The impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of high school Female students

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Abstract

The current applied, quasi-experimental study adopted a descriptive –survey approach with pre-test/post-test design with a control group. The statistical population included 3400 high school students in Babol, Mazandaran, Iran, in the academic year of 2020-2021, among whom 30 people were selected (15 people in the experimental group, 15 people in the control group) using cluster random sampling method. Data collection tools were Smith (2014) Anger Management Training Package, Bar-On's (1980) Standard Emotional Intelligence Questionnaire, Miller & Lefkourt (1982) Social Intimacy Questionnaire, and Younesi (2004) Deterministic Thinking. The validity of this questionnaire was confirmed by experts and the reliability of the questionnaires were calculated through Cronbach's alpha coefficient including emotional intelligence model as 0.90, social intimacy as 0.89 and deterministic thinking as 0.90 percent. For data analysis, the descriptive statistics (mean and standard deviation) and the inferential statistics (Kolmogorov-Smirnov tests, the multivariate analysis of covariance (MANCOVA) for the main hypothesis and the univariate analysis of covariance (ANCOVA) for the sub-hypotheses were used using $Spss_{22}$ software. The results showed that anger management training had an impact on emotional intelligence, social intimacy and deterministic thinking of high school students in Babol. It also showed that anger management training prevented students from increasing their physical and mental arousal during aggression.

Keywords: Anger Management, Emotional Intelligence, Social Intimacy, Deterministic Thinking.

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Introduction:

Considering the world around us designates that the behavioral problem of anger is observed among all different types of living beings, societies, socio-economic classes and different age related stages. However, what seems to be important is the severity and type of symptoms of such behavioral disorder among its different types. Anger-related issues such as coping behaviors, hostility and aggression are the main reasons for adolescents and children to refer to counseling and psychotherapy centers (Ghasemi, 2019). Emotional intelligence measures people's ability to recognize and control emotions in themselves and others, and allows us to think more creatively and use our emotions to solve problems. Therefore, the combination of management knowledge and management skills can be applicable and effective in leading people to achieve the goal, and social intelligence is one of the key components that can play an impressive role in managers' relationships with members of the organization (Faramarzi, 2019). Another variable under consideration is the social intimacy. Students with less anger are more willing to engage in intimate social relationships. In such situations, the cognitive-behavioral approach challenges incorrect thoughts and attitudes and tries to promote social behaviors, increase intimacy and positive relationships with the individual by teaching coping techniques, internal dialogue, and problem-solving strategies (Bavi, 2019). One of the salient characteristics of human beings is the power of thinking and intellectuality. In this research, a type of thinking called

deterministic thinking has been selected. Deterministic thinking is a kind of distortion based on the belief that in the current world the we live, no two equal things can be found and what has been considered equal in mathematics and other basic sciences is nothing except something at the state of mind and mentality (Kopayehiha, 2013). Ideally, the school is a place to acquire knowledge and shape the students' positive personality. Educational organizations are one of the most important, effective and extensive organizations that are responsible for the formal education of community members as well as providing human resources to other organizations. (Barkhoda, 2020). Students 'perception of school is one of the most important indicators of school and teachers' effectiveness, so it should not be surprising if students' satisfaction is greatly influenced by their experiences in the classroom and school, and since teachers and school officials are responsible in this regard, students' satisfaction can be considered as an indicator of their effectiveness (Marufi and Mohammadi, 2019). One of the features that should be developed in school is the ability to deal with anger. The ability to deal with anger is an essential trait. Without such a trait, adolescents will have destructive behavior toward themselves and others (Hernanawati et al., 2017). Anger is an indication of aggression, violence, and many behavioral disorders. Aggressive behavior during adolescence is a risk factor for adult violence and delinquent behavior. If adolescent anger is not controlled, consequences such as death from suicide, murder, and injury are inevitable. Anger is associated with violence,

cognitive distortion and physical and verbal aggression (Shokoohiyekta et al., 2019). Among the various approaches to anger management in the last two decades, the cognitive-behavioral approach has attracted so many researchers in the field. Cognitive-behavioral approach emphasizes the important role of thinking and interpreting experiences, which has a significant impact on emotions, actions and overall cognitive function of individuals, although at this stage aggression is not aroused but there is a desire in the individual to let these unpleasant conditions end (Khankesh et al., 2020). In fact, anger management does not seek to remove anger; but rather, it strives to encourage cognitive, emotional, and behavioral self-monitoring which is one of the applications of self-control. Therapists aim to increase awareness of the symptoms of hostile primary arousal and train their control techniques in order to reduce the likelihood of aggressive behaviors (Naseri-Fodafan et al. 2018). In recent years, the issue of emotional intelligence has been used to organize the efforts used to teach the various types of skills needed by students and to create self-monitoring capabilities and the development of social relationships. The teaching of discontinuous skills, such as social problem-solving and conflict, extends to areas organized around social change issues. The term emotional intelligence is used in many cases to explain individual differences related to life success that are not specifically measured by traditional intelligence scales (Gholizadeh Tehrani et al. 2017). One of the important variables in anger management perspective is social intimacy. Intimacy is one of the important features of interpersonal relationships in

