FACTORS INFLUENCING FEMALE UNDERGRADUATE STUDENTS' ACCEPTANCE OF CERVICAL CANCER SCREENING IN SOUTH-WEST NIGERIA

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Abstract

There is a general recognition of lack of practice, knowledge and acceptance of importance of cervical cancer screening among young women. This has resulted in late diagnosis of cervical cancer and a resultant poor prognosis. The aim of this study is to assess the level of acceptance and determine the factors influencing the acceptance of cervical cancer screening among female undergraduate students in a selected University in Lagos, Nigeria. This study adopted a descriptive design and a multistage sampling technique. A self-administered questionnaire was used to elicit information from 228 students with a response rate of 99.13%, data was analysed using the SPSS statistic version 20. This study observed that more than half (70.2%, n=228) of the respondents were between ages 20-24yrs. A good number (31.6%, n=228) were in 300 level. Almost all (93%, n=228) were single and well above half (63.2%, n=228) were Yorubas. More than three-quatre (89.9%, n=228) were Christians and well above half (57.0%, n=228) began menarche from age 9-12 years. The study reveals that the level of acceptability of cervical cancer screening among the respondents is average. Further findings shows that accessibility of Screening Center, affordability of vaccines and screening services, lack of funds, health workers attitude, worry about privacy and feeling of embarrassment about the procedure were the major factors influencing the acceptance of cervical cancer screening and the major risk factors of cervical cancer are Human Papilloma virus infection, multiple sexual partners, early onset of sexual activity and family history and smoking. The tested hypothesis shows that the age and level of study have significant association with acceptance of cervical cancer screening with P = 0.000 and 0.014 respectively. It is therefore recommended that the nurses should, in conjunction with the government and the ministry of health and ministry of education, create awareness programmes on the importance of cervical cancer screening among undergraduate students at all levels.

Keywords: Factors, Acceptance, Cervical Cancer Screening.

Introduction

Cervical cancer is a malignant tumour arising from cells that originates from the cervix, the lowermost part of the uterus. It occurs when an abnormal cell on the uterus grows out of control; the condition is malignant in nature and usually affects women in their fifth and sixth decades of life at the mean age of fifty-four years. The pre-malignant stage of the diseases usually occurs in younger women under the age of forty (Makwe and Anorlu, 2011). Even though it is preventable, the number of cases globally is predicted to almost double up by the year 2025 (Abida, Sumeyya, Guo and Sayi, 2015). The mortality rate of this preventable disease can be reduced globally through introduction of comprehensive prevention, early diagnosis, effective screening and treatment approach. Though there are vaccines that can be used to protect against common cancer-causing types of Human Papilloma Virus (HPV), thereby reducing significantly the risk of cervical cancer but because these vaccines are not utilized as expected, the condition has become a serious public health problem accounting for over 275,000 female deaths and approximately 529,000 new diagnoses each year (WHO, 2018).

The World Health Organization (WHO) reports that globally, cervical cancer is the second most common cause of female cancer. For the past 3 decades, the rate of cervical cancer has reduced drastically in major developed countries due to improvement in routine screening exercise. This is different in developing countries like Nigeria where there is low screening programme thus bringing about no improvement or increasing the rates. Even though it is clear that early screening exercise could reduce the mortality and morbidity associated with cervical cancer, but due to lack of resources, limited coverage of cervical cancer screening, this has become difficult to achieve. (Assoumou, Mabika, Mbiguino, Mouallif and Khattabi, 2015)

Moreover, that there is high prevalence of HPV in the developing countries compared to the developed ones, early detection and treatment still remain the main control strategy for this condition. (Assoumou, et al, 2015). In sub-Sahara Africa, where Nigeria remains the most populous country with over 150 million inhabitants and life expectancy of 49.3 years in men and 50.8 years in women, child mortality rate of 57.3 and 56.5, 5 per 1,000 in males and females respectively. The incidence rate of cervical cancer like any other condition in Nigeria is still high (Oluwole, Mohammed, Akinyinka & Salako, 2017). As earlier observed, the non-existence of adequate screening

exercise, lack of infrastructure, poorly trained health staff and huge financial cost usually result in late diagnosis at advanced stages leading to poor prospects of Cervical cancer which kills one woman every hour and over 9,000 women every year in Nigeria (Oluwole, et al, 2017).

