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RESEARCH ARTICLE

A STUDY TO ASSESS THE EFFECTIVENESS OF STRUCTURED TEACHING PROGRAM REGARDING PREVENTION OF CHICKEN POX AMONG ADULTS IN SMT. NAGARATHNAMMA COLLEGE OF NURSING, BANGALORE

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Abstract

Background: A study to assess the effectiveness of structure teaching program regarding prevention of Chicken Pox among adults in Smt. Nagarathnamma College of Nursing, Bangalore. This research study aims to assess the effectiveness of a structured teaching program designed to educate adults about the prevention of chickenpox at Smt. Nagarathnamma College of Nursing in Bangalore. By enhancing knowledge and awareness among adults through a structured educational intervention, this study seeks to contribute to the reduction of chickenpox incidence in the adult population, ultimately leading to improved public health outcomes.

Methods: Study was done with undergraduate nursing students, convenient sampling technique was used for selecting the sample. Period of study was August 2023. A self-administered questionnaire was used in form of multiple choices. Section A: Structured Questionnaire for assessing knowledge consisting of 25 items.

Results:

1. 53.33% has got adequate knowledge.
2. 35% has got moderate knowledge.
3. 11.67% has got inadequate knowledge.

Conclusion: Majority of the undergraduate nurses above 50%, have got adequate knowledge about the prevention of Chicken Pox.

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Introduction:-

Chickenpox is commonly thought of as a childhood illness, adults are also susceptible to contracting the disease. Unlike children, adults are at a higher risk of developing severe complications due to their mature immune systems and other underlying health conditions. This makes it imperative to educate adults, especially those in healthcare and nursing settings, about the prevention of Chickenpox to reduce the risk of outbreaks and protect vulnerable populations. The healthcare field has witnessed evolving trends in the prevalence of infectious diseases. Understanding the best practices for preventing contagious illnesses such as Chickenpox is essential to maintain the health and safety of both healthcare professionals and patients. An effective structured teaching program can equip healthcare practitioners with the necessary knowledge and strategies to prevent the spread of Chickenpox within healthcare settings and beyond. Furthermore, the prevention of Chickenpox in adults holds broader implications for public health. By reducing the incidence of the disease among adults, the overall burden on healthcare systems can be lessened, thereby freeing up resources for other critical medical needs. Additionally, preventing Chickenpox

among adults contributes to the reduction of transmission within communities, protecting individuals who might be more vulnerable due to immunosuppression, pregnancy, or other medical conditions. In the context of Smt. Nagarathnamma College of Nursing, where the study is conducted, there exists a unique opportunity to bridge the knowledge gap among nursing students and healthcare professionals. These individuals play a pivotal role in patient care and have the potential to influence preventive practices in both clinical and community settings. Implementing a structured teaching program in this institution can serve as a model for other nursing schools and 11 healthcare organizations, promoting the importance of continuous education and preparedness in the face of preventable diseases. In conclusion, this study's significance lies in its potential to enhance the awareness and knowledge of adults, particularly those within the healthcare and nursing fields, regarding the prevention of Chickenpox. By assessing the effectiveness of a structured teaching program, the study aims to contribute to the broader goals of reducing disease transmission, improving public health outcomes, and fostering a culture of proactive disease prevention within healthcare settings.

Methods:-

Research Design

Research design is the arrangement of conditions for collection of an analysis of data in a manner that aims to combine relevant to research purpose with economy in procedure. The selection of research design depends upon the purpose of study a condition under which the study is conducted. The research design used for this particular study is described descriptive is shown diagrammatically.

Setting

It refers to place the study is conducted. It may be natural setting or a laboratory setting depending upon the study topic and research done. The study is conducted in Smt. Nagarathnamma College of Nursing, Bangalore.

Target Population

Population is a group whose member possess attributes that a researcher is including in study. Target population for present study were undergraduate students of "Smt. Nagarathnamma College of Nursing, Bengaluru".

Sample and Sample Size

Sampling is the process of selecting a group of people, event, behaviour or other elements with which conduct a study. The sampling for the research study was 30 undergraduate students who were studying in Smt. Nagarathnamma College of Nursing, Bengaluru.

Sample and Sampling Technique

The sample was selected from graduate nurse, of Smt. Nagarathnamma College of Nursing, Bangalore. The size of the sample was 50. The convenient sampling technique was used to collect the samples. At first the prepared tool was given to experts to check the content validity. The study was conducted in college among nursing students at the findings revealed that the tool was feasible and practicable.

Criteria for Selecting Sample

Inclusion Criteria

Second year B.Sc. Nursing students:

1. Who are willing to participate in the study.
2. Who are available at the time of data collection.
3. Who knows to read and write English.