early adulthood. Erickson considered intimacy tasks as a key factor in the transition from adolescence to adulthood (Daneshvarpour et al., 2007). According to Burke, intimacy is seen in close interpersonal relationships such as relationships with parents, close friends and spouse (Daneshvarpour, 2006).

In addition, the signs of the ability to be intimate is the desire to participate in close, warm, communicative and committed interactions that play a key role in a successful and productive adult life. "Social intimacy" is the desire to participate in a supportive and loving relationship without the loss of "-self" in that relationship (Sarikhani, 2012). Deterministic thinking is considered as the mother of cognitive distortions and other cognitive distortions also start from this point and after being confirmed in this main channel (mother of all distortions), they enter other sub-channels in the mind. Deterministic thinking is a kind of distortion that equates an event or thing with something else, and has a positive relationship with anxiety and depression, as well as a negative relationship with life expectancy. For example, thoughts such as passing the national entrance exam equals happiness, failing the national entrance exam equals misery; beauty in the face equals the continuation of marriage, lack of beauty in the face equals non-continuation of marriage; or marriage equals restriction, non-marriage equals freedom, and dozens of others are examples of such distortion that many people use on a daily basis, regardless of the fact that their certainties affect their relationships. They are harmful to the environment and even to themselves (Kopayeh et al., 2013). Today, anger control interventions have become very important. The goal of anger control treatment and interventions is to

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reduce emotional feelings and physiological arousal caused by anger, to increase people's awareness of anger and to teach effective methods and strategies to control it. In fact, anger management is not about getting rid of anger, but about self-cognitive, emotional, and behavioral monitoring, which is one of the applications of self-control (Shkohi-Yekta et al., 2018). Emotional intelligence, as a phenomenon of interest, has not only a psychological theoretical aspect, but by promoting it in the field of practice, one can find suitable answers for many hidden problems of life. If a person benefits from a high emotional intelligence, he can better adapt to the challenges of his personal and social life and manage his emotions effectively, and as a result, provide the basis for increasing his physical and mental health (Qolizadeh Tehrani et al., 2016). One of the types of cognitive errors is cognitive distortion called deterministic thinking. Deterministic thinking causes distortion of facts, and in fact, it is the mother of cognitive distortions, and all cognitive distortions originally come back to this distortion. It is also a type of cognitive distortion that considers an event or matter to be equal to something else with certainty (Qazalfsalo et al., 2013). Social intimacy is very important in close interpersonal relationships such as the relationship with parents. Since intimacy is the capacity for two-way openness, participation in relationships with others and mutual trust. The evidence shows that the ability to establish sincere relationships with others is considered one of the psychological well-being of people. Social intimacy leads to the strengthening of the sense of personal identity even at the beginning of adolescence and before the establishment of identity (Mirqbad Khodarahmi et al., 2018). Considering the importance of the impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of primary school students in Sari city, and considering that no research has been done in this regard so far, it was necessary to conduct this research, one of the immediate results of the research is to identify the impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of primary school students in Sari city. Among the future results of the research, providing solutions and guidelines to the officials and those involved, in order to strengthen and develop the impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of students and covering their weak points can be mentioned. Therefore, the results of the research can be used practically by all students, teachers, students for research work and others interested in this research field.

Students with less anger are more willing to engage in intimate social relationships. In such situations, the behavioral-challenging approach challenges misconceptions and attitudes and seeks to enhance emotional intelligence, social intimacy, and deterministic thinking by teaching coping techniques, internal dialogue, and problem-solving strategies. Considering the importance of anger management training on emotional intelligence, social intimacy and deterministic thinking of high school students in Babol, and considering that no research has been done in this regard yet, it was necessary to conduct this research. The study sought to identify the impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of high school students in Babol. Therefore, the present study aimed at answering the question of whether anger

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management training had any impact on emotional intelligence, social intimacy and deterministic thinking of high school students in Babol. The following hypotheses were also proposed in line with the research objectives:

