design of study:** The study used experimental design; it developed five blends of:

Wheat flour (WF), 100%, = AW<sub>0</sub> Wheat flour/ African yam bean 80:20 WF/AYBE (AW<sub>I</sub>)

Wheat flour/ African yam beans 75:20 WF/AYBE (AW<sub>2</sub>)

Wheat flour/ African yam beans 50:50 WF/AYBE (AW<sub>3</sub>)

African yam beans 100% 100°G/AYBE (AW<sub>4</sub>)

Materials: Wheat flour and African yam bean were obtained from Abanwan village in Erei, Biase Local Government Area Cross River State of Nigeria. African yam bean seeds were sorted, washed, sun dried and weighed. The seeds were roasted for 10 minutes and

milled using a laboratory hammer mill (model ED-5, Thomas Wiley, England) and sieved into fine flour with a 1mm mesh sieve. The purchased wheat) flour was sieved using the same mesh screen to obtain same particle size with African yam flour.

Parts of wheat flour (WF) were substituted with 20%, 25%, 50% African yam bean flour (AYBE) by weights. Each blend was separately mixed in a Philip blender (FIR 2811 model) for three minutes at high speed. The various flour blends were packed separately in airtight plastic containers till needed.

**Preparation of Cakes:** The cakes were prepared according to the method described by Ukam,( 2014); Ceserani, Kinton, and Foskett, (1995) as follows:

- 1. The fat and sugar were creamed together until fluffy (double in size) using a wooden spoon in a stain less steel bowl
- 2. This was followed by the addition of the liquids (beaten eggs and milk).
- 3. The sieved flour with salt and baking powder were gradually folded into the cream (mixture).
- 4. The baking tins were greased with fat and the mixture was poured into the tin and
- 5. Baked at oven temperature of 180°c for 20 minutes.

**Formulation of flour blends** (composite flours): The wheat and African yam flours were formulated as follows: Parts of wheat flour (WF) were substituted with 20, 25, and 50% African yam and African yam beans substituted as follows: 80, 75 and 50% respectively.

Each blend was separately mixed in a Philip blender (FIR 2811 model) for three minutes at high speed to ensure a thoroughly blend. They were then packed separately in an airtight container till when they were used.

## The preparation of the cake samples were as follows:

Wheat flour 100
African yam bean flour100
Sugar 80
Eggs (beaten) 4
Milk 60mls
Baking powder 5
Salt to taste

Procedures for Preparation of the **Cakes:** For the first sample of flour (composite flour): The constituted only the wheat flour of 100%. To this flour baking of powder of 5g and salt a pinch of salt was added. Fat and sugar were creamed until fluffy, after which the beaten eggs and milk were added to the cream and mixed very well to incorporate air. The flour was added gradually and turned until the mixture was smooth. The cake washed tins were greased with fat and then the cake was poured into it and then put into a pre-heated oven of 220°c for 30 minutes. It was removed from the tin and allowed to cool for chemical analysis and coded for sensory evaluation.

Chemical Analysis: Proximate analysis for the cake samples was carried out using Association of Official Analytical Chemists (AOAC, 2005) method. This method was used to determine the nutrients composition, including moisture, protein, fat, fibre, ash and

carbohydrate content was estimated by simple difference. The percentages of protein, fat, ash, fibre and moisture were subtracted from 100% to obtain the value carbohydrate. The caloric value was calculated by multiplying values obtained for carbohydrate, fat and protein respectively and taking the sum of the products.

## **Sensory Evaluation**

Selection of panel: Staff and students of the Department of Home Economics, Cross River State College of Education, Akamkpa were involved in the study. A 15-member panel comprising of eight staff and seven students (one male) (six females) were randomly selected amongst the members of staff and students of the Department of Home Economics, Cross River State College of Education, Akamkpa was used for the sensory evaluation.

Data Collection: The study was carried out under white light in the food laboratory within the Department in the midmorning hours (10am). laboratory was quiet without noise and/or interruption. The panelists were separately seated, each provided with a glass of clean tap water to rinse their mouths between the five evaluation sessions of three minutes interval. The 100% wheat flour cake served as control. The five cake samples were presented in two digits coded white plastic plates and were evaluated for colour, texture, flavour, taste general acceptability.

Instrument for Sensory Evaluation: The attributes that were evaluated are colour, taste, appearance, flavour,

texture and overall acceptability using a 9 point hedonic scale in which I represents the least score (dislike extremely) and 9 the most desirable score (like extremely) for any attribute (Dias, Faria, Mercadante, Bragagolo and Banass, 2007).

Data Analysis: Means were separated using Duncan's Multiple Range Test significantly (DMRT) and judged confidence level different at 95% (p<0.05).

Findings of the Study

Table 1: Nutrient Composition of Cakes from WF, AYBE and WF/AYBE Blends

Parameters	S	Samples			
Parameters	$AW_0$	$AW_1$	$AW_2$	AW <sub>3</sub>	AW <sub>4</sub>
	WF:AYBE	WF:AYBE	WF:AYBE	WF:AYBE	WF:AYBE
	100:0	80:20	75:25	50:50	0:100
Moisture	14.4a	14.21a	14.19a	$14.08^{a}$	$14.0^{a}$
Crude protein	9.2a	11.41 <sup>b</sup>	11.52 <sup>b</sup>	16.11 <sup>c</sup>	$17.40^{d}$
Crude fat	16.7a	$16.30^{a}$	16.00 <sup>b</sup>	$14.90^{\circ}$	13.20 <sup>d</sup>
Crude fiber	$0.14^{a}$	$0.52^{b}$	$0.68^{b}$	$1.10^{c}$	1.80 <sup>d</sup>
Ash	3.7a	4.12 <sup>b</sup>	4.51 <sup>b</sup>	$4.95^{b}$	$5.50^{c}$
Carbohydrate	70.26a	67.65 <sup>b</sup>	67.29a	62.94 <sup>b</sup>	62.1 <sup>b</sup>
Caloric value	$468.14^{\mathrm{a}}$	462.94 <sup>b</sup>	459.24 <sup>b</sup>	450.3 <sup>b</sup>	436.8d

WF-Wheat (Triticum aestivum) flour: AYBE African yam bean (Sphenostylis stenocarpo) flour a,b,c,dValues on the same row with different letters are significantly different at P<0.05

Table I shows that the proximate composition of the cakes samples which indicated the moisture composition ranging from 14g (AW<sub>4</sub>) to 14.21g W.F: AYBE respectively. Protein ranged from 9.2g (AW<sub>0</sub>) to 17.40 (AW<sub>4</sub>) each. Fibre was between 0.14 (AW<sub>0</sub>) and 1.80 (AW<sub>4</sub>) respectively. Ash content ranged from 3.7g AW<sub>0</sub> to 5.50g (AW<sub>0</sub>). CHO was between 62.1g (AW<sub>4</sub>) to 70.26g AW<sub>0</sub> and caloric value ranged from 436.8g (AW<sub>4</sub>) ton 468.14g AW<sub>0</sub>.

Table 2: Sensory Evaluation Scores for Cakes Samples

Sample	Colour	Texture	<b>Parameters Taste</b>	Flavour	General acceptability
$AW_0$	8.0a	8.3a	7.9a	8.1a	7.9a
$AW_1$	$7.8^{a}$	8.1a	$7.5^{a}$	$8.0^{a}$	7.8 <sup>a</sup>
$AW_2$	$7.6^{a}$	7.8 <sup>b</sup>	$7.0^{b}$	$7.5^{b}$	7.5 <sup>a</sup>
$AW_3$	$7.0^{b}$	7.8 <sup>c</sup>	6.6 <sup>c</sup>	$6.8^{c}$	6.2 <sup>b</sup>
$AW_4$	$6.8^{b}$	6.3 <sup>d</sup>	6.3 <sup>c</sup>	$6.0^{d}$	5.8 <sup>b</sup>

AW<sub>0</sub> 100%WF cake; AW1 - 80:20; AW<sub>2</sub> - 75:25; AW3 50:50 WF: AYBE respectively; AW<sub>4</sub> 100% AYBR where WF wheat flour: AYBE African yam flour a,b,c,d Values on the same row with different letters are significantly different at P<0.05

Table 2 shows the sensory evaluation indicated the color values ranged from

between 6.3 (AW<sub>4</sub>) to 8.3 (AW<sub>0</sub>); taste 6.3 (AW<sub>4</sub>) to 7.9 (AW<sub>0</sub>); flavour 6.0 68% (AW<sub>4</sub>) to 8.0 (AW<sub>0</sub>), texture ranged (AW<sub>0</sub>) to 8.1 (AW<sub>4</sub>) and general acceptability ranged from  $5.8 \text{ Aw}_4$  to  $7.9(AW_0)$  respectively.

### **Discussion of Findings**

Result of the nutrient composition of cakes produced from wheat (Triticum aestivum) and African yam (Sphenostylis stenocarpo) flour blend (Table I) showed that protein, crude fiber and ash) from cake AW (100% WF) to AW<sub>4</sub> (100% AYBE) differed when compared with control. The parameters increased with African vam bean (Sphenostylis stenocarpo) flour. Wheat (Triticum aestivum) flour like other cereals is limiting in lysine and typtophan but rich in sulphur containing amino acids, methionine and cystine. The reverse is the case for African yam bean (Sphenostylis stenocarpo) flour (Ene-obong Carnovale, 1992). The proteins of wheat (Triticum aestivum) flour yam bean flour thus complement each other's limiting amino acids, thus, producing cakes of better nutritional quality. The utilization of lesser known legumes that are cheaply available and equally rich in protein reduces protein energy malnutrition resulting from high cost of animal protein and commonly accepted legumes like cowpeas.

The higher fiber and ash content of cakes produced for WF/AYBE blend further justifies the nutritional importance of African yam bean (Sphenostylis stenocarpo). The utilization of fiber rich leguminous plant food in developing countries to combat high incidence of diabetes has been of considerable interest in recent years. The resultant effect of utilization of WF/AYBE (AW<sub>4</sub>) blend will increase

intake of dietary fiber and subsequent reduction in the prevalence of chronic diseases.

