A Study to Assess the Effectiveness of Planned Teaching Program on Knowledge Regarding Prevention of PCOD Among Adolescent Girls Studying in Selected Schools of Rohtas Bihar

¹Shweta Kumari, ²Seempy Kumari, ³Kajal Soni, ⁴Asmar Mansoor, ⁵Arohi Kumari ¹Lecturer, Department of Community HealthNursing, ²B.Sc.(N) 4th Year Student, ³B.Sc.(N) 4th Year Student, ⁴B.Sc.(N) 4th Year Student, ⁵B.Sc.(N) 4th Year Student. Narayan Nursing College, Gopal Narayan Singh University, Sasaram, Bihar, India

Abstract- Introduction: Adolescence is a time of transition from childhood to adulthood. Teenage females suffer numerous health issues during this time because of their fluctuating hormones. One in fifteen women worldwide suffer from the diverse endocrine condition known as polycystic ovarian syndrome. The researchers conducted A Study to assess the effectiveness of planned teaching program on knowledge regarding prevention of PCOD among adolescent girls studying in selected schools of Rohtas Bihar. Aim and objective: to assess the existing knowledge of adolescent girls regarding PCOD, to evaluate the effectiveness of planned teaching programme on PCOD, and to find out the association between the post-test knowledge with their selected demographic variables. Methodology: experimental design, with one group pre-test and posttest design was chosen for the study, conducted at selected school of Rohtas. sampling and change agents were selected as convenient sampling technique. A planned health teaching programme on Prevention of Polycystic Ovarian Disease approach was the intervention of the study. The pre and post-test level of knowledge on PCOD was assessed using selfstructured questionnaire. Results: The analysis of the study findings revealed that knowledge on PCOD in regards to the pre-test mean score was 5.2 and SD 2.34 and the post-test mean score of knowledge was 13.33 and SD 2.66. The calculated paired value of t =2.3749was found to be statistically significant at p<0.001 level and the other demographic variables had not shown statistically significant association with the post-test level of knowledge.

Keywords: Planned Teaching Programme, PCOD, Adolescent Girl.

INTRODUCTION

Adolescents, or young individuals between the ages of 12 and 19, are frequently considered to be a

healthy demographic. Teenagers need to pay closer attention because they are going through a fastpaced stage of physical, sexual, physiological, and psychological development. Teenage females experience a range of menstrual issues, with PCOD being the condition with the highest current occurrence. When polycystic ovarian syndrome (PCOS) was initially identified, it was noted as a condition including irregular menstruation periods, obesity, infertility, and excess testosterone production. Subsequent research has demonstrated that elevated blood insulin levels are frequently associated with PCOS and lead to an excess of testosterone. Further research has verified that women diagnosed with polycystic ovarian syndrome are more susceptible to metabolic disorders, such as type II diabetes and anomalies associated with blood

METHODOLOGY

Reasearch Approach	Quantative Approach
Reasearch Design	Pre- experimental one group pre-test post- test design.
Setting of the study	Selected Schools of Rohtas
Population	All Adolescent girls.
Sample	Adolescent girls who fulfill the inclusion criteria.
Sample Size	100
Sampling Technique	Convenient Sampling Technique.

Table 1.1- Showing Brief Description About Research Methodology

SAMPLE SELECTION CRITERIA

Inclusion Criteria

Study includes:-

- 1. Girls who will in the age group of 10 to 19 years, who have attained menarche irrespective of their marital status.
- 2. Class 9th and 10th standard adolescence girls.
- 3. Adolescent girls who will willing to participate.

Exclusion Criteria

Study excludes:-

- 1. Adolescence girls who will absent on the day of data collection period.
- 2. Sick Adolescence girl.
- 3. Not willing to participate in the study.

Method of Data Collection

Data collection is the gathering of information from the sampling units. The investigator collected the data from the 100 adolescent girls, who came for the study in High School Jamuhar. "A self Questionnaire is a method of data collection in which the researcher obtain responses from the subject in a face encounter Hence ,the researcher developed a self structured questionnaire scheduled to conducted the tools. Pre-test Post-test design was used for data collection to assess the effectiveness of self structured teaching programme on polycystic ovarian disease among the adolescent girls. The structured questionnaires schedule, which was used in pre-test was again used in the post test in the same manner in the same order to all the respondents of the research study.

Description of tool

The tool for data collection consists of 2 sections: Section A: Demographic Data.

Section B: Consists of 20 Items related to knowledge on PCOD.