1. Anger management training has an impact on students' emotional intelligence.

2. Anger management training has an impact on students' social intimacy.

3. Anger management training affects students' deterministic thinking.

Methodology:

The current applied, quasi-experimental study adopted a descriptive–survey approach with pre-test/post-test design with a control group. The statistical population of this study was 3400 high school students in Babol, Mazandaran, Iran, in the academic year of 2020-2021. In this study, 30 people (15 people in the experimental group, 15 people in the control group) were selected as the statistical sample using cluster random sampling. First, the students were divided into two groups (control and experiment). Students in both groups were given questionnaires of emotional intelligence, social intimacy and determinative thinking as pre-test and were asked to complete the questionnaires. After completing the questionnaires, the control group received traditional teaching trainings and the experimental group was taught the anger management training method in 12 sessions. At the end of the training sessions, students in both control and experimental groups were given questionnaires of emotional intelligence, social intimacy and

deterministic thinking for the second time as the post-test. They were asked to complete the given questionnaires according to the training they received. The responses were then analyzed as data in the software. Therefore, the following tools were used to conduct the research.

Anger Management Training Package: In this study, a revised version of the fireworks intervention program (Smith, 2014) was used to train anger management. This program offers a cognitive-behavioral approach with an emphasis on the relationship between adults and children, a multiple educational model in the field of anger management. In the review phase, the effectiveness of anger management training on depression, anxiety and stress was adapted to the Iranian and Islamic culture. The validity of this educational package on the relationship between parents and children was confirmed in several studies; (Shokoohi Yekta and Zamani, 2008; Shokoohi Yekta, Zamani and Ahmadi, 2011; Shokoohi Yekta, Zamani, Parand and Akbari Zardkhaneh, 2011 and Shokoohi Yekta, Zamani and Parand, 2010). This program consisted of three components: 1- Conceptualization: training on the nature of anger and how people reacted to it. Such training was conducted by discussing the person's angry experiences in the past. 2- Acquiring skills and practice: Using coping strategies with a cognitive-behavioral approach. At this stage, the person practices the learned skills under the therapist, and 3- Application and follow-up: This component included the application of the learned skills in real life. To reach this stage, the person was faced with anger-provoking situations. Changing and replacing new perceptions is a

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key component of anger management program. In fact, according to cognitive theory, anger is the result of people's thinking patterns and expectations, and changing the thinking patterns avoids violence. Another cognitive technique for controlling anger is how to record anger. The person was encouraged to write down anger-provoking events and to identify and write down their perception of the angry event. In addition to cognitive reconstruction, participants also learned and practiced anger management behavioral sub-skills that enabled them to function appropriately when confronted with anger-provoking situations.

Emotional Intelligence Questionnaire: This questionnaire was developed by Bar-On in 1980, which assesses people's emotional intelligence and includes 15 components that are: problem solving, happiness, independence, stress tolerance, self-fulfillment, emotional self-awareness, realism, Interpersonal relationships, optimism, self-esteem, impulse control, flexibility, social responsibility, empathy and self-expression. This questionnaire consists of 90 questions and its scoring is based on the Likert scale method. The total score of each scale is equal to the sum of the scores of each of the questions on that scale and the total score of the test is equal to the sum of the scores of 15 scales. The minimum and maximum scores for each component are 6 and 30, respectively, and for the whole test, they are 30 and 450, respectively. Achieving a high score in this test indicates the success of the individual in the desired component or in the whole test.

Social Intimacy Questionnaire: This questionnaire was designed by Miller and Lefkourt (1982) to assess the intimacy received from different relationships which includes 17 questions in 2 components. The scale questions were developed through organized interviews in which participants discussed the role of intimacy in all of their relationships, including relationships with friends, acquaintances, and family members. This scale includes two groups of questions, of which 6 questions are dedicated to the psychological description of intimacy and the other 11 questions are devoted to the intensity of intimacy experienced at the present time. All questions are answered on a 10-point Likert scale. Questions 2 and 14 are reversed and the rest of the questions are scored on a 10-point scale (from "1" very rarely/low to 10- almost always / high). The validity of the questionnaire was confirmed by experts and a reliability of 0.86 percent was reported.

