

■ **Research Paper**

Compare the Effectiveness of Rhythm Games on Decreasing Aggression Children with Mild Mental Retardation and Children with Learning Disorders with Normal Children

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The present research was done with the aim of showing the Comparison of rhythmic games on aggression in children with mild mental retardation and learning disorders in children with normal children Primary school children. The study sample comprised all children of primary school Sirjan city. A total of 90 patients were selected for sampling. In this research, the semi experimental research method who was randomly assigned to three groups. Data and software spss16 were analyzed by analysis of covariance. The findings revealed that the game had a significant effect on aggression in children Effect of rhythmic games on aggression in children with mild mental retardation and learning disorder is different from normal children.

Keywords: Rhythmic games, Aggression, Children with mild mental retardation, Learning disorders, Normal children

INTRODUCTION

Childhood years for the diagnosis of pediatric problems are timely intervention and prevention of emotional problems, social and educational future. The timely intervention of modifying maladaptive behaviors in children at this critical period, enhance social skills and popularity with peers and adults prepare children for future responsibilities (Shahim, 2007). Aggression is one of the most common reasons for referral to their wiki children's mental health. Recognizing this problem with young children and timely intervention can prevent the continuation of this behavior (Goodwin et al., 2003). From the day when human life begins, subject those reasons were unable to adapt themselves to the

community, has been proposed. It's one of those people who are mentally backward children (Hiniker, Daniels, & Williamson, 2013). The children continued to cause delays compared with normal children in mind, and eventually stop, do not understand the different situations and environments, mainly in the face, if undetected compromise is often aggressive behavior and self-emotive corner will develop according to the first opinion on the issue of education therapy or rehabilitation of these children are paid in different ways this is one of the most rhythmic (Reynolds, 1982; Schmidt quoted Peters, 1992). Students with learning disorders, especially in the field of gifted children have recently been in the area of

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Exceptional Children (Narimani, 2004). These are children that their intelligence is lower than their peers, their natural appearance, growth in height and weight is normal like other children playing but activities such as reading, writing, speaking and understanding of mathematical problem and in the homework problems are serious (and Mac Shin Dakrl, and quoted Ahmadi Assadi, 1997). The students compared to their natural counterparts are less popular and therefore are at risk of social problems in addition to the teachers discovered they have more behavioral problems than they are and cannot adapt to regular classroom instruction available (Jamshidi, 2004; quoted Takaloy, 2011).

Aggressive behavior in children is a common problem that needs attention all over the world are increasingly and research about effective solutions, has created a big challenge for practitioners and theorists. In the past three decades, researchers and practitioners have led efforts to introduce diversity are effective treatments (Spivak et al., 1976; quoted Nasirzadeh and Roushan, 2010). We have special scientific studies, the effectiveness of play and show rhythmic (Durkin, Boyle, Hunter, & Conti-Ramsden, 2013). Because of the lively and rhythmic movements and play rhythmic, harmonic movement and games the combination of music and movement, children are learning a lot of concepts and themes and so the implicit cognitive or learning while doing motions. Recent research on the effectiveness of physical activity and exercise shows rhythmic memory and learning (Dadsetan, 2005). Research that has been done in the past, indicating the importance of this research are among the Dehghani et al (2012) in a study entitled "Effect of rhythmic motion games (weighted) on executive function in children with learning disabilities Developmental Neuropsychological pre-school period". Results showed rhythmic motion games are effective in improving the performance of participants and reduce problems (Esposito et al., 2013). Dadsetan et al (2009) in a study entitled "The effect of child-centered play therapy on children's externalizing problems showed: Child-centered play therapy is an effective method for reducing externalizing behavior problems of children considered and it seems that this approach has more impact on aggressive behavior. Zarepour and et al (2009) in a study entitled "Effect of group play therapy on

depression in children with cancer" showed: Play therapy significantly reduced depression in the intervention group compared with the control group. The game can be an effective intervention by health care team members to help the hospitalized children they used to painful procedures and prepare and adapt to the stress of hospitalization. A new study by Butt (2009), the University of North Florida was revealed similar findings. In this study, children were followed from preschool programs in the fourth grade the result was that children in pre-school centers have programs that match the orientation of the selected activities are free; to those centers that have programs focused on scientific and educational activities, academic performance and better social.

