UTILIZING ICT TO IMPROVE STUDENTS' INTEREST IN CLOTHING FOR ENHANCED CREATIVITY AND ENTREPRENEURSHIP FOR HOME ECONOMICS GRADUATES

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Abstract. Constructed clothing refers to garments and clothing items such as foot wears, head coverings, undergarments worn for various purposes. Clothing; a course offered under Home Economics in some tertiary educational institutions in Nigeria ensure provision of skills for self-employment by graduates. The study was done in Home Science and Management department, Federal University of Agriculture, Makurdi. Population for the study was 135 persons comprising students, lecturers and laboratory technologists. The population formed the sample size for the study. The research design was survey.

Specifically, the study had following objectives:(1) Identification of factors hindering student's interest in clothing (2) identification of more effective methods of imparting skills of clothing construction and textile designing (3) assessment of students' knowledge about clothing career opportunities (4) To identify area of teaching clothing where use of ICT is most required. Data were analyzed using percentages and mean. Findings of the study include: parents' poor attitude and societal perception of clothing constructors, lack of motivation by teachers; each with means 4.00, 3.90 and 2.73 respectively   hinder students' interest in clothing construction. Student's awareness of clothing career was high (X=3.98). Sale of products from practical by students (X=3.97), grouping of students with a leader (4.0) were indicated as ways of improving students' attitude to participating in practical. CT is relevant in teaching learning of all Clothing and Textile courses. Recommendations included (1) Institutional sponsorship of practical for ICT compliance. (2) Students should enjoy financial benefits from sold practical products.

Keywords: ICT, Clothing Construction, Home Economics, Income generation.

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1. INTRODUCTION

The mandate of tertiary education is to produce skilled persons, who are capable of playing effective roles in national economic and technological growth and development (Igbo, 1994 and Lemchi, 2001). Home Economics a vocational course, is concerned with the acquisition and development of practical skill by its students; providing employment opportunities in occupations relating textiles designing and production, clothing designing, construction, selection, care, economics (Igbo,1994; Ezema ,1998, Olutola, 2000 and Lemchi, 2001). Kaka (1998) observed that for students to be able to perform creditably in clothing, the course content should be effectively taught. Howe (2002) noted that the extent of learning among students can be accelerated by the teacher and the application of teaching devices at his disposal. Realizing the relevance of effective teaching of clothing and Textiles, stimulating students interest and developing their skill, there is need to identify areas of difficulties in the teaching of the subject so as to proffer solutions.

The ability to access and effectively utilize information is no longer a luxury but a necessity for development. There is no doubt that, Information and Communication Technology (ICT) provides the best possible means for productive teaching and learning in all educational fields in order to increase pupils' creative and intellectual resources. The simultaneous use of audio, text, multi-

color images, graphics and motion, ICT, gives an ample and exceptional opportunity to the student and teachers to develop capabilities for high quality learning and teaching and to increase their ability to be creative. The use computer in color selection for textile designing, pattern designing and drafting, determination of fit of garments, have introduced speed and accuracy.

Interest is the attraction which enables a person to respond to a particular stimulates in the midst of other competing stimuli (Okeye, 1998). Interest is a feeling which an individual has for something which is valuable and beneficial. It is the mother of attention, once there is direct attention, interest is guaranteed and learning is assured (Okeye, 1998). Interest to my mind is aroused by what people see and touch; ICT provides this opportunity for teachers and learners.

Vocation or career choice is not a smooth process. Certain prevailing factors guide individuals while a choosing a career and showing proficiency in it. These include among others: personality, environment, experiences, religion, academic achievement, family, socio-economic status. External factors such as interest and values like parents, teachers, peer group, friends, radio, television and books also affect the choice of an individual vocation. There are lots of causes and effect issues in life and in the field of vocational choices. Valuing education is one of the essentials for making realistic vocational decisions (Chauchan, 2011). Denga (2011) noted that vocational interest of adolescents are strongly influenced by the socio-economic inheritance from their parents or guardians; which may have a direct and greater effect upon the occupation open to him or which he finds attractive.