Deterministic Thinking Questionnaire: This questionnaire is a researcher-made questionnaire that was developed based on theoretical foundations related to cognitive theories (Younesi, 2004) as well as the clinical experiences (Younesi, Asgari and Bahrami, 2008). This scale has 36 questions and includes five components of 1) general determinism, 2) determinism in interaction with others, 3) philosophical absolutism, 4) determinism in predicting the future, and 5) determinism in negative events which is scored by the 4-point Likert scale (from 1 for the option "I completely agree" to 4 for "I strongly disagree"). Thus, the higher a person's score is on the scale, the more certain he is. In Farhadi's (2014) research, the content validity of this questionnaire was approved by supervisors and consultants and several experts and had the necessary validity

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requirement. Reliability in Younesi and Bahrami's (2008) research was 0.821 through internal consistency coefficient and 0.78 through test-retest method with one-week interval.

Validity

Considering the fact that the questionnaires are standard and have been used many times in various local and foreign studies, but to be more sure, several copies of the questionnaires were provided to several experts and specialists, including the advisor and consultant. After receiving the comments and making the necessary corrections, its validity and content were confirmed.

Findings

Analysis of covariance was used to investigate the research hypotheses related to the impact of anger management training on emotional intelligence, social intimacy and deterministic thinking of high school students in Babol. The analysis of covariance test allows the researcher to examine the effect of an independent variable on dependent variables and eliminates the effect of other

Reliability

Due to the fact that the questionnaires are standard, their validity has been confirmed in various domestic and foreign studies, but in order to ensure the reliability of the questionnaires, 20 questionnaires were available to educators, as the first grade students cannot fill the questionnaire. After completing the questionnaires, using internal consistency method and using Cronbach's alpha coefficient, the reliability of emotional intelligence questionnaires was equal to 0.90, social intimacy was equal to 0.89 and deterministic thinking was equal to 0.90 showing that the questionnaires had a relatively high reliability.

variables. Before performing the analysis of covariance, its hypotheses were first examined and confirmed. Prerequisites for performing covariance analysis such as normality, homogeneity of variance, random sampling and regression line coefficients are equal or independent and auxiliary variables do not interact with each other

Test of normality

Table 1: Evaluation of normality of research variables using Kolmogorov-Smirnov test (k-s)

	Variables	Z score	Sig.
pretest	Emotional Intelligence	0.338	0.059
	Social Intimacy	0.177	0.20
	Deterministic Thinking	0.184	0.183
Posttest	Emotional Intelligence	0.196	0.124
	Social Intimacy	0.163	0.20
	Deterministic Thinking	0.173	0.20

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The scores in Table 1 show that the distribution of research variables is normal. Due to the fact that the distribution of research variables in pre-test and post-test was normal and the measurement scale of variables was interval, parametric analysis of covariance was used to analyze the data.

Homogeneity of variances

Table 2: Levene's test results to examine the homogeneity of variances

Levene's test	F value	df_1	df_2	Sig.
Emotional Intelligence	2.285	1	28	0.142
Social Intimacy	0.289	1	28	0.595
Deterministic Thinking	0.011	1	28	0.916

According to Table 2, the Levene's F value for equality of variances of research variables post-test in the experimental and control groups indicates that this value is not significant between the groups. That is, the research groups in the post-test scores of emotional intelligence, social intimacy and deterministic thinking have equal variance. Thus, another condition for performing the covariance test is established.

Homogeneity of regression line

Table 3: Results of analysis of variance to examine regression homogeneity

Variable	Source	Sum of squares	df	Mean squares	F	Sig.
Emotional Intelligence	*Pretest*	13502.298	2	6751.149	3.034	0.065
Social Intimacy	*Pretest*	769.196	2	384.598	2.180	0.132
Deterministic Thinking	*Pretest*	984.085	2	492.043	2.362	0.113

As shown in Table 3, based on the results of the test effects between subjects, the hypothesis of homogeneity of regression is not significant (P> 0.05). In other words, the slope of the regression line between the covariate variable and the dependent variable is the same at different levels of the independent variable (control and experimental group). Therefore, it is permissible to use the analysis of covariance model for research data.

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Main Hypothesis: Anger management training had an impact on emotional intelligence, social intimacy and deterministic thinking of high school students

Table 4: Results of analysis of covariance (MANCOVA)

Source		sum of squares (SS)	(df)	Mean square (MS)	F	sig	P
Emotional Intelligence pretest		11839.775	1	11839.775	2.880	0.102	0.372
Social Intimacy pretest		15.719	1	15.719	0.112	0.741	0.062
Deterministic Thinking pretest		3067.916	1	3067.916	3.868	0.060	0.473
Group	Emotional Intelligence	53934.487	1	53934.487	13.118	0.001	0.936
	Social Intimacy	1251.086	1	1251.086	8.877	0.006	0.817
	Deterministic Thinking	10482.223	1	10482.223	13.217	0.001	0.937
Error	Emotional Intelligence	102786.040	25	4111.442			
	Social Intimacy	3523.216	25	140.929			
	Deterministic Thinking	19827.480	25	793.099			
Total	Emotional Intelligence	175603.467	29				
	Social Intimacy	5166.700	29				
	Deterministic Thinking	42601.367	29				

