



# A STUDY TO ASSESS THE HPV VACCINATION STATUS AND TO EVALUATE THE EFFECTIVENESS OF VIDEO ASSISTED TEACHING REGARDING CERVICAL CANCER AND ITS PREVENTION AMONG ADOLESCENT GIRLS AT SELECTED COLLEGES OF DISTRICT PATIALA

**Gagandeep Kaur, Amandeep Kaur**

*Gagandeep Kaur, Tutor, Govt. College of Nursing Patiala  
Associate Professor, Govt college of Nursing, Patiala*

Article DOI: <https://doi.org/10.36713/epra20128>

DOI No: 10.36713/epra20128

## ABSTRACT

**Background of the study:** Estimates show that nearly 96922 women are diagnosed with cervical cancer every year and about 60078 die of this disease.<sup>1</sup> Persistent HPV infection of the cervix if left untreated causes 95% of cervical cancers.<sup>3</sup> The widespread immunization with the HPV vaccine is the method of primary prevention which could reduce the impact of cervical cancer and other cancers caused by the HPV.

**Aim of the study:** -To assess the HPV vaccination status and create awareness regarding cervical cancer and its prevention.

**Material and Methods:** The study adopted a pre experimental research design. Using non probability convenient sampling technique a total of 40 adolescent girls was selected. Data was collected using self structured questionnaire to assess the knowledge and awareness regarding cervical cancer and its prevention. Data was analyzed using descriptive and inferential statistics.

**Results:** Results revealed that none of adolescent girls were immunized with HPV vaccination and majority of adolescent girls did not have good level of knowledge regarding prevention of cervical cancer. There was statistically significance difference between the mean pretest and posttest knowledge scores (Mean difference=6.900, Paired T test = 11.5, P value = <0.001) indicating that structured teaching program was an effective strategy to improve the knowledge of adolescent girls regarding cervical cancer and its prevention.

**Conclusion:** The study concluded that the awareness program regarding cervical cancer and its prevention had positive influence on knowledge of adolescent girls.

**KEY WORDS:** -Cervical Cancer, HPV Vaccination, Adolescents

## INTRODUCTION

### PROBLEM STATEMENT

A study to assess the HPV vaccination status and to evaluate the effectiveness of video assisted teaching regarding cervical cancer and its prevention among adolescent girls at selected colleges of district Patiala.

### OBJECTIVES

- To assess HPV vaccination status among adolescent girls.
- To assess awareness and knowledge regarding cervical cancer and its prevention.
- To evaluate the effectiveness of video assisted teaching regarding cervical and its prevention.
- To find out the association between level of knowledge of adolescent girls regarding cervical cancer and its prevention with their selected personal variables.

### HYPOTHESIS

H<sub>1</sub>. The mean post test knowledge score of adolescent girls regarding cervical cancer and its prevention will be significantly higher than pre test knowledge score.

### MATERIAL AND METHODS

The study adopted the Pre-experimental(one group pre test post test design).Sample size of 40 adolescent girls selected by using the non probability convenient sampling from General Shivdev Singh Diwan Gurbachan Singh Khalsa College Patiala. The tool used to collect data consisted of two sections. Section A: Deals with socio demographic variables. It included the following items to



obtain baseline information about the subjects. Age, habitat, religion, education status of father, education status of mother, type of family, monthly family income, birth order, stay during course and source of previous information regarding cervical cancer. Section B:-It was a Self structured questionnaire to assess the awareness regarding cervical cancer and HPV vaccination. The questionnaire consists of 29 multiple choice questions with a single correct answer. The various questions related to risk factors, mode of transmission, symptoms, screening, treatment and prevention of cervical cancer were included to assess awareness regarding cervical cancer and HPV vaccination. The reliability coefficient for structured knowledge questionnaire was calculated using split-half method. The reliability coefficient was calculated to be 0.90. The ethical permission was taken from institutional ethical committee to conduct the study. Data was analyzed using descriptive and inferential statistics.

**SAMPLING CRITERIA**

**Inclusion criteria**

- Adolescent girls of age group 16 to 21 years.
- Those who are willing to participate and available at time of data collection
- Study in course other than medical field.