Exclusion Criteria

Second year B.Sc. Nursing students:

1. Who are not willing to participate in the study
2. Who are not available at the time of data collection.

Tools used for Study

Developmental of tool

An extensive study and review of literature helped in preparation of the tool. A self-prepared validated questionnaire is used as the tool for this study.

Description of Tool

The structured questionnaire consists of two parts:

Part I: The structured questionnaire to assess the knowledge of graduate nurses about the prevention of Chicken Pox. It consists of a total of 25 questions regarding the management and prevention of Chicken Pox. The total score is 25 marks and each correct answer carries '1' mark each and each wrong answer carries '0' mark. Total knowledge is calculated with percentage of marks scored by the sample.

- Below 50%-Inadequate
- 50-75%-Moderate
- Above 75%-Adequate

Part II: This part contains items such as demographic data that includes age, sex, year of study, marital status, previous knowledge, type of family, source of knowledge, place of living.

Data Collection

This data was collected from undergraduate nursing students. The period of data collection was from July, 2023. The assessment of undergraduate nursing students was done while they were in college.

Plan for Analysis

After data collection, the investigator decided to organize, tabulate, summarize and analyse the data. The data were coded, entered in Excel sheet and analysed by descriptive statistics like frequency, mean and inferential statistics using Epi info version.

Table 1:- Demographic Profile.

SL. NO.	VARIABLES		FREQUENCY	PERCENTAGE	
1.	Age	18-20 years	21	70%	
		21-23 years	9	30%	
2.	Sex	Male	15	50%	
		Female	15	50%	
3.	Previous Knowledge	Absent	13	43.33%	
		Present	17	56.67%	
4.	Source of Knowledge	Lecture Class	13	43.33%	
		Seminar	2	6.67%	
		Self-Study	15	50%	
5.	Place of Living	Urban	12	40%	
		Rural	18	60%	

Table 2:- Question wise knowledge of undergraduate students regarding effectiveness of structured teaching program regarding prevention of Chicken Pox.

Sl. No.	Content	No of Correct Answers	Percentage	Interpretation	
1.	What is the causative agent of	Pre-test: 27	90%	Adequate	

	Chicken Pox?	Post-test: 30	100%		
2.	What is the incubation period for Chicken Pox?	Pre-test: 26	86.67%	Adequate	
		Post-test: 29	96.67%		
3.	What are the common symptoms of Chicken Pox?	Pre-test: 16	53.33%	Moderate	
		Post-test: 26	86.67%	Adequate	
4.	How is Chicken Pox transmitted?	Pre-test: 22	73.33%	Moderate	
		Post-test: 23	76.67%		
5.	Who is most at risk for severe Chicken Pox complications?	Pre-test: 19	63.33%	Moderate	
		Post-test: 30	100%	Adequate	
6.	How can Chicken Pox be prevented?	Pre-test: 25	83.33%	Adequate	
		Post-test: 26	86.67%		
7.	What is the name of vaccine used to prevent Chicken Pox?	Pre-test: 27	90%	Adequate	
		Post-test: 29	96.67%		
8.	What is the most common complication of Chicken Pox?	Pre-test: 13	43.33%	Inadequate	
		Post-test: 18	60%	Moderate	
9.	Can a person get Chicken Pox more than once?	Pre-test: 18	60%	Moderate	
		Post-test: 22	73.33%		
10.	Can Chicken Pox be treated with antiviral medications?	Pre-test: 25	83.33%	Adequate	
		Post-test: 28	93.33%		
11.	What is a reactivation of Chicken Pox in adults?	Pre-test: 22	73.33%	Moderate	
		Post-test: 26	86.67%	Adequate	
12.	Which of the following are not symptoms of the Chicken Pox?	Pre-test: 9	30%	Inadequate	
		Post-test: 24	70%	Moderate	

13.	Which gender of population is mostly affected with Chicken Pox?	Pre-test: 29 Post-test: 29	96.67% 96.67%	Adequate	
14.	What is the secondary attack rate of Chicken Pox?	Pre-test: 12 Post-test: 18	40% 60%	Inadequate Moderate	
15.	Which of the following disease confers lifelong immunity?	Pre-test: 11 Post-test: 20	36.67% 66.67%	Inadequate Moderate	
16.	What is the drug of choice for treatment of Chicken Pox?	Pre-test: 17 Post-test: 26	56.67% 86.67%	Moderate Adequate	
17.	Source of infection of Chicken Pox?	Pre-test: 27 Post-test: 29	90% 96.67%	Adequate	
18.	Which part of the vzv holds the DNA?	Pre-test: 15 Post-test: 18	50% 60%	Moderate	
19.	Chicken Pox usually last longer in children or adults?	Pre-test: 12 Post-test: 15	40% 50%	Inadequate Moderate	
20.	Am I protected if I previously had Chicken Pox?	Pre-test: 21 Post-test: 25	70% 83.33%	Moderate Adequate	
21.	What does the rash in Chicken Pox looks like?	Pre-test: 18 Post-test: 19	60% 63.33%	Moderate	
22.	What is shingles?	Pre-test: 26 Post-test: 29	86.67% 96.67%	Adequate	
23.	Where will the virus reside in the body following a Chicken Pox infection?	Pre-test: 23 Post-test: 27	76.67% 90%	Adequate	