As can be seen in Table 4, the impact of anger management training on emotional intelligence (P <0.05 and F = 13.118), on social intimacy (P <0.05 and F = 8.877) and on deterministic thinking (05 P <0.02 and F = 13/217) are statistically significant between the groups (control and experimental) after adjusting the means of the two groups based on the pre-test score. Therefore, it can be concluded that anger management training has an impact on emotional intelligence,

social intimacy and deterministic thinking of high school students in Babol. Considering the means of the two groups (Tables-1, 2 and 3), it shows that the score of the subjects in the experimental group in the post-test has increased compared to the control group.

Therefore, it can be concluded that anger management training has focused on students' emotional intelligence, social intimacy and deterministic thinking. Eta squared values in emotional intelligence,

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social intimacy and deterministic thinking are 0.936, 0.817 and 0.937, respectively. This means that 93% of the changes in emotional intelligence scores, 81% of changes in social intimacy scores and 94% of deterministic thinking scores are due to anger management training

Hypothesis 1: Anger management training has an impact on students' emotional intelligence.

Table 5: Results of covariance analysis (ANCOVA)

Source	sum of squares (SS)	(df)	Mean square (MS)	F	Sig.	P
Pretest	10941.224	1	10941.224	2.819	0.105	0.367
Group	.57158.00	1	57158.003	14.725	0.001	0.959
Error	104808.909	27	3881.811			
Total	175603.467	29				

As shown in Table 5, the value of F is significant for the difference between the groups (control and experimental) (P <0.05 and F = 14.725). This means that there is a significant difference (with pre-test factor control) between the emotional intelligence scores of the experimental and control groups. So the research hypothesis is confirmed. Considering the means of the two groups (Table 1), it is revealed that the score of the subjects in the experimental group in the post-test has increased compared to the control group. Therefore, it can be concluded that anger management training has increased students' emotional intelligence. The Eta squared value also shows that about 96% of the variance of students' emotional intelligence is explained through anger management training.

Hypothesis 2: Anger management training has an impact on students' social intimacy.

Table 6: Results of covariance analysis (ANCOVA)

Source	sum of squares (SS)	(df)	Mean square (MS)	F	Sig.	P
Pretest	33.108	1	33.108	0.233	0.633	0.075
Group	1239.089	1	1239.089	8.712	0.006	0.812
Error	3839.958	27	142.221			
Total	5166.700	29				

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As can be observed in Table 6, the effect of anger management training on social intimacy (P <0.05 and F = 8.712), after adjusting the means of the two groups based on the pre-test score, is statistically significant. Therefore, it can be concluded that anger management training has an impact on students' social intimacy. Considering the means of the two groups in Table (2), it is observed that the score of the subjects in the experimental group in the post-test has increased compared to the control group. Therefore, it can be concluded that anger management training has increased students' social intimacy. The Eta square value is equal to 0.81 indicating that 81% of the changes in social intimacy scores are due to the implementation of anger management training. In other words, anger management training has caused 81% change in social intimacy scores.

Hypothesis 3: Anger management training affects the students' deterministic thinking.

Table 7: Results of covariance analysis (ANCOVA)

Source	sum of squares (SS)	(df)	Mean square (MS)	F	Sig.	P
Pretest	2158.321	1	2158.321	2.058	0.163	0.283
Group	9389.988	1	9389.988	8.951	0.006	0.822
Error	28322.746	27	1048.991			
Total	42601.367	29				

As it is witnessed in Table 7, after adjusting the means of the two groups based on the pre-test score, the impact of anger management training on deterministic thinking (P <0.05 and F = 8.951) is statistically significant. Therefore, it can be concluded that anger management training has an impact on students' deterministic thinking. Considering the means of the two groups in Table (3) it is shown that the score of the subjects in the experimental group in the post-test, compared to the control group, has increased. Therefore, it can be concluded that anger management training has increased students' deterministic thinking. The Eta square value is equal to 0.82. meaning that 82% of the changes in deterministic thinking scores are due to the implementation of anger management training. In other words, anger management training has caused 81% change in deterministic thinking scores.

Discussion and conclusion

The average emotional intelligence score of the experimental group is 132.33 in the pre-test and 128.20 in the control group.

