ASSESS THE EFFECTIVENESS OF PLAN TEACHING PROGRAM ON KNOWLEDGE REGARDING NEW-BORN ASSESSMENT AMONG STAFF NURSE WORKING IN LABOUR ROOM IN SELECTED HOSPITAL AT VADODARA.

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Abstract

Background:

In India, 2 out of 10 term babies are born with low birth weight. The prevalence of low birth weight exists universally in all population. Low birth weight with high mortality and morbidity continuous to be a major health problem in India. Half of the prenatal and one third of the infant mortality is due to low birth weight. Low birth weight is also an important indirect cause of neonatal deaths. It contributes to 60% to 80% of all neonatal deaths.

Material and Methods:

A quantitative research approach was used andquasi experimental one group pre- test post-test design was used to assess the effectiveness of plan teaching program on new born assessment among the staff nurse working in labour room in selected hospital. Non - probability purposive sampling technique was used. The sample size was comprised of the 40 staff nurses from selected Hospital. Formal permission was taken from the concerned authoritiesAn informed written consent from all the participants was taken before starting the study. The main aim of this research study is to assess the knowledge of staff nurses before and after administration of a Planned Teaching Programme on newborn assessment in labour room of selected hospital in Vadodara.Two sections divided in this study Section I: Personal data of the samples. It includes age, professional education and labour room work experience. Section II: It contained 25 multiple choice type question items and each item carries one mark. Maximum score of the questionnaire was 25. Data was analyzed using descriptive and inferential statistics.

Results: The mean score of post-test knowledge was 19.88 higher than the mean score of pre- test knowledge 12.26 score with the mean difference of 7.62. This indicated that the

difference obtained in the mean pre-test and post-test knowledge score was a real difference and not by chance.

Conclusion: After the administration of a Planned Teaching Programme on New-born Assessment on knowledge of the staff nurses improved definitely. The Planned Teaching Programme was effective in improving the knowledge of the samples. The Planned Teaching Programme on New-born Assessment was acceptable and useful method of teaching for staff nurses.

Key words: Assess, effectiveness, plan teaching program, knowledge, new-born, staff nurse.

Introduction

Birth weight is one of the most important factor for estimating the maturity of the newborn, evaluating intrauterine growth and development. In both, the developed and developing countries low birth weight is the most important factor that affects perinatal mortality, neonatal mortality, postnatal mortality, infant mortality and infant and Childhood morbidity. Neonatal period is the single-most hazardous period in the life. Never again life is the individual confronted with more dramatic challenges than during the transition from dependent intrauterine to existence to Independent post-natal life. Children are the wealth of any country. They are the most valuable asset for any society. They are the builders of the future of any nation. Traditionally birth weight has been regarded as a reliable indicator of fetal wellbeing and maternity. Since decades fetal weight is believed to be the greatest single factor determining the survival of the child.The magnitude of low birth weight infants in developing countries is enormous. There are about total 22 million low birth weight infants in the world out of which India shows about 7-10 million. Low birth constitutes 30% of live births in India.In general, risk factors in the mother that may contribute to low birth weight include young ages, multiple pregnancies, previous low birth weight infants, poor nutrition, heart disease or hypertension, drug addiction, alcohol abuse, and insufficient prenatal care. Environmental risk factors include smoking, lead exposure, and other types of air pollutions.[1]

Advances in neonatal medicine over the past few decades have led to improvements in survival of extremely premature neonates worldwide. However, short-term and long-term morbidities such as neurodevelopmental, respiratory, renal, and cardiovascular problems are known to occur in the surviving children. Optimal care in the neonatal period is crucial and

this care includes balancing the risks of adequate early nutrition and its possible complications. Studies have demonstrated that sub-optimal nutrition during the early neonatal period can have long-term health consequences.[2]

New-born babies constitute the foundation of a nation and no sensible government can afford to neglect their needs and rights. Healthy and sturdy babies are likely to evolve as physically and mentally strong adults with enhanced quality of human resource development. Neonatal deaths account for 64% of all infants' deaths in India optimal perinatal care with improved survival of infant is essential for effective fertility control and stabilization of population dynamic. The World Bank has estimated that the burden of disease contributed by perinatal courses in India accounts for 25% of the global disability adjusted life years (DALYs) last to the society.[3]

Material and Methods: Formal permission was taken from the concerned authorities; it was informed to the Superintendent, Chief Matrons and Matrons of selected hospital for collection of data. Before starting to collect the data discussed the study with Medical Superintendent and the Matron of the hospital as well as with the head of Obstetrics and Gynaecology Department and Sister In charge of the department. An informed written consent from all the participants was taken before starting the study. The Investigator approached the samples individually, discussed the objectives of the study and obtained consent for participation in study. The Investigator administered pre -test on 1st day and then administered a Planned Teaching Programme on the same day. The post test was taken after 7th day. All samples gave good co-operation during data collection procedure and Investigator did not any problem during data collection.Section I: Personal data of the samples.It includes age, professional education and labour room work experience. Section II: It contained 25 multiple choice type question items and each item carries one mark. Maximum score of the questionnaire was 25. Data was analysed using descriptive and inferential statistics.