24.	Who is not eligible for vaccination by Chicken Pox?	Pre-test: 22	73.33%	Moderate
		Post-test: 28	93.33%	Adequate
25.	The varicella zoster virus is a member of which virus group?	Pre-test: 21	70%	Moderate
		Post-test: 26	86.67%	Adequate

Discussion:-

This chapter gives a brief account of the present study including conclusion drawn from the findings and possible application of the results. Recommendations for further research and suggestion for improving the present study are also presented.

The findings of the study were discussed with reference to the objectives and with the findings from other studies.

The objectives of the study are:

1. To equip students with knowledge and understanding on how to manage sick adult with chicken pox.
2. To identify the occurrence/incident of chicken pox.
3. To assist the effectiveness of planned teaching program.
4. To correlate the pre-test and post-test results.

To Equip Students with Knowledge and Understanding on How to Manage Sick Adults with Chicken Pox

In this research study, the primary objective is to equip nursing students with comprehensive knowledge and a deep understanding of the management protocols for sick adults afflicted with chicken pox. As the varicella-zoster virus can manifest more severely in adults than in children, it becomes crucial for healthcare professionals, especially nurses, to be well-versed in the appropriate care measures. The teaching program will encompass a structured curriculum that covers various aspects of chicken pox management, including symptom recognition, infection control, symptom relief, and potential complications management. By achieving this objective, nursing students will be better prepared to provide effective care to adult patients, ensuring timely and accurate interventions that alleviate discomfort, reduce the risk of complications, and promote a faster recovery.

To Identify the Occurrence/Incidence of Chicken Pox

Another pivotal objective of this research is to assess the occurrence and incidence rate of chicken pox among adults within the premises of Smt. Nagarathnamma College of Nursing, Bangalore. By gathering data on the number of cases reported over a specified period, the study aims to provide valuable insights into the prevalence of chicken pox among the adult population. This information will serve as a foundation for understanding the significance of preventive measures and educational programs, as well as the necessity for heightened awareness within the college community. The findings will contribute to the development of informed strategies to mitigate the spread of the virus and enhance the overall health and well-being of the nursing college's adult population. Moreover, the identification of chicken pox cases will underscore the importance of continuous monitoring and timely interventions to minimize potential outbreaks and protect the health of the community.

To Assess the Effectiveness of the Planned Teaching Program

A critical aim of this research is to evaluate the effectiveness of the structured teaching program designed for the prevention of chicken pox among adults. The teaching program's impact will be assessed through various indicators such as changes in knowledge levels, improved recognition of symptoms, and adherence to preventive measures. By collecting and analyzing data on participants' engagement with the program and their subsequent behavior, the study will provide valuable insights into the program's ability to enhance awareness and influence positive behavioral changes. The findings will not only contribute to the refinement of the teaching program itself but also hold implications for the development of similar educational initiatives in the future. Ultimately, a successful teaching program will empower individuals with the information and skills needed to actively participate in safeguarding their health and the health of those around them.

To Correlate Pre-test and Post-test Results

The final objective of this research endeavor is to establish a correlation between the pre-test and post-test results of participants who undergo the structured teaching program. This comparative analysis will shed light on the effectiveness of the teaching intervention in enhancing participants' understanding of chicken pox prevention strategies. By examining the progression of knowledge and comprehension from before to after the program, the study will ascertain whether the teaching methods employed have successfully conveyed the intended information. The correlation between pre-test and post-test results will provide quantitative evidence of the program's impact and help validate its significance in contributing to improved awareness and preparedness among nursing students and potentially the wider community. This analysis will form a pivotal component of the study's conclusive findings, reinforcing the value of targeted educational initiatives in combating preventable diseases like chicken pox.

Nursing Implications**Nursing Practice:**

The findings of this study hold significant implications for nursing practice, as they contribute to the development of structured teaching programs aimed at preventing Chicken Pox among adults. Nurses play a crucial role in patient education and preventive care. The insights gained from this research can inform nurses about effective strategies and interventions for educating adults on Chicken Pox prevention, enhancing their ability to provide tailored guidance and support to individuals at risk.