Income generation for sustainability is the target of every business venture. Successful income generation hitches largely on competence, managerial skills, the environment for the business and goodwill enjoyed by the entrepreneur among other things. Ekpo (2010) noted that entrepreneurship is vital route to growth of individuals and the nation. It helps to create wealth and reduce unemployment. Entrenching creativity and entrepreneurship

into education will take education beyond economic life and earning a living to sustainable communities and economies (Kembe, 2014).

2. STATEMENT OF PROBLEM

The poor awareness among students about clothing has produced negative attitude towards it. Most of the knowledge about clothing is reduced to just sewing of dresses which is viewed as job for school drop-outs; giving it a low social perception. The clothing course demands time and diligence, however, curriculum planners do not seem to allocate adequate time for this course as it is usually lumped with other courses on the time table. Clothing is still being lumped together with Textiles as one in some institutions of learning. Professionalism or specialization is not adequately displayed by graduates of Home Economics especially in Clothing entrepreneurship (Olugbaimgbe, 2009). The course content in colleges of Agriculture, and other tertiary institutions have remained the same over several years hence students' interest in clothing in particular is very low. Therefore very few graduates of Home Economics end up as Clothing professionals. This has resulted in influx of non-professionals in the business of clothing construction, Textiles production. Non-professionals sometimes produce poor quality garments and clothing items. There are lots of setbacks on availability and use of instructional materials by teachers of clothing.

There is therefore need to strategize on how to enhance the teaching and learning of clothing to improve creativity and entrepreneurship among Home Economic graduates.

3. PURPOSE OF THE STUDY

The main purpose of the research is to assess utilization of ICT to improve students' interest in clothing for enhanced creativity and entrepreneurship for home economics graduates.

3.1. Research Questions
1. What are the factors hindering students interest in Clothing?

2. What is the status of student's knowledge on clothing career opportunities?
3. How can clothing be taught more effectively to improve students' interests?
4. What are the areas of teaching clothing where use of ICT is most required?

3.2. Research Design

The design of this study is survey design. Survey was used since it required seeking opinion from a sample of respondents and generalizing for a larger population (Trochim 2006).

3.3. Area of the Study

The research was carried out in the department of Home Science and Management, College of Food Technology, Federal University of Agriculture, Makurdi. The department runs a four-year degree course. Academic activity in the department comprise lectures, practical work, seminars, exhibitions and excursions; with much emphasis on graduating students with entrepreneurial skills and careers for self-sustainability. The department has a total of three hundred and thirty-nine registered students in 100 to 400 levels (2010/2011 academic session).

3.3.1. Population for the Study

The population for this research comprised all 300 and 400 level students of Home Science and Management Department and all laboratory technologists working in the Clothing laboratory of the department in the 2010/2011 academic session totaling 135 persons.

3.3.2. Sample and Sampling Technique

No sampling was undertaken. All the population was used for the study, since the population was small.

4. DATA ANALYSIS

Structured Questionnaire was the instrument for data collection for the study. The questionnaire consisted of two sections: A and B. Section A deals with bio data of respondents. Section B solicited information on general issues relating to the clothing course, sociological and psychological variables. Each question contained four options rated on a four point rating scale as follows: Strongly Agree (SA) = 4, Agree (A) = 3, Disagree (D) =2, Strongly Disagree (SD) = 1.

4.1. Validation of Instrument for Data Collection

The instrument was validated by two lecturers in department of Home Science and Management. Suggested corrections especially on the right people to respond to the questionnaire were carried out.

4.2. Reliability of Instrument for Data Collection

Reliability of instrument was tested using Cronbach Coefficient alpha method. The questionnaire was served to randomly select fifty 300 and 400 level students of Benue State University, who offer Home Economics. Benue State University has similar environment with the University of Agriculture Makurdi. The items responded to were subjected to statistical analysis using SPSS (statistical package for social science) version 16 to estimate the internal consistency of the instrument. The Cronbach Coefficient alpha is 0. 72 indicating that the instrument has internal consistency and therefore reliable for what it set out to measure.

