Effectiveness of Play Therapy on Anxiety among Hospitalized Children at Selected Hospitals

Rashmi More

Department of Mental Health Nursing, Godavari College Of Nursing, Jalgaon Kh

Abstract: <u>Aim of the study</u>: *The study aims to find the Effectiveness of play therapy on anxiety among hospitalized children at selected hospitals.* <u>Objectives of study</u>: *1) To assess the level of anxiety among hospitalized children at selected hospital.2) To determine the effectiveness of play therapy by comparing pre-test and post test level of the anxiety among the experimental group. 3) To determine the effectiveness of play therapy by comparing posttest level of anxiety among experimental and control group. 4) To find out the association between pretest level of anxiety and selected demographic variables.* <u>Method</u>: *True Experimental Pre test – Post test Control Group Research Design Quantitative, evaluative approach was carried out on 40 hospitalized children selected by simple random sampling (lottery method) technique to test effectiveness of play therapy. The data was collected by using Modified Hamilton Anxiety Scale consists of 14 items.* <u>Results</u>: *The presents study evaluates and found that demographic variables, 13(23.5%)were in the age group of 4years, 24 (60%)were males, 29(72.5%) belongs to Hindu religion, 12 (30%) have Pre-school /Play School education, birth order in family was first order 19(47.5%) , number of children in family is two shows percentage are 22(55%), mother was primary with percentage 22(55%), education of father was primary 20(50%), monthly incomes between 10000 Rs-15000Rs are 16(40%), nuclear type of family is 21(52.5%), population staying in urban area is 25(62.5%), population staying in urban area is 25(62.5%), previous history of stay in hospital is 27(67.5%), duration of current stay in hospital shows 19(47.5%), pre test and post-test Anxiety level means were 23.15 and 15.10 showed play therapy was effective.* <u>Interpretation and conclusion</u>: *Analysis data shows that highly significance difference found between the pre -test and post- test anxiety scores at the level of (P<0.05). play therapy proved to be effective in reducing the anxiety among among hospitalized children at selected hospital.*

1. Introduction

"*"Every child comes with the message that God is not yet discouraged of man".*

Rabindranath Tagore

Play is an essential part of a child's life and is an important aspect in fostering growth and development. Toys are the "tools" of play and provide a more "natural" environment for a child. The proper selection and use of toys can reduce the traumatic effects of a hospitalization experiences and aid in the recovery phase of illness. [2] Hospitalization is stressful for children of all ages. During a serious illness, even older children have a great need for their parents and can tolerate their absence only for short periods. They need to know that their parents will be there when they need them most and that they are loved and missed. It is re- assuring to note that most children are able to survive the event of hospitalization without long-term negative effects with the help of play activities. Nurses play a critical role in helping the child and family cope effectively with hospitalization. Play is an essential part of a child's life and is an important aspect in fostering growth and development. Toys are the "tools" of play and provide a more "natural" environment for a child. The proper selection and use of toys can reduce the traumatic effects of a hospitalization experiences and aid in the recovery phase of illness. [3]

2. Need for the Study

In the early 2000s, children of all ages and from every socioeconomic background often prefer television, computers and battery operated toys to self directed, imaginative, and creative play. This tendency leaves children developmentally deprived, because imaginative and fantasy play allows children to gain control of their thoughts, feelings, and actions and help them achieve self confidence. Spending time in hospital can be very stressful for children and their parents , and distress can affect how children recover from their illness. [4]With the rise in parental divorce, current terrorist threats, and high turnover in employment causing frequent relocation of families, levels of anxiety have increased in children as well as adults. Over the forty years, a meta-analysis of research showed that levels of anxiety have risen, but it is unknown if societal changes or current events, such as terrorist attacks or natural disasters, have influenced these trends. During these changes, children and adults tends to experience some anxiety encountering new surroundings. It is typical for many adults and children have to experience anxiety when introduced to novel situations or experiences. Often people are frightened of situations that are new and unfamiliar. [5]

