

**MENTAL REHABILITATION BASED ON POSITIVE THINKING SKILLS  
TRAINING ON INCREASING HAPPINESS HEARING-IMPAIRED ADOLESCENTS**

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**ABSTRACT**

Hearing impairment can have an impact on adolescent's quality of life and cause them to sustain depression and isolation. Therefore, the main purpose of this research is to study the effectiveness of positive-thinking skills training on increasing happiness in a group of hearing-impaired girls and boys. This research is an experimental study that uses a pre test and post test plan with a control group. The statistical community of this research is hearing-impaired students (girls and boys) in high schools of the southern parts of Tehran, during the year 2012-2103. Altogether, 48 hearing-impaired girls and boys were selected using a 2-stage sampling method. They were randomly assigned to 2 groups: the experimental group and the control group. Each group consisted of 12 students comprising boys and girls. Positive thinking skills training were given to experimental groups during eight 45-minute sessions, twice a week. We used the Oxford happiness questionnaire as our tool in this research. Results from analysis of ANCOVA, showed that positive-thinking skills training had meaningful and positive effect in increasing happiness of hearing-impaired boys and girls in the experimental groups ( $p < .001$ ). Positive-thinking skills training increases the happiness scores of hearing-impaired adolescents. Hence, the approach taken in this study can be considered as an appropriate method for psychological-education interventions and counselling and therapeutic intervention in hearing-impaired adolescents.

**KEYWORDS:** Mental rehabilitation, Positive-thinking skills, Hearing-impaired adolescents, Happiness.

**INTRODUCTION**

The National Association of Deaf (NAD) defines the term "deaf" as persons who are incapable of hearing well enough to trust their hearing and to apply it as a means of processing information. Approximately 1: 2700 children are born deaf (Patel, 2010). The prevalence rises to approximately 1:1000 to 6:1000, when children who sustained hearing

impairment in the first year of life are added to the statistics. The majority (95%) of these children are born in families without any prior experience of deafness. These statistics are true in all countries (Movallali & Nemati, 2009).

The impact of initial onset of hearing impairment on these children's development can be seen in psychological, social, medical, and cultural terms. Deafness can affect the quality of life of hearing-impaired people, and it lead to social isolation and depression. In other words, hearing impaired can cause privation or delay in social development. Communication barriers and low ability to express demands and needs may cause a person to give up interests and activities and this predisposes them to mental health problems, especially depression. Hearing-impaired adolescents are more vulnerable to mental health problems than hearing children. The pervasiveness of mental health problems in community of deaf children is approximately 40% and rates of behavioural and emotional problems in deaf children are about two times higher than hearing children (Hindley, 2005). Research on the psychological characteristics of hearing-impaired individuals in Iran is limited, however globally; the fact that people with hearing impaired have depression is confirmed. For example, research shows that more hearing-impaired children have reported of having depression than children with normal hearing (Theunissen, Rieffe, Netten, Briaire, Soede, Schoones, & Frijns, 2014).

One of the important psychological aspects of life is happiness. Happiness is one of the most common areas of research in positive psychology, which has recently been widely studied in the field of child and adolescent population (Stewart, Watson, Clark, Ebmeier, & Deary, 2010). Happiness is identification and nurture of the most basic abilities and using them in love, in parenting, and in everyday work. It is the abilities and virtuous acts that can be a shield against evil and psychological disorders, and can be a key to recovery (Kobau, Seligman, Peterson, Diener, Zack, Chapman & Thompson, 2011). Happiness has three main components, namely the amount and degree of positive affect, the lack of negative emotions such as depression and anxiety, and the average level of satisfaction within a particular period in life (Stewart et al., 2010).

