Effect of Play Intervention in Improving Social Skills among Autistic Children

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Abstract: <u>Aim</u>: To determine the effect of play intervention in improving social skills among autistic children. <u>Method</u>: A total of 30 children (15 in experimental group and 15 in control group) aged 3 to 5 years participated in the study. The Experimental group underwent play intervention. Independent and paired "t" tests were used to process results. <u>Results</u>: Statistically significant improvement in social skills in the experimental group as compared to the control group with regard to effect of play intervention. <u>Conclusion</u>: Play intervention has significant effect on improving social skills among autistic children.

Keywords: Autism, Play, Social skills

1. Introduction

Autism is not considered as disease, but is defined as "A developmental disorder of brain functioning with three main symptoms, impaired social interaction problem with verbal and non-verbal communication and imagination and unusual or severely limited activities and interest.

Autistic individuals show restricted, repetitive and stereotype pattern of behavior, interest and Activities. This has an impact on the child willingness or ability to learn, owing to his/her restricted behavior and interests. According to Axline (1974) play is a child's natural medium of selfexpression. It is an opportunity that is given to the child to play out his feelings and problems as in certain types of adult therapy an individual "acts out" his difficulties.

Play therapy UK (2006) defines play as a physical or mental leisure activity. It assists in learning and self development involving individuals aAre groups, either spontaneously or is part of a planned activity.

This study aimed to explore the various play techniques that can be used with autistic children in order to improve their social skills.

Aims

The aim of the study was to evaluate the effectiveness of the play technique programme in improving social behavior of autistic children.

Objectives

- To asses the severity of autism using childhood autism rating scale.
- To determine the level of socials skills among autistic children using vineland social maturity scale.
- To evaluate the effectiveness of play technique programme in improving social skills.

Alternative Hypothesis

There will be significant improvement in social skills of autistic children through play intervention.

Null Hypothesis

There will be no significant improvement in social skills of autistic children thought play intervention.

2. Review of Literature

Florey.L., (1971): Conducted a study for sixty children, thirty in experimental and thirty in control group. The experimental group was involved in 20 weeks of group play. Following therapy the experimental group showed significant improvement when compared to control group.

D.M.Kanys, BR Leonard, et.al.,: They investigated the use of social skills groups to facilitate increased social interaction for students with autism and their non-handicapped peers in an integrated first grade classroom. Social skills group consisted of training students and peers in initiating, responding and keeping interaction among, peer greeting others, taking turns and sharing and asking for help. Training occurred during the first 10 min of 20 min play groups four times per week. Results demonstrated increases in the frequency of time, engaged in and duration of social interaction, as well as the responsibility of students and peers to each other.

Cox (1953): Investigated the effect of play therapy program on personal adjustment and interpersonal relationship. The nine subjects of the experimental group and nine subjects of control group were matched on measures of adjustment and on sociometric rating. The experimental group was involved in 27 week play therapy programme. Following therapy, the experimental group showed significant increase in interpersonal relationship as compared with no gains in the control group who had received no therapy.

Ginott (1961), Slauson (1948)30: Non-directive play therapy with a group of children may stimulate expression in situation which would not occur in individual therapy. Interactions, vicarious catharsis and inter stimulation are characteristic of the group situation. Result showed significant improvement for the children involved in non directive play therapy.

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Sommer(1932)

Studied the effect of a similar group approach in and found greater improvement in the social skills of pre school children with poor communication skills. Improvement among the pre school children who were involved in group play was more than their matched control group who received no therapy.

Research Approach

Evaluation approach was adopted for this study, since the researcher aimed to assess the effectiveness of play intervention in improving social skills among autistic children.

Research Design

The present study was two group pre test and post test quasi experimental design. Control Group = Pre test Post test Intervention Experimental Group = Pre test Post test

Variables Under Study

In this study the independent variable is play intervention, the dependent variable is social skills.