There was no significant difference in the moisture content of the blends when compared with the control (14.40 vs 14.21 vs 14.19 vs 14.08 and 14.00) respectively, indicating that the blends competed favourably with the control wheat (Triticum aestivum) flour. This implied that there is increase in their shelf life. However, there was a significant difference in the crude protein content of the blends especially with AW<sub>4</sub> (17.40g) when compared with high control AW<sub>0</sub> (9.2g). This indicated the high content of protein of African yam bean (Sphenostylis stenocarpo) flour (Subbulakshmi and Udipi, 2008). Again, there was also significant difference in their fat contents especially for AW<sub>4</sub> (13.20g) when compared with the control AW<sub>0</sub> (16.70g), indicating that yam bean (Sphenostylis African stenocarpo) flour could be used both at home and confectionary industry for especially the obese, hypertensive ad diabetes patients.

The ash content also differed significantly more especially for African yam bean (Sphenostylis stenocarpo) flour  $AW_0$  (5.50g) when compared with control AW<sub>0</sub> (3.7g). This is an indicative of the higher mineral content of African yam bean (Sphenostylis stenocarpo) over the control. The carbohydrate value of bean (Sphenostylis African yam stenocarpo) flour was lower (62.1g) than the control AW<sub>0</sub> (70.26g) and differed significantly. The caloric value of the control (wheat (Triticum aestivum) flour) was much higher (70.2g) than African bean yam (Sphenostylis

stenocarpo) flour  $(AW_0)$  62.1g. There also significant difference (p<0.05). This indicated that the cakes (snacks) produced from African vam flour ad blends could be used for weight control and the diabetics. The fibre value of African yam bean (Sphenostylis stenocarpo) flour AW<sub>4</sub> (1.80g) differed significantly with the control (0.14g) and other blends. This that African yam showed (Sphenostylis stenocarpo) flour could be utilized in the production of cookies, cakes, snacks and foods for the obese (those watching their weight and the diabetes). Therefore, the utilization of less known legumes that are cheaply available and rich in protein could reduce protein energy malnutrition resulting from high cost of animal protein and commonly accepted legumes like cowpea.

There was a significant difference in the color attribute of the control, wheat (*Triticum aestivum*) flour over the blends of AW<sub>3</sub> and AW<sub>4</sub>. There was also significant difference in the texture of the control AW<sub>2</sub>, AW<sub>3</sub> and AW<sub>4</sub>. This may be due to the increase in supplementation of African yam bean flour to wheat flour which is serving as control. The taste of the wheat flour (control) differed significantly with the taste of the blends of AW<sub>2</sub>, AW<sub>3</sub> and AW<sub>4</sub> respectively. This is also as a result of the supplementation ratio of African yam bean flour increase to wheat flour control and probably the beany flavour. This was also the trend for the flavour attribute.

The results of the study also show a significant decline (p<0.05) in carbohydrate and fat content hence,

lower caloric values of cakes from WF/AYBE blends. This implies that it could be a good snack for the diabetic and the obese people.

The most significant decrease was observed in the cakes made from 50% AYBE supplementation. It is interesting that general acceptability and indeed all other evaluated parameters decreased from control to AW<sub>4</sub>. However all cakes were generally acceptable since none scored below minimum acceptable rating of five on a 9 point hedonic scale. The cake sample from 20% AYBE supplementation show no significant difference (p<0.05) with the control cake (100% WF) in all attributes evaluated. Cakes of acceptable qualities can be produced from wheat supplemented with up to 25% African yam bean flour as cake samples made from 20% and 25% AYBE supplementation compare favourably with control cake (100% WF).

At other levels of supplementation, there were significant differences (p<0.05) although scores were above minimum in all parameters. Cake production from WF/AYBE blends may be answer to increase in consumption and utilization of this less known legume with the resultant effect of increase intake of quality protein, minerals and dietary fiber. The general acceptability of the cake products also followed the same trend.

## Conclusion

This research assessed the nutrient composition, and sensory properties of cake made from wheat *and* African yam bean. Experimental design was employed for the research. Wheat Flour (WF) was supplemented with African

yam bean Flour (AYBE) and used to bake queen cakes at various ratios (WF/AYBE 100:0, 80:20, 75:25, 50:50, 0:100). The 100% WF cake served as control. To determine the general acceptability of the blends samples as compared to the control sample, the other four samples were subjected to sensory evaluation using a 9 point hedonic scale for colour, texture, taste and general acceptability. The objectives of the study were to prepare flour blends. determine the proximate composition of the cakes and conduct sensory evaluation and general acceptability. The proximate analysis for moisture, protein, fat, fibre and carbohydrate were done using standard methods. Proximate analysis showed significant increase (p<0.05) in protein content (9.2-17.4%), ash (3.7-5.5%) and crude fiber (0.14-1.80%) in AYBE supplemented cakes. Result revealed that there was a significant decrease (p<0.05) in carbohydrate (70.26-63.1%) and fat (17.7-13.2%) contents. There was no significant difference (p<0.05) in moisture contents (14.4-14%) of test samples. Sensory evaluation results showed that all cakes samples had high rating for all evaluated attributes. The 20% and 25% AYBE supplementation compared favourably with WF). Cakes form supplementation levels were generally acceptable as they were neither liked nor disliked.

#### Recommendations

Since the result of the findings showed that the blends of Africa yam bean flour at 100% nutrients composition was comparably higher and better as

follows; moisture 14g (good shelf quality), crude protein 17g (cheaper and available means of reducing micronutrient protein deficiency), fat 13.20g lower than the other blends (good for weight control). Higher fibre 1.80 (to increase bowel movement and weight control), ach content 5.50g higher than the other blends (increase in mineral content), lower carbohydrate content (62g) than the other blends (weight control and reduction in the incidences of diabetes) and lower calorie value (436.8g): control of obesity. Therefore Africa yam bean flour is hereby recommended based on these findings for usage both in the home and in the confectionary industry.

It was also recommended that nutrition education and advocacy campaigns should be carried out the communities, churches and cooking demonstrations by nutritionists, home economists, to sensitize the public on the nutrient density of the African yam bean.

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# Strategies for Enhancing Parent-Adolescent Relationship within Households in River State

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#### Abstract

The study evolved strategies for enhancing parent-adolescent relationships within households in Rivers State. Specifically, it determined strategies related to parents; adolescents themselves; and siblings of adolescents. Three research questions guided the study. The study adopted a descriptive survey research design. The population for the study was made up of parents and adolescents within households in 10 local government headquarters of Rivers State. Sample size of 500 parents and 500 adolescents were randomly selected from the population. Data were collected with a questionnaire. Mean was used for data analysis. Findings include 13 parent-related, 12 adolescent and five other siblings-related strategies for enhancing Parent-Adolescent relationship. These include that parents should identity adolescents' ethical dilemma ( $\overline{X}$ =3.0), provide needs and wants of adolescents ( $\overline{X}$ =3.5), among others. Adolescents' related strategies include that: they should appreciate their parents  $(\overline{X}=2.7)$ , their usage of mass media should respect family values  $(\overline{X}=3.3)$ , and others. Adolescents' related include, among others, sibling cooperation (X=2.8), mentorship of adolescents by older siblings  $(\overline{X}=2.8)$ . Thus a total of 28 strategies for enhancing parent/adolescents relationship were identified. Based on the findings, recommendations were made to improve parent-adolescent relationship in households in Rivers State.

**Keywords:** Adolescents, Discipline, Education, Parents, Relationship, Strategies, Household.

# Introduction

Family relationships are long-lasting and often strong. This is because family in the members depend upon each other for from

many things. Parents-child relationship is one group of relationships that exist in the family. This relationship starts from infancy and continues into adulthood for every child. Along the continuum of this relationship is the parent-adolescent relationship. This relationship can be both interesting and challenging for both the parents and the adolescents.

An adolescent is neither a child nor adult. Adolescents have some needs and problems which affect their relationships with their parents and other (Anyakoha 2015). For instance they always face problems of adjusting to their physical changes; attempting to achieve adult status, independence, and so on. (Umukoro and Obidua 2011; Ikenviri and others 2010; Uzoka 2013). As adolescents deal with their challenges with some seeking independence from parents on who they hitherto depended upon, the parent/adolescent relationship often suffer some conflict.

Besides, adolescents are exposed to technological revolution with 24 hours service provision by various electronic media and social network platforms. How adolescents cope with this trend depends on their relationship with their parents at home. By reciprocity, Okeke (2009) noted that adolescents on their own part should learn to appreciate love and attention given to them by their parents. According to Atser and Kembe (2018) adolescents may be characterized by maladaptive behaviors and emotional disturbance. According to Umukoro and Obidoa (2011) many parents do not see reasons why the adolescents' behavior should change, therefore see adolescents' behavior as stubbornness and rebellion. However, instead of forcefully trying to correct should them, parents present themselves as good models, so that their children will behavior like them.

Siblings are children (brothers and sisters) of the parents. According to Okeke (2009),siblings enjoy companionship of each other; learn how to respect each other's points of view; and protect and support one another. In addition to the above, Anyakoha (2015) stated that adolescent siblings can check each other on manners and etiquette, clothes, language, ways of making hair and so on. However, sometimes siblings are jealous of each other, and also compete for their parents' or other people's love and attention. Parents should endeavour to encourage bonding among siblings by working at a task together and spend quality time together amongst themselves and with them. **Parents** should avoid favoritism and preferential treatment to their children at the expense of others. According to (1999),like parent-child relationship, sibling interactions adapt to change at adolescence. As younger siblings mature and become more selfsufficient, they may be less accepting to directives from older siblings. Adolescents may not want to interact as much with siblings, as they seek autonomy from the family.

Household consists of all the people living together in a house. Most households in Rivers State have a parent, adolescent and sibling who are connected with looking after the house and the people. Komolafe in China, Mbah and Anozie (2019) defined household as a group of people living together in a common residence as consuming units in a physical

environment. Concerning the wellbeing of adolescents in the household, UNICEF in Nwosu (2011) reported that 71 percent of adolescents claimed that they work for people other than their parents for a fee after school hours, 29 percent of them stayed in more than one household, and 3.5 percent had been sexually abused by their relative or by others. The condition of the Nigerian adolescent is bad and pathetic in all parts of the country, especially in Rivers State as a result of youth restiveness, hence there is need to evolve strategies to enhance parents-adolescents relationship within households.

Enhancing parent-adolescent relationship requires strategies to help family life of households in Rivers State. According to Okeke and Eboh (2011), strategies are well planned series of actions for achieving an aim. Therefore, strategy is a plan that is intended to achieve a particular purpose. In order words, it is the process of planning something in a skillful way.

and good behavior adolescents starts in the family which is made up of parents, siblings and other relations. According to Onwuadi (2014), education of parents and adolescents is a very powerful tool for the liberation and enhancement of human potentials. This is because an educated person can analyze situations effectively, define strategies, draw up programs of actions and opt for a better deal on any socioeconomic and educational matters of family members and prospect of the individuals. However, Lilly (2007), noted that the role the family members play is defined by different positions they occupy in their interactions in the family, community and society. The lifestyle of parents and adolescents in contemporary society called into question adolescents behavior with their parents could be linked to poor family. relationship in the constitutes the problem of evolving strategies that would enhance parentadolescent relationship households in Rivers State.