Research Bailey (2007), in Germany in 1970 showed that children in kindergarten to fourth grade participated with a focus on learning the game, or the children who were in kindergarten with the focus and direction of the development of mental, emotional, social and physical excel (Franceschini et al., 2013). The German government was so interesting and compelling manner that all kindergarten orientation program and their focus on the game. According to what was said this study aimed to determine the effect of rhythmic play in reducing aggressive behavior in mentally backward children, the effect of rhythmic play in reducing aggressive behavior in children with learning disabilities, the effect of rhythmic play in reducing aggressive behavior in normal children, the effects of rhythmic games on reducing aggressive behavior in mentally retarded children and children with mild learning difficulties in children of normal and taking into consideration the hypothesis that rhythmic games on decreasing of aggression children with mild mental retardation is common in children (Blumberg & Fisch, 2013), rhythmic games on decreasing of aggression mentally retarded children and children with mild learning disability is different, rhythmic games on decreasing of aggression children with disorders and normal children learn differently, rhythmic games and aggressive behavior in children, reducing the effect of mentally backward, to reduce aggressive behavior in children with disorders rhythmic games affect learning reducing aggressive

behavior in normal children and play rhythmic influences to accomplish.

METHODOLOGY

This research is semi-experimental with pretest - posttest three-group test. The study sample, all elementary school students in the city of Sirjan, the number was 3,500. Using random cluster sampling from two Sirjan zone, zone 2 and between schools within the district, school and school age children, elementary ordinary but exceptional knowledge and the method of sampling the selected learning disorders then we asked them to answer the questions carefully following the completion of the questionnaire as a control group of 15 participants per class. And 15 controls were selected by simple random sampling. This study is semi-experimental with pretest - post-test. The three experimental groups were used. All three groups were tested before and after the intervention, the experimental group was tested finally, all groups were tested. To collect data, a questionnaire was angry kids. The questionnaire consists of 39 items and four subscales (frustration, physical aggression, peer relations, and relations with the authorities) is in terms of choice, "I do not care = 1" bothering me = 2 ", 3 = I'm really upset" and "angry = 4" is the passing score. The minimum score that earns participants 39 and the maximum is 156. To evaluate the reliability and validity, this test was conducted on 1,604 students. Results of test-retest coefficient (TEST-RETEST), 0.65 to 0.75, 0.85 and 0.86 internal consistency and validity of the four subscales were obtained 0.93. Process research and educational classes on the basis that

1. Refer to management education and research and to explain the purpose of the application's execution, research and implementation way
2. The order of the Honorable Director of Education
3. The request referred to preserve the venerable and respected expert advice Elementary
4. Obtain a referral to go to school and three elementary school boys 4 express purpose of research and procedures for the selection of 30 students, school administrators and aggressive

And placing students into two groups, in both control and experimental groups and control groups, with the pretests were evaluated, and then a group of 8 sessions for 2 hours to form a rhythmic game began. The first training session for 20 minutes to stretch the children's bodies were then heated as described in more games with them were carried out.

The musical play: In this game, the child must run on a straight line according to the rhythm of music and music instruction provided in the text (vault, sit, skip, jumping pairs, etc.) applies. Motion Rhombus: Rhombus that the child should be designed with different colored lines on the template move along with the music players.

The movement is without music and poetry reading by your child's first runs.

Game Sound: The sounds of children playing in the spread of sound on stage. For example, a sound like a plane or a train, plane or train began to move. Match colored balls in this game with various sizes of colored tape on the floor. Various intervals along the bar and chat with the color bar tops. The child must move with the song and said bouncer given color music balls asked in the bucket at the end of the ribbon is cut. The required number of balls off the music is added.

Game of shapes: shapes (circle, square, etc.) are placed in different parts of the hall. Along with music, children's poetry conforms to the shape of the poem moves. This game can also be used in animal shapes. Board games, children are placed in a checkerboard and music instruction (two upper house, three straight at home, etc.) are starting to move in different directions, jump on one foot for a foot.

Play Sudoku: The numbers game randomly arranged in a square is colored. Children should be music to the number of animals or flowers that are said to be the number required to run or jump. Forms play a role in this game, the child will be asked to move on color bar hampered by the difficulty according to recipe instructions (no touching) to perform the desired activity.