Although researches have shown that the primary causative agent is the human papillomavirus (HPV) with over 70% of all cases of cervical cancer directly due to infection with HPV-16 and 18 strains. Also, the sexually transmitted nature of this HPV, early onset of sexual intercourse and multiple sex partners are significant risk factors which increases the chance of it becoming the only human cancer which necessary cause is known (Coleman, Levison & Sangi-Haghpeykar, 2011). Other related factors include unhealthy diet, alcohol, tobacco, and lack of physical exercise, oral contraceptive use, and susceptibility of the adolescent cervix to sexually transmitted infections (Toye, Okunade, Roberts, Salako, Oridota & Onajole (2017).

Also, contributing to the vulnerability of cervical cancer are poor vaccine delivery efforts, low cervical cancer screening levels, ineffective health system capabilities, inaccessibility to medical care, low awareness and knowledge of HPV and cervical cancer, and failure to recognize cervical cancer as a major health concern (Agida, Akaba, Isah & Ekele, 2015). Moreover, because of the prevailing low level of awareness, poor knowledge and poor participation (acceptance) in the screening exercise of cervical cancer observed from literature (Lenselink, Schmeink, Melcherd, Massuger, Hendriks & Hamont, 2008); the study therefore seeks the need to determine the factors influencing the acceptance of cervical cancer screening among female undergraduate students in a selected University in South-west Nigeria.

Objectives of the study

To assess the acceptance of cervical cancer screening among female undergraduate students in a selected University, South-west Nigeria.
To determine factors influencing their acceptance
To identify the major risk factors of cervical cancer.

Methodology

This study adopts descriptive research design. The study area is the College of Medicine, University of Lagos. The College of Medicine was conceived by the founding fathers as a Medical school which is an autonomous entity within the University of Lagos in October 1962, with the admission of the first batch of 28 medical students. The college now has three faculties: Basic Medical Sciences, Clinical Sciences and Dental Sciences. The College consists of 32 departments with a student population of almost 2000 students and staff strength of 1,850. The College has since to date produced over 6000 graduates of Medicine, Nursing, Dentistry, Microbiology, Physiotherapy, Radiography and Pharmacology. It has also produced graduates of M. Sc, M, Phil and Ph. D degrees in various disciplines and MD degree in Anatomy, Physiology, Medical Microbiology, Pharmacology, Pharmacy, Medicine, Clinical Pathology and Child Health & Primary Care. Great strides have been taken in providing facilities for teaching and research.

The population of this study consists of female undergraduates in the College of Medicine, Idi-Araba. Sample size was calculated with the Yamane formula ($n = N/1+N (e)^2$; 1967); which came to a total of 228 female undergraduate students. A 95% confidence level and 'P'= 0.05 were assumed. Multistage sampling technique method was used to select the participants viz: purposeful selection of the three faculties in college of medicine, University of Lagos; random selection of one Department from each faculty for good presentation of the departments; putting the students into clusters according to their levels e.g. 200, 300, - 600 levels and students were selected by ballot method from all the Clusters (Levels).

The instrument used for data collection was a self-developed structured questionnaire. The questionnaire was designed to provide answers to each of the objectives of the study. It consists of 3 sections, with 40-item, designed to obtain details about the respondent's Socio- demographic characteristics, Knowledge of participant about cervical cancer screening, acceptance of the participants to cervical cancer screening. This questionnaire was validated by experts from the field and the reliability was determined in different populations (23 students from other departments other than the selected departments) with a Test-retest reliability coefficient of 0.614.