4.3. Method of Data Collection

The researcher distributed the questionnaire personally and collected at stipulated short period to avoid lose. Copies of questionnaire were distributed to 300 and 400 levels student in their classrooms or laboratories and to laboratory technologists in the clothing laboratory and collected at the same venue.

4.4. Method of Data Analysis

Sections A and B were analyzed using means and percentages respectively. A mean of 2.5 was considered as bench mark to determine acceptability or otherwise by respondents.

5. RESULTS AND DISCUSSION

Research Question One: What are the factors that hinder students' interest in clothing course? The response to this research question is in table 1.

Table 1: Responses of Students on Factors that Hinder Students' Interest in Clothing.

S/N	Variables	Frequency				Mean	Remarks
		4	3	2	1	X	
1	Lack of motivation by teachers.	110	15	7	0	3.67	Accepted
2	Parents attitude towards clothing	50	40	25	17	2.73	Accepted
3	Inadequate practical per week	120	10	2	0	3.86	Accepted
4	Poor methods of teaching.	54	63	13	2	3.07	Accepted
5	Societal perception of clothing constructor	115	10	5	2	3.71	Accepted
6	Inadequate period on the school time	125	5	2	0	3.90	Accepted
7	Lack of innovations in teaching	105	6	8	13	3.54	Accepted

Table 1 shows that all the following factors; inadequate practical, inadequate period on the school time table, lack of motivation by teachers, societal perception of clothing constructors hinder students' interest in clothing since each of the means was higher than 2.50. Inadequate period on the school time table (X=3.90) has the highest mean while parent attitude towards clothing has the lowest mean (X=2.73).

Research Question Two: What is the status of student's knowledge on the importance of clothing as a career? The response to this research question is in table 2.

Table 2: Status of Student Knowledge on the Importance of clothing as a career.

S/N	Variables	Frequency				Mean X	Remark
		4	3	2	1		
1	Students are aware that clothing construction provides employment opportunities	120	10	2	0	3.86	Accepted
2	Students are aware that clothing construction provide income to man.	125	5	2	0	3.90	Accepted
3	Students are aware that career in clothing is applicable in different works of life.	90	25	15	2	3.30	Accepted
4	Students are aware that career in clothing is useful for health therapy.	50	42	20	2	2.92	Accepted
5	Students are aware that the knowledge of clothing produces graduates with saleable skills.	122	10	0	0	3.92	Accepted
6	Students are aware that the knowledge of clothing helps to reduce poverty among university students.	127	6	1	0	3.98	Accepted

Table 2, shows that student's awareness about functions of clothing as a course performs is moderate since the highest mean is 3.98 (clothing helps to reduce poverty among university students).

Research Question Three: What are the new practical ways of improving students' skill and interest in clothing? The response to this research question is in table 3.

Table 3: Responses of Students on the New Practical Ways of Improving Students' Skill and interest in clothing

S/N	Variables	Frequency				Mean	Remark
		4	3	2	1		
1	Grouping of students with a leader to each group.	100	17	13	2	3.42	Accepted
2	Each group should have a particular day for their practical.	127	3	2	0	3.92	Accepted
3	Increase ratio of lecturers to students.	90	25	15	2	3.30	Accepted
4	The use of video for wider coverage and arousal of students' interest.	97	26	7	2	3.53	Accepted
5	Student should be told of the practical on time to obtain funds ahead.	117	9	6	0	3.57	Accepted
6	Students should carry out the practical themselves while the teacher supervises thoroughly.	80	40	7	5	3.33	Accepted
7	All clothing practical should be scheduled after theory and exams.	9	69	41	13	2.56	Accepted
8	Students should purchase their personal sewing equipment as they enter into the university.	50	24	43	15	2.82	Accepted
9	Clothing should be taught only to those interested in the career.	127	3	2	0	3.92	Accepted
10	Students should sell the produced item and have a portion of the income generated.	126	6	0	0	3.97	Accepted
11	Students interested in clothing career should be given part time employment in the laboratory to generate income for the university and themselves.	9	29	7	0	3.55	Accepted

