

ISSN: 2456-0057 IJPNPE 2019; 4(2): 447-448 © 2019 IJPNPE www.journalofsports.com Received: 10-05-2019 Accepted: 12-06-2019

#### M Parthiban

Ph.D. Scholar, YMCA College of Physical Education, Chennai, Tamil Nadu, India

Dr. S Johnson Preamkumar Assistant Professor, YMCA College of Physical Education, Chennai, Tamil Nadu, India

# Effect of aqua therapy exercises on behavior: Hyperactivity & impulsivity among person with ADHD

# M Parthiban and Dr. S Johnson Preamkumar

#### Abstract

Purpose of the study was to facilitate the Effect of aqua therapy exercises on Behavior - Hyperactivity & Impulsivity among person with ADHD, for this study thirty (N=30) male subjects with special needs were randomly selected from Deepam and AGAPAE special school in Chennai with 18-25 years of age. They were randomly divided in to two equal groups of fifteen (n=15) subjects each. Those two groups have named as experimental and control group. Experimental group underwent aqua therapy exercises for the period of twelve weeks and for the control group no training was given. Behavior - Hyperactivity & Impulsivity was selected as dependent variable and independent variable was aqua therapy exercises. The data was collected before and after the experimental treatment period. Analysis of Covariance (ANCOVA) test was used in this study as statistical technique. It was concluded that Behavior - Hyperactivity & Impulsivity was significantly altered to PERSON WITH ADHD due to the influence of twelve weeks practices of aqua therapy exercises to comparing the control group.

Keywords: Aqua therapy, hyperactivity, impulsivity, ADHD

### Introduction

For children with hyperactivity, physical activities are not the only aspect. Their minds down. To help a child learn to manage or reduce hyperactivity includes strategies to help lower physical activity levels and to calm thoughts. Because of their behavior adaptations are needed in physical education in order to ensure enjoyment and success. Creative adaptations can alter recreation activities and programs, thus meet the unique needs and provide fun and healthy exercise for all participants. Developing a new game or modify an already existing game to accommodate children with ADHD, it was important to apply a few basic principles. Apart from creativity of a game or modification of a game, if the activity did not child as a structured form of Adapted games in water considered as a support to reduce the symptoms of ADHD. Adapted water games have no definite rules as they are self-created by the individual and and psychological development. It could be purely recreational as well as precious tools for learning social relations. The purpose of study was to find out the effect of aqua therapy exercises on Behavior - Hyperactivity & Impulsivity among person with ADHD.

# Methodology

For this study thirty (N=30) male subjects (18-25 years of age) with special needs were randomly selected from Deepam and AGAPAE special school in Chennai and their Age ranged between male. They were randomly divided in to two equal groups of fifteen (n=15) subjects each. Those two groups have named as experimental and control group. Experimental group underwent aqua therapy exercises for the period of twelve weeks and for the control group no training was given. Behavior - Hyperactivity & Impulsivity was selected as dependent variable and independent variable was aqua therapy exercises. The data was collected before and after the experimental treatment period. Analysis of Covariance (ANCOVA) test was used in this study as statistical technique.

#### Result

The following table illustrated the statistical results of the effects of aqua therapy exercises on Behavior - Hyperactivity & Impulsivity of person with ADHD.

## Correspondence M Parthiban

Ph.D. Scholar, YMCA College of Physical Education, Chennai, Tamil Nadu, India

Table 1: Computation of Analysis of Covariance of Behavior - Hyperactivity & Impulsivity

Test	Con. Group	Exp. Group	SV	SS	df	MS	F
Pre test	15.13	15.53	between	1.20	1	1.200	1.07
			within	31.47	28	1.12	
Post test	15.33	11.07	between	136.53	1	136.53	105.41*
			within	36.27	28	1.30	
Adjusted	15.43	10.97	between	143.37	1	143.37	132.09*
			within	29.31	27	1.09	
Mean gain	-0.20	4.47					

<sup>\*</sup>Significant-Table F-ratio at 0.05 level of confidence for 2 and 28 (df) =4.21.

Taking into consideration of the pretest mans and post test means were determined and analysis of covariance was done and the obtained post test F valve 105.41 was grater than the required value of 4.21 and hence it was accepted that the aqua therapy exercises significantly altered the Behavior - Hyperactivity & Impulsivity among person with ADHD at 0.05 level.

# Discussion on the Findings of Behavior - Hyperactivity & Impulsivity

The result revealed that the Behavior - Hyperactivity & Impulsivity of experimental group (aqua therapy exercises) was significantly decreased than the control group and it is due to the effects of adapted physical activity.

#### **Conclusions**

It was concluded that person with ADHD Behavior -Hyperactivity & Impulsivity was significantly altered due to the influence of twelve weeks' practices of aqua therapy exercises when comparing to the control group.

#### Reference

- Bhavanani AB, Ramanathan M, Kt. H. Immediate effect of Mukha Bhastrika (a bellows type pranayama) on Reaction Time in Mentally Challenged Adolescents. Indian Journal of Physiology Pharmaco. 2012; 56(2):174-90
- Samantha Mae Rose, Kathleen R Bogart, Samuel W Logan, Layne Case, Jeremiah Fine, Hanna Thompson. Physical Activity Participation of Disabled Children: A Systematic Review of Conceptual and Methodological Approaches in Health Research. Front Public Health. 2016; 4:187.
- Centers for Disease Control and Prevention. (2014, August 25). Physical Activity. Retrieved on 2015, May 6 from http://www.cdc.gov/physicalactivity/everyone/ guidelines/index.htm.
- Kornatovska Z, Trajkova A. Availability, organization and health-social benefits of physical activities in disabled children -- A comparative study of 2 regions in bulgaria and the Czech Republic. Rozprawy Naukowe. 2012; 3:919-30.
- Lang R, Koegel LK, Ashbaugh K, Regester A, Ence W, Smith W. Physical exercise and individuals with autism spectrum disorders: A systematic review. Research in Autism Spectrum Disorders. 2010; 4:565-576. DOI: 10.1016/j.rasd.2010.01.006
- 6. Tyler K, Cook NM, Macdonald M. Physical activity and children with disabilities. Palaestra. 2014; 28(4):17-22.