In the teaching of optimism and positive thinking skills, students are encouraged to recognize their good and positive experiences and their role in promoting self-respect and self-esteem. In addition, they are also encouraged to acquire the ability to identify the positive aspects of others. Furthermore, they also learn that to take an active stance in the world and shape their lives personally, rather than passively accepting everything that comes upon them (Seligman & Csikszentmihalyi, 2000). This research found that positive moods are effective in reducing

and relieving depression. Studies have also shown that children who have received optimistic thinking and behaviour skills training have decreased their rate of depression by 50% (Seligman & Csikszentmihalyi, 2000). Similarly, by empowering optimism and hope skills, depression in children who are at risk, can be prevented (Kobau et al., 2011). Moreover, in a psychotherapy intervention with a clinically depressed population, Seligman, Rashid, and Parks found that identifying one's signature strengths and finding ways to use them more, led to clinically significant and sustained decreases in depression (Seligman, Tayyab, Parks, & Acacia, 2006). Likewise, a study entitled "The Use of Positive Psychology in Psychotherapy" showed that interventions based on promoting positive perceptions of the self, increases positive self-describing and clients have attained more confidence, families have their conflicts reduced, clients have their depression improved (Khodayarifard, 2000). Given the debilitating nature of the hearing impaired, the low mental health indicators found in this large group, as well as the lack of studies on happiness among hearing-impaired adolescents, providing an intervention that takes happiness in hearing-impaired adolescents into consideration is vital. Therefore, the main purpose of this study is to investigate the effectiveness of positive thinking skills training on increasing the happiness of hearing-impaired adolescents.

## **MATERIALS AND METHODS**

In this study experimental research design with pre test, post test and control group was used. It was among high school students of Tehran in 1391-1392 academic years. Forty eight students (24 girls, 24 boys) were selected via two-stage sampling includes: purposive sampling (students who their happiness score was lower than average 40-42) and random sampling (randomly assigned to experimental and control groups). Thus, each of the 24 students (girls and boys) randomly and equally assigned to experimental and control groups. It should be noted that the sample selection is determined based on weekly group (8-15 people) with a leader who provides a good opportunity for member's interaction. The leader also organizes the minimum time for personal activities and creative the positive feeling of beings in a group.

### **Instrument**

The Oxford Happiness Questionnaire: This test has been made by Miles Argyle in 1989 based on Beck Depression Inventory (BDI). This inventory has 29 items. Each item of happiness questionnaire has four options that subjects must choose one of them according to

its current state. Each item is rated from 0 to 3 that minimum of total score is 0 and maximum is 87. Argyle and colleagues, using Cronbach's alpha coefficient reported reliability of the tests 0.90. They reported retest reliability 0.78 during 7 weeks(Argyle & Lu, 1990a1990b). Also in other studies Cronbach's alpha of the questionnaire was equal to 0.93 and the internal consistency of OHI, for men and women are respectively 0.94 and 0.90. Retest reliability after 7 weeks was 0.78 and test-retest reliability with an interval of three weeks in 25 subject sample was 0.79(Bayani, 2008).

### **Intervention**

After coordinating with the educational centers of Tehran, Oxford Happiness Questionnaire was carried out among 100 high school students. Forty eight adolescents(24 girls, 24 boys) who their happiness score was lower than average (40-42) were selected. Thus 24 students (girls and boys) randomly and equally assigned to experimental and control groups. Students were 15 to 18 years old and hadn't a history of psychiatric hospitalization and drug abuse. In the next step we asked teachers specializing in hearing impaired who to be co-researcher in this study. Positive thinking skills carried in eight 45-minute sessions (twice a week) for hearing impaired adolescents. At the end sessions, past test was conducted. Then, SPSS software and ANCOVA as statistical method was used to analyze and evaluate the data.

### **Therapeutic package**

**Session one:** Members familiar with each other and the nature and purposes of the program, administering conditions and duration for the group was introduced.

**Session two:** Everyone can write down on a piece of paper about their strengths. Obviously it needs to be done with focus.

**Session three:** Everyone thinks about at least five good experiences or memories and writes down their headers.

**Session four:** Everyone determines the relative importance of the strengths that mentioned in the first and second sessions in order to priority. Then among the points raised, they can choose 5 to 8 strengths points. This is reliable capabilities and provides evidence that his valuable strengths are reliable

**Session five:** Each member tells his first memories or positive experience. This is repeated for all group members so that each member will tell all memories written. When one of the group members is expressing his positive experience, the rest of the members write down the

positive points in the speaker's memory explanation and make a list. Obviously, there should be eye contact while listening.