## Purpose of the Study

The main purpose of the study was to evolve strategies for enhancing parentadolescent relationship within households in Rivers State. Specifically, it determined strategies for enhancing parent-adolescent relationship that are related to:

- 1. parents of the adolescents.
- 2. adolescents themselves.
- 3. other siblings of the adolescents.

# **Research Questions**

What are the strategies for enhancing parent-adolescent relationships that are related to:

- 1. parents of the adolescents?
- 2.adolescents themselves?
- 3. other siblings of the adolescents?

## Methodology

Research Design and Area of Study: The research is a survey study. The area of the study was Rivers State covering 23 Local Government Areas (LGAs). Rivers State is a multicultural state with distinctive traditions and norms.

Population for the Study: The population consisted of households in the 23 LGAs in the area of the study. In each household a parent and adolescent were the participants in the study. The

parents were of variety in educational levels from West African Examination Council (WAEC)/GCE and above. The adolescents were aged 10-15 years. They were in junior secondary schools (JSS) at the time of the study.

Sample for the Study: Ten (10) LGAs were randomly selected out of 23 LGAs. Fifty (50) households were purposively selected from each LGA. Only households with adolescents selected. From each household, a parent and an adolescent were purposively selected. These gave sample was 1000 consisting of 500 parents and 500 adolescents.

Instrument for Data Collection:
Questionnaire was used for data collecting. The same instrument was used for parents and adolescents. The instrument had n four-point scale of Strongly Agree (SA), Agree (A), Disagree (D) and Strongly Disagree

(SD). It was developed through literature review based on the specific purposes of the study. It was validated three experts in child development studies.

Data Collection Technique: One Thousand copies of the questionnaire were distributed by hand with the aid of 5 research assistants. Out of 500 each for parents and adolescents, a total of 457 and 432 for parents and adolescents were retrieved respectively. These gave a retrieval rate of 91.4% and 86.4% respectively.

Data Analysis Techniques: Data collected were analyzed using mean. Mean scores from 2.5 and above  $(\overline{X} \ge 2.5)$  were considered as agreed. Mean below 2.5  $(\overline{X} \le 2.5)$  were considered disagreed.

Findings of the Study

Table 1: Mean Responses on Parent Related Strategies to Enhance Parent-Adolescent Relationship

S/N	Parent-related Strategies	$\overline{X_p}$	Xa	$\overline{X_g}$	Remark			
1.	Identity adolescents' ethical dilemma.	2.8	3.2	3.0	Agree			
2.	Acquire knowledge on adolescents' behavior.	2.7	2.6	2.7	Agree			
3.	Provide of basic needs and wants of adolescents.	3.3	3.6	3.5	Agree			
4.	Encourage adolescents in their endeavours.	3.4	3.6	3.5	Agree			
5.	Correct adolescents through modeled behavior.	3.5	3.4	3.5	Agree			
6.	Discipline should be from a point of knowledge and love.	3.2	3.0	3.1	Agree			
7.	Do everything possible to enhance their potentials.	3.5	3.8	3.7	Agree			
8.	Give them responsibilities (roles to play).	3.3	2.8	3.1	Agree			
9.	Allow their friends' visitation and vice versa.	2.5	3.2	2.9	Agree			
10.	Discuss problems and major issues with adolescents.	2.4	2.6	2.5	Agree			
11.	Be an example parent in basic households' issues.	2.5	2.6	2.6	Agree			
<b>12.</b>	Parents should create atmosphere of love and friend-	3.3	4.3	3.4	Agree			
	lovers.							
<b>13.</b>	Ensure high parental mentorship.	3.4	3.6	3.5	Agree			
	Cluster mean	3.1	3.2	3.2	Agree			
	<b>Key:</b> $\overline{X_p}$ = Mean for parents; $\overline{X_a}$ = Mean for adolescents $\overline{X_g}$ = grand mean (of $\overline{X_p} & \overline{X_a}$ ).							

Table 1 shows that all the items have agreement responses from the parent respondents, except item 10 which is discuss problems and major issues with adolescents. While all the responses to the adolescents' items attracted agreement in respect of parent-related strategies for enhancing parents-

adolescent relationship. The cluster means for parents, adolescents and grand are 3.1, 3.2 and 3.2 respectively. The result implies that both parents and adolescents agreed that the parentrelated strategies are relevant in parentadolescent relationship.

Table 2: Mean Responses on Adolescent Related Strategic to Enhance Parentadolescent Relationship

S/N	Adolescent Related Strategies	$\overline{X}_p$	$\overline{X_a}$	$\overline{X}_{g}$	Remark
1.	Adolescents should appreciate their parents.	2.6	2.8	2.7	Agree
2.	Adolescents usage of mass media should respect family	3.2	3.4	3.3	Agree
	values.				
3.	Adolescents should not waste money spent on their	2.1	2.6	2.4	Disagree
	education.	2.4	•		
4.	Adolescents should go out with parental permission.	2.4	2.6	2.5	Agree
5.	Adolescents should communicate their demands politely	2.7	2.8	2.8	Agree
	to the parents.				
6.	Adolescents should not resent parental control.	2.5	2.6	2.6	Agree
7.	Adolescents' character should reflect family positive traits.	2.2	2.6	2.4	Disagree
8.	Adolescents should dress appropriately as per their	3.4	3.2	3.3	Agree
	family values.				
9.	Encourage parental support through high educational	3.3	3.4	3.4	Agree
	performance.				
10.	Ensure your parents know your friends.	2.6	2.8	2.7	Agree
11.	Use of mass media e.g. Tv, Internet for performance.	3.2	3.2	3.2	Agree
12.	Learn to manage their sexual relations with the opposite	2.6	2.9	2.8	Agree
	sex.				
	Cluster mean	2.7	3.0	2.8	Agree

*Key:*  $\overline{X}_p$  = Mean for parents;  $\overline{X}_a$  = Mean for adolescents  $\overline{X}_g$  = grand mean (of  $\overline{X}_p$  &  $X_a$ ).

Table 2 shows that parents respondent had agreement responses to all the 12 items with a cluster mean of 3.0 which is above criterion mean of 2.5 The adolescent respondents had agreement responses to items 1-2, 5-6, then item 8-12; while they disagree to items 3,4, and 7. The grand mean rating ranged from

2.4 to 3.4 and gave a cluster grand mean of 2.8 which is greater than 2.5 criterion mean. This implies agreement responses by parents and adolescents to adolescent-related strategies for enhancing parent-adolescent relationship.

Table 3: Mean responses by parents and adolescents on siblings related strategies

S/N	Siblings-related Strategies	$\overline{X}_p$	$\overline{X}_a$	$\overline{\chi}g$	Remark
1.	There is need for siblings' cooperation.	2.8	2.8	2.8	Agree
2.	Senior siblings should mentor younger siblings.	2.7	2.8	2.8	Agree
3.	Sibling support has more understanding in gender bases.	3.0	3.4	3.2	Agree
4.	Indifference exists among siblings.	3.0	3.0	3.0	Agree
5.	Sibling jealousy and rivalry could be healthy by	2.9	2.9	2.9	Agree
	discipline.				
	Cluster mean	2.9	2.9	2.9	Agree

*Key:*  $\overline{X}_p$  = *Mean for parents;*  $\overline{X}_a$  = *Mean for adolescents*  $\overline{X}_g$  = *grand mean (of*  $\overline{X}_p$  &  $\overline{X}_a$ ).

Table 3 shows that parents and adolescents responses to the items on sibling related strategies to enhance parent-adolescent relationship in the household have agreement responses to all the items. The cluster mean for parents is 2.9 while for adolescent is 2.9 which gave grand cluster of agreements. This indicated that parents' and adolescents' respondents agreed that the items are ways of enhancing sibling relationship in order strengthen parents-adolescent relationship.

# **Discussion of Findings**

The study determined some strategies enhancing parent-adolescent for relationship within households Rivers State. The findings of the study for research question one revealed that parents related strategies are identify adolescents ethical dilemma, acquire knowledge on adolescents' behavior, provision of basic needs and wants, encourage adolescents endeavors, discipline should be from a point of knowledge, do everything possible to enhance their potentials, give them responsibility, allow their friends visitation and vice versa, be a rule parent in basic household issues,

create atmosphere of love, and ensure parental mentorship. high These findings concisely agree with Okeke (2009) statement that adolescents need understanding as well discipline and education. According to Glenn, Jones and Simpson (1975) adolescents behavior are all the habits, characters, mannerism, and conducts that are common in adolescence, which may not all be wrong, as long as it is in line with societal expectations of the time. Still in line. American Psychological Association (APA) (2019) noted that low socio-economic status communities are often under resourced which affect children. In similar vein, Berk (1999) noted that parent-child relationship adapt to change adolescence. However, Uzoka (2013) reiterated the need for the family to be a foundation of human values and sociable behaviours.

Looking at research question two, parents and adolescents agreed to appreciation of parents, usage of mass media based on family values, communicate politely for demands, character to reflect family values, performance in education, parents know their friends, use of mass media for academic performance, and learn to

manage their sexual relations with opposite sex. In agreement Huitt and Hummel (2010) noted that education brought about congenial relationship in the family. Both parents and adolescents agreed that information and communication technology encourages deviation from old standards. According to behavioural theorists, there is connection between stimulus and response, and overtime connection is formed even though there is no logical or apparent relationship. Also, connection of emitted behavior and its consequences is instrumental in bringing about expected behavior (Huitt and Hummel, 2010; Lopez, 2014; and Cherry, 2019). It also agrees with Atser and Kembe (2018) assertion that adolescents may be characterized by behavior antisocial and emotional problems.

Based on research question three, this study further discovered that on siblings related strategies, both parents and adolescent agreed to all the items which are there is need for siblings cooperation, senior siblings mentor young siblings, sibling support has more understanding on gender bases, indifferences exist among siblings and siblings jealousy and rivalry could be healthy by discipline. In support of this Okeke (2009) noted that siblings enjoy companionship of each other, respect each other's point of view and protect and support each other. However, in agreement, Anyakoha (2015) opined that siblings sometimes are jealous of each other, and also compete for attention and love.

