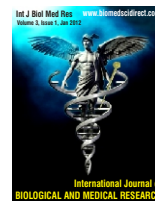


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Original article

A Study of Knowledge, attitude and practice regarding prevention of Cervical Cancer among female students and staff of some professional colleges in Jaipur.

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ABSTRACT

A cross sectional study was undertaken with the aim of estimating Knowledge Attitude and Practice regarding prevention of cervical cancer amongst female students and staff of colleges in Jaipur. Study revealed that out of total of 668 respondents 85.6% were Hindus, 73.06% were students, 22.75% were teachers and professionals and rest were housewives. 42.5% belonged to upper higher class, 37.67% were upper middle group and rest were lower middle group. 50.8% women knew that multiple partner is risk factor for carcinoma cervix. 62.5% women thought post menopausal bleeding and foul smelling vaginal discharge were related. 53.8% women knew that barrier contraceptives can reduce chances of carcinoma cervix. 65.86% had knowledge about usefulness of screening. 39.5% believed that age of screening to be 30 years and 70% said screening to be repeated after 3 years. Literacy status was found to be significantly related with higher knowledge regarding prevention of cancer cervix by avoiding multiple partners and using barrier contraceptive

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1.Introduction:

Cervical Cancer is the leading cause of morbidity and mortality in most of the developing countries. It is estimated that 530000 new cases and 275000 deaths occur worldwide annually due to cervical cancer (2008) [1].

Cervical cancer is the commonest malignancy among women in India [2]. It accounts for 12% of all cancers. More than 160000 deaths are reported due to cervical cancer every year [3]. The age adjusted incidence rate for cervical cancer has been reported to vary from 19-44/100000 women in various cancer registers in India [4]. Early diagnosis by screening has been proved to be effective preventive measure in reducing morbidity and mortality from disease [5]. Many studies have confirmed that carcinoma in situ can be detected many years before it progresses to invasive cancer by cytological screening [4].

HPV infection is found to be causally related in 93.5% cases of Squamous cell carcinoma and 90.7% cases of Adeno carcinoma of cervix [6,7]. There is need to create awareness regarding screening and methods of primary prevention related to cervical cancer.

2.Aims And Objectives

1. To estimate level of knowledge regarding risk factors of cancer cervix amongst college students and staff
2. To find the attitude and practice towards prevention of carcinoma cervix
3. To create awareness amongst them.

3.Material and Methods

A cross-sectional study was carried out amongst female students and staff of colleges in Jaipur. A semi structured questionnaire was designed to record by interview technique. Nature of cervical cancer symptoms, causes, risk factors, were included and correlated with literacy and socio-demographic characteristics [8] of respondents. Two different questionnaires were used one for 15-24 years age group and another for 25 years and above. Questionnaire for 25 years and above included some extra questions like post menopausal bleeding and unhealthy vaginal discharge is harmful along with history of genital lesion in her or her husband. We covered 5 main colleges namely Management and engineering college (IIMET), Homeopathy college, Nursing college, Maharani college and Kanodia college. Interview took place from October 2010 to January 2011. A total of 668 females above the age of 15 years were analyzed by random cluster sampling technique, age classification of Life cycles groupings was used [9]. Data were analyzed using SPSS-16 software.

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4. Results

Socio demographic characteristics. (Refer Table 1)

Table: 1 Socio- demographic profile of study population in five colleges

Variables	number (%)
1. Age (years)	
15-19	320 (47.9%)
20-24	28 (4.19%)
25-64	316 (47.3%)
> 64	4 (0.59%)
2. Marital Status	
Unmarried	428(64.07%)
Married	240(35.93%)
3. Education	
Secondary	8 (1.19%)
Higher secondary	168 (25.1%)
Graduate	380 (56.8%)
Post graduate	112 (16.7%)
4. Socio-economic class	
SE class1	284 (42.5%)
SE class2	100(14.9%)
SE class3	140 (20.9%)
SE class 4	100 (14.9%)
SE class 5	44 (6.5%)
5. Religion	
Hindu	572 (85.6%)
Muslim	84(12.5%)
Christians	4(0.59%)
Others	8(1.2%)
6. Locality	
Urban	512(76.6%)
Rural	144(21.5%)
Slum	12(1.79%)
7. Occupation	
Student	488(73.05%)
Teacher	120(17.96%)
Professional	32(4.79%)
House wives	28(4.19%)
8. Parity	
None	472(70.65%)
1	180(11.9%)
2-3	2-3104 (15.5%)
>3	12(1.7%)

It is seen that of the total respondents majority were in age group 15-24 years.

(52.09%) Most of them were students (73.05%). Majority were graduates (56.8%). Most of them belonged to upper social class (42.5%) and only 6.5% belonged to class V.

Most of them were Hindu (85.6%) and rests were of different religions.

Majority were residents in urban areas (76.6%) and only 35.9% were married..

Knowledge and attitude regarding perceived risk factors, contraceptives, Vaccines, Papsmear and Cancer Screening.

In all age groups main risk factors emerged from the study were multiple partners in 340(50.8%), Smoking in 196(29.3%) and alcohol and tobacco chewing in 160(23.95%). While above 25 years perceived post menaupausal bleeding with harmful discharge as additional risk factors in 200(62.5%) and unhealthy vaginal discharge in 224(70%).

360(53.8 %) Women have knowledge that barrier contraceptives can reduce chances of cancer cervix.

Majority 456 (68.2%) of women preferred private clinical approach and rest 212 (31.8%) believe in government setup.