Table – 1 Blue print on areas, number of items and level of knowledge domain on Structured Knowledge Questionnaire for assessing Knowledge of Staff Nurses on Newborn Assessment

Areas	Level of Knowledge			Total No. of	Max.	Perce ntage %
	Knowledge	Compre hension	Appli Cation			

	No. of Item	No. of Item	No. of Item	Questions	Mark	
Introduction	1	2	-	2	2	8
ameters and Measurement	3, 4, 5, 7, 8, 9, 10		6	8	8	32
Head to toe assessment	14, 15, 16, 18, 20, 21, 22, 23	11, 12, 24, 25	13, 17, 19	15	15	60
Total	16	5	4	25	25	
Percentage (%)	64	20	16			100

Table-2Area-wise Maximum score, Mean, Mean Percentage, Standard Deviation (SD), Percentage gain and Mean Difference of pre-test and post-test Knowledge score of Staff Nurses on Newborn Assessment

Areas	Max score	Pre test			Post test			Perce-ntage gain	Mean Diffe-rence
		Meanscore	Mean %	SD	Meanscore	Mean %	SD		
Intro-Duction	2	0.70	35	0.56	1.78	88.75	0.42	53.75	1.08
Para- meters & Measure-Ment	8	3.83	47.81	1.24	6.10	76.25	0.93	28.44	2.27
Head to toe Assess-Ment	15	7.73	51.50	1.89	12	78.5	1.1	27	4.27
Total	25	12.26			19.88				7.62

The mean, percentage and SD of Introduction of Newborn area in the pre test was 0.7, 35% and 0.56 respectively. Whereas in the same area post testresult was 1.78, 88.75 and 0.42 with 53.75% gain andmean difference 1.08. Pre -test Knowledge score of area related to Parameters & Measurement of newborn mean was 3.83, percentage was 47.81% and SD was 1.24. On the other side, in the same area post -test Knowledge score, mean was 6.10, percentage was 76.25% and SD was 1.1 with the mean difference 2.27 gained percentage was

28.44%. In the third area, Head to toe Assessment mean was 3.83, percentage was 47.81% and SD was 1.24. On the other side, in the same area post-test Knowledge score was mean 12, percentage 78.5% and SD 1.1 with the meandifference 4.27 gained percentage was 27%. The percentage gained in the area related to introduction of newborn was 53.75 with the mean difference 1.08. In the parameters & measurement of newborn area the percentage gained was 28.44 with the mean difference 2.27. In the area of head to toe assessment, the percentage gained was 27 with the mean difference 4.27. Obtained mean differences in all areas are found to be significant statistically. Hence, Investigator concluded that there was significance increase in the mean post test knowledge scores as compared to mean pre test knowledge scores after the administration of a Planned Teaching Programme on Newborn Assessment.

Results: Finding related to personal data Out of 40 samples between the age group of 20 years and above 50 years among that 14(35%) samples were in the age group of 41-50 years. The professional educational status of all the samples (40) was General Nursing and Midwifery. In labour room work, 20(50%) samples had 1-5 years' experience. The percentage gained in the area related to Introduction of Newborn was 53.75 with the mean difference 1.08. In the Parameters & Measurement of Newborn area, the percentage gained was 28.44 with the mean difference 2.27. In the area of Head to toe Assessment, the percentage gained was 27 with the mean difference 4.27. Obtained mean differences in all areas were found to be significant statistically. The mean score of post test knowledge was 19.88 higher than the mean score of pre test knowledge 12.26 score with the mean difference of 7.62. This indicated that the difference obtained in the mean pre test and post test knowledge score was a real difference and not by chance.

Discussion:

Major findings14 (35%) samples were in the age group of 41-50 years. The professional educational status of all the samples 40(100%) was General Nursing and Midwifery. In labour room work, 20(50%) samples had 1-5 years experience.

The mean score of post-test knowledge was 19.88 higher than the mean score of pre-test knowledge 12.26 score with the mean difference of 7.62. This indicated that the difference obtained in the mean pre-test and post-test knowledge score was a real difference and not by chance.

Conclusion

The main conclusion from this present study was that, most of the participants had low knowledge regarding newborn assessment in pre-test. In post-test, the knowledge gain regarding newborn assessment. The plan teaching Programme regarding newborn assessment was improved the knowledge of staff nurse.The Planned Teaching Programme on Newborn Assessment was acceptable and useful method of teaching for staff nurses.

Ethical clearance

Ethical clearance was obtained from Institutional Ethical Committee (SVIEC) and willingness was obtained from the subject before data collected.

Source of Funding: Researchers were bearing all the expenses related to this research

Conflict of Interest: There was no any conflict of interest.

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