Table 3, revealed that all the relevant suggested methods of improving student's skill and interest in practical were acceptable to the students. The item with the highest mean (3.97) is students should sell the practical and have a portion of the income generated. Clothing practical should be scheduled such that theory and exams had the lowest mean (2.56).

Responses of Laboratory Technologists

Research Question Four: What are the factors that hinder student's interest in clothing as a course?

Table 4: Response of laboratory technologist on the factors that hinder student's interest in clothing as a course.

S/N	Variables	4	3	2	1	Mean	Remark
				Frequency			
1	Lack of motivation by teachers.	2	1	0	0	3.66	Accepted
2	Parent's attitude towards clothing.	3	0	0	0	4.00	Accepted
3	Inadequate practical per week.	1	2	0	0	3.33	Accepted
4	Poor methods of teaching.	1	2	0	0	3.33	Accepted
5	Societal perception of clothing constructor.	3	0	0	0	4.00	Accepted
6	Inadequate period on the school time table for theory	2	1	0	0	3.66	Accepted

In table 4 all the factors were accepted since each of the mean was higher than 2.5. The factor with the highest mean (X=4.00) for parents attitude towards clothing and societal perception of clothing constructors. While the factor with the lowest mean (X=3.33) inadequate classes and poor method of teaching.

Research Question Five: What are the new practical ways of improving student's and skill and interest in clothing?

Table 5: Response of Laboratory Technologists on the new practical ways of improving Students' skills and interest in clothing

S/N	Variables	4	3	2	1	Mean X	Remark
			Frequency				
1	Grouping of students with a leader to each group	3	0	0	0	4.00	Accepted
2	Each group should have a particular day for their practical	0	3	0	0	3.00	Accepted
3	Increase ratio of lecturers to students	0	3	0	0	3.00	Accepted
4	The use of video for wider coverage and arouse students interest	0	3	0	0	3.00	Accepted
5	Students should be told of the practical on time to get fund ready	3	0	0	0	4.00	Accepted
6	Students should carry out the practical themselves while the teacher supervises thoroughly	2	1	0	0	3.66	Accepted
7	All clothing practical should be scheduled after theory and exams	1	2	0	0	3.33	Accepted
8	Students should purchase their personal sewing equipment as they enter into the university	2	1	0	0	3.66	Accepted
9	Clothing should be taught only to those interested in the career	2	1	0	0	3.66	Accepted
10	Students should sell the produced item and have a portion of the income generated	2	1	0	0	3.66	Accepted
11	Students interested in clothing career should be given part time employment in the laboratory to generate income for the university and themselves	2	1	0	0	3.66	Accepted

Table 6 shows that the eleven suggested methods of improving students' interest in practical were acceptable by the laboratory technologists. Grouping of students with a leader and informing students about the requirements for the practical each has the highest mean of (X=4.00) respectively.

Table 6: Clothing and Textile courses that require use of ICT

S/No	List of courses that require use of ICT for teaching and learning	Yes	%	No	%	Accepted/ Unaccepted
			Responses			Remarks
1	Introduction to Clothing	135	100	0	0	Accepted
2	Introduction to Textiles	132	97.78	3	2.22	Accepted
3	Introduction to Clothing construction	135	100	0	0	Accepted
4	Introduction to Textile design	135	100	0	0	Accepted
5	Introduction to Pattern designing, drafting and Alteration	135	100	0	0	Accepted
6	Advanced garment Construction	128	98.81	7	5.18	Accepted
7	The Fashion Industry	135	100	0	0	Accepted

Responses in table 6 shows that all course list require the use of ICT in teaching and learning to arouse students' interest and improve on their choice of career.