#### Conclusion

Based on the findings of this study it concluded that parents adolescents should relate based on expected values in the family. The family is a basic structure of the society as such needs to be revisited in its foundation especially in the cultivation parent-adolescent of cordial relationship so as to minimize hiccup in the life of adolescents. In all ages, adolescents behave in a peculiar way because of the issues of biological maturity and being launched into the space without adequate guidance. It is imperative that parents who are the basic foundational structure of the family need to pay more premium attention to the needs and wellbeing of the adolescents by owning up to their responsibilities. Relationship in the family essentially anchors on communication of the members.

Education may afford the parents to create enabling environment in terms of more resources for their children, but it has been noted that education without parental love and responsiveness at the different periods children of development, could result adolescents' deviancy. Hence, families in Rivers State should tighten the loose knots in their parental childrearing practices and bring about general improvement in the habit or behavior of the adolescents.

#### Recommendations

Some recommendations are hereby put forth as provided by the respondents.

1. Parents should talk to their adolescents about their normal

- physical and emotional changes at puberty and their likely response to these changes.
- 2. Parents should talk with their adolescents about risky things friends may pressure them to do like smoking or drinking, dangerous physical desires or molestations and how they could assert themselves in such circumstances.
- 3. Parents should desist from exhibiting poor character in the home so that their adolescents would not imitate them.
- 4. Parents should ensure they keep their adolescents positively occupied patriotic voluntary service, religious activities or long vacation attachment for skill learning/training. Encourage them to join good school, religious and community groups such as team sports, volunteers group such as Red Cross, Civil Brigade, Boys Scout, Girls Guide, Anti-cult Groups, and etcetera.
- 5. Beyond formal education, parents should bring up their adolescents to imbibe doing household tasks, cultivating saving habits and spending their money wisely, etcetera.
- 6. Adolescents are the future parents, so they should be trained to respect other people's feeling and being charitable to people in need.
- 7. Family should have rules; hence parents should make clear rules and stick to them. Use discipline to guide and protect their children instead of punishment.
- 8. Affectionate parent-adolescent relationship is importance hence

- parents should make their children their friends.
- 9. Adolescents should reciprocate the love and care of their parent by being responsible.
- 10. Sibling cooperation and respect should be strengthened even beyond adolescence.

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# Constraints to Food Security among Low-income Households in Rural Area of Sapele Local Government Area, Delta State

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#### **Abstract**

The study focused on constraints to food security within low-income households in Sapele Local Government Area (LGA), Delta State. Specifically, it determined constraints to food availability and accessibility among households in the area .of study. Population was made up of lowincome households in the in the area. Data were collected using questionnaire. Data were analyzed using means. Findings of the study revealed: 15 constraints to food availability and 14 constraints to food accessibility. Some of the constraints to availability of food to households are; household has no land to farm; household has no agricultural input for farming; poor food preservation and storage practices; among others. Some constraints to food accessibility to households are; lack of money/poverty; food is very expensive; food scarcity. It was recommended that government should provide soft loans to farmers, good roads and infrastructures in rural communities. Also efforts should be made to encourage more people especially the youths to go into farming in order to increase food production. This in effect will stimulate the economy, reduce poverty and hunger.

**Keywords:** Households, Food, Availability, Accessibility, Security, Constraints.

#### Introduction

Food is one of the basic needs of households. Individuals need food to survive. The basic nutrients needed for good health are mostly found in food. It is important that individuals and households have access to daily food requirements in order to live a healthy and productive life. This calls for food security. Food security exits when all people, at all times, have physical and

economic access to sufficient, safe and nutritious food to meet their dietary needs and food preferences for an active and healthy life (Food and Agriculture Organization (FAO) 1996). Household food security means that all members of the household, at all times, have access to enough food for an active healthy life (USDA 2008). Four pillars of food security as identified by (FAO 2009); are availability, access, utilization and

stability. This means that when and where there is household food security, food has to be available and accessible to the members to utilize at all times. When there are constraints that disrupt any of the pillars, food insecurity could result. Food insecurity entails limited or uncertain availability of nutritionally adequate and safe foods or limited or uncertain ability to acquire acceptable food in socially acceptable ways (Bickel et.al 2000; FAO 2013). When households are trapped in food insecurity, they become hunger and poor health results. Poor healthy reduces ability work and live a productive healthy life. It is therefore necessary to identify the constraints to household food security and address them appropriately.

In Nigeria, especially among the low-income group, food insecurity remains a bane for households (Shehu 2012). Fakiyes (2011) observed that Nigerian's domestic food supply has been far short of the need of the population. Thus one of the country's greatest challenges is that of feeding her teaming population. According to Jacob (2013), food insecurity exists when people are undernourished as a result of the physical unavailability of food, their lack of social or economic access to adequate food. This is common among low-income households and especially those in the rural areas. Shehu (2012), opined that farming constitutes the major occupation of people in the rural areas in Nigeria.

This situation is typical of many households in Sapele Local Government Area of Delta State. The major occupation of these households is farming which is their major source of income. However, over dependence on subsistence farming with limited access to farm inputs and working capital, poor extension services and poor post-harvest processing and storage technologies result in food insecurity in this area. It is necessary to evolve ways of enhancing food security in the area. In order to do this, it important to first identify the constraints to food security among households in Sapele Local Government Area, Delta State.

# **Objectives of the Study**

The study investigated the constraints to food security among households in Sapele Local Government Area (LGA) of Delta State. Specifically, it determined constraints to food:

- 1. availability to households in Sapele, Delta State
- 2. accessibility to households in Sapele, Delta State

# **Research Questions**

- 1. What are the constraints to food availability in households in Sapale LGA
- 2. What are the constraints to food accessibility to households in Sapale LGA

#### Methodology

**Design of the Study:** The research design employed in this study was descriptive survey. It involved questionnaire.

The Study Area: The study was conducted in Sapele Local Government Area (LGA), Delta State Nigeria. The study LGA is made up of three districts. The major occupation of households in the area is farming and a few of them engage in fishing due to the presence of

the river Ethiope in the area. Apart Sapele town, most of communities are more of settlement that engages also in farming. Sapele market centre in cassava (manioc), fish, palm oil and kernels, yams, and plantains. The major food produced by households are low in price like garri, palm oil, yam etc, while other food stuffs are high in price and most of them are imported into the Local Government Area amid bad roads and high transportation which makes food availability and accessibility a major challenge to households in Sapele town.

**Population** for the Study: The population of this study included allowincome of the rural areas households in Sapele district. The district is the most populated area of Sapele Local Government Area, Delta State. These household heads are mostly farmers whose major source of income is from the sales of their farm produce. Homemakers in the households were involved in the study.

Sample for the Study: One district (Sapele district) was purposively selected for the study because it is the most populated of the three districts in the LGA. One hundred and fifty low-income households were purposively selected for the study. From each household a homemaker was selected to

form a sample of 150 homemakers for the study.

Instrument for Data Collection: The instrument for data collection was questionnaire. It was developed based on literature review and the specific purposes of the study. It had a 4-point scale of Disagree (SD), Strongly Disagree, Agree (A), and (D) Strongly Agree (SA). The instrument was validated by three Universities lecturers of Home Economics.

Data Collection Techniques: One hundred and fifty copies of the questionnaire were distributed to the homemakers by hand with the help of three research assistants. One hundred and forty-two (142) copies of the questionnaire were properly responded to and returned. This represented 9.47 per cent return.

*Data Analysis Techniques*: The data for this study were analyzed using mean  $(\overline{X})$ . The mean of 2.5 was obtained from the responses on the 4-point scale of strongly agree=4, agree=3, disagree =2 and strongly disagree=1. Thus, mean of 2.5 and above  $(\overline{X} \ge 2.5)$  was considered "Agree", while any mean of less than 2.5  $(\overline{X} \le 2.5)$  was considered "Disagree". So any item with a mean of 2.5 and above is a constraint, while any with  $\overline{X} \le$  is not a constraint.

Findings of the study

Table 1: Mean  $(\overline{X})$  Responses on the Constraints to Food Availability among

Households in Sapele.

S/N	Possible Constraints to Food Available	Mean (x)	Decision
1	Household has no land to farm	3.3	Agree
2	Household has no agricultural input for farming	2.9	Agree
3	Household not interested in farming	2.7	Agree
4	Household experience crop failure	2.6	Agree
5	Households has no good soil for farming	2.6	Agree
6	Lack of food in the community	2.8	Agree
7	Food theft	2.7	Agree
8	Absence of food in the market	2.5	Agree
9	Natural disaster eg drought, flood, hurricane, wildfire etc	2.9	Agree
10	Communal disturbances, dispute, violence, terrorism,	3.0	Agree
	war, etc		_
11	Food wastage	2.9	Agree
12	Poor food preservation and storage practices	3.2	Agree
13	Food spoilage on farm land	3.2	Agree
14	Food hoarding by traders	2.7	Agree
15	Poor/lack of power supply for food processing and	3.5	Agree
	preservation		

Table 1 shows that items 1 to 15 were the mean score of  $(\overline{X} \ge 2.5)$  3.3, 2.9, 2.7, 2.6, 2.6, 2.8, 2.7, 2.5, 2.9, 3.0, 2.9, 3.2, 3.2 2.7, and 3.5. This shows they are all constraints to food availability in the area of the study. Each item has mean  $(\overline{X} \text{ of } \ge 2.5)$ .

Table 2: Mean  $(\overline{X})$  Responses on the Constraints to Food accessibility among households in Sapele.

S/N	Possible Constraints to Food Accessibility	Mean $(\overline{X})$	Decision
1	Lack of money/poverty	3.6	Agree
2	Food market too far	2.7	Agree
3	Food is very expensive	3.3	Agree
4	Food sealers inflates high prices	2.7	Agree
5	Food scarcity	2.6	Agree
6	Poor access to food production, raw materials and market	3.4	Agree
7	Frequent change in price of food	3.2	Agree
8	Poor market structure	3.2	Agree
9	Enmity between communities settlers	2.9	Agree
10	State of emergency as a result of communal crises	3.0	Agree
11	Laziness	2.6	Agree
12	Presence of robbers, ambush, cattle rustler and kidnappers	3.0	Agree
13	Poor means of food items mobility to market	3.2	Agree
14	Government of impossible of ban on some food items	3.1	Agree

Table 2 shows that items 1 to 14 have the mean scores of  $(\overline{X} = \geq 2.5)$  3.6, 2.7, 3.3, 2.7, 2.6, 3.4, 3.2, 3.2, 2.9, 3.0, 2.6, 3.0, 3.2, and 3.1. This shows that they are all constraints to food accessibility in the area of the study. So there are 14 constraints to food accessibility  $(\overline{X} \geq 2.5)$ .