3. Review of Literature

Ms. Sheuli Sen (2017): A Study aimed at To evaluate the effectiveness of play therapy on anxiety among hospitalized children in selected hospitals at Gurgaon, The convenient sampling technique was used to select the sample for the study. Data was collected by using a structured anxiety rating score. The tool consists of two parts. First part consists of demographic data of the sample and second part consists of the a structured anxiety rating score In experimental post test mean score 37.87and SD14.708respectively.study shown that play therapy was effective to reduce the anxiety among hospitalized children. [6] Bowmer, N. (2002) had written an article about the use of puppet show as therapeutic play, to decrease anxiety in hospitalized preschoolers. He explained about the importance of educating the nurses on the effects of therapeutic play on anxiety levels in hospitalized children. Nurses could use this information to implement therapeutic play in hospitals throughout the world. Feasibility issues would include the cost of materials needed and the time involved to educate nurses. More research should be done on

therapeutic play as a method to decrease anxiety in children. [7]

Assumption
1) Rural adults may have some knowledge regarding prevention of stroke.
2) Self instructional module will enhance the knowledge of rural adults regarding prevention of stroke. **(3)** Rural adult's level of knowledge will be influenced by demographic variables.

Limitation
1) The study is limited to preschool children.
2) The study is limited to anxiety and play therapy only.

Hypothesis
H_1: There is significant difference between the level of anxiety before and after administration of play therapy in experimental group.
H_2: There is significant difference between post-test level of anxiety among experimental group and control group.
H_3: There is significant association between prep-test level of anxiety with the selected demographic variables.

Methodology
- **Research approach:** A Quantitative research with evaluative approach
- **Research design:** True Experimental Pre test – Post test Control Group Research Design.
- **Variables under study:** (1) Independent variable: Play therapy (2) Dependent variable: level of anxiety.
- **Setting:** The study was conducted in selected hospital as the setting
- **Population:** In this study, the population includes children. **Target population** the hospitalised children at selected hospital. **Accessible population** children are who are fulfilling the Criteria for selection **Sample and sampling technique Sample:** In the present study sample children who are hospitalised at selected hospital
- **Sample size:** The sample size for the present study is 40 children who fulfill the set inclusion criteria.
- **Sampling technique:** simple random sampling technique

Inclusion criteria
- Children under the age group 3 years to 6 years.
- Children who are admitted in selected hospital.
- Children who are available at the time of data collection.
- Children who are co-operative.

Exclusion criteria
- Children who are medically seriously illness.
- Children who are not willing to participate in study

Tool preparation
Tool used for the research study was modified Hamilton anxiety scale. The tool was prepared after extensive review of literature search, consultation with experts, and based on the past clinical experience of the investigator.

Development of tool:
The research instrument consists of two parts:

Part I- Demographic data: It consists of demographic data on 13 different variables such as age, gender, religion, education of child, number of children in family, birth order in family, education of mother, education of father, monthly income, type of family, residential area, previous history of stay in hospital, duration of current stay in hospital

Part II– Modified Hamilton Anxiety Scale: - It consists of 14 items. Each item was multiple choices with 4 responses.

Validation of the tool: To ensure the content validity the instrument was given 11 experts from the field of mental health nursing, and from biostatistician. The experts were requested to give their opinions and suggestions regarding the relevance, adequacy and appropriateness of the tool. Their suggestions were taken into consideration in the preparation of the

Reliability: In order to establish reliability of the tool, test re test method was used. Reliability of the tool was **0.97** which showed that tool was highly reliable.

Feasibility of the study: The investigator conducted a Pilot study.

Pilot study: The pilot study was conducted from 3rd Nov 2018 to 18th Nov 2018 Nov in selected hospitals.to assess the feasibility of the study and to decide the plan for analysis.

Data collection procedure: Prior permission will be taken from the selected hospital. Informed consent will be taken from parents of participants and data will be kept confidential. The period of data collection was from 2nd December 2018 to 10th Jan 2019.

The data was collected by the investigator. Pre-test was conducted on adults who fulfill the inclusion criteria soon after the pre-test play therapy was administered. Evaluation was done by conducting post-test after 7 days of administration of play therapy.

Plan for data analysis: - (1) Description of demographic characteristics of the children was computed by using frequency and percentage. (2) Mean, Standard deviation of pre and post- test knowledge scores was computed. (3) "t" test was applied to determine the significance of mean difference between mean pre-test and post- test knowledge scores. (4) Chi- square test was used to find the association of knowledge score with demographic variables and the findings were documented in tables, graphs and diagram.

Scoring mode: Each item is scored on a scale of 0 (not present) to 4 (severe), with a total score range of 0–56, where <17 indicates mild severity, 18–24 mild to moderate severity and 25–30 moderate to severe.