Scoring And Interpretation

KNOWLEDGE	SCORE
GOOD	13-20
AVERAGE	7-12
POOR	0-6

RELIABILITY OF THE TOOL

The tool Reliability was established by test retest method 10 adolescent girl were chosen from the same setting and the tool was administered twice, with the gap of 14 days. The reliability score= 0.164 by using Karl Pearson's correlation Coefficient formula. The tool was found to be reliable.

PILOT STUDY

The structured tool was administered on 10 adolescents girl who filled the criteria for sample selection, for clarity and understanding of the questionnaire was measured. The duration of pilot study was 14 days. Pilot study helped the investigator to ascertain the feasibility and practicability of the designed methodology. The average time taken for completing the questionnaire was 10 minutes. This helped to find the feasibility of the tool for language, clarity, sequence and appropriateness of items. The samples in the pilot study were not included in the main study.

DATA ANALYSIS AND INTERPRETATION

ORGANIZATION OF DATA

The collected data were tabulated and presented according to the objectives

under the following sections:

Section I: Description of frequency and percentage distribution of

demographic variables among children.

Section II: Description of pre-test level of knowledge on PCOD.

Section III: Description of post-test level of knowledge on PCOD.

Section IV: Comparison of pre-test and post-test level of knowledge on PCOD.

Section IV: Association between post test level of knowledge with the demographic variable

SECTION I TABLE 1.2: DESCRIPTION OF FREQUENCY AND PERCENTAGE DISTRIBUTION OF DEMOGRAPHIC VARIABLES

Sl.No.	DEMOGRAPHIC VARIABLES	N	%
1	AGE		
	10-13	10	10
	14-16	89	89
	17-19	1	1
2	TYPE OF FAMILY		
	NUCLEAR	50	50
	JOINT	45	45
	EXTENDED	5	5
3	RELIGION		
	HINDU	94	94
	MUSLIM	5	5
	CHRISTIAN	0	
	OTHERS	0	
4	RESIDENCE		
	URBAN	6	6
	RURAL	92	92
	SEMI- URBAN	2	2
5	DITARY PATTERN		
	VEG	17	17
	NON-VEG	7	7
	MIXED	76	76

SECTION II: DESCRIPTION OF PRE-TEST LEVEL OF KNOWLEDGE ON PCOD.

Percentage distribution of items related to knowledge on PCOD.

KNOWLEDGE LEVEL	N	%
POOR	68	68
AVERAGE	32	32
GOOD	0	0

Table 1.3 describes that the pre-test level of knowledge in study participants in which 68% of adolescent girls are having poor level of knowledge score, 32% of them having average knowledge.

SECTION III: DESCRIPTION OF POST-TEST LEVEL OF KNOWLEDGE ON PCOD

KNOWLEDGE LEVEL	N	%
POOR	2	2
AVERAGE	43	43
GOOD	55	55

Table 1.4 Describes that the post-test level of knowledge in study participants in which 2% of adolescent girls are having poor level of knowledge score, 43% of them having average knowledge, and 55% of adolescent girls having good knowledge regarding PCOD.

SECTION IV: COMPARISON OF PRE-TEST AND POST-TEST LEVEL OF KNOWLEDGE ON PCOD. TABLE- 1.5 SHOWING THE VALUE OF MEAN SCORE, SD, MEAN DIFFERENCE, DEGREE OF FREEDOM, PAIRED T TEST AND P VALUE.

KNOWLEDGE	MEAN SCORE	SD	MEAN DIFFERENCE	Df	paired "t" value	P value
PRE TEST	5.4	2.340	-7.93	198	2.3749	0.001
POST TEST	13.33	2.661				

SECTION IV: ASSOCIATION BETWEEN LEVEL OF KNOW WITH THE DEMOGRAPHIC VARIABLE.

	POST TEST LEVEL OF KNOWLEDGE								
DEMOGRAPHIC	PO	OR	AVE	RAGE	GOOD		X2	Df	p-VALUE
DATA	N	%	N	%	N	%			
AGE	AGE								
1013	1	7.60	6	46	6	46			
1416	1	1.21	37	45.10	44	53.60		4	
1719	0	0	0	0			6.77		0.01
TYPE OF FAMILY									
NUCLEAR	2	3.50	26	45.60	29	50.80			
JOINT	0	0	17	41.40	24	58.50			
EXTENDED	0	0	0	0	2	100	3.48	4	0.4797
RELIGION									
HINDU	2	2.19	39	42.85	50	54.90			
MUSLIM	0	0	4	44.40	5	55.50	0.20	6	0.998

RESIDENCE									
URBAN	2	28.50	2	28.50	3	42.80			
RURAL	0	0	41	46.06	48	53.90			
SEMIURBAN	0	0	0	0	4	100	3.50	4	0.000
FOOD PRACTICE	FOOD PRACTICE								
VEG	0	0	8	44.40	10	55.50			
NON VEG	0	0	6	60	4	40			
MIXED	2	2.77	29	40.27	41	56.90	0.7280	4	2.042

TABLE – 1.6 Association Between Post-Test Level Of Digital Eye Strain With The Demographic Variable.

