Effectiveness of Planned Health Teaching Programme on Knowledge Regarding Prevention of Cervical Cancer among Adolescent Girls in M.V.P's Arts, Commerce and Science College, Ozar

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Abstract: *"Effectiveness of planned health teaching programme on knowledge regarding prevention of cervical cancer among adolescent girls at MVP's Arts, Science and Commerce College, Ozar."*

Keywords: knowledge, adolescent girls, cervical cancer

1. Introduction

"Yesterday's Girl Is Today's Adolescent and Tomorrow's Mother"

Life is dynamic in nature and human growth is ongoing, changing and evolving. Adult lifecycle also shows as a period that requires continuous assessment and evaluation for coping with developmental changes. Midlife has emerged as an important developmental transitional point for both men and women. It is marked by an important turning point in the lifecycle of a woman. It is a period of continuous biological changes.

The cervix is the lowest portion of the uterus. Normally the cervix has stopped growing by puberty, but its cells will continue to divide to replace those that die of injury or old age. Sometimes an abnormal cell may arise which later on divides out of control. This will then form a tumor. Cervical cancer starts in just one single cell, but this cell quickly divides to form many similar cancer cells, which continues to grow. Eventually, if not cured, these cells push the normal cells out of the way, grow into a large tumor and spread to other parts of the body leading to fatal complications.

Statistics (2006) indicate that 1,26,000 women are diagnosed with cervical cancer in India each year. Cancer of the cervix is the most common malignancy in women of developing countries and second only to breast cancer worldwide. The median age at diagnosis for cancer of the cervix is 47 years. Approximately 0.2% are diagnosed under age 20; 15.6% between 20 and 34; and 26.8% between 35 and 44 years.

Close to a half-a-million women are diagnosed with cervical cancer each year, and nearly a quarter million women die from the disease. Most live in developing countries where cervical cancer is often the leading cause of cancer deaths among women. In India Women don't have to die of cervical cancer; it can be completely cured. It is eminently detectable at an early stage. Unlike most other cancers, it is preventable when precursor lesions are detected and treated.

However, millions of women around the world are never screened for cervical cancer – whether it is because of local myths and fears about cervical screening, poor health services or lack of information. Screening is essential because women often don't experience symptoms until the disease has advanced.

2. Literature Survey

Cervical cancer
Cancer of the uterine cervix is one of the leading cancer among women worldwide, with an estimated 520,000 new cases and 274,000 deaths reported annually (WHO/ICO Information Centre on HPV and Cervical Cancer- HPV and cervical cancer statistics in India. 2010). About 86% of the cervical cancer cases occur in developing countries, which represents 13% of all female cancers (WHO/ICO Information Centre on HPV and Cervical Cancer- HPV and cervical cancer statistics in India. 2010).

Cervical cancer is sub-divided into cervical squamous cell carcinoma and cervical adenocarcinoma Majority of the cases of cervical cancer are squamous cell carcinoma and adenocarcinomas are rare. Cervical squamous cell carcinoma develops gradually over time from pre-existing non-invasive squamous precursor lesions, also called cervical intra epithelial neoplasias or squamous intraepithelial lesions. The latency period between normal HPV infections to establishment of cancer may take over a decade.

There has been significant progress in the etiology of cervical cancer during the last few decades. Sexually transmitted infectious agents such as gonorrhea, Chlamydia, syphilis, and Herpes simplex virus type 2, were considered to be the causative agents for cervical cancer Between the years 1974 to 1976, Prof. Harold zurHausen started to

postulate and established the link between Human papillomavirus (HPV) and cervical cancer and for his contribution in unraveling this link, he was conferred with 2008 Nobel Prize for Physiology and Medicine. During the early 1980s development of technology to detect for the presence of HPV DNA in cellular specimens provided the strong basis for the definite etiological role of HPV in cervical cancer. The first HPV types isolated from cancer biopsies of the cervix were HPV16 and 18: these were cloned in 1983 and 1984 respectively. Following this, there was an explosion of research on papilloma viruses.

Papillomavirus infections in humans are known to cause a variety of benign proliferations; these include warts, intraepithelial neoplasias, anogenitalpapillomas, oral laryngeal and pharyngeal papillomas, Molecular and epidemiological evidence has now established that HPV types associated with anogenital neoplasms, including condylomata, cervical dysplasia and cervical carcinoma, are almost always sexually transmitted.