Data were collected and analysed with the aid of Statistical Package for Social Sciences (IBM SPSS) software Version 20 (Armonk, 2011). Analysis involves computation of frequency tables. Frequency distributions was generated for all categorical variables and determined for continuous variables. Chi square test was used to test for significance of categorical variables. Results were presented in tables and charts. Ethical approval was obtained from the Health Research and Ethics Committee of College of Medicine, University of Lagos with ethical number ADM/DCST/HREC/APP/3286 and informed consent was taken from each participant before data collection.

Results

A total of 230 copies of the questionnaire were distributed but only 228 copies of the questionnaire that were adequately filled and returned were subjected to analysis. These gave a response rate of 99.13%. As presented in Table 1, 15.8% of the respondents are between the age range of 15-19years, 70.2% are between the age range of 20-24years, 11.4% are between the age range of 25-29years while 2.6% are 30years and above. Also, 18.9% of the respondents are in 200 level, 31.6% are in 300 level, 12.7% are in 400 level, 26.3% are in 500 level while 10.5% are in 600 level. Majority (93%) of the respondents are single while 7% are married. Most of the respondents (63.2%) are Yorubas, 25% are Igbos, 9% are Hausas while 7.9% are from other tribes. Majority of the respondents (89.9%) are Christians while 10.1% are Muslims. Also, 57% of the respondents have their menarche between 9-12 years, 40.4% have their menarche between 13-15years while 2.6% have their menarche between 16-18years.

Table 1: Socio-demographic variables

Variables		Frequency	Percentage
Age	15-19	36	15.8
	20-24	160	70.2
	25-29	26	11.4
	>30	6	2.6
	Total	228	100
Level	200	43	18.9
	300	72	31.6
	400	29	12.7
	500	60	26.3
	600	24	10.5
	Total	228	100
Marital status	Single	212	93.0
	Married	16	7.0
	Divorced/separated	0	0.0
	Total	228	100
Ethnic group	Yoruba	144	63.2
	Igbo	57	25.0
	Hausa	9	9.0
	Others	18	7.9
	Total	228	100
Religion	Christianity	205	89.9
	Islam	23	10.1
	Others	0	0.0
	Total	228	100
Menarche	9-12	130	57.0
	13-15	92	40.4
	16-18	6	2.6
	Total	228	100.0
How many sexual partners do you have?	1-2	34	14.9
	3-4	27	11.8
	5-6	0	0
	>6	9	3.9
	None	158	69.3

Furthermore, 14.9% of the respondents have 1-2 sexual partners, 11.8% have 3-4sexual partners, 3.9% have more than 6 sexual partners while 69.3% have no sexual partners. A summary of the sociodemographic characteristics of respondents are viz: the respondents are between the age 20-24yrs (70.2%), majority are 300 level students, single and Yoruba (63.2%). Furthermore, the result shows that majority (89.9%) of them are Christians, begin menarche at the age 9-12years (57.0%) and do not have sexual partners.

Objective one

To assess the acceptance of cervical cancer screening among female undergraduate students in a selected University in South-west Nigeria.

As presented in Table 2, the result shows that 28.9% of the respondents strongly agree that cervical cancer is an invasive procedure and 43% agree, 12.7% are neutral while 11.4% of the respondents disagree and 3.9% strongly disagree. Also, 21.1% of the respondents agree that cervical cancer screening should be done for all females irrespective of their ages and 24.1% agree, 23.7% are neutral while 27.2% of the respondents disagree and 3.9% strongly disagree. 25.9% of the respondents agree that cervical cancer screening should be done for adolescents and 58.3% agree, 3.5% are neutral while 12.3% of the respondents disagree. 21.1% of the respondents strongly agree that cervical cancer screening should be done for all school ages and 31.6% agree, 29.4% are neutral while 13.6% of the respondents disagree and 4.4% strongly disagree. 46.1% of the respondents strongly agree that cervical cancer screening should be encouraged / advocate before marriage and 44.7% agree, 3.5% are neutral while 5% disagree. 12.3% of the respondents strongly agree that cervical cancer screening should be done only for women preparing for marriage and 6.1% agree, 18.9% are neutral while 42.5% of the respondents disagree and 20.2% strongly disagree. 12.3% of the respondents strongly agree to have done cancer screening before and 6.1% agree, 18.9% are neutral while 42.5% of the respondents disagree and 20.2% strongly disagree.