Nursing Education:

In the realm of nursing education, the study underscores the importance of incorporating targeted teaching programs into the curriculum. As educators strive to equip nursing students with comprehensive knowledge and skills, integrating preventive measures for infectious diseases like Chicken Pox becomes imperative. This research provides a foundation for educators to design and implement structured teaching programs within nursing education, ensuring that future healthcare professionals are well-prepared to address and prevent such communicable diseases.

Nursing Administration:

The implications for nursing administration are profound, emphasizing the need for healthcare institutions to prioritize and support structured teaching programs on disease prevention. Administrators can use the study's outcomes to advocate for the integration of preventive measures into nursing protocols and policies. By fostering a culture that values ongoing education and training in disease prevention, nursing administrators can contribute to a safer healthcare environment and better overall patient outcomes.

Nursing Research:

The study itself adds to the body of nursing research by specifically focusing on the effectiveness of a structured teaching program in preventing Chicken Pox among adults. This research contributes valuable insights that can guide future studies exploring similar interventions for other infectious diseases or different population groups. Additionally, the methodology and outcomes of this study serve as a basis for refining and advancing research methodologies in the field of nursing, fostering a continuous cycle of evidence-based practice and knowledge development.

Conclusion:-

In conclusion, the study's nursing implications underscore its potential to positively influence nursing practice, education, administration, and research. The structured teaching program offers a practical approach to preventing Chicken Pox among adults, and its integration into nursing practice and education can lead to improved patient outcomes. Nursing administrators can implement evidence-based policies, and the study contributes to the broader research landscape in nursing, paving the way for future investigations into preventive measures for infectious diseases in diverse populations.

References:-

1. Bialek S, Perella D, Zhang J, et al. Impact of a routine two-dose varicella vaccination program on varicella epidemiology. *Pediatrics* 2013;132(5): e1134-40.

2. CDC. FDA Approval of an Extended Period for Administering VariZIG for Postexposure Prophylaxis of Varicella. MMWR 2012;61(12):212.
3. CDC. Immunization of health-care personnel. Recommendations of the Advisory Committee on Immunization Practices (ACIP). MMWR 2011;60(RR-7):1–45.
4. CDC. Prevention of varicella: recommendations of the Advisory Committee on Immunization Practices (ACIP). MMWR 2007;56(No. RR-4):1–40.
5. CDC. Updated Recommendations for Use of VariZIG-United States, 2013. MMWR 2013;62(28):574–6.
6. CDC. Use of combination measles, mumps, rubella, and varicella vaccine: recommendations of the Advisory Committee on Immunization Practices (ACIP). MMWR 2010;59(No. RR-3):1–12.
7. Galil K, Brown C, Lin F, et al. Hospitalizations for varicella in the United States, 1988 to 1999. *Pediatr Infect Dis J* 2002 Oct;21(10):931–5.
8. Leung J, Broder K, Marin M. Severe varicella in persons vaccinated with varicella vaccine (breakthrough varicella): a systematic review. *Expert Rev Vaccines* 2017;16(4):391–400.
9. Leung J, Marin M. Update on trends in varicella mortality during the varicella vaccine era, United States 1990–2016. *Human vaccines & Immuno-therapeutics* 2018;14:10, 2460–63.
10. Lopez A, Zhang J, Marin M. Epidemiology of varicella during the 2-dose varicella vaccination program – United States, 2005–2014. MMWR 2016;65: 902–5.
11. Leung J and Harpaz R. Impact of the Maturing Varicella Vaccination Program on Varicella and Related Outcomes in the United States: 1994–2012. *J Pediatric Infect Dis Soc* 2016 Dec;5(4):395–402. doi: 10.1093/jpids/piv044.
12. Kuter B, Matthews H, Shinefield H, et al. Ten year follow-up of healthy children who received one or two injections of varicella vaccine. *Pediatr Infect Dis J* 2004;23: 132– 7.
13. Marin M, Marti M, Kambhampati A, et al. Varicella vaccine effectiveness worldwide: a systematic review and meta-analysis. *Pediatrics* 2016;137:1–10.
14. Marin M, Zhang J, Seward J. Near elimination of varicella deaths in the United States following implementation of the childhood vaccination. *Pediatrics* 2011; 128:214–20.
15. Marin M, Leung J, Gershon A. Transmission of vaccine strain varicella-zoster virus: a systematic review. *Pediatrics* 2019;144(3): e20191305.
16. Seward J, Watson B, Peterson C, et al. Varicella disease after introduction of varicella vaccine in the United States, 1995–2000. *JAMA* 2002;287: 606–11.
17. Seward J, Zhang J, Maupin T, et al. Contagiousness of varicella in vaccinated cases: a household contact study. *JAMA* 2004;292: 704–8.