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Regarding the average score of behavioral problems of the experimental group in the post-test, i.e. after receiving the anger management training package, it has increased significantly to 165.00 and this score has reached 165.00 in the post-test from 132.33 in the pre-test. But the average of this score in the control group has reached from 128.20 pre-test to 133.80 post-test, which has slightly increased compared to the pre-test scores. The average score of social intimacy in the experimental group is 27.93 in the pre-test and 26.67 in the control group. Regarding the average social intimacy score of the experimental group in the post-test, i.e. after receiving anger management training, it has increased significantly to 42.67 and this score has reached 42.67 in the post-test from 27.93 in the pre-test. But the average of this score in the control group has reached from 26.67 before the test to 30.53 after the test, which has slightly increased compared to the pre-test scores. The average score of deterministic thinking in the experimental group is 47.07 in the pre-test and 46.67 in the control group. Regarding the average score of deterministic thinking of the experimental group in the post-test, i.e. after receiving anger management training, it has increased significantly to 83.33 and this score has reached 83.33 in the post-test from 47.07 in the pre-test. But the average of this score in the control group has reached from 46.67 before the test to 52.33 after the test, which has slightly increased compared to the pre-test scores.

Main hypothesis: Anger management training has an effect on emotional intelligence, social intimacy and deterministic thinking of primary school students in Sari city. The findings showed that the averages of the two groups based on the pre-test score are statistically significant. Therefore, it can be concluded that anger management training has an effect on emotional intelligence, social intimacy and deterministic thinking of primary school students in Sari city. But the averages of the two groups in the experimental group have increased in the post-test compared to the control group. Therefore, it can be concluded that anger management training has become a factor in students' emotional intelligence, social intimacy, and deterministic thinking. Hypothesis 1: Anger management training has an effect on students' emotional intelligence. The findings showed that there is a significant difference between the emotional intelligence scores of the experimental and control groups. It also shows that the test group's score has increased in the post-test compared to the control group. Therefore, it can be concluded that anger management training has increased the emotional intelligence of students. Hypothesis 2: Anger management training has an effect on students' social intimacy. The findings showed that the averages of the two groups based on the pre-test score are statistically significant. Therefore, it can be concluded that anger management training has an effect on the social intimacy of students. It also shows that the test group's score has increased in the post-test compared to the control group. Therefore, it can be concluded that anger management training has increased the social intimacy of students. Hypothesis 3: Anger management training has an effect on students' deterministic thinking. The findings showed that the averages of the two groups based on the pre-test score are statistically significant. Therefore, it can be concluded that anger management training has an effect on students' deterministic thinking. Also, the average of the two groups in the experimental group has increased in the post-test compared to the control group. Therefore, it can be

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concluded that anger management training has increased students' decisive thinking.

In examining the main hypothesis, the findings showed that anger management training has an effect on emotional intelligence, social intimacy and deterministic thinking of primary school students in Sari city. The obtained result is consistent with the research results of Khankesh et al. (2020), Baharond et al. (2019), Shekohi-Yekta et al. (2019), Abouyi-Mehrizi et al. (2010), Lok et al. In examining hypothesis 1, the findings showed that anger management training has an effect on students' emotional intelligence. The result obtained is consistent with the research results of Rezaei Dizgah et al. (2018), Qolizadeh Tehrani et al. (2017), Khodayari Fard et al. (2011), Dolov et al. (2019), Wu (2019) and Fakhreddin (2017). In examining hypothesis 2, the findings showed that anger management training has an effect on students' social intimacy. The obtained result is consistent with the results of the researches. In examining hypothesis 3, the findings showed that anger management training has an effect on students' deterministic thinking. The obtained result is consistent with the research results of Baharond et al. (2019), Sharifi et al. (2017), Nadimi (2015), Ghazlesflo et al. (2014), Stefan (2017), Mebler et al. In order to explain these assumptions, it should be said that anger management training creates self-monitoring in students, which makes them aware of warning signs and the use of muscle relaxation. This action prevents the increase of physical and mental arousal of students during aggression. The student anger management workshop, with emphasis on cognitive-behavioral strategies, affects the change of emotional intelligence, social intimacy and deterministic thinking towards the sources of anger and the correct understanding of its process. In these workshops, students understand negative and non-adaptive strategies for dealing with anger and practice positive coping with the emotion of anger by learning appropriate skills. Although the said workshop reduced the mean of depression, anxiety and tension in the present sample, this reduction was statistically significant only in the tension subscale.