This study also reveals that 9.6% of the respondents agree that individuals having multiple sexual partners should only be screened for cervical cancer and 12.7% agree, 6.1% are neutral while 50.9% of the respondents disagree and 20.6% strongly disagree. 22.8% of the respondents agree that they accept different screening types, for example pap smear, vagina examination and others and 47.8% agree, 20.2% are neutral while 9.2% disagree. 16.2% of the respondents agree that female below 15years should

be screened of cervical cancer and 37.3%, 21.1% are neutral while 17.1% of respondents disagree and 8.3% strongly disagree. 26.8% of the respondents strongly agree that they support cervical cancer screening and they would allow their self to be screened later and 57% agree, 13.6% are neutral while 2.6% of respondents strongly disagree. From this study it can be deduced that the level of acceptance of the participants to cervical cancer screening is average (55.6%).

Table 2: Acceptance of participant to cervical cancer screening

S/N	VARIABLES	SA	A	N	D	SD
1	Cervical cancer is an invasive procedure	66 (28.9)	98 (43.0)	29 (12.7)	26 (11.4)	9 (3.9)
2	Cervical cancer screening should be done for all female irrespective of their ages	48 (21.1)	55 (24.1)	54 (23.7)	62 (27.2)	9 (3.9)
3	Cervical cancer screening should be done for adolescent	59 (25.9)	133 (58.3)	8 (3.5)	28 (12.3)	0 (0.0)
4	Cervical cancer screening should be done for all school age girls.	48 (21.1)	72 (31.6)	67 (29.4)	31 (13.6)	10 (4.4)
5	Cervical cancer screening should be encouraged/advocated before marriage	105 (46.1)	102 (44.7)	8 (3.5)	13 (5)	0 (0.0)
6	Cervical cancer screening should be done only to women preparing for marriage	25 (12.3)	14 (6.1)	43 (18.9)	97 (42.5)	46 (20.2)
7	I have done cervical cancer screening before	28 (12.3)	14 (6.1)	43 (18.9)	97 (42.5)	46 (20.2)
8	Individuals having multiple sexual partners should only be screened for cervical cancer	22 (9.6)	29 (12.7)	14 (6.1)	116 (50.9)	47 (20.6)
9	I accept different screening types e.g pap smear, vagina examination and others	52 (22.8)	109 (47.8)	46 (20.2)	21 (9.2)	0 (0.0)
10	Females below 15 years should be screened of cervical cancer	37 (16.2)	85 (37.3)	48 (21.1)	39 (17.1)	19 (8.3)
11	I support cervical cancer screening and I will allow myself to be screened later	61 (26.8)	130 (57.0)	31 (13.6)	0 (0.0)	6 (2.6)
	TOTAL	22.1	33.5	15.6	21.1	7.7

*percentages are written in parenthesis

Objective two

To determine factors influencing their acceptance.

From Table 3, this study observes that 72% of the respondents agree that accessibility of screening centres is a factor influencing acceptance of cervical cancer screening, while 8% agree, 8% disagree and 11% strongly agree. 51.3% of respondents strongly agree that affordability of vaccine and screening is a factor influencing acceptance of cervical cancer screening, while 15% agree, 18% disagree and 16% strongly disagree. This study also reports that 46.5% strongly agree that lack of funds is a factor influencing acceptance of cervical cancer screening while 19.3% agree, 26.8% disagree and 7.5% strongly disagree. 16.2% of respondents strongly agree that fear of cancer diagnosis is a factor influencing acceptance and 25.4% agree, 44.3% disagree while 10.1% strongly disagree. 10.1% of the respondents strongly agree that lack of transportation is a factor influencing acceptance of cervical cancer screening and 7.5% agree, 57.5% disagree, while 21.1% of the respondents strongly disagree. 14.5% of the respondents strongly agree that fear of pain and embarrassment is a factor influencing acceptance of cervical cancer screening while 21.9 % agree, 49.6% disagree and 10.1% strongly agree.