#### **Discussions of Findings**

Tables 1 & 2 show that food availability and food accessibility to households are major constraints to food security in Sapele Local Government Area, Delta State. Many factors have been identified as responsible for these constraints.

The mean scores for all the items in Table 1 are more than 2.5 ( $\overline{X} \ge 2.5$ ), therefore, all the items listed on the table are accepted as constraints to food availability in the study area. All these constraints are still lingering in most parts of Nigeria because the government still favours foreign imported goods (Jacob, 2013), like the mean rating for Household has no agricultural input for farming is 2.9, and household has no land to farm rated 33; the problem of food availability is partly due to the small size of farm lands cultivated by the farmers (Adebayo, 2012).Land is an important factor of production which helps in the production of goods and services. The mode of land acquisition could determine the scale of farm operation undertaken by the farmers. This is in line with Okon (2017) who reported that there is hope for increasing by expanding output farmland.

Jayne (2005) noted that access to land is a key factor in reducing rural poverty and ensure food security. Other factors responsible for the problem of

food availability are well listed in table 1 and their mean rating  $(\overline{X})$  is  $\geq 2.5$  which made them all accepted as constraints to food availability.

Table 2 shows the factors responsible for food accessibility. According to Henneberry and Carrasco (2014),food access is a major dimensions of food security, is a function of income and purchasing power of households. The mean rating of Lack of money/poverty is 3.6, which shows that Income and purchasing power of households is a core problem to food accessibility in Sapele Local Government Area. Like the mean rating for "food is expensive" is 3.3, this is in line with (Federal Ministry of Agriculture, FMA, 2008) who noted that high rates of increase in food prices due to a growing food supply deficit despite food importation has led to food insecurity in Nigeria. The mean rating for all items in has shown that 2 accessibility is determined by various socio-economic, natural and political factors.

The major constraints highlighted in this study are availability and accessibility of Constraint of food security to households in Sapele Local Government Area of Delta State. Thus, becomes expedient that government of Delta state should put resources in place to sensitize and support farmers through various credit facilities infrastructural and development.

The contribution of agriculture to economic development lies in making food available and accessible to the rapidly expanding population; increasing the demand for industrial products rather than local or raw products. Ozor and Nwankwo (2008), reiterated that self-sustained community development is vital to the economic and social progress of any community like Sapele Local Government of Delta State and Nigeria at large. In less developed countries, production dominates agricultural sector while output expands with increased productivity it increases the income of the farmers.

Therefore, government must put in place infrastructures such as setting a piece of land for agricultural purposes, provision of roads and good transport system to convey farm produces and should make policies that will aid farmers and food sellers to make available and accessible foods with households enabling environment where households can easily have access to. So that it can address constraints to food security through availability and accessibility factors.

Government should provide soft loans and subsidies on seeds for farmers, and same for sellers (traders) so that food will be more available and accessible to households. Otherwise, if poverty, lack of infrastructure, modern farming tools are problems. There will be high dependence on importation, which will correspondingly affect food availability thereby causing price increase and threaten food availability for households. This causes major food insecurity for households.

#### Conclusion

The study examined the two major constraints to food security among

households. It was limited to food availability and accessibility to households in Sapele Local Government Area of Delta State. The study revealed major constraints to food availability and accessibility in Table 1 and 2 these constraints are majorly linked to socioeconomic, natural and political factors.

The studied showed a significant effect of food security constraints and needs to be mitigated to save Sapele community from lack of availability and accessibility to food.

Sometimes there are available varieties of farm produce needed by households scarcely in the market. However, until such food stuffs are easily available and accessible to these households, one cannot say there is food security. This is so because no matter the availability of food items in the markets, until they are easily accessible by consumers without having to jump through the hooks, or pay more or do more to have food, there is a serious food problem in that community. The constraints must be removed for food security and safety by government for households.

### Recommendations

Based on the findings of this study, the following recommendations are made.

- 1. Government should provide soft loans to farmers, good roads and infrastructures in rural communities.
- 2. Efforts should be made to encourage more people especially the youths to go into farming in order to increase food production. This will in effect stimulate the economy, reduce poverty and hunger.

3. Government should check those whose actions that militate against food security in the area of the study and the state as a whole.

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# Budgeting Practices of Low-Income Households in Owerri Municipal, Imo State

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#### **Abstract**

This study focused on household budgeting practices adopted by low income households in Owerri Municipal, Imo State. Specifically the study determined: points households consider in making their budget; areas of priority in household budget; problems households face in making budgets,; and ways households could improve their budgeting practices. Survey design was adopted. Population was made up of all 1,250 registered and serving teachers in 62 private primary school teachers of the area of the study. Questionnaire was used for data collection. Mean and standard deviation were used for data analysis. Findings show eight points households consider in making budgets, including, provision of food for family; cost of children's education; family income and others. Other findings are six priority areas in household budget, including, couples set aside a part of individual income as saving; agreement for a member to commit income for investment; there is special fund set aside for shelter as priority; among others. There are also nine problems households faces in making budgets. They include lack of education on budgeting principles; irregular income discourages budgeting; and misconception about budgeting. Further findings are 14 ways of improving budgeting practices, including, among others, seeking education on effective budgeting practices; encouraging the control of appetite among members; and practicing effective communication. Based on the findings four recommendations were made.

**Keywords**: Practices, Prioritization, Savings, Low-income, Households, Budgeting.

#### Introduction

Household resources are used to meet household needs. One of the household resources is money. Often the needs of the household exceed the money available to them. This problem is especially the low income households. It is therefore necessary that households find ways of utilizing their limited income in order to meet their many needs. One of the ways of doing this is to make budgets and apply such in their use or allocation income to needs.

A budget is a plan for spending and saving money. A household budget is the plan for future expenditures of a given household (Anyakoha 2015). It represents the first step in money management. (Hu 2017) sees it as a "strict breakdown of how a household aims to spend or allocate their income. Household budgeting has many advantages including, among others, providing the household with guidelines for financial expenditure and enabling them to reach their money management goals and live within their income (Anyakoha 2015). It is of special benefit to the low-income households where resources are often in short supply (Furnham and Argyle 2017; Bele 2017). Angeo (2019) recommended strict budgeting practices for low income households, especially those of artisans in rural Pakistan who were confronted with harsh economic circumstances. The practices should also be highly recommended for all households in Nigeria, especially those at the lowincome level.

The practice of household budgeting can help low income families manage few available resources at their disposal. Household budgeting principles aim at helping families attain a sustainable living standard in the midst of scarcity (Patterson 2015; Ibrahim 2010 and example, Humphrey 2008). For Patterson (2015) and Uwa (2013) noted that families that do not pay attention to unnecessary spending, prompt buying/purchases, as well as careless and uncalculated allocation of resources are subjected to serious crisis. Emphases have been placed on the importance of prioritization and savings in family spending patterns and budgets (Nkah, 2017; Nwoke, 2015). Bell (2015) and Brad (2019) argued that when families maintain strict budgeting principles which include savings and prioritization, they can attain high levels of living. Many low income families are unable to enjoy minimum standards of living due to their inability adopt or implement responsible consumption habits amongst their members. In Owerri, it common to find many households always struggling to make ends meet, yet they end up spending excessively on certain items that may not benefit them. Among this group of households are those who go borrowing because they usually run into financial crises probably arising from careless spending. Family members are also found at loggerheads, especially husbands and wives, over meeting household needs such as food, children's school fees and shelter. These issues draw attention to the need for proper budgeting in the management of family resources for ensuring effective wellbeing of the family. It was against this background that the researchers investigated low income households' budgeting practices towards sustainable family living in Owerri Municipal, Imo State.

#### Purpose of the Study

The main purpose of this study was to examine household budgeting practices adopted by low income households in Owerri Municipal, Imo State. Specifically the study determined:

- (1)points households consider ir making their budgets.
- (2)areas of priority in household budget.
- (3)problems households face in making budgets.
- (4)ways households could improve their budgeting practices.

#### **Research Questions**

The study was guided by the following research questions:

- (1) what are points household consider in making their budget?
- (2) what are areas of priority in household budgeting?
- (3) what are problems households face in making budgets?
- (4) what are ways household could improve their budgeting practices?

## Methodology

*Design of the Study:* The survey design was adopted for the study. It entailed the sampling of opinions of the respondents using questionnaire.

Area of the Study: Owerri Municipal was the area of the study. It is one of the three council areas that constitute Owerri, the capital city of Imo State, Nigeria. The area is one of the densely populated areas in the state with an estimated population of over 400,000 inhabitants (National Bureau of 2018). The Statistics. area is characterized by people high income households as well as the low-income ones. Low-income households include petty traders, artisans, single-parents and teacher in private schools. Hence it offers an ideal setting this study.

Population for the Study: The population for the study was all the

1,250 registered and serving teachers in the 62 private primary school teachers in Owerri Municipal, Imo State (Imo State Ministry of Education, 2019). This population was adjudged to be low income earners. This is because majority of them have an average income of forty thousand (N40, 000.00) Naira per month. They also experience delays in their salary, in a city that is noted for cost of living.

Sample for the Study: The sample for the study was 260 registered and serving private primary school teachers in Owerri Municipal. This sample was determined using Krejcie & Morgan (1970) sample determination table. Ten private primary schools with high pupil enrolment and high population of teachers were purposively selected for the study. Twenty-six (26) teachers were randomly selected from each school to give a sample of 260 teachers.

Instrument for Data Collection: Ouestionnaire was used for data collection. It was developed through literature review based on the specific purposes of the study. It was designed on a 4-point scale of "Strongly Agree (SA)-4"; "Agree (A)-3"; "Disagree (D)-2"; and "Strongly Disagree (SD)-1". It was validated by the three Home Economics lecturers. Based on their validation the instrument was modified. Data Collection *Method:* researchers used the direct contact method to collect data from the participants with the support of 5 research assistants. Some of the items in the questionnaire were carefully to the respondents where necessary. A total of 260 copies of the questionnaire were distributed to the respondents by hand.

After three weeks only 240 copies of the questionnaire were retrieved in good conditions. This represents 92.3 percent of retrieval rate.