**Exclusion criteria**

- Those who were absent.
- Adolescents girls studying in medical field.

**RESULTS AND DISCUSSION**

The results of the study concluded that maximum number of participants (42.5%) were age 18 years and above. The majority of participants were day scholars (65%), while a smaller percentage stays in hostel and paying guests (10% each). Majority of students (95%) had no previous information regarding cervical cancer. Regarding HPV vaccination status, no subject was vaccinated with HPV vaccination.

**TABLE 1. Distribution of Adolescent Girls as per their level of knowledge scores.**

N=40

Knowledge Score	Pre test f(%)	Post test f(%)
Good Knowledge(21-29)	0	16(40.00%)
Average knowledge (11-20)	30(75.00%)	23(57.50%)
Below average knowledge (0-10)	10(25.00%)	01(02.50%)

Maximum Score=29 Minimum Score=0

**Table 4: Descriptive statistics of pre-test and post test level of knowledge.**

N=40

Descriptive Statistics	Mean	S.D.	Median Score	Maximum	Minimum	Range	Mean%
PRETEST KNOWLEDGE	12.60	3.543	13.5	20	4	16	43.40
POSTTEST KNOWLEDGE	19.50	4.472	18.5	28	10	18	67.20

**Table 5: Comparison of descriptive statistics of pre-test and post-test Scores of knowledge.**

	Mean±SD	Mean%	Range	Mean difference	Paired t test	p valuse
Pre test Knowledge	12.6±3.54	43.40	4-20	6.900	11.5*	0.001
Post test Knowledge	19.5±4.47	67.20	10-28			

**CONCLUSION**

The results of the study revealed that no one among the participants were vaccinated with HPV vaccination. The comparison between pretest and post-test knowledge scores reveals positive changes. There was a notable decrease in the percentage of participants with below average knowledge and an increase in the percentage of participants with good knowledge. The majority of participants maintained a average knowledge level, but the overall distribution reflects an improvement in knowledge levels after



the video assisted teaching which conclude that the awareness program regarding cervical cancer and its prevention have positive influence on knowledge of adolescent girls.

### LIMITATIONS

The limitations of this study were:

- The study size was small as limited to 40 adolescent
- The study adopted non probability convenience sampling; hence the generalization of findings outside the study sample is limited.

### RECOMMENDATIONS

On the basis of the findings recommendation were given as follow:.

1. A comparative study can be undertaken to compare the knowledge of adolescent girls in urban and rural areas.
2. Similar study can be conducted to assess the effectiveness of other educational strategies to improve the knowledge of women regarding cervical cancer and its prevention.

### IMPLICATION

#### Nursing Education

- The nurse educator needs to conduct health campaigns and use different informational modalities, teaching strategies to create awareness regarding the cervical cancer and its prevention.

#### Nursing Practice

- Care- oriented approach to helps to understand prevention of cervical cancer
- Nursingadministration
- 

The nurse administrator can take part in developing protocols, standard orders related to design of the health education program to update nursing personals knowledge regarding cervical cancer prevention and HPV Vaccination.

### REFERENCES

1. Singh M, Jha RP, Shri N, Bhattacharyya K, Patel P, Dhamnetiya D. Secular trends in incidence and mortality of cervical cancer in India and its states, 1990-2019: data from the Global Burden of Disease 2019 Study. *BMC cancer*. 2022 Dec;22(1):1-2. Available from : <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8819855/#:~:text=Specific%20women%20populations%2C%20such%20as,of%20developing%20cancer%20%5B3%5D>
2. Kaarthigeyan K. Cervical cancer in India and HPV vaccination. *Indian Journal of Medical and Paediatric Oncology*. 2012 Jan;33(01):7-12. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3385284/>
3. Kulkarni A. Indian Government's Initiative in Promoting Cervical Vaccines. [Internet]. *Continental Hospitals*; 2024. Available from: <https://continentalhospitals.com/blog/indian-governments-initiative-in-promoting-cervical-vaccines/>