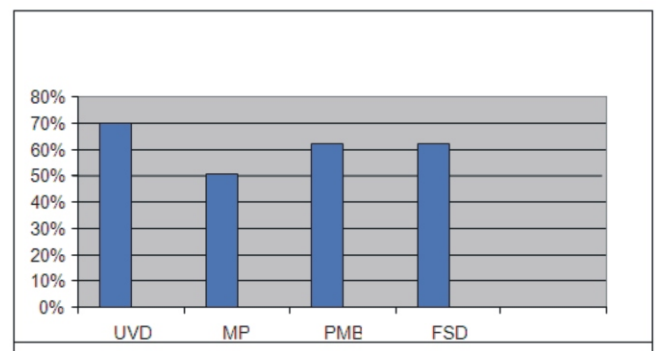
Only 440 (65.86%) of women have knowledge of cancer screening.. A significantly higher knowledge regarding prevention of cancer cervix by avoiding multiple partners and using barrier contraceptive was recognized by women with higher education ($\chi^2=13.48$, $df=1$, $p<0.001$).

4.1. Practice

It was observed that 96 (14.3 %) were smoking and 60 (8.98%) were using both smoking and alcohol.

Overall only 32(4.7%) of subjects had regular extramarital relations. Of which 12.5% were between 15-19 years of age (half are students and half housewives), 87.5% are in age group 25-64 years (57.1% are teachers and 42.8% are professionals). 160 (23.9%) women got their pap smear done at least once., out of which majority (50%) are students, 37.5% are teachers, 7.5% are professionals and 2.5% are housewives and 2.5% other group. 124(18.5%) women are taking either oral contraceptives(OCP) regularly or emergency contraceptives which were mainly more than 25 years of age(74.1%)

Diag:1. Bar diagram showing risk factor knowledge



UVC unhealthy vaginal discharge

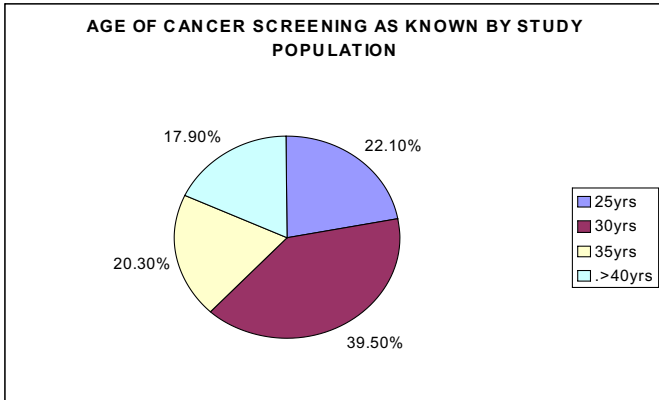
MP multiple sex partners

PMB- Postmenaupausal bleeding

FSD- Foul smelling discharge

22.1% women say screening age to be 25 years, 39.5% believes it to be 30 years, 20.3% say it 35 years and 17.9% say it above 40 years of age.

Diag.2. Pie diagram showing distribution of optimum age at screening



70% women are of the opinion that screening is to be repeated after 3 years, 13.7% say it to be 1 year, 10.7% say it 5 years and 5.3% believes it to be repeated after 7 years.

Diag.3. Pie chart showing optimum interval of repeat screening

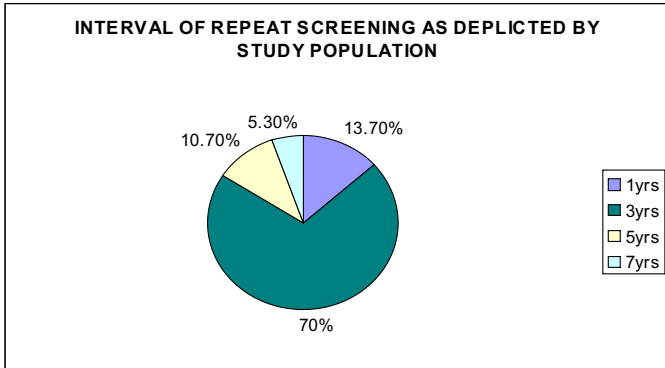


Table 2 Source of information about Pap smear

Information source	Number	Percentage
1. Television	222	33.2
2. Newspaper	152	22.7
3. Radio	97	14.5
4. Family	43	6.4
5. Friends	20	2.9
6. others	134	20.0

Majority 222 (33.2%) acquired knowledge regarding cancer screening from television, followed by 152 (22.7%) via Newspaper, the other significant sources of information were family/friends 63 (9.4%).

5. Discussion

In the present study the respondents mainly were in the age group 15 to 25 and more which is also reported in other studies [10]

In the study most respondents were literate (graduate and above). The knowledge regarding risk factors was correctly known to only 200 (62.5%) women out of 320, in the age group 25 years and above while in younger age group below 25 years had no clear concept. While lower correct knowledge (40%) is reported in similar studies [1,10].

In the present study 360 (53.8%) respondents have knowledge that barrier contraceptives can prevent cancer cervix. While lower rates are reported in most other studies [1,5].

Knowledge regarding cancer screening in our study is also higher (65.86%) than other similar studies where the knowledge as low as 18.8% is reported in Ethiopia [5]. 32% in Kenya and 63.6% in south Africa [11,12].

We found that in our study 23.9% of respondents whereas very low rates 6% and 6.5% have been reported in all other similar studies [1,5].

6. Conclusion

The level of correct knowledge regarding carcinoma cervix and its prevention in college students and staff was found to be 50.8%. Since the study has been undertaken amongst urban literate group of population the knowledge is likely to be further poor amongst illiterate masses both in urban and rural areas for which more studies are needed to confirm. The need for educational derive to increase greater awareness amongst all group of women regarding carcinoma cervix and its prevention is urgent.

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