**Data Analysis Technique**: Mean and standard deviation were used to analyze the data. The cut-off mean score was 2.5. Any item with a mean score of below the cut-off mark of  $(\overline{X} \le 2.5)$  was regarded as disagreement while items

with mean scores of the cut-off mark of 2.5 and  $(\overline{X} \ge 2.5)$  above were regarded as agreed.

#### Results

The results of the study were presented in Tables 1, 2 and 4.

Points Households Consider in Making their Budget

Table 1: Mean Responses and Standard Deviation on Points Households Consider in Making their Budget

S/N Guidelines (considerati	ons)	$\overline{X}$	SD	RMK
1. Provision of food for family		3.59	0.9	A
2. Cost of children's education		3.82	1.11	A
3. Family income		3.36	0.91	A
4. Family size/number of people	e in the family	3.53	0.89	A
5. clothing needs of family		2.46	0.94	D
6. Cost of housing the family		3.22	1.21	A
7. Family Savings/Investment		3.81	1.01	A
8. Alternative sources of income	for the family	3.24	1.51	A
9. Special nutritional needs of m	embers, eg. the sick.	2.23	1.03	D
10. Areas of necessary allocation	such as health care,	2.5	0.83	A
transportation				
Grand Mean		3.16	1.03	D

Key:  $\overline{X} = Mean\ score;$  SD = Standard Deviation; D = Disagree; A = Agree; N= 240

Tables 1 show the mean responses and standard deviation on points households consider in making their budget. The Table shows that items Nos 1-4 and 6-8 and 10 have each mean scores of  $\geq$  2.5. These show that these eight items are points which the households consider in making their budgets. Also, the standard deviation

ranged between 0.83 and 1.51 indicating that the respondents were not far from their opinions. The Table also shows that the highest mean score was  $\overline{X}$ = 3.82 (item 2), while the lowest mean score was  $\overline{X}$ = 32.23 (item 9).

Areas of Priority in Households Budgets

Table 2: Mean Responses and Standard Deviation on Areas of Priority in Household Budget

S/N	General Procedures	$\overline{X}$	SD I	RMK
1.	Couples set aside a part of individual income as saving	2.12	1.07	D
2.	agreement for a member to commit income for investment	1.44	1.00	D
3.	buying of clothing is not made the most important			
	things in the budget	2.92	0.96	A
4.	there is special fund set aside for shelter as priority	1.53	1.11	D
5.	children are enrolled in non-expensive\public schools	2.81	0.98	A
6.	families engage in inclusive communication	2.41	0.82	D
7.	making vacations/entertainment receive less attention	2.97	0.97	A
8.	members do not prioritize fashion consciousness	3.34	1.08	A
9.	avoiding bulk buying to save some money	3.19	0.98	A
10.	only affordable lifestyle is adopted	2.71	1.28	A
11.	clothing for children is given adequate attention	1.82	0.99	D
12.	keeping healthy environment	2.02	0.71	D
13.	special provision for education	2.14	0.80	D
	Grand Mean	2.42	0.98	D

Key:  $X = Mean\ score$ ;  $SD = Standard\ Deviation$ ; D = Disagree; A = Agree; N = 240

Table 2 shows the mean responses and standard deviation on the areas of priority in households budget of the respondents. It shows that items 3, 5, 7-10 were at agreedwith because they had mean scores of 2.5 and above (cut-off mark), while items 1, 2, 4, 6, 11-13were disagreed with because they had mean scores of less than 2.5. Also, the standard deviation ranged between 0.71 and 1.28 indicating that the respondents

were not far from their opinions. The Table also shows that the highest mean score was 3.34 (item 8), while the lowest mean score was 1.44(item 2). The implication of these findings is that majority of the respondents disagreed in the suggested priority areas.

**Problems Households Face in Making Budgets** 

Table 3: Mean Responses and Standard Deviation of on the Problems Households Face in Making Budgets

S/N	Problems	$\overline{X}$	SD	RMK
1.	lack of adequate communication	3.31	0.97	A
2.	disagreement over items in the budget	3.50	1.13	A
3.	lack of interest by some members	3.23	0.91	A
4.	misconceptions about budgeting	3.51	0.98	A
5.	inability to understand budgeting processes	3.71	0.85	A
6.	lack of education on budgeting principles	3.82	0.98	A
7.	irregular income discourages budgeting	3.72	0.85	A
8.	careless spending does not allow budgeting	3.96	0.88	A
9.	impatience in drawing a budget	3.02	0.91	A
	Grand Mean	3.53	0.94	A

Key:  $\overline{X} = Mean \ Score$ ;  $SD = Standard \ Deviation$ ; D = Disagree; A = Agree; N = 240

Table 3 shows the mean responses and standard deviation on the problems households face in making budgets. It also shows that all the items (1-9) were agreed with because they had mean scores of 2.5 and above (cut-off mark). The standard deviation ranged between 0.85 and 1.13 indicating that the

respondents were not far from their opinions. The table also showed that the highest mean score was 3.96 (item 8), while the lowest mean score was 3.02(item 9).

Ways Households Can Improve their Budgeting Practices

Table 4: Mean Responses and Standard Deviation on the Ways Households Can

**Improve their Budgeting Practices** 

S/NWays to Improve Budgeting Practices	$\overline{X}$	SD	RMK
<ol> <li>seeking education on effective budgeting practice</li> </ol>	es 3.11	0.99	A
2. encouraging them on avoiding unnecessary food	s expenses		
especially during times of limited funds	3.10	1.11	A
3. encouraging the control of appetite among mem	pers 3.13	0.96	A
4. practicing effective communication	3.11	0.88	A
5. encouraging them to discontinue careless spendi	ng 3.51	0.95	A
6. encouragement of spousal cooperation on budge	ting 3.92	0.92	A
7. teaching them the importance of budgeting	3.12	0.85	A
8. teaching them how to cut down on expenses	3.36	0.88	A
9. tracking income	3.22	0.91	A
10. encourage savings	3.00	0.97	A
11. encouraging self-discipline	4.00	1.09	A
12. encouraging critical thinking	2.85	0.93	A
13. teaching how to organize needs	3.85	1.01	A
14. delegating responsibilities to members	2.89	0.91	A
Grand Mean	3.29	0.95	$\mathbf{A}$

Key:  $\overline{X}$  = Mean score; SD = Standard Deviation; D = Disagree; A = Agree; N=240

Table 4 shows the mean and standard deviation of male and female responses on the ways households can improve their budgeting practices. The data showed that all the items (1-14) were agreed with because they had mean scores of 2.5 and above (cut-off mark). The standard deviation ranged between 0.85 and 1.11 indicating that the respondents were not far from their opinions. The table also showed that the highest mean score was 4 (item 11),

while the lowest mean score was 2.85(item 12).

# **Discussion of the Findings**

The findings on the points households consider in making their budget, show that items 1-4 and 6-8 were agreed with; they include: food is given priority in decision making; children's education is given priority; family income is considered; family size is considered; cost of housing before selection; cost of schooling is determinant of budget;

alternative income sources. These findings are indications that majority of respondents consciously unconsciously effective apply budgeting guidelines in their day-today plans. The findings are supported by earlier reports on routine family practices by Bele (2019). However, the respondents disagreed with: clothing is given less attention; food preferences of members; areas of necessary allocation. This is an indication that they may not completely aware of family budgeting practices effectiveness.

These findings are in consonance with Atkinson (2019) who noted that families are shaped by their experiences over time. These experiences may the determinants of considerations for how to spend family resources. For, a family which has limited resources may know that there is need to enroll the children or wards in schools they can afford. Also, housing selection or choice can be done unconsciously without necessarily perceiving the act as a practice. Furthermore, it is important to know that certain basic needs are normally accorded preferences in budget or family resources allocation. Nkah(2017) had identified food, shelter, clothing and children's education as significant in drawing a family's budget. These essentials are structural issues that the family aims to address at all times.

The findings on areas of priority in households budgets reveal that the respondents agreed with items 3, 5, 7-10 which are as follows: buying of clothing is not made the most important things in the budget; children are enrolled in not-expensive schools; making vacations/entertainment receive less

attention; members do not prioritize fashion consciousness; avoiding bulk buying to save some money; only affordable lifestyle is adopted. Items 1, 2, 4, 6, 11-13 were disagreed with by the respondents as follows: couples set aside a part of individual income as saving; agreement for a member to commit income for investment; there is special fund set aside for shelter as priority; families engage in inclusive communication; clothing for children is attention; given adequate keeping healthy environment and special provision for education. These findings indicate that the respondents do not follow majority of the procedures that can help in family budgeting.

These findings are supported by Hu (2017) who noted that prioritization is a characteristic of effective budgeting system. Prioritization is the activity that arranges items or activities in order of importance and helps families to manage their resources constructively. Prioritizing family spending means making a family budget on first, the few available resources, and secondly on the important things. This significant for low income earners who have limited resources at their disposal. The housewife is the manager of the family resources, hence is responsible for spending wisely. With all of the things that we spend our money on in our families, how do we determine what things are the most important? Families need to know what is essential vs. what is desired. For example, Brad (2016) opined that food and shelter are some of the essentials that should take priorities in family budgets. One will

also need to decide what the items are that the family really doesn't need.

Learning how to manage expenses is significant for low income earners. Families should prioritize expenses. Some bills can be paid late, but other bills must be paid on time in order to avoid foreclosure, eviction, or property repossession. The changing realities of time and place have greatly affected the family framework all over the world (Nwoke, 2015). Economic status of a society such as economic recession has direct impact on especially families with low incomes, and this impacts negatively on family circumstances. Due to the numerous challenges confronting these families, noteworthy that some families need minor adjustments to get back on course and some need a major overhaul to save the family or relationships within the family. Nkah(2017) and Mohan (2019) noted that savings, which is the amount of income per time that is not consumed economic units, is prerogative of rich or, and high income societies. He noted low income earners can save to avoid future financial encumbrances. Low income families may not possess the knowledge on the of savings. Family importance communication is vital for families deciding to engage in savings. This way, the low income families can overcome some the uncertainties of the future.

From research question three, the findings on the problems households face in making budgets showed that the respondents agreed with all the items, and they are as follows: lack of adequate communication; disagreement

over items in the budget; lack of interest by some members; misconceptions about budgeting; inability understand budgeting processes; lack of education on budgeting principles; unsteady income discourages budgeting; careless spending does not allow budgeting, and impatience in drawing a budget. These findings indicate that household budgeting is faced with serious impediments. The findings are in consonance with earlier studies regarding family finance management. For example, Furnham and Argyle (2017) noted that budget is a sensitive subject that breeds confusion in the home. Families can differ or show lack of interest in budget, while some other members can engage in the blame game. These are aspects that can make people lose interest in adopting budgeting practices.