**Session six and seven:** Continue recounting memories.

**Session eight:** Each member will take the list of his positive points and compares with provided positive points at the beginning of the period and comes up to common points. At the end, the members achieve a newer understanding of them and discuss the ways using their positive points in the future(Kobau et al., 2011).

## RESULTS

Table 1. Levine's of Equality of Error Variances

Significance level	Degree of freedom 2	Degree of freedom 1	F
.764	44	3	.385

Table 2. Mean and Standard Deviation of the Experimental and Control Groups at Pretest and Post test

Variable	Groups	Pretest		Posttest		Total of pretest	Total of posttest
		N	M SD	M SD	M SD	M SD	
<b>Boys</b>	experimental	12	36/25 1/48	51/33 1/43	36 1/38	44/49 9/28	
	Control	12	35/75 1/28	37/66 5/15			
<b>Girls</b>	experimental	12	32/16 1/02	45/08 2/99	32/04 1/16	38/70 7/87	
	Control	12	31/91 1/31	32/33 1/43			
<b>Total</b>	experimental	24	34/202/01	48/35 4/35	34/02 2/15	41/59 9/09	
	Control	24	33/832/33	35/00 4/59			

Table 3. ANCOVA Test of Between-Subjects Effects

Source of variance	Degree of freedom	mean of square	F
<b>Significance level</b>			
<b>Covariate (pretest)1</b>	20.71	2.24	0.141
<b>Sex1</b>	270.6928.03	0.000	
<b>Group (posttest)1</b>	292.88	303.220.000	
<b>Error</b>	439.656		
<b>Total</b>	48		

According to Table 3 the intervention with elimination and neutralization of the covariate is statistically significant (f: 303.22,  $p < 0.001$ ). In other words positive thinking skills program has effect on experimental group.

## DISCUSSION

One of the strategies that have shown to increase happiness successfully over longer periods includes using one's character strengths in new ways (Kobau et al., 2011). The main purpose of this research is to study the effectiveness of positive thinking skills training on increasing happiness in hearing-impaired adolescents. After conducting positive thinking skills intervention programmes for physically disabled students in eight sessions, and the administering of questionnaires of happiness in the pretest and posttest, the results indicated that there was a significant difference between the experimental group and control group. To explain the effects of happiness on the pretest scores, one can conclude that the difference was caused by the independent variable in the experimental group. In other words, because positive thinking skills training was conducted only on the experimental group, whereas the control group did not receive any training, this training programme has led to increase the happiness of physical or motor-disabled students in the experimental group. The results showed that the students were encouraged through positive thinking skills to recognize their positive and good experience, their role in promoting self-respect and self-esteem, and the positive aspects of others. As previously mentioned, they learn to shape their lives personally and to take a stance in this world, and not to accept the things that happen to them passively (Seligman & Csikszentmihalyi, 2000). Additionally, due to their weakness in communication skills and their having difficulties in expressing their feelings and experiences, hearing-

impaired adolescents have little opportunity to discuss and identify their abilities and capacities. Therefore, this opportunity was provided at the position groups. The hearing-impaired juveniles felt that they were in an atmosphere of respect, thus they were able to express their feelings and experiences. Then, they also received feedbacks from other group members. The process which used positive psychology reveals the strengths of the adolescents; thus their happiness and other mental components such as self-esteem increased. Unfortunately, no similar research has been done in this field. However, the results from this study are consistent with those of Khodayarifard (2000); Kobau et al., (2011); and Seligman et al., (2006). Overall, training in positive thinking has succeeded in increasing 12 scores of happiness for girls and 15 scores for boys. Therefore, the method used in this study can be considered as an appropriate method for psychological-educational interventions, counselling and therapy in hearing-impaired adolescents and emotional disorders such as depression, movement, stress, and anxiety disorders. Findings of this research can be used in psychological intervention and counselling for depression prevention, in boosting self-esteem and educational improvement of children through emphasizing on their positive points.

## **CONCLUSION**

Positive-thinking skills training increases the happiness of hearing-impaired adolescents. Therefore, this approach can be considered as an appropriate method for psychological-educational interventions, counselling and therapeutic programmes in male adolescents with physical-mobility disability.

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