The table-1.6 depicts that the show chi-square value is significant association between the post-test knowledge score and selected demographic variables such as gender, and, class of study. There was no significant between the post-test knowledge score and selected demographic variables such as age, area of residence, religion, type of family, food pattern.

DISCUSSION

Major Findings Of Socio-Demographic Profiles-

- Out of the total study population majority of samples 82% belongs to 14-16 Years of age group.
- With regard to the family, 57% were from nuclear family.
- Out of the total study population majority of samples 89% from rural area.
- Out Of the total participants of samples ,72% were follow mixed diet.
- Out of the total study population majority of adolescent girls are of Hindu religion.

FINDINGS BASED ON THE OBJECTIVE

Objective 1: To assess the existing level of knowledge adolescent girls regarding PCOD. The result reveals that in the pre-test, majority 68% of adolescent girls had poor knowledge regarding pcod and 32 % had average knowledge. This shows that the knowledge of adolescent girls were adequate. The finding of the study is also supported by a study conducted on knowledge regarding polycystic ovarian disease among adolescent girls selected conducted in Vinayak Mission's college of Nursing ,Karaikal. Result: The study reuslt shows the majority 60%(36) of the adolescent's girls had adequate knowledge ,33%(20) of the adolescent girls had moderately knowledge, and 6.6% (4) of the adolescent girls had adequate knowledge regarding PCOD. The finding are supported by a study conducted on knowledge regarding polycystic ovarian disease among adolescent girls selected schools of district Mohali. Result: The result shows

that majority of adolescent girls 123(61.5)% had fair knowledge and majority of girls 1(0.5%) had excellent knowledge. Only 35 (17.5%) girls had good knowledge.

Objective 2: To evaluate the effectiveness of planned teaching programme on PCOD. A study was conducted on implementation and evaluation of knowledge on prevention and management of poly cystic ovarian disease among adolescent girls. The objective of the study is to implement and evaluate a planned teaching programme on knowledge regarding prevention and management of poly cystic ovarian disease among adolescent girls. Before the planned teaching programme, adolescent girls were having lack of knowledge about prevention and management of poly cystic ovarian disease, after the planned teaching programme, knowledge of adolescent girls were improved. The finding of the study is supported by a study conducted to assess the effectiveness of planned teaching programme on poly cystic ovarian syndrome among adolescent girls in selected high school at Mangalore. The result of this study in general showed, the significance difference between the mean pre- test and post test knowledge. The significance difference was found in between all areas . There was no association between pre-test knowledge and selected demographic variables. Hence it can be concluded that PTP was effective in gaining knowledge of adolescent girls on PCOS, which was evident in post-test knowledge score.

Objective 3: To find out association between the post-test knowledge with their selected demographic variables. It was found that was statistically significant association between knowledge score of adolescent girls and age. It was found that there was no significant association between knowledge score of adolescent girls with type of family, area of residence, religion, food pattern.

SUMMARY, CONCLUSION, IMPLICATIONS RECOMMENDATIONS AND LIMITATIONS

SUMMARY

The present study is intended to assess the effectiveness of planned teaching programme on knowledge regarding polycystic ovarian disease among the adolescent girls in selected school in Rohtas.

THE OBJECTIVES OF THE STUDY WERE:

- 1. To assess the existing knowledge of adolescent girls regarding PCOD.
- 2. To evaluate the effectiveness of planned teaching programme on PCOD.
- 3. To find out the association between the post-test knowledge with their selected demographic variables.

THE RESEARCH HYPOTHESIS FORMULATED WERE:

There was two hypothesis:

 H_1 – There will be significant difference between pre-test and post- test level of knowledge on PCOD. H_2 – There will be significant association between the post-test level of knowledge on PCOD among the Adolescent Girls with selected demographic variables.