Setting and Duration of the Study

Settings: Special School, Muthampalayam, Erode, & C.K.Hospital, Erode. Duration: 1 year

Population of the Study

Population of the study consisted of both male and female children.

Criteria for Sample Selection

Inclusion Criteria

- Age group 3-5 years
- Both males and females
- Mild to moderate degrees of autism

Exclusion Criteria

- Age group below 3 years and above 5 years of age.
- Rett's syndrome.
- Childhood disintegrative disorder
- Aspergers syndrome
- History of seizures
- Pervasive Developmental Disorder Not Otherwise Specified
- Severe degree of autism/

Sample Size

Sample size was 30 subjects, 15 subjects randomly selected in control group and 15 subjects randomly selected in experimental group. This was an open unblinded study.

Sampling Technique

Convenient sampling procedure adopted.

Measurement Tools

- 1) Childhood Autism Rating Scale (CARS)
- 2) Vineland Social Maturity Scale (VSMS)

3. Intervention Procedure

Days 1 to 15

Intervention based on Takatas and Bartons classification stages was given. These sessions focused on the sensorimotor stage, where the children are allowed to play with objects which intensify sensory experiences such as rattles, teething rings, blankets, mobiles, balls, cups and boxes.

Days 16 to 45

In these sessions interventions was mainly focused on simple constructive work that is characteristic of parallel play and present in symbolic games. Play materials included in these sessions were balls, blocks, dolls, sand box, play dough, crayons and small figures.

Children were directed towards motor activities such as jumping, building with blocks, stringing beads, buttoning, scribbling and imitating house work.

Days 46 to 90

In these sessions the children learnt about the social participation in play. Co-ordination of the children while doing the activities was better. The children learnt some basic skills essential to participate in culture and society. Play materials included in these sessions were crayons, paints, clay, games with rules such as hide and seek, follow the leader, merry go rounds, group singing games, ball games, and role play.

 Table 1: Comparison of Social Skills between Control

 Group Pre Test Vs Experimental Pre Test

S.No.	Test	Factor	Group	Mean	SD	't'	LOS	
1	Pre	SQ	Control	38.01	12.49	1 576	0.05	
1.	Test		Experimental	45.25	12.62	1.370		

Table I and Graph I shows that there is no significant difference between pre test control group and pre test experimental group.

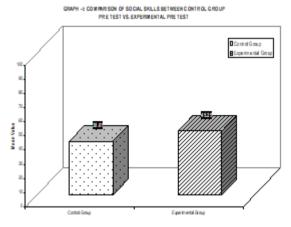


Table 2: Comparison of Social Skills Between Control

 Group Post Test Vs Experimental Post Test

S.No.	Test	Factor	Group	Mean	SD	't'	LOS
1	Post	SQ	Control	41.75	11.96	6 6 1	0.001
1.	Test		Experimental	71.27	12.46	0.01	

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Table II and Graph II shows that there is significant difference between post test control group and post test experimental group.

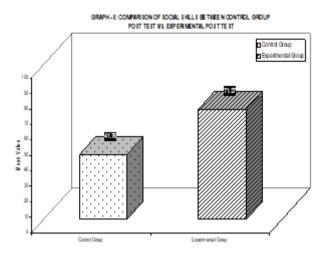


 Table 3: Comparison of Social Skills in Control Group Pre Test Vs. Post Test Values

Group	Factor	Group	Mean	SD	ʻt'	LOS						
Control	SQ	Pre Test	38.01	12.49	1.62	0.126						
		Post Test	41.67	11.86	1.02							
		Control SQ	Control SQ Pre Test Post Test	Control SQ Pre Test 38.01 Post Test 41.67	1081 1681 41.07 11.00	Control SQ Pre Test 38.01 12.49 1.62 Post Test 41.67 11.86 1.62						

NS = Not Significant

Table III and Graph III shows that there is no significant difference between pre test and post test values in control group.

