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EFFECTIVENESS OF INSTRUCTIONAL MODULE ON ANXIETY AMONG PATIENT DURING THE UNDERGOING MAGNETIC RESONANCE IMAGING

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ABSTRACT

This study is based on access the anxiety level of the adult patient before & During MRI procedure. To find out the association of anxiety level with their selected demographical variables. In this study we used the quasi experimental research approach in time series design. The total sample size is 50 which selected by snowball sampling techniques. The instrument are used for data collection was structured questionnaire. After conducting this study we receive male patient mean ±S.D. state anxiety in patients before lying down in the MRI was 24.7 ±6.96 and was reduce the anxiety during the MRI 18.01± 7.25 but women the mean ±S.D. anxiety in patients before lying down in the MRI was 36.4 ± 10.24 and was reduced the anxiety during the MRI 25.8± 10.87. So, the instructional modules are effective to reduce the anxiety. The present study instructional module is more effective to reduce the anxiety level before & during the magnetic resonance imaging.

Key words: *Effectiveness, MRI & Anxiety*

INTRODUCTION

Magnetic resonance imaging (MRI) has become a standard & non invasive procedure for the diagnosis of central nervous system and musculo-skeletal system disorders. MRI is helpful in diagnosing abnormalities in all tissues, and especially of the nervous tissue, heart, and muscles. The procedure is not painful in itself but requires that the patient remain still for approximately 45 minutes. It must be taken into consideration that some factors related to MRI procedure (noises, unfamiliar environment, presence of unknown staff) can cause anxiety, nervousness, fear and agitation in patients undergoing MRI. Magnetic resonance imaging (MRI) is a medical imaging technique that uses a magnetic field and computer-generated radio waves to create detailed images of the organs and tissues in your body. Most MRI machines are large, tube- shaped magnets. When you lie inside an MRI machine, the magnetic field temporarily realigns water molecules in your body.

Contraindications to MRI include most cochlear implants and cardiac pacemakers, shrapnel, and metallic foreign bodies in the eyes. Magnetic resonance imaging in pregnancy appears to be safe at least during the second and third trimesters if done without contrast agents.

It is estimated that symptoms of claustrophobia, high levels of stress, tension, and anxiety resulting from the fact of being inside an MRI chamber are experienced by up to 35% of all people undergoing this study.

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OBJECTIVE

- To assess the anxiety level of the adult patient before MRI Procedure. To assess the anxiety level of the patient undergoing MRI procedure.
- To find out the association of anxiety level with their selected demographical variables.

METHODOLOGY

The study was conducted on 50 adult person who are willing & able to follow the instruction. The quasi experimental research approach in time series design was used . Snowball sampling techniques are used in this research study. The instrument used for data collection was standardized tools. Before the collection of data prepare the observational checklist .The Tools are divided in two parts. Parts I- demographical data (03) Part II- structured tools.(15) The total tools 18 .The reliability of questionnaire was found to be +0.8. Thus the tools are highly reliable. Ethical clearance of the research committee & administrative committee before the conduct the of the study. Data was collected in Sir Sunderlal hospital & Trauma center in IMS, BHU ,Varanasi. The data analysis using descriptive & inferential statistics. Total time duration collection of data 4 week. Obtained score /maximum score *100

RESULT

Statistical analysis was performed with the SPSS software, version 22. Based on Shapiro-Wilk tests, the distribution of the studied variables, i.e. state anxiety before and during the MRI as well as trait anxiety, were slightly different from the normal distribution **.**

Table 1. Finding to related the anxiety level of the adult patient before & during the MRI procedure N=50

Demographical variable	F	%	BEFORE MRI Mean ±S.D. (Pre –test)	DURING MRI Mean ±S.D. (Post –test)	Difference Mean +S.D.
Men	20	40%	24 .7±6.96	18.01 ±7.25	6.69±0.29
Women	30	60%	36 .4 ±10.24	25.8 ±10.87	10.6±0.63
TOTAL Mean ±S.D.	50	100%	61.1±17.2	25.26±18.12	

As presented in Tab. 1 & FIG. 1 in male patient the mean ±S.D. state anxiety in patients before lying down in the MRI was 24.7 ±6.96and was reduce the anxiety during the MRI 18.01± 7.25 but women the mean ±S.D. state anxiety in patients before lying down in the MRI was 36.4±. 10.24 and was reduced the anxiety during the MRI 25.8± 10.87 . So, the instructional modules are effective to reduce the anxiety.

DISCUSSION

The finding of the present study revealed that adult patient after the used of instructional module regarding the anxiety of the patient are effective because the after the instructional module patient anxiety are reduced .

The association of the anxiety level of adult patient with selected demographical variables such as gender, occupation & education are significant (p>0.05) .

CONCLUSION

The study was used to effectiveness of instructional module regarding the anxiety level in adult patient during MRI.

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