The involvement of HPV in cancers of the vulva, anal canal, vagina is currently being identified in addition to these, the possible infectivity of HPV incutaneous cancer, oral cancers and other cancers of the upper aero digestive tract is being investigated. In humans, specific papillomavirus types have been associated with over 99% of cervical cancer biopsies.
These are considered the "high-risk" types and include, in order of prevalence, HPV types 16, 18, 31 and 45. HPVs have also been associated with other anogenital lesions and carcinomas, oral and pharyngeal papillomas and skin lesions in a rare genetic disorder called epidermodys-plasiaverruciformis.

Due to the similarity in genome and non-enveloped capsids, papilloma viruses had previously been grouped together with polyomaviruses in one family *Papovaviridae*. Later, it was established that the two virus groups have difference in genome sizes as well as genome organization and have no significant similarities in the nucleotide or amino acid sequences. The International Committee on the Taxonomy of Viruses (ICTV) has assigned papillomavirus a separate genera.

Genital HPV types are classified into low-risk types and high-risk types. Where low-risk types cause warts and high-risk types, which causes15invasive cervical cancer. Although 13 to 19 high-risk types have been identified, only the 12 HPV types namely 16, 18, 31, 33, 35, 39, 45, 51, 52, 56, 58 and 59 are consistently observed clinically (Gravitt *et al.,* 1998). Apart from the high-risk types, six more genotypes ((26, 53, 66, 68, 73 and 82) have been identified as "probably high risk."

3. Methods/Approach

Research design is master plan specifying the method and procedure for collecting and analyzing the needed information. Ahuja (2009). Pretest and post test was used in this study among the selected adolescent girls at M.V.P'S Arts, commerce and Science College, ozar.

Setting of the study
Setting refers to location where the study is conducted. The study was conducted in M.V.P'S Arts, commerce and Science College, ozar, Nashik.

Population
Population is the entire set of individuals or objects or elements having some common characteristics. The population of present study comprised of 12thscince adolescent girls (16-18 yrs) which are selected of M.V.P'S Arts, commerce and Science College, ozar

Sample
Sample is the subset of population selected for a particular study and members of the samples are the study subject. Adolescent girls in the age group of 16-18 years in M.V.P'S Arts, commerce and Science College, ozar, Nasik 03 were recruited as the samples for the study.

Sample size
In the present sample size composed of 60 Adolescent girls in the age group of 16-18 years in M.V.P'S Arts, commerce and science college, ozar, Nashik.

Sampling technique
"Sampling technique is the process of selecting apportion of the designated population to present the entire population."In present study sample were selected by convenient sampling technique by investigator.

4. Data Collection Technique and Instrument

Data Collection Technique
Data collected for the purpose of research is by data collection method employed by the researcher, needs to be the objective and systematic. The present study is aimed at studying the effectiveness of planned health teaching programme regarding prevention of cervical cancer, in terms of the knowledge gain by adolescent girls.

Development of Tool
The tool was selected and developed based on the research problem, review of the related literature and with suggestions and guidance from expert from field of Nursing.

Description of the Tool
The tool for data collection comprised of three sections:

Section A: Demographic data consisting 6 items seeking information about the baseline data such as age, marital status, religion, monthly income of the family, previous knowledge and previous source of knowledge.

Section B: This part consists of questions related to cervical cancer.

Section C: This part consists of questions related to prevention of cervical cancer and HPV vaccine.

5. Validity and Reliability of the Tool

Validity

Validity refers to a degree to which a tool measures what it is intended to measure. The content validity of the tool was done by experts from Dept. of Obstetrics and Gynecology, Medical Surgical Nursing, Mental Health Nursing, Child Health Nursing.

Reliability

Reliability is concerned with how consistently the instrument measures the concept of interest. Reliability of the research instrument is defined as the extent to which the instrument yields the same result in repeated measures. It is then concerned with consistency, accuracy, precision, stability, equivalence and homogeneity. The tool after the validation was subjected to test for its reliability. Split-half method was used. The tool was administered to 30, M.V.Psamaj's, INE, Adgaon, Nashik-03 other than the actual place of study. The reliability of the tool is completed by using Karl Pearson's formula. The reliability co-efficient on knowledge found to be 0.98 and the tool found feasible for administration of the main study.