However, once complete, a budget is the solid foundation with which families can manage their current income and expenses and plan for future possibilities. No doubt, many low income earners experience the problem of savings. Yet, it is important to help them understand that they can still save to secure their members. Many low income households may disagree over perceptions on savings. In fact, it has been recorded that many low income earners find it difficult to save since they have little at their disposal. However, Blind (2016) noted that the ability of low income families to save from the meager they possess will help them cope with many uncertainties. Hence, communication is essential in budgeting. This enables the involvement or consideration of the

opinions of other members of the family. In terms of money, self-awareness can help people understand where they spend their money impulsively and how to control it.

Finally, from the research q1uestion on the ways households can improve their budgeting practices, the findings revealed that respondents agreed with all the suggestions (1-14); they are as follows: seeking education on effective budgeting practices; encouraging them avoiding unnecessary foods expenses; especially during times of limited funds; encouraging the control of appetite among members; practicing effective communication; encouraging them to discontinue careless spending; encouragement of spousal cooperation on budgeting, and teaching them the importance of budgeting. Other items are: teaching them how to cut down on expenses; tracking income; encourage savings; encouraging self-discipline; encouraging critical thinking; teaching how to organize needs, and delegating responsibilities to members. findings are similar to the notion of Nkah (2017) and Ibe (2019) who noted that continuous education of families on the importance budgeting will address family financial issues and problems encountered by families. Communication in one's family plays an important role in managing money well. Honest conversations with a partner, if one has, one can help to avoid conflict about money. And involving children in planning and budgeting can make it easier to achieve savings goals together (Ibrahim, 2010).

Basic money management is about meeting one's family everyday

expenses, handling unexpected bills and saving for the future. It can put one in control of his/her money, which helps families avoid stress and feel more secure. The importance of budgeting to families cannot be over-emphasized. For example, budget will tell one whether one is currently spending more or less than they earn. If one is currently spending more, it can help to sit down together as a family and think about where they can save money. And if they are already spending less than they earn, they can look at how to save and how to use they savings.

One way to avoid crisis in resource allocation in the budget is identifying essentials. The absence of this can cause friction in family relationship. For example, food is a basic need of man. Food management is a broad process that involves the proper oversight of food selection, preparation, presentation, and preservation to ensure family food safety (Bell, 2015). Hu (2017) and Brad (2016) noted that food insecure individuals such as those in low income families engage in certain strategies to acquire food or manage their resources. These dietary and resource management behaviors are associated with more healthful dietary intake may indirectly improve food security status (Ali, 2001; Brother, 2019). Adoption of these behaviors and indirect improvement of food security status may ultimately lead to improved overall health and decreased risk of chronic diseases. With improved food security status, these at-risk populations can continue to engage in lifestyles that promote beneficial health outcomes and diminish the risk of negative health

outcomes associated with food insecurity. For example, when pregnant are women and children's foods prioritized, thev have access to nutritious foods which help to evert several diseases and ailments associated with poor feeding. However, until families are enlightened on these basics, they may not be able adopt effective practices towards family finance.

## Conclusion

This study has revealed the extent of budgeting practices adopted by families Owerri Municipal, Imo Specifically the study determined: guidelines (considerations) household follow in making their budget; general procedures they adopt in making budgets; problems they face in making budgets, and the ways they can improve their budgeting practices. The findings showed that some families do not practice safe budgeting practices, or have limited knowledge or awareness on its importance that will ensure the promotion of responsible consumption for sustainable living standards. The study revealed the need for adequate and continuous education of families towards this regards. This is significant these families helping sustainable living standards. Family is the microcosm of the larger society.

#### Recommendations

Based on the findings of this study, the following recommendations were made:

1. Interests groups and stakeholders such as religious groups (especially churches), community based

- organizations, socio-cultural groups such as youth and women wings, and relevant governmental should embark on continuous enlightenment and education of household members on the importance of family budgeting.
- 2. Specifically, enlightenment and sensitization programmes should be carried out for low income earners or families on the need for effective budgeting which will promote sustainable living for its members.
- 3. The enlightenment/education programmes for members of households should be focused on these sensitive areas to avoid ambiguity.
  - a) guidelines for making their budget;
  - b) procedures to adopt in making budgets;
  - c) and ways they can improve their budgeting practices.
- 4. Amongst all, effective communication amongst members in the family, and especially couples should be encouraged.

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# Management Strategies Adopted by Luxury Fashion Brand Retail Outlets in Uyo Local Government Area (LGA), Akwa Ibom State

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#### **Abstract**

This study focused on management strategies adopted by luxury fashion brand retail outlets in Uyo LGA. Specially, it determined: the planning and controlling strategies employed by luxury fashion brand retail outlets in Uyo LGA; and constraints to the management strategies. Three research questions guided the study. Survey design was used for the study. Population for the study was made up of all 34 luxury fashion brand retail outlets in Uyo. Questionnaire was used for data collection. Mean and standard deviations were used for data analysis. Findings reveal eight planning strategies mostly used by the fashion brand retail outlets to include, among others, identification of business goals and business subgoals; control strategies employed by the managers, among others, were assuming premise of future events, allow management examine assumption, recognise changes in the premise for adaptation, and evaluation of business plan. Findings reveal inadequate finance, scarcity of supply chain and high cost as constraints. Based on the findings of the study, it is recommended that managers of luxury fashion brand retail outlets should endeavour to employ appropriate planning and controlling strategies in their business management.

**Key words:** Management, Strategies, Luxury, Fashion, Brand, Retail, Outlets.

#### Introduction

The luxury concept has played an important role in social life of people in the past by being a clear indicator of knowledge and social class which has not changed at present but is only becoming catchier (Bothra, 2013). Today, the demand for luxury brands is ever increasing and brand offering is

continuously on the increase too. Luxury is anything that is desirable and more than necessary and ordinary (Bothra, 2013). Scholars explain it dynamically with changing times and scenarios. There are five characteristics of luxury according to Mortelmans (2005) which include restriction to elites by law or price; complexity of

acquisition; semiotic virtuosity; codes for appropriate consumption demanding specialized knowledge; and degree of linkage of their consumption to body, person and personality. Since the 1980s, the luxury market has grown at about ten percent per year, a much higher rate than the world economy, making the luxury industry a relevant economic factor (McKinsey 2011). Despite the current economic uncertainties, Bain Company (2011) forecast the luxury market to grow in the next few years by about five to six percent per annum worldwide. This thus creates current research concerns on luxury fashion products management of the luxury fashion brand retail outlets.

Management is often described as a ubiquitous concept, which is present in every aspect of human endeavour. Whether in business, hospital, religious setting, or even at home, management is indispensable. Management is useful especially in business sector where it is usually the driving force towards the achievement of the business objectives. It transcends from reforming manager's individual endeavour to entire staff of the business outfit. Management when viewed as a practice is neither a common sense activity, application of common sense leadership, and codified experience, nor mere financial manipulation (Okeke, 2001). The tasks of management include among others, the formulation, clarification, reinforcement, balancing and communication of objectives, and setting priority among objectives. About 80% of small and medium enterprises are stifled because of this problem of poor financing and other problems associated with it. The problems that emanated from poor financing include lack of competent management strategies.

Management strategy is a collection of techniques that helps to create a unique identity for an organisation by maintaining brand character, quality and customer interactions. It provides greater appeal and differentiation to a brand; enhances customer loyalty and retention; increases employee engagement and alignment; improves perceptions about product performance; decreases vulnerability to competitive marketing actions; accelerates trade cooperation and consumer response; increases marketing communication effectiveness; **Promotes** licensing opportunities (Anisa, 2019). According to Gomez-Mejia, Balkin and Cardy (2008), managers play a pivotal role in getting things done by motivating, inspiring and leading others at work. Management strategy includes planning, organizing, staffing, leading directing, and controlling organization to accomplish the goal (Gomez-Mejia, Balkin and Cardy (2008). Management of fashion luxury retail outlets need employ planning to strategy for the goals of the organization to be achieved.

Planning strategy is the process of documenting and establishing a direction of your small business by assessing both where you are and where you're going. A well-written plan can play a pivotal role in your small business's growth and success because it tells you and your employees how best to respond to opportunities

and challenge (Eric, 2020). A SWOT analysis critically evaluates the company's Strengths, Weaknesses, Opportunities and Threats. In planning management defines strategy, mission and vision of the organization. This involves defining business goals, determine staffing, budget and financial needs (George, 2018). In order implement the planning strategy effectively, adequate control technique must come to play.

Control technique involves the monitoring and evaluation of plans, activities, and results with a view towards future action, providing a warning signal through diagnosis of data, and triggering appropriate interventions, be they either tactical adjustment or strategic reorientation and Scifries, 2018). Control (Julian employed by techniques business outlets are include, assume premise of events, allow management examine assumption, recognise changes in the premise for adaptation (John, 2018), evaluation of business plan, (Julian and Scifries, 2018), special alert control to check strategy relevancy, evaluate plan on special alert control, monitor multiple source threat, attending conferences to be abreast with business trend which allows multiple management to monitor sources threats.

Business organizations exhibit typical characteristics: short lifecycles, high volatility, low predictability and high impulse purchasing (Christopher, Lowson and Peck, 2004). This is not indifferent for the marketing of fashion products. It is of paramount importance that luxury fashion dealers

identifies and manages risks in the supply chain and understands the value of marketing in mitigating some of the risks associated to the sales of their fashion products. Managers constraints which are forces that every organisation must contend with in order to execute management strategies (John, 2016). The author pointed out that, finance, managerial skills, organizational resources, structure, business ideas, poor public relation, high cost are constraint faced by business enterprises. Thiran, (2016) supports the fact by listing business model, organisational structure, leadership and culture as part of the constraints mostly faced by business enterprise like fashion luxury outlets. Carroll (2019) explained that faculty thinking, organisational process, time, culture economy and personal trait of the managers are constraint exposed to managers as they try to implement their strategic planning and control.

Irrespective of these constraints there is increasing demand for luxury brands which has resulted in the growth of emerging markets for luxury fashion houses in Uyo. While some of these fashion houses are having a good time soaring greener pastures in customer loyalty and sales turnover probably due to the brand names they project, their longstanding image and management strategies; others are yet to break-even. The stage gets tougher for the later especially in this wake of information technology where products are marketed via the internet or other ecommercial platforms. This gives an illusion that the management strategies of fashion luxury houses can contribute

a whole lot to the success of the business outfit. Thus, this paper makes an attempt to analyse the management strategies employed by luxury fashion brand retail outlets in Uyo, Akwa Ibom State.