4. Results

Organization of the data: The collected data is tabulated, analyzed, organized and presented under the following sections:

Section –I: -Description of adults with regards to demographic Variables

Section – II: Frequency and percentage distribution of pretest and post test scores in control and experimental group.

Section – III: Comparison of mean scores between pretest and posttest among experimental and control group.

Section – IV: Association between pretest score with demographic graphic variables among experimental and control

Section –I: -Description of adults with regards to demographic Variables

Table 1: Frequency and percentage distribution of demographic variables

Sr no.	Variable	Group	experimental		control	
			Frequency	percentage	Frequency	percentage
1	age	3 years	7	35	3	15
		4 years	5	25	8	40
		5 Years	4	20	7	35
		6 years	4	20	2	10
2	gender	Male	11	55	13	65
		Female	9	45	7	35
3	religion	Hindu	13	65	16	80
		Muslim	4	20	4	20
		Christian	1	5	0	0
		Others	2	10	0	0
4	education of child	Not yet started	6	30	6	30
		Pre-school /Play School	5	25	7	35
		UKG&LKG	6	30	5	25
		First standard	3	15	2	10
5	birth order of child	First	9	45	10	50
		Second	9	45	9	45
		Third	1	5	1	5
		Fourth and above	1	5	0	0
6	Number of children in family	One	5	25	7	35
		Two	11	55	11	55
		Three	3	15	2	10
		More than Three	1	5	0	0
7	education of mother	Illiterate	1	5	3	15
		Primary	11	55	11	55
		Secondary	7	35	5	25
		Graduate and other	1	5	1	5
8	education of father	Illiterate	1	5	2	10
		Primary	10	50	10	50
		Secondary	6	30	7	35
		Graduate and other	3	15	1	5
9	family monthly income	5000 rs -10000 rs	5	25	6	30
		10000 rs-15000rs	7	35	9	45
		15000 rs-20000 rs	6	30	3	15
		more than 20000 rs	2	10	2	10
10	type of family	Nuclear	12	60	9	45
		Joint	7	35	11	55
		Single parent	1	5	0	0
		Other	0	0	0	0
11	residential area	Rural	7	35	8	40
		Urban	13	65	12	60
12	previous history of stay in hospital	Yes	6	30	7	35
		No	14	70	13	65
13	duration of current stay in hospital	1-3 days	11	55	8	40
		4-6 days	6	30	10	50
		7-10 days	2	10	1	5
		More than 10	1	5	1	5

Section – II: Frequency and percentage distribution of pretest and post test scores in control and experimental group

Table 2: Pre Test Anxiety Score

Sr.no	Category	Pre test	
		Frequency	Percentage
1	Mild	4	20
2	Mild to moderate	11	55
3	Moderate to severe	2	10
4	Very severe	3	15

Table 3: Post Test Anxiety Score

Sr. no	Category	Post test	
		Frequency	Percentage
1	Mild	12	60
2	Mild to moderate	5	25
3	Moderate to severe	3	15
4	Very severe	0	0

Section III

Table 4: Comparison pre-test and posttest anxiety level among experimental and control group

S. No.	Category	Pre-test				Post-test			
		experimental		Control		experimental		control	
		N	%	n	%	N	%	N	%
1	Mild	4	20	3	15	12	60	6	30
2	Mild to moderate	11	55	14	70	5	25	12	60
3	Moderate to severe	2	10	2	10	3	15	2	10
4	Very severe	3	15	1	5	0	0	0	0

Section IV

Table 5: Comparison of between experimental and control group

Anxiety level	Mean	Standard Deviation	Mean difference	't' value	'p' value	Significant
Experimental group	23.15	8.13	1.35	4.92	0.000	Significant
Control group	21.80	4.12				

Section V

Table 6: Association between pretest score with selected demographic variables

S. No	Demographic variable	Chi square	Degree of freedom	P value	Inference
1	Age	6.354	9	0.704	NS
2	Gender	5.096	3	0.165	NS
3	Religion	5.856	9	0.754	NS
4	Education of child	7.038	9	0.633	NS
5	Birth order of child	14.32	9	0.111	NS
6	Number of children in family	14.019	9	0.122	NS
7	Education of mother	8.909	9	0.446	NS
8	Education of father	5.068	9	0.828	NS
9	Family monthly income	11.047	9	0.272	NS
10	Type of family	2.875	6	0.824	NS
11	Residential area	5.154	3	0.161	NS
12	Previous history of stay in hospital	3.728	3	0.292	NS
13	Duration of current stay in hospital	7.49	9	0.586	NS