The game will be added gradually to form a band (Rafee, 2008). After the intervention, the experimental group aggression in children in all three groups were evaluated with the test

If the difference in grades two groups is significant, demonstrates the effectiveness of rhythm games as a group to reduce anxiety in children. In this study, considering the scale of measurement data, to analyze the data, descriptive and inferential statistics were performed using SPSS software. Descriptive statistics for the aggressiveness of the mean, standard deviation is used and to evaluate the assumptions of inferential statistics including T-dependent covariate analysis was used.

THE FINDINGS

Hypothesis 1: The effect of rhythmic video games on decreasing of aggression children with mild mental retardation is different from normal children.

(Table 1): comparison of pre- and post-test statistics decreasing of aggression children with mild mental retardation and normal children

TABLE 1 HERE

According to the table above were determined and compared effect of rhythmic video games on decreasing of aggression children with mild mental retardation is common in children is more common in children's games and rhythmic effect.

Hypothesis 2: The effect of rhythmic video games on decreasing of aggression mentally retarded children and children with mild learning disability are different.

Table 2: Comparison of pre- and post-test Statistical indicators decreasing of aggression mentally retarded children and children with mild learning disability.

TABLE 2 HERE

According to the table above were determined and compared the impact of rhythmic video games on decreasing of aggression children with mild mental retardation and the children are learning and rhythmic games behind mild mental balance is less affected.

Hypothesis 3: The effect of rhythmic video games on decreasing of aggression children and normal children are learning.

(Table 3): comparison of pre- and post-test Statistical indicators decreasing of aggression

normal children and children with learning difficulties

TABLE 3 HERE

According to the table above were determined and compared effect of rhythmic video games on decreasing of aggression children with learning disorders are common in children the effect is more common in children and rhythmic games.

Hypothesis 4: The Game rhythmic influences on aggression in mentally retarded children.

(Table 4): ANCOVA impact rhythmic games on decreasing of aggression mentally retarded children

TABLE 4 HERE

As seen in Table 4. The value of the test statistic ($F = 33/488$) were that since $p < 0.01$, this value is significant at the one percent level. There is a relationship between aggressive mentally retarded children in the control group. And tested in a pretest-posttest differences were significant after controlling for the effect. The rhythmic games on decreasing of aggression mentally retarded children have had significant effect on the level of one percent.

H5: rhythmic games on aggression in children are learning effects.

(Table 5): ANCOVA impact rhythmic games on decreasing of aggression children's learning

TABLE 5 HERE

As seen in Table 5. The value of the test statistic ($F = 15.704$) is that since $p < 0.01$, this value is significant at the one percent level. So between aggression in children's learning in both control and experimental group pretest-posttest differences were significant after controlling for the effect.

The rhythmic games on decreasing of aggression children with learning disorders have significant effects on the level of one percent.

Hypothesis 6: Games rhythmic influences on decreasing of aggression normal children.

(Table 6): ANCOVA impact of video games on decreasing of aggression children with normal rhythmic

TABLE 6 HERE

As seen in Table 6 is equal to the value of the test statistic ($F = 9.301$) is that since $p < 0.01$,

This value is significant at the one percent level. So between aggression and normal children in both experimental and control groups in the pretest-posttest differences were significant after controlling for the effect.

The effect of rhythmic video games on decreasing of aggression normal children had significant effect on the level of one percent.

DISCUSSION AND CONCLUSION

In the first hypothesis, the results of this test showed the impact of rhythmic video games on decreasing of aggression children with mild mental retardation is common in children.

The second hypothesis, the results showed that the effect of rhythmic video games on decreasing of aggression mentally retarded children and children with mild learning disability are different.

The third hypothesis, results showed that the effect of rhythmic video games on decreasing of aggression children with disorders and normal children learn differently. The fourth hypothesis, the results showed that rhythmic games on decreasing of aggression mentally retarded children affected.