The findings of this study will be relevant to luxury fashion dealers in Uyo, as it will guided them on the best management strategies to be adopted for effective sales. The result of the study will also become an invaluable resource material for subsequent research works in this similar. The study was restricted to luxury fashion dealers in Uyo, Akwa Ibom State.

#### **Objectives of the Study**

The main objective of the study was to investigate the management strategies adopted by luxury fashion brand retail outlets in Uyo, Akwa Ibom State. Specifically the study determined:

- 1. planning strategies adopted by luxury fashion brand retail outlets in the study area.
- 2.controlling strategies adopted by luxury fashion brand retail outlets in the study area.
- **3.**constraints to the management strategies.

#### **Research Questions**

- 1. What are the planning strategies adopted by luxury fashion brand retail outlets in the study area?
- 2. What are the controlling strategies adopted by luxury fashion brand retail outlets in the study area?
- 3. What are the constraints to the management strategies of luxury fashion brand retail outlets in the study area?

#### Methodology

**Design of the Study:** The descriptive survey design was adopted for this study.

Area of the Study: The area for this study was Uyo Local Government Area (LGA) of Akwa Ibom State. Uyo is capital of Akwa Ibom State and located within North-East senatorial District of the State. It was appropriate for the study because there are small and medium scale enterprises in the LGA that engage in luxury fashion business. The people living in the area of the study patronize luxury brand fashion extensively.

Population of the Study: Population for this study consisted of all the managers of luxury fashion brand retail outlets in Uyo, LGA, Akwa Ibom State, who are registered with the State Ministry of Commerce and Industry. The number of registered luxury fashion houses in Uyo LGA was 34 as at the time of the study. This population was considered manageable, so the entire population was involved in the study. There was no sampling.

Instrument for Data Collection: Questionnaire was used for data collection. The instrument was adopted and modified from General Business Management Questionnaire (Coach, 2003) and Osotimehin, Jegede, Akinlabi and Olajide (2012). They had a5-point scale for each of the items. It was validated by three experts Business Management.

*Data Collection Method:* Thirty four copies of the questionnaire were administered by hand to the respondents. The objectives of the study

were carefully explained to the respondents. Thereafter they were given sufficient time to respond to the questionnaire items. All the 34 copies of the questionnaire were retrieved. This represents 100 percent return.

**Data Analysis Techniques:** Data were analyzed using mean  $\overline{(X)}$  and standard deviation. Means score of 2.50 and above  $\overline{(X)}$  >2.5) were regarded as

"agreed" and any mean below 2.50  $\overline{(X} < 2.5)$  was regarded as "disagreed"; in terms of adoption /non-adoption of strategies. The means were also used to decide on the constraints and non-constraints to planning and control strategies

**Results** 

Table 1: Mean Responses on Planning Strategies Adopted by Luxury Fashion Brand Retail Outlets Uyo LGA

S/N	Planning Strategies	Mean	Std. Dev.	Rank
1	Identify business goals.	4.31	1.09	2 <sup>nd</sup>
2	Identify their business sub-goals.	4.26	0.94	3 <sup>rd</sup>
3	Define their business mission and vision.	3.95	0.85	5 <sup>th</sup>
4	Evaluate staff, budget and financial needs of their business.	3.86	0.83	6 <sup>th</sup>
5	Study the overall market.	4.35	0.83	$1^{\rm st}$
6	Evaluates strength of the business.	2.32	0.76	8 <sup>th</sup>
7	Evaluates weakness of the business.	1.87	1.47	9 <sup>th</sup>
8	Evaluates business opportunities available to the outlet.	3.97	0.66	$4^{\mathrm{th}}$
9	Evaluates business threats that need to be addressed	2.87	0.54	$7^{th}$

Table 1 shows that eight planning strategies are mostly adopted (used) by fashion brand retail outlets in Uyo LGA. All the items, except No 7, each has a mean score of 2.5 and above item ( $\overline{X}$ >2.5). No 7 has a mean of 1.87( $\overline{X}$ < 2.5). This shows that it is not adopted or been utilized by the outlets in the area of the study.

Table 2: Mean Responses on Control Strategies Adopted by Retail Outlets in Uyo LGA.

S./N	Control Strategies	Mean	Std. Dev.	Rank
	Manager:			
1	check on factors influencing their business, such as inflation.	2.85	0.43	5 <sup>th</sup>
2	compares actual result of factors against accepted	2.87	0.54	$4^{ m th}$
	business/outlet standard.			
3	recognises changes in the business and adjusts its strategy.	3.97	0.66	$2^{nd}$
4	revaluates the business plan of the fashion outlet.	4.04	1.38	$1^{\rm st}$
5	reassesses a given strategy in order to check its relevancy to	2.34	0.67	
	the fashion outlet.			$7^{th}$
6	assigns responsibilities of handling unforeseen events to crisis	1.87	1.47	$8^{th}$
	team.			
7	mentions and checks multiple sources threat.	3.86	0.83	$3^{rd}$
8	attends conferences to be abreast with business trend.	2.65	1.43	6 <sup>th</sup>

Table 2 shows that seven out of the eight control items, each has a mean of  $\overline{X}$ =>2.50. This means that the seven strategies are presently adopted by the outlets. The No 6 has a mean of 1.87 ( $\overline{X}$ <2.5). That means that the managers" do not assign responsibilities of handling unforeseen events to crisis team".

Table 3: Mean Responses on Constraints to the Management of Luxury Fashion Brand Retail Outlets in Uyo LGA

S/N	Constraint to the Management of Luxury Fashion	Mean	St. Dev.	Rank
1	High cost of fashion products.	2.71	0.73	1 <sup>st</sup>
2	Inadequate financing to meet the demands of costumers.	2.36	1.08	$2^{nd}$
3	Scarcity of supply links for luxury products.	2.29	0.83	$3^{rd}$
4	Poor public relations with costumers.	1.93	1.00	$4^{ m th}$
5	Lack of managerial skills by managers.	1.86	0.86	5 <sup>th</sup>
6	Lack of efficient storage facilities for luxury products.	1.86	0.95	$6^{th}$
7	Lack of business ideas to overcome inadequate digital	1.71	0.99	$7^{th}$
	marketing of products.			

Rank 1st is the most pressing constraint while rank 7th is the least pressing constraint.

Table 3 shows the mean responses on constraint items, ranked in an order of decreasing value and their corresponding standard deviations. 3 also reveals that management of luxury fashion brand retail outlets is mostly constrained by high cost of fashion products  $(\overline{X} = 2.71)$ . Other constraints to the management of luxury fashion brand retail outlets are "inadequate finance to meet costumers demand" and "scarcity of supply links for fashion product with mean of 2.36 and 2.29 respectively. The Table further shows that four items have means scores less than 2.5. Poor public relations with costumers ( $\overline{X}$ =1.93), lack of managerial skills by managers  $(\overline{X}=1.86)$ , lack of efficient storage facilities for luxury products  $(\bar{X}=1.86)$ , and lack of business ideas to overcome inadequate digital marketing products ( $\overline{X}$ =1.71), were not constraints

to the management of luxury fashion brand retail outlets in Uyo LGA.

#### **Discussion of Findings**

The adopted planning strategy by luxury fashion retail outlets in Uyo indicated that dedicated efforts are put in place to define the business goal, mission and vision. This goes to support Eric, (2018) and Anisa, (2019) that these variables speak well of why organization exists. This is to ensure that the business is effectively run to meet up with pre-defined objectives and targets. George, (2018) supports this finding by stating that effective planning strategy articulates not only where an organisation is going and the actions needed to make progress, but also how it will know if it is successful.

Managers of luxury fashion retail outlets in Uyo acknowledged that studying the overall market pave way for the success of fashion business. Završnik and Mumel (2000) supports this finding by stating that properly studying the overall market is a factor for success in the clothing industry. Based on the findings managers of luxury fashion retail outlets employ control strategy through assume premise of future events, allow management examine assumption and recognising changes in the premise for adaptation. This finding is in line with the statement of John, (2018) that aforementioned control strategy will organisation recognize help the changes in the premise for proper adaptation. The finding also reveals that manager of luxury fashion brand retail outlets implement control by evaluating their business in relation to organisational goals. Julian and Scifries, 2018 buttress this finding by pointing out that the implementation control evaluate plans, programs and projects by actually guiding the organisation towards its pre-determined luxury fashion brand retail outlets managers do not employ special alert as control strategy and this is against the fact emphasised by John, 2018 that special alert control allows an organization reconsider the relevancy of their strategy in light of these new events and prepare how they will handle these special alerts with procedures to be followed, priorities to keep and tools to be used. findings also revealed managers monitor multiple source threat and attend conferences to be abreast with business trends. support of this John, (2018) stated that Strategic surveillance control allows the management to monitor multiple sources threats and Continually safeguards strategy by following trade journals, attending conferences and keeping awareness of industry trends to meet the risks as they arise.

Furthermore, the findings unveiled that management of luxury fashion brand retail outlets are constrained by inadequate finance, scarcity of supply links and high cost. This finding confirms the statement of John, (2016) that managers face constraints which are forces that every organisation must contend with in order to execute its management strategies. The author pointed out that, inadequate finance, high cost are constraint faced by business enterprises. The findings also showed that Poor public relations, lack of managerial skills, lack of efficient preservation system and lack business ideas were not constraints to the management of luxury fashion brand retail outlets. This finding is not in agreement with John, (2016), Thiran, (2016) and Carrol, (2019) as they clearly pointed out that manager contend with these constraints in every organisation in order to execute their management strategies.

# Conclusion

In conclusion, this study explored management strategies employed by luxury fashion brand retail outlets in Uyo. The study unveiled that managers employ planning and controlling strategies to ensure efficiency in their business organisation. Irrespective of strategies employed the face financial, scarcity of supply link and high cost as constraints. Therefore they need appropriate management strategies to be able to contend with the constraints they face.

#### Recommendation

Based on the findings of the study the following recommendations are made:

- 1.Managers of luxury fashion brand retail outlets should endeavour to employ appropriate planning and controlling strategies in their business management.
- 2. Managers of luxury fashion brand retail outlets should endeavour to attend conferences as to abreast with business trend.
- 3..Managers of luxury fashion brand retail outlets should endeavour to employ appropriate premise control and acquire managerial skills in other to contend with financial skill.

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