References:

Abuie Mahrizi, M., Tahmassian, K. & Khoshkakanesh, A. (2010). The effect of anger management training on anger self-regulation skills and parent-adolescent conflicts in middle school girls in Tehran. Family Research Quarterly, Volume 6, Number 23, pp: 404-393. [In Persian]

Baharvand, I., Sudani, M.& Mansouri Kariani, R. (2019). Self-compassion and deterministic thinking as a mediator between attachment styles and depression: A model of path analysis of students of Shahid Chamran University of Ahvaz. Fifth National Conference on Recent Innovations in Psychology, Applications and Empowerment Focusing on Psychotherapy, Tehran, https://civilica.com/doc/922274. [In Persian]

Barkhoda, J. & Ahmadhidari, S.P. (2020). Social responsibility is a way to make schools more effective. Journal of School Administration, 8(4), 403-384. doi: https://doi.org/10.34785/J010.2021.252. [In Persian]

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Bavi, S. (2020). Comparison of the effectiveness of social competence training and social skills on social anxiety, social adjustment and social intimacy teenager boy. Scientific Journal of Social Psychology, 7(53), 37-46. [In Persian]

Daneshvarpour, Z. (2010) A study of the relationship between identity styles and social intimacy in male and female high school students in Tehran. Master Thesis, Tehran Teacher Training University.URL: http://socialworkmag.ir/article-1-462-fa.html. [In Persian]

Dolev, N., Goldental, N., Reuven-Lelong, A. & Tadmor, T. (2019). The Evaluation of Emotional Intelligence among Medical Students and Its Links with Non-cognitive Acceptance Measures to Medical School. Rambam Maimonides Med J. Apr, 10(2), 1-10.

Faramarzi, A. (2019). The Relationship between Emotional Intelligence and Social Intelligence with Entrepreneurship Skills and Creativity of Male Vocational Students in Region 2 of Tehran. Master Thesis, Islamic Azad University, Science and Research Branch, Department of Educational Management. [In Persian]

Ghazalsaflou, Mehdi; Mirahmadi, Leila and Jazayeri, Rizvan-Alsadat. (2014). The relationship between deterministic thinking and self-pity in master's students of Isfahan University. Journal of Rafsanjan University of Medical Sciences, Volume 13, pp: 1049-1060. [In Persian]

Ghezelseflo, M., Mirahmadi, L. & Jazayeri, R. (2015). Relationship between Deterministic Thinking and Self-

Compassion among Master Students in Isfahan University (2013-2014). JRUMS. 13 (11) :1049-1060. URL: http://journal.rums.ac.ir/article-1-2283-fa.html. [In Persian]

Gholizadeh Tehrani, N., Nourian, M. & Shahmohammadi, N. (2017). The impact of emotional intelligence instruction on emotional intelligent improvement in students of Islamic Azad University, Tehran Medical Branch in 2014-2015. MEDICAL SCIENCES. 27 (1) :32-39. [In Persian]

Hernanwati, L., Rahayu, R & Soejowinoto, P. (2017). Enhancing Indonesian high schools' understanding on anger management. International Journal of Economic Perspectives, 11(1), 1632-1638.

Khankosh, M., Amini Rarani, M., Nosratabadi, M. (2017). The Effect of Anger Management Training on Aggression of Labor Children in Isfahan. Socialworkmag. 2020; 9 (1) :24-31. [In Persian]

Kiani, M. & Milli, A. (2017). Determining the role of social intimacy in life satisfaction of married students: Cultural and social perspective in Kashan. Conference Title: International Conference on the Culture of Psychopathology and Education. [In Persian]

Kupayeh, M., Hosseini, A. & Razavi Nematullah, V. (2013). Investigating the Relationship between Definitive Thinking and Creativity and Emotional Creativity of Postgraduate Students in Public Universities in Tehran. Journal of Innovation and Creativity in the Humanities, Volume 3, Number 1, pp: 200-175. [In Persian]

Lök, N., Bademli, K. & Canbaz, M. (2018). The effects of anger management

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education on adolescents' manner of displaying anger and self-esteem: A randomized controlled trial. Archives of Psychiatric Nursing, 32(1), 75-81. [DOI:10.1016/j.apnu.2017.10.010] [PMID].