6. DISCUSSION OF RESULT

The main factors hindering student's interest in clothing indicated by students in the research were inadequate classes and inadequate period on the school time table for theory (X=3.90), lack of motivation by teachers (X=3.67) and parents' attitude towards clothing (X=2.73). The factor hindering students interest in clothing according Laboratory technologists are: parents attitude towards clothing (X=4.00) and societal perception of clothing constructors (X=4.00) and inadequate classes and poor method of teaching (X=3.33).The finding agrees with reports by Howe (2002), who noted that the extent to which the rate of learning among students generally can be accelerated, depends on the teacher and the extent to which he can apply the entire teaching device at his disposal. The lack of students on the subject interest can be very devastating on students. Kembe, (2008) noted that clothing design and construction is generally viewed by students to be very difficult. It is viewed as the mathematics of Home Science and Management (Kembe, 2008). It is generally dreaded and kills their interest.

The findings are supported by Olaitan (1994) who purported that factors hindering students' interest in clothing include lack of

time, misconception of clothing by the society. Where enough time is not allocated for clothing practical, teachers or laboratory technologist may not be able to supervise the students adequately. Students left to them to complete their practical may not produce the best clothing items. Products with poor finishes cannot compare well with other products in the market.

According to Stage (1991), and Steinberg (1993) other factors that cause poor interest include low socio economic status of the family, parental education amongst others. Students' knowledge on the importance of clothing as a career is high; clothing helps reduce poverty among university students, provide employment opportunity, produces graduate with saleable skill and career in clothing is useful for health therapy. Several career opportunities abound in clothing for graduates of Home Economics. Ezema (1998) had noted that clothing equips students in tertiary institutions with saleable skills and thus poses the capacity of helping in the reduction of poverty problem among university graduates. With this awareness, it is necessary to device means of encouraging full participation of students in clothing. Clothing of various forms is gaining popularity in providing health therapy for the sick; expanding career opportunities in clothing. For instance the use of wrist bangles, neck chains and ankle chains for treatment of diabetes, high blood pressure etc. Carrol(2001), Chase and Quinn (2003) noted the role correct clothing play in enhancing a feeling of wellness in sick people. One of the new practical ways of improving students interest in clothing suggested by students in table 3 was clothing should be taught to only those interested in the course. It should not be a compulsory course. Direct interest is achieved when the learner pays attention without compulsion. This is so because the subject under study will be so attractive and interesting to the students who do not have to make any concerted effort to understand it.

However, the curriculum for home economics in the University of Agriculture Makurdi and probably in some Universities in Nigeria does not permit course selection. Another factor suggested is the use of video as an instructional material. The use of video is one of the recent strategies for enhancing student's interest in learning. Due to the financial implications of this it poses a challenge especially in the department Home Science and Management. Another strategy suggested by students is grouping of student to reduce number of students per lecturer for their practical. This agrees with the findings of Ossai (2003) that grouping enhances closer contact between teachers and students resulting in better learning process. This is only possible if student to lecturer ratio is low (6:1) and both have ample time at their disposal. In a situation where the class population is very high, space small, equipment few and number of lecturers are few, the lecturers will be over worked and productivity will remain low. The ICT will help for coverage by lecturers.

7. CONCLUSION

The importance of clothing course in providing career opportunities for graduates of Home Economics is known to students however, students' interest in this course is hampered by some factors emanating from the school system and the outer society. The proffered solutions will enhance the learning process by students of Home Economics and consequently reflect on their career choice on graduation. Application of ICT for teaching and learning is a well come development by most of the students.

8. RECOMMENDATIONS

Based on the findings of the research, the following are recommended:
1. More time on the time table should be allocated to practical and theory classes in Clothing.
2. During clothing practical, students should be grouped with a leader, few students per group.
3. Students who produce saleable items should enjoy financial benefits to encourage better participation.

Conflict of interests

Author declare no conflict of interest.

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