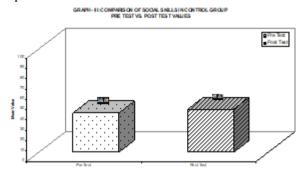
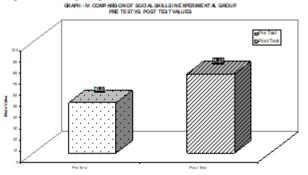


 Table 4: Comparison of Social Skills in Experimental Group Pre Test Vs. Post Test Values

Gloup The Test V3. Test Values								
S.No.	Group	Factor	Group	Mean	SD	ʻt'	LOS	
1.	Experimental	SQ	Pre Test	45.25	12.62	6.60	0.001	
			Post Test	71.27	12.46			
C - Cignificant								

S = Significant

Table IV and Graph IV shows that there is significant difference between pre test and post test values in experimental group



4. Discussion

30 children included in this study, 15 in control group and 15 to the experimental group were randomly assigned.

The play technique programme was administered to the experimental group. The VSMS was administered to all children before and after the intervention. Results have been compared and statistical analysis done "t" test and paired "t" test have been calculated for the obtained results. The "t" test indicates that there was a unanimity of both the experimental and control group characteristics in the pre test values and significant difference between experimental and control group in the post test values.

The study aim at studying the effectiveness of play techniques in improving social skills among Autistic children.

Play techniques were administered as occupational therapy intervention to improve social skills among Autistic children. This intervention is supported by Florey.L., (1971). In this study she suggested that participations in play enhances social interaction among Autistic children.

Initially the researcher administered vineland social maturity scale to both control and experimental groups, scores were tabulated. A period of three months play interventions was given as occupational therapy intervention. Post test was conducted with same vineland social maturity scale, scores were tabulated. "t" test and paired "t" test have been calculated for the obtained results. "t" test indicates that unanimity of both the control and experimental group characteristics in the pre test values and significant difference between experimental and control group in the post test values.

In pre test of control and experimental group t = 1.576. It indicates that there was no significant difference between control and experimental group. There was significant difference between pre and post test values of experimental group. Experimental group "t" value is 6.60 (P > 0.001)> It signifies that there is significant improvement in social skills of Autistic children through play intervention. Hence alternate hypothesis is proved and null hypothesis was accepted. These findings are supported by the study of Florey.L., (1971) that is engagement in play activities have significant improvement in social skills of experimental group when compared to control group. It was also supported by Cox (1953), the study, that is play therapy program showed significant increase in inter-personal relationship.

In pre and post test values of control group t = 1.62 (P = 0.126). It signifies that there is no significant improvement in social skills of control group children with Autism. Because the play intervention was given to experimental group alone.

The statistics in post test values for control versus experimental category shows high significant difference, that is "t" value of control and experimental group after therapy is 6.61 (P = 0.001). It also signifies that there is significant

Volume 7 Issue 5, May 2018 <u>www.ijsr.net</u> Licensed Under Creative Commons Attribution CC BY improvement in social skills among Autistic children after play intervention.

Hence these findings suggest that the play intervention has significant effect in improving social skills among Autistic children.

This study was based on the hypothesis that the play technique program would significantly improve social skills in Autistic children as measured by the social quotient obtained through the vineland social maturity scale. From tables I, II & IV it is clear that there was a significant improvement in the SQ of children who underwent intervention as compared to those who did not (Table III). This study therefore concludes that the play technique program is an effective intervention method to improve social skills to young children with mild-to-moderate autism.

5. Limitations

- The present study was done to a limited number of people.
- This study is confined only to the age group of 3-5 years.
- This study includes only autistic children, other associated disorders are not included in the study.
- Male and female comparison is not included in the study.

6. Recommendations

- The present study can be repeated on a large size of subjects and at different locations.
- Further study can be done with the age group > 5 years.
- Other associated disorders can be taken for the study.
- Male and female comparison can be done.
- Further follow up study can be done.

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