This study also reveals that 6.6% of the respondents agree that lack of knowledge is a factor influencing the acceptance of cervical cancer screening while 23.7% agree, 48.7% disagree and 12.7% strongly disagree. 19.7% of the respondents strongly agree that health workers attitude is a factor influencing acceptance of cervical cancer screening, while 32% agree, 32.5% disagree and 15.8% strongly disagree. 18.9 of the respondents strongly agree that low perceived risk of diseases is a factor influencing acceptance of cervical cancer screening while 28.9% agree, 39% disagree and 13.2% strongly disagree. This study further shows that 17.5% of the respondents strongly agree that worry about their privacy is a factor influencing acceptance of cervical cancer screening while 40.4% agree, 30.3% disagree and 11.8% strongly disagree. 17.5% of the respondents strongly agree that hospital/health centres policies are factors influencing acceptance of

cervical cancer, while 18% agree, 43.4% disagree 21.1% strongly disagree. 22% of the respondents strongly agree that the feeling of embarrassment about the procedure is a factor influencing acceptance of cervical cancer screening while 21% agree, 22% disagree and 18% strongly disagree. The study concludes that the main factors influencing the acceptance of cervical cancer screening are: accessibility of screening centres, affordability of vaccines and screening, lack of funds, health workers attitude, worry about privacy and feeling of embarrassment about the procedure.

Table 3: Factors influencing acceptance of cervical cancer screening

Factors	SA	A	D	SD	Sig
Accessibility of Screening Centre	164 (72)	20(8)	20 (8)	24 (11)	80%*
Affordability of vaccines and screening	117 (51)	35 (15)	40 (18)	36 (16)	66%*
Lack of fund	106 (46.5)	44 (19.3)	61 (26.8)	17 (7.5)	65%*
Fear of cervical cancer diagnosis	37 (16.2)	58 (25.4)	101 (44.3)	23 (10.1)	42%
Lack of transportation	23 (10.1)	17 (7.5)	131 (57.5)	48 (21.1)	18%
Fear of pain and Embarrassment	33 (14.5)	50 (21.9)	113 (49.6)	23 (10.1)	36%
Lack of knowledge	15 (6.6)	54 (23.7)	111 (48.7)	29 (12.7)	30%
Health workers attitude	45 (19.7)	73 (32.0)	74 (32.5)	36 (15.8)	52%*
Low perceived risk of disease	43 (18.9)	66 (28.9)	89 (39.0)	30 (13.2)	48%
Worry about privacy	40 (17.5)	92 (40.4)	69 (30.3)	27 (11.8)	58%*
Hospital/ health centres policies	40 (17.5)	41 (18.0)	99 (43.4)	48 (21.1)	36%
Feeling of embarrassment about the procedure.	90 (40)	48 (21)	50(22)	40 (18)	61%*

*percentages are written in parenthesis

Objective three

To identify the major risk factors of cervical cancer.

From the Table 4, the result shows that 93.4% of the respondents agree that Human papilloma virus infection is a risk factor for cervical cancer, 88.2% agree that having multiple sex partners is a risk factor for cervical cancer and also, 86.4% of the respondents agree that early onset of sexual activity is a risk factor to cervical cancer. Furthermore, 83.3% of the respondents agree that family history is a risk factor of cervical cancer screening and 58.8% of the respondents agree that smoking is a risk factor for cervical cancer.

Also 32.5% of the respondents agree that unknown cause (spiritual) is a risk factor of cervical cancer while 27.2% of the respondents agree that the long-term use of oral contraceptives is a risk factor of cervical cancer. However, 24.6% agree that poor hygiene is a risk factor for cervical cancer while 7.9% agree that sexually transmitted infections are risk factors for cervical cancer. This study reveals that the major risk factor of cervical cancer is Human Papilloma virus infection, multiple sexual partners, early onset of sexual activity, family history and smoking.