The fifth hypothesis, the results showed that rhythmic games on decreasing of aggression children are learning effects. The sixth hypothesis, the results showed that rhythmic games on decreasing of aggression normal children affected. The Research findings with previous results Dehghani and et al (2012), Emaraty (2011), Syed Ameri (2011), Dadsetan and et al (2009), Sanah and et al (2008), Zvaljd et al (2007), Shojaee and Alamdarlou (2006), Jannatian (2006), Shaker (2004), Sheikh (2003), Mac Gyv (2000), lobby and Welch (2002), Bailey (2007), Landers, Bratoun, and Ray (2009) and Butt (2009) rhythmic effects of games on aggression have noted, is consistent. Aggression is the most common reason for referral to their wiki children's mental health (Sokhodleksy et al., 2004). Now scientific studies, special effects and show rhythmic game. Because of the vitality and rhythmic movements and play rhythmic, harmonic movement and games, as well as being

the co-movement with music, children's education and cognitive Many themes are implicitly learn while doing the movements. Recent research on the effectiveness of physical activity and exercise show rhythmic memory and learning (Dadsetan, 2006).

This is also reflected in this study. Members of the group after exposure and rhythmic games with the control group showed no significant difference. Researcher of the study, the children's play helps your mental strength to throw, understand various aspects of their environment, their ability to effectively recognize and add to their experience, also play a rhythm (rhythmic) is one of the purest ways of thinking are accessible to young children. Theories abound about the importance of rhythmic movement is expressed. Maria Lavr Scheib, who pioneered a rhythmic teaching method is that the move is a gateway through which can be seen in humans. Rhythmic expression is inner feeling their baby move. Feelings that cannot be explained only by doing these movements are indescribable. Kypart also included theorists who have learning difficulties due to lack of normal movement know on the other hand, the interaction between the movement and games with music, lyrics, and rhythmic and melodic songs on the effectiveness of this approach in working with children has increased. It is closely linked with the music of the soul, emotions, feelings and emotions of the child, created and amplifying communication skills, social, speech and language, and so on. After calming melodic and rhythmic music, and the stylized teaser for children after creating the rhythmic and harmonic order, harmony, unity and solidarity among internal elements, psychic children around the world. Many academic and behavioral problems in children early and then somehow or lack of attention, concentration, response rate and irregular, hasty behavior, just bear down and Hvosl, crude and ill-considered move, restlessness, and so on are (Rafee, 2008). Play is important because it helps children grow healthy and strong. When children run, spin, throw, etc. They will make your muscles strong and your energy to burn. Placing physical play, physical strength, and endurance, and endurance and improves balance and helps children sleep better and eat better (Rafee, 2008).

Since the results showed rhythmic training games (weighted), the primary influences decreasing of aggression children accordingly the following suggestions to perform harmonic games among children and the nature of the decreasing of aggression they provide. Preschool programs essential component of health centers play in their children's education and upbringing. Parents may try to encourage their children to do the rhythmic games. The teachers care about the style of play in education and in-service training centers devoted to them. Through the mass media to educate parents to encourage children to play with.