H1: There is significant difference between the pre-test and post-test level of anxiety in experimental group. The pre test and post-test Anxiety level means were 23.15 and 15.10 respectively. The standard deviation for pre test and post-test were 8.13 and 6.61 respectively. The mean difference was 8.05. The calculated 't' value 8.93 is greater than table value (2.0) at degree of freedom 0.05 level.. This indicates the there is significant change in anxiety level in experimental group. As the result shows there is significant decrease in post-test level of anxiety among hospitalized children in experimental group after the intervention of play therapy, **hence the research hypothesis H₁ is accepted.**

H₂: There is significant difference between the post test level of anxiety among Experimental group and control group. Posttest experimental group and control group Anxiety means were 23.15 and 21.80 respectively. The standard deviation for pre-test and post-test were 8.13 and 4.12 respectively. The mean difference was 1.35. The calculated 't' value 4.92is greater than table value (2.0) at degree of freedom 0.05 level. This indicates the play therapy was effective in decrease the anxiety level among hospitalized children. As the result shows there is significant difference in post-test level of anxiety of experimental and control group among hospitalized children after the play therapy **hence the research hypothesis H₂ is accepted.**

H3: There is significant association between pretest level of anxiety with selected Demographic variables. Chi-square value was calculated to find out the association between pre-test levels of anxiety among hospitalized children with selected demographic variables and results show that there is no significant association between the selected socio-demographic variables and pre-test level of anxiety of hospitalized children. Hence hypothesis **H₃ rejected and H₀₃ accepted.**

H₀₃: There is no significant association between pretest level of anxiety with selected demographic variables

5. Summary

- Majority of the population belongs to the age group of 4 years 13(23.5%)
- Majority of population shown males 24 (60%).
- The highest population belongs to Hindu religion 29(72.5%).
- Majority of population 12 (30%) have Pre-school /Play Schooleducation.
- The highest population whose birth order in family was first order 19(47.5%)
- The majority of population whose number of children in family is two shows percentage are 22(55%).
- The majority of population shows education of mother was primary with percentage 22(55%)
- The majority of population shows education of father was primary 20(50%)
- The highest population shows monthly incomes between 10000 Rs-15000Rs are 16(40%)
- The majority of population shows nuclear type of family is 21(52.5%).
- The majority of population staying in urban area is 25(62.5%).
- The highest population those who have previous history of stay in hospital is 27(67.5%).
- The majority of populations whose duration of current stay in hospital shows 19(47.5%).
- The pre test and post-test Anxiety level means were 23.15 and 15.10 respectively. This indicates the Play therapy was effective.

6. Conclusion

The mean of post test score (15.1) was Less than the mean of pre- test score (23.15) The study findings concluded that there is reduction in anxiety of hospitalized children. Play therapy had great potential for reduction in anxiety among hospitalized children at selected hospital.

7. Recommendations

- The study can be replicated on a larger sample to generalize the results.
- The study can be done following a particular type of surgery, invasive procedures.
- The study can be done to find out which kind of play material is more effective to reduce the anxiety.
- The study can be done by increasing the duration of play more than one hour to find out the effect of reduction of anxiety

References

[1] Quote: https://www.brainyquote.com/quotes/rabindranath_tagore_104535
[2] Ingalls, saleroom. Maternal and child health nursing. 9th edition. Network: Mosby; 1999.
[3] http://www.iosrjournals.org/iosr-jnhs/papers/vol3-issue2/Version-4/L03245962.pdf
[4] Middeldorp CM and Slof-Op, innovations in ply therapy, Brunner Roultedge,1st edition ,newyork, 2006 ,pp 302-322
[5] Salder C, child's play nurses times, 1990; 86 (11); 16-17.)
[6] https://www.scribd.com/document/358578552/a-study-to-assess-the-effectiveness-of-play-therapy-on-anxiety-among-hospitalized-children
[7] BowmerN. Therapeutic play and the impact on anxiety in hospitalized children, Journal of Kentudey Nurse,2002; 50(1),15