The research approach used was quantitative research approach. Pre-experimental one group pretest and post-test design is chosen for conducting the study, were there is no randomization and control group. The setting of the study was selected school of Rohtas. The target population comprises of all adolescent girls. The accessible population in this study is all adolescent girls in selected school of Rohtas. Self-structured questionnaire was prepared containing a set of questions, are being filled by the sample. The investigator collected data from 100 adolescent girls. The pilot studies were conducted in High School Jamuhar, to test the reliability and practicability. Ten adolescent girls are selected for pre-test. The retest is conducted after four days. The adolescent girls who were participated in pilot study were excluded from the main study. The reliability of the tool were elicited by test-retest method. A sample of ten adolescent girls were chosen the obtained data were subject for the calculation of correlation and the 'r' was found be 0.77. It indicates that the tool is reliable. So no modifications were made after pilot study. The review of literature provided the base to construct the tools to select the

methodology. The conceptual framework of the study was based on the CIPP model, context, input, product and process. Data analysis was done by using descriptive and inferential statistics.

NURSING IMPLICATIONS: The investigator has drawn the following implications from the study, which is of vital concern in the field of nursing practice, nursing education, nursing administration and nursing research.

Nursing Practice

1. The nurses have an initial role to work with adolescent girls in schools through the school health programme and in hospitals. 2.Adolescent girls must be encouraged to impart knowledge on health related

conditions. Nurse as the change agent, can introduce planned teaching to impart knowledge on healthrelated conditions.

Nursing Education

1. The nurse educator should be competent enough to imparting the concepts of planned teaching approach to nursing students. 2. The nurse educator can utilize planned teaching approach to impart the recent advancement regarding health should be encouraged. 3. Nursing students can utilize planned teaching approach to give health education in the schools, hospitals, and community.

Nursing Administration

- 1. Nurse administrators can organize formal training programme for parents with planned teaching approach.
- 2. Nursing personnel can organize continuing nursing education programme on Planned teaching approach in all health sectors. 3. Nurse Managers should encourage the administration to recommend utilization of planned teaching approach in all healthrelated programmes. 4. Nurse Manager can strengthen interdisciplinary and multidisciplinary collaboration with researchers to develop planned teaching approach.

Nursing Research

- 1. Disseminate the findings of the study through conferences, seminars and by publishing in journals and websites.
- 2. Promote more research in developing video assisted teaching approach. 3. Expand the research to study a larger population of individuals with school students.

PLAN FOR RESEARCH UTILIZATION

1. The planned teaching approach has been an effective teaching in High School Jamuhar, received a positive feedback on this teaching and the Headmistress feels to implement this teaching in High School Jamuhar, for educating various health programmes.

RECOMMENDATIONS

- 1. The nurse investigator encourages the use of planned teaching approach for health education programmes
- 2. The concept of planned teaching approach could be initiated in schools/community. 3. Similar study can be replicated on a larger sample to increase validity and generalization of findings

PLAN FOR RESEARCH DISSEMINATION

The research findings will be disseminated various National and International conference and Journals.

LIMITATIONS

- 1. Study limited for 1 weeks.
- 2. Study limited to school students from IX standard to X standard.

CONCLUSION

The present Study to assess the effectiveness of planned teaching program on knowledge regarding prevention of PCOD among adolescent girls studying in selected schools of Rohtas Bihar. The study findings revealed that there was a significant difference in the pre-test and post-test level of knowledge on PCOD using planned teaching programme. Hence the planned teaching programme approach had a significant impact on the knowledge on the PCOD among adolescent girls studying in selected schools.

REFFERENCE

1.Azziz, R.2006 Diagnosis of Polycystic Ovarian Syndrome: The Rotterdam Criteria are Premature. Journal of Clinical Endocrinology and Metabolism 91(3):781-785.Balen, A., R. Homburg, and S. Franks2009 Defining Polycystic Ovary Syndrome. BMJ (Clinical Research Ed.) 338.
2.Barnard, L., A. H. Balen, D. Ferriday, B. Tiplady, and L. Dye Cognitive Functioning in Polycystic

- Ovary Syndrome. Psychoneuroendocrinolog In Press, Corrected Proof.
- 3.Bem, S. L. 1981 Bem Sex Role Inventory Professional Manual. Palo Alto, Calif.: Consulting Psychologists Press.
- 4.Benson, S., P. C. Arck, S. Tan, S. Hahn, K. Mann, N. Rifaie, O. E. Janssen, M. Schedlowski, and S. Elsenbruch 2009 Disturbed Stress Responses in Women with Polycystic Ovary Syndrome. Psychoneuroendocrinology 34(5):727-735.
- 5.Benson, S., S. Hahn, S. Tan, K. Mann, O. E. Janssen, M. Schedlowski, and S. Elsenbruch2009 Prevalence and Implications of Anxiety in Polycystic Ovary Syndrome: Results of an Internet-Based Survey in Germany. Human Reproduction 24(6):1446-1451.