Maroofi, Y. & Mohammadi, M. (2019). The moderating role of learning climate on the impact of quality of school life on student self-efficacy. *Journal of School Administration*, 7(4), 120-100. doi: https://doi.org/10.34785/J010.1398.208. [In Persian]

Mirqabad Khodarahami, Sahar; Mr. Joshughani, Asghar and Golparov, Mohsen. (2019). The effect of special psycho-social skills training of runaway girls on their social intimacy and feeling of loneliness, Isfahan welfare organization. Scientific journal of education and evaluation, year 12, number 45, pp: 71-84. [In Persian]

Nadimi, M. (2015). The Relationship between Communication Skills and Definitive Thinking with Marital Satisfaction. Third International Conference on Psychology and Social Sciences, Tehran, https://civilica.com/doc/435544. [In Persian]

Naseryfadafan, M. & Noohi, S. (2018). Effectiveness of anger management intervention with cognitive-behavioral approach and gradual muscle relaxation on the quality of marital relationship and moral anxiety of married males' substance abusers with a three month follow-up. *Journal of Applied Psychology*, 12(1), 63-82. [In Persian]

Plusnin, N., S. Kashima, E. & Pepping, C. A. (2020). Romantic intimacy and terror management: Examining the mediating roles of felt security, relational self-esteem, and relational worldview defense. https://doi.org/10.1177/ 0265407 520947820.

Qasemi, S. (2019). The effectiveness of anger management skills on emotion control and anger expression among first grade students in Sari. Master Thesis, Islamic Azad University, Sari Branch, Department of Educational Management. [In Persian]

Qholizadeh Tehrani, Neda; Nooryan, Mohammad and Shah-Mohammadi, Nireh. (2017). The effect of emotional intelligence training on improving emotional intelligence in students of Islamic Azad University, Tehran branch of medicine in 2013-2014. Journal of Medical Sciences of Islamic Azad University, Volume 27, Number 1, pp: 32-39. [In Persian]

Rezaei Dizgah, M., Mehrabian, F. & Janipour, M. (2018). The effect of emotional intelligence on job satisfaction with regard to the mediating role of burnout, emotional effort, emotional disharmony, depersonalization and lack of personal success in the staff of Guilan University of Medical Sciences. Occupational Health and Safety Quarterly, Volume 8, Number 1, pp: 14-1. [In Persian]

Rostamzadeh, N. & Narimani, M. (2017). Investigating the role of social intimacy and happiness in predicting students' academic burnout. Available at https://civilica.com/doc/644793. [In Persian]

Sarikhani, L. (2011). Investigating the relationship between differentiation and social adjustment and social intimacy of high school students in Khorrambid city. Master Thesis, Islamic Azad University, Marvdasht

Branch, Faculty of Educational Sciences and Psychology. [In Persian]

Sharifi, M., Zadeh Dana, M.A, Soleimani sefat, E, Soodmand, N. & Younesi, S.J. (2017). The relationship between deterministic thinking and feelings of loneliness and depression in the elderly living in Karaj nursing home. Elderly Journal, Volume 12, Number 3, pp: 287-276. [In Persian]

Shekohi-Yekta, Mohsen; Akbari Zardkhaneh, Saeed; Attari, Mohammad and Mahdavi, Mojtaba. (2019). The effectiveness of anger management training on depression, anxiety and stress of students of non-profit schools in Tehran. Journal of Empowering Exceptional Children, Volume 10, Number 2, pp: 236-227. [In Persian]

Shokoohi Yekta, M., Akbari Zardkhaneh, S., Attari, M. & Mahdavi, M. (2019). The effectiveness of anger management training on depression, anxiety and stress in students of non-profit schools in Tehran. Journal of Exceptional Children Empowerment, Volume 10, Number 2, pp: 236-227. [In Persian]

Shokoohi Yekta, M., Behpajooh, A., Ghobari Bonab, B., Zamani, N. & Parand, A.

(2008). The effect of anger management skills training on anger management of mothers of mentally retarded and retarded students. Quarterly Journal of Research in Exceptional Children, Volume 8, Number 4, pp: 369-358. [In Persian]

Shokoohi Yekta, M., Zamani, N., Parand, A. & Akbari Zardkhaneh, S. (2011). Effectiveness of anger management on expression, and control of parental anger. Quarterly Journal of Developmental Psychology: Iranian Psychologists, Volume 7, Number 26, pp: 12-5. [In Persian]

Steffgen, G. (2017). Anger Management - Evaluation of a Cognitive-Behavioral Training Program for Table Tennis Players. Journal of Human Kinetics volume, 55: 65-73.

Woo, J. & Linze, W. (2019). Evaluation of Medical College Students' Entrepreneurial Skills and Its Relationship with Social Intelligence. Leave a comment, 11(24), 13-23.

Younesi, S.J. & Bahrami, F. (2011). Predicting marital satisfaction and definite thinking in couples. Quarterly Journal of Iranian Psychologists, Volume 5, Number 19, pp: 255-241. [In Persian]