Table 4: Risk Factors for Cervical Cancer

S/No	Variables	Yes	No
1.	Human Papilloma virus Infection	213(93.4%)*	15(6.6%)
2.	Multiple Sexual Partners	201(88.2%)*	27(11.8%)
3.	Early Onset of Sexual Activity	197(86.4%)*	31(13.6%)
4.	Family History	190(83.3%)*	38(16.7%)
5.	Smoking	134(58.8%)*	94(41.2%)
6.	Unknown causes (Spiritual)	74(32.5%)	154(67.5%)
7.	Long term use of Oral contraceptives	62(27.2%)	166(27.2%)
8.	Poor Hygiene	56(24.6%)	172(75.4%)
9.	Sexually Transmitted Infections	18(7.9%)	210(92.1%)

*Significant factors

From Table 5, it is statistically shown that the age and level of study of the respondents are both significantly associated with the acceptance of cervical cancer screening among the respondents with p-values <0.05 (x^2=25.871, p-value=0.000; x^2=12.447, p-value=0.014) respectively.

Table 5: Association between socio-demographic variables (age, level of study, marital status, menarche) and acceptance of cervical cancer screening.

Socio-demographic variables		Acceptance Level		Total	X^2	Df	p- value
		Poor	Good				
Age	15 -19	27	9	36	25.871	3	0.000*
	20 – 24	115	45	160			
	25 – 29	6	20	26			
	>30	3	3	6			
Level	200	22	21	43	12.447	4	0.014*
	300	53	19	72			
	400	14	15	29			
	500	44	16	60			
	600	18	6	24			
Marital Status:	Single	141	71	212	0.107	1	0.744
	Married	10	6	16			
Menarch	9 – 12	84	46	130	1.316	2	0.518
	13 – 15	64	28	92			
	16 – 18	3	3	6			

Sig.*

Discussion of findings

The study evaluates the factors influencing the acceptance of cervical cancer screening in a selected college of medicine, south-west Nigeria. The study population comprises mainly of female undergraduate students in 200 to 600 levels in their various course of studies. Majority (70.2%) of the respondents are between the age 20-24yrs in keeping with reports from other studies, (Ogbonna, 2017) that assesses the knowledge, attitude and experience of cervical cancer and screening among Sub-Saharan African female students in a United Kingdom University and found that 56.5% of the respondents are within age range 18 and 24year; this is not surprising as undergraduate students are usually within these age range. The larger percentages of the respondents are in 300 level, this is because the researcher has higher participation from the students in 300 level.

This might not be far-fetched from the fact that the students in 300 level across all Departments in the college are through with most of their faculty courses which might give them more time to participate in researches unlike those in higher classes who are loaded with higher and new responsibilities (courses). Those in 200 level are also still busy with the faculty courses. All this might not be far from the fact that these are University undergraduates who are mostly still studying and are not yet married. Almost all (93%) of the respondents are singles and 63.2% are Yorubas. Moreso, the study was conducted in a Yoruba setting, so it is not surprising that majority of the participants are Yorubas. Moreover, most (89.9%) of the respondents are Christians and more than half (57.0%) begin menarche at the age of 9-12 years in keeping with findings of reports from the study of Yermachenko and Dvornyk (2014); that shows that the mean age at menarche is between 11.96 to 12.93 years.

This study shows that the level of acceptance of the respondents to cervical cancer screening is average. The study agrees with Assoumou, et al (2015) which reveals that cervical cancer rates have reduced significantly in most of the developed world, because of routine screening programs but the rate of cervical cancer has risen or remain unchanged in developing countries like Nigeria due to lack of screening resources. The findings of this study is contrary to Ogbonna's (2017) submission that almost half (43.5%) of the respondents show willingness to participate in future screenings. This study is not also consistent with Lenselink, et al, (2008) observation that the uptake of screening and other cervical cancer prevention methods remains low among most women, due to low or no awareness of HPV infection, HPV screening and adolescent vaccination for the prevention of future disease.