REFERENCES

- Ahmadi, M. (2006). *The effectiveness of child-centered play therapy is aggressive*, MS Thesis, University and rehabilitation.
- Blumberg, F. C., & Fisch, S. M. (2013). Introduction: Digital games as a context for cognitive development, learning, and developmental research. *New directions for child and adolescent development*, 2013(139), 1-9.
- Durkin, K., Boyle, J., Hunter, S., & Conti-Ramsden, G. (2013). Video games for children and adolescents with special educational needs. *Zeitschrift für Psychologie*, 221(2), 79.
- Dadsetan, Parirokh and stale, Maryam and Asgari, Ali. (2009). Effect of child-centered play therapy on children's externalizing problems. *Journal of Behavioral Sciences*, 3 (4).
- Dadsetan, Parirokh. (2005). *Transformation of morbid psychology*. Tehran: the lily.
- Dehghani, M. and Karimi, N. and Taghipur Young, AA. (2012). Effect of rhythmic motion games (weighted) on executive functions in children with LD psychological pre-school transition. *Journal of Learning Disabilities*, 2 (1).
- Esposito, M., Ruberto, M., Gimigliano, F., Marotta, R., Gallai, B., Parisi, L., . . . Carotenuto, M. (2013). Effectiveness and safety of Nintendo Wii Fit Plus™ training in children with migraine without aura: a preliminary study. *Neuropsychiatric disease and treatment*, 9, 1803.
- Franceschini, S., Gori, S., Ruffino, M., Viola, S., Molteni, M., & Facoetti, A. (2013). Action video games make dyslexic children read better. *Current Biology*, 23(6), 462-466.
- Goodwin T, Pacy K, Grace M. (2003) children violence prevention in preschool settings. *Journal of child Adoles psychiatric Nursing*, 16, 52– 59.
- Hiniker, A., Daniels, J. W., & Williamson, H. (2013). *Go go games: therapeutic video games for children with autism spectrum disorders*. Paper presented at the Proceedings of the 12th International Conference on Interaction Design and Children.
- Lbbe, E. E. & welsh, M. C. (2009). children-154 and runing changes in pshysical fitness, self-efficacy, and health locus of control. *Journal of sport Behavior*, 16, 58-97.
- Nassir Zadeh, R. and Roushan messenger. (2010). *Iranian Journal of Psychiatry and Clinical Psychology*, 16(2).
- Rafee, Talat. (2008). *Movement and rhythmic games (rhythmic)*. Tehran: Danzhhh.
- Schmidt Peters, Jacqueline. (1992). *Introduction to Music Therapy*, translated by Alizadeh, Mohammad. Tehran.
- Shahim, TV. (2007). Relational aggression in preschool children. *Iranian Journal of Psychiatry and Clinical Psychology*, 1 (3).
- Takaloy, Samia. (2011). The effect of maternal education, play therapy on children with behavioral problems, learning disabilities, *Journal of Learning Disabilities*.

Zareapour, legends and Khoshknab Fallahi,
M. and Kashaninia, Z and Big Lryan,
Akbar and a Baba Shahabi, Ronak.
(2009). Effect of group play therapy on
depression in children with cancer.
Scientific. *Journal of Kurdistan University
of Medical Sciences*.

APPENDIX

Table 1: comparison of pre- and post-test statistics decreasing of aggression children with mild mental retardation and normal children

Group	Statistical indicators	Mean	Standard deviation
Children with mild mental retardation	Pretest	14/59	3/84
	Posttest	15/20	4/46
Normal children	Pretest	16/50	3/50
	Posttest	20/02	3/08

Table 2: Comparison of pre- and post-test Statistical indicators decreasing of aggression mentally retarded children and children with mild learning disability.

Group	Statistical indicators	Mean	Standard deviation
Children with mild mental retardation	Pretest	14/59	3/84
	Posttest	15/20	4/46
Children with learning difficulties	Pretest	15/20	3/60
	Posttest	16/12	4/09

Table 3: comparison of pre- and post-test Statistical indicators decreasing of aggression normal children and children with learning difficulties

Group	Statistical indicators	Mean	Standard deviation
Normal children	Pretest	16/50	3/50
	Posttest	20/02	3/08
Children with learning difficulties	Pretest	15/20	3/60
	Posttest	16/12	4/09

Table 4: ANCOVA impact rhythmic games on decreasing of aggression mentally retarded children

Source changes	Sum of squares	Degrees of freedom	Mean square	test statistic	P	ETA	Ability test
effect of pre-test	1075/318	1	1075/318	43/629	0/0	0/618	1/000
effect of the independent	825/377	1	825/377	33/488	0/000	0/554	1/000

variable							
Error	665/463	27	24/647				
Adjusted total	2222/817	29					

Table 5: ANCOVA impact rhythmic games on decreasing of aggression children's learning

Source changes	Sum of squares	Degrees of freedom	Mean square	test statistic	P	ETA	Ability test
effect of pre-test	326/587	1	326/587	22/240	0/0	0/452	0/995
effect of the independent variable	230/609	1	230/609	15/704	0/000	0/368	0/968
Error	396/479	27	14/684				
Adjusted total	831/367	29					

Table 6: ANCOVA impact of video games on decreasing of aggression children with normal rhythmic

Source changes	Sum of squares	Degrees of freedom	Mean square	test statistic	P	ETA	Ability test
effect of pre-test	30/217	1	30/217	8/656	0/07	0/241	0/805
effect of the independent variable	32/812	1	32/812	9/301	0/005	0/256	0/836
Error	95/250	27	3/528				
Adjusted total	168/667	29					