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Effectiveness of Planned Teaching Program on Knowledge Regarding Anemia Among Antenatal Mothers in Sadar Hospital, Ranchi, Jharkhand

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Abstract: Anemia is one of the most common nutritional disorders among antenatal mothers, particularly in developing countries like India. Physiological hemodilution during pregnancy, along with iron deficiency due to poor dietary intake and lack of awareness, contributes to its high prevalence. Despite government initiatives, anemia continues to affect maternal and fetal health outcomes. Methodology: A pre-experimental onegroup pre-test post-test design will be adopted. The study was conducted among antenatal mothers visiting Sadar Hospital Ranchi, Jharkhand. Samples were selected through non probability purposive sampling technique. A structured knowledge questionnaire will be used to assess the level of knowledge before and after administering the planned teaching program. Data has analyzed using descriptive and inferential statistics. Results: The result of the present study findings are shows that, there was a significant improvement of knowledge among antenatal mother after administration of planned teaching program. The mean and SD of post-test knowledge score was (25.7±6.37) and pre-test knowledge score was (16.8±7.74). The paired 't' value (7.96) at level of significant (<0.05) shows that there is a statistical difference between pre-test and post-test level of knowledge score among antenatal mothers. The result supported that, the knowledge of antenatal mothers was improved after administration of planned teaching program of anemia antenatal mother. Conclusion: The planned teaching program is anticipated to be an effective strategy to enhance knowledge and awareness about anemia among antenatal mothers, thereby promoting better maternal and fetal health outcomes.

Keywords: Anemia, Antenatal Mothers, Iron Deficiency, Hemodilution, Planned Teaching Program, Knowledge.

1. Introduction

Anemia is one of the most common complications during pregnancy, particularly in developing countries like India. It is often caused by iron deficiency and is further influenced by physiological hemodilution due to plasma volume expansion during pregnancy. Iron deficiency anemia among antenatal mothers contributes significantly to maternal morbidity, preterm delivery, and low birth weight. Despite several national health programs, the prevalence remains high due to inadequate knowledge and poor dietary practices. Therefore, a planned teaching program can be an effective approach to improve the

knowledge of antenatal mothers regarding anemia and its prevention, thereby promoting better maternal and fetal outcomes.

A. Objectives

- 1. To assess the pretest knowledge score regarding anemia among antenatal mother.
- 2. To assess effectiveness of planned teaching program on knowledge regarding on anemia in antenatal mother
- 3. To find out the association between pre-test knowledge score of antenatal mothers with their selected socio demographic variables

B. Hypothesis

H₀-There will be no difference between pre-test and post-test knowledge regarding anemia in antenatal mothers at 0.05 level.

 H_1 -There will be significant difference between pretest and post-test knowledge score at 0.05 level.

 $\rm H_2\text{-}There$ will be significant association between pretest knowledge score with the selected demographic variables at 0.05 level.

C. Assumptions

- Planned teaching program helps to increase the knowledge of anemia among antenatal mothers.
- Planned teaching program helps to establish the trusting relationship between the researcher and the antenatal woman.
- Communicating with antenatal mothers effectively is essential for prevention of anemia during pregnancy in future.
- Use of planned teaching program helps to improve the awareness of antenatal mothers.

2. Methods and Materials

A quantitative quasi-experimental research approach with pre- experimental research design was used for the study. The researcher evaluated the effectiveness of planned teaching program on knowledge regarding anemia among antenatal

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mothers. The tool consists of sociodemographic data and self-structured anemia knowledge assessment tool containing 50 multiple choice questionnaire.

The study was conducted on 30 antenatal mothers visiting antenatal OPD for health checkups. The sample was selected by using non-probability purposive sampling technique.

A. Inclusion Criteria

- Antenatal mothers visiting Sadar hospital.
- Antenatal mothers who are available during the course of Study.

B. Exclusion Criteria

- Antenatal mothers Who are not available during Course of study.
- Antenatal mothers who are not willing to participate in the study.

3. Result and Discussion

A. Section-A: Distribution (Frequency and Percentage) of Sample According to Socio-Demographic Variables

In present study majority (87%) of sample were above 20 years of age. All sample (100%) were married. Sample has maximum education of matric (70%). Majority (63%) of the sample were living in urban area. Half of the sample (50%) gathered information regarding anemia from mass media. Almost half (53%) of the sample had monthly income below 20,000.

B. Section -B: Assessment of Pre-Interventional Knowledge Regarding Anemia Among Antenatal Mothers

Over all analysis of pre interventional knowledge regarding anemia among antenatal mothers based on set category using frequency and percentage. In order to attain the first objective pre-interventionally learning ability were assessed. The findings shows that majority of the samples n-18 (60%) have average knowledge; followed by seven (23.33%) samples got poor knowledge score and only five (16.67%) with good knowledge score.

Table 1			
Level of Knowledge	Range Score	Frequency	Percentage
Good	0-16	5	16.67%
Average	17-33	18	60%
Poor	34-50	7	23.33%
Total		30	100%

C. Section-C: Analysis to Assess the Effectiveness of Cognitive Skill Training in Improving Learning Ability

A major shift is identified at good category, percentages distribution was increased to 70% which was 16.67% priorly, average level was 60% and in poor level 23.33% of participants belonged before intervention, however after planned teaching program majority of the samples were upgraded to good level of knowledge score.

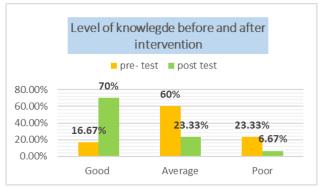


Fig. 1.

1) Effectiveness of Planned Teaching Program on Knowledge Regarding on Anemia in Antenatal Mother

The difference in the score was analyzed using 't' test and a significant improvement in knowledge level is statistically proved as calculated 't' value that is 7.96 is higher than table value (2.04) at p<0.05 level of significance.

Hence null hypothesis H₀: There is no difference between pre-test and post-test knowledge regarding anemia in antenatal mothers at 0.05 level of significance is rejected and research hypothesis H₁: There is significant difference between pretest and post-test knowledge score is accepted at 0.05 level of significance.

D. Section-D: Association Between Pretest Learning Ability and Sociodemographic Variables

Chi-square analysis was done to assess the association between knowledge score and selected sociodemographic variables and findings proven a significant association with education level at p<0.05 level of significance.

Hence H₂: There will be significant association between pretest knowledge score with the educational level is accepted at 0.05 level of significance.

The Study findings revealed that there was a significant improved the knowledge regarding anemia during antenatal period after planned teaching program. The Provision of Planned teaching program will motivate the antenatal mothers and help them to improve the knowledge level regarding anemia.

4. Nursing Implications

A. Nursing Practice

- Nursing are the key persons of the health team, who
 play a major role in health promotion and maintenance
 Nurse should be update with knowledge and
 competence in providing quality care.
- The nurse personnel need to prepare teaching and learning materials like information guide, which can be studied at schools.

B. Nursing Education

 The nurses should be encouraged to participate in awareness programs regarding anemia during pregnancy.

- As a nurse educator there is an abundant opportunity for nursing professionals to educate people about anemia during pregnancy.
- Nurse educator should conduct health campaigns and should use different strategies.

C. Nursing Administration

- The nursing administrator should develop standardized protocols in managing anemia during pregnancy and their rehabilitation.
- Nursing administrator can organize continuing education programs on the prevention of anemia during pregnancy for nursing personnel and motivate them to educate the common public

D. Nursing Research

- The researcher can develop appropriate health education tools for educating people.
- The study will motivate beginning researcher to conduct the same study with different variables on large scale

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