Pilot Study

The pilot study was conducted on 25th April 2015 on 6 students of 3rd year GNM in M.V.PSamaj's Training College of Nursing, Adgaon, Nashik-03.

The purpose of the pilot study was to:

- Find out the feasibility of conducting the final study.
- Determine the method of statistical analysis.
- To refine the tool and lesson plan.
- To know time required for administering questionnaire.
- To know if subjects understood wordings of tool.

The samples chosen were similar in characteristics to the population under study. It took 45 minutes to complete the questionnaire and it was found that the tool were simple and comprehensive.

6. Data Collection Procedure

Ethical consideration

- Prior to collection of data, written permission was obtained from the Principal of M.V.P'S Arts, commerce and science college, ozar, Nasik 03 were the samples for the study.
- Informed consent was taken from all the samples prior to data collection

Techniques

- Introduction
- Sufficient time was provided for the successful completion of the tool approximately 30 minutes.
- Immediately after completion; the tool was collected from the samples by the researcher with appreciation.
- The post test was collected after 3rd day.

Plan for Data Analysis

The collected data was analyzed under the guidance of statistical expert. Descriptive and inferential statistics were used for data analysis. Effectiveness of planned health teaching was analyzed by the correlation of pre-test and post-test knowledge score. The collected data is planned to be organized and tabulated by using descriptive statistics like mean, standard deviation, and mean percentage.

7. Findings, Discussion, Summary, Conclusion, Implications and Recommendations

This chapter presents a summary and conclusion of the study as well as its implications for nursing and chapter ends with suggestions and recommendation for future research in this field.

6.1 Major findings of the study

The obtained data were entered in to the master sheet for tabulation and statistical processing. The findings of the study are discussed in terms of objectives and hypothesis. The analysis of data was organized and presented under the following aspects. The major findings of the study are summarized as follows:

Section A:

Demographic variables (sample characteristics)

- 83% of the samples were in the age group of 16-18 years.
- Majority of the students belong to Hindu religion (85%), Muslim (7%), Christian (3%) and any others (5%).
- Maximum percentage of girls belongs to nuclear family (79%) and joint family (21%).
- Most of them had previous knowledge regarding cancer (82%) and does not have knowledge regarding cervical cancer (96%).
- Family members, mass media, peers are primary source of knowledge regarding cancer and main source of knowledge regarding cervical cancer are health professionals.
- Most of the parents have completed their education up to higher secondary (40%), secondary (30%), and graduate and above (25%), primary education (5%).

Section B:

Assessment of knowledge on prevention of cervical cancer.

1) *Pre Test Knowledge Score* **:** The findings of the study reveals that the mean knowledge score of pre test is 7.84
2) *Post Test Knowledge Score* **:** The findings reveal that the mean knowledge score obtained for the post test is 12.67

The statistical paired 'z' implies that the difference in the Pre test and Post test knowledge score found statistically highly significant.

6.2 Conclusion

The following conclusions were made from the findings of the study:

There was lack of knowledge among adolescent girls of MVP's Arts, Science and Commerce collage at Ozar regarding Prevention of cervical cancer.

The planned health teaching programme on prevention of cervical cancer was found to be effective in terms of increasing knowledge. This indicates that planned health teaching programme was effective method of imparting information and knowledge to adolescent girls on prevention of cervical cancer.

From the statistical analysis it was clear that there was significant increase in the level of knowledge of adolescent girls regarding prevention of cervical cancer. From this it would be concluded that planned health teaching programme was effective in bringing out this changes.

6.3 Recommendation

Keeping in view the findings of the present study, the following recommendations are made since the study was carried out in a small sample, the result can be used only as a guide for further studies.

1) A similar study can be done on a large sample as very few nursing studies have been conducted in India for assessing knowledge regarding prevention of cervical cancer among adolescent girls.
2) A similar study can be repeated on a control group for generalization of findings.
3) A similar study can be conducted by using various methods of teaching like CD, self instructional module etc.

6.4 Conclusion

On conducting this research and analyzing the collected data, Researchers were concluded that the planned health teaching programme on knowledge regarding prevention of cervical cancer was effective in increasing the knowledge of the adolescent girls.

The effectiveness of planned health teaching programme was independent of the selected demographic variables.

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