Moreover, there are no established screening programmes in rural areas in Nigeria; even at the urban areas where there may still be little screening facilities, the uptake of cervical cancer screening has remained very low leaving the mortality and morbidity associated with cervical cancer high (Oluwole, et al, 2017). This study shows that the factors influencing the acceptance of cervical cancer screening are; accessibility of screening centres, affordability of vaccines and screening services, lack of funds, health

worker's attitudes, worry about privacy and feeling of embarrassment about the procedure. This study is not in agreement with the study of Keita (2015) who observes that almost all (94%) of the respondents who participate in the study have never been screened for the disease. Factors mentioned for the non-participation in the screening include lack of awareness about the screening services and unawareness of the disease. It also does not conform with the findings of Bessler, Aung & Jolly's (2007), who observed that women did not accept to have screening because of the belief that they did not need it, lack of symptoms, fear that their health provider would find cervical cancer as the result of a Pap smear and fear of the pain of a Pap test.

The findings of this study revealed that the major risk factor of cervical cancer is Human Papilloma virus infection, multiple sexual partners, early onset of sexual activity, family history and smoking. This study supports Coleman, Levison & Sangi-Haghpeykar, (2011) position that early onset of sexual intercourse and multiple sex partners are significant risk factors which increase the chance of having cervical cancer. This study is not consistent with Toye, Okunade, Roberts, Salako, Oridota & Onajole (2017) who observe that risk factors among respondents include unhealthy diet, alcohol, tobacco, lack of physical exercise, oral contraceptive use, and susceptibility of the adolescent cervix to sexually transmitted infections Lastly, this study is not in agreement with Agida, Akaba, Isah & Ekele, (2015) who explain that vulnerability of cervical cancer are poor vaccine delivery efforts, low cervical cancer screening levels, ineffective health system capabilities, inaccessibility to medical care, low awareness and knowledge of HPV and cervical cancer, and failure to recognize cervical cancer.

This study also reveals that there is significant association between age, level of study (socio-demographic characteristics) and acceptance of cervical cancer screening. This is not surprising because it is expected that being older and being in higher class comes with more experience and greater capacity to have good acceptance of the procedure. Ekechi, Olaitan, Lajura, & Marlow (2014) observe that higher education qualification ($p<0.001$) is associated with understanding of possible risk factors. That means the level of education of the respondents relates to the awareness of the possible risk factor. Moreover, age is observed in the same study to be the most important factors for understanding of symptoms of cervical cancer. This is supported by studies of Nwabichie, Manaf & Suriani, (2018); Jassim, Obeid, & Nasheet, (2018), which reveals that level of study is a significant predicting factor for the acceptance of cervical cancer screening methods. This is also supported by Owoeye & Ibrahim's (2013) findings that women who are in school have better acceptance than married women who are not in school at the time of their study. In addition, this study also shows that the age at Menarche, marital status both have no significant association with the acceptance of cervical cancer screening which means there is no difference in the acceptance of both the married and the single lady as far as acceptance of cervical cancer screening is concerned.

This non-acceptance might be due to any of the factors (lack of funds, health worker's attitude, low perceived risk of disease and worry about privacy, Hospital/ health centers policies, accessibility of Screening Centers, affordability of vaccines and screening and feeling of embarrassment about the procedure,) stated above; which is in support of the submission of Bessler, Aung & Jolly (2007).

Implication to nursing

Nurses should, in conjunction with the government and the ministry of health and ministry of education, create awareness programmes on the importance of cervical cancer screening. The nurse should also make provisions on limiting the factors influencing the decision of screening against cervical cancer.

Conclusion and recommendations

The study set out to assess the factors influencing the acceptance of cervical cancer screening among female undergraduate students in college of medicine, South-west, Nigeria and found out that majority of the students have poor acceptance of the cervical cancer's screening because of the factors mentioned as hinderances to their decision. Therefore, more should be done to improve the awareness of cervical cancer screening. There should be provision of possible solution to reduce the hindering factors thereby improving the acceptance of the procedure. Emphasis should also be placed on the benefits of cervical cancer screening during health education in our various educational institutions in Nigeria.

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