The mediating role of self-efficacy in the relationship between risk perception and psychological vulnerability in Students with social anxiety disorder

Maryam Darzi Azadboni[1], Mohammad kazem Fakhri[2*], Bahram Mirzaeian[3]

1. PhD Student in General Psychology, Sari Branch, Islamic Azad University, Sari, Iran.
2. Assistant Professor, Department of Psychology, Sari Branch, Islamic Azad University, Sari, Iran.
3. Assistant Professor, Department of Psychology, Sari Branch, Islamic Azad University, Sari, Iran

Abstract

Purpose: The aim of the present study was to model the mediating role of self-efficacy in the relationship between risk perception and psychological vulnerability in adolescents with social anxiety disorder.

Methodology: The method of this research was correlation research based on structural equation modeling method. The statistical population of this study was all first grade students in the second-high school of Sari in the academic year of 2018-2019. 260 subjects were selected using stage sampling method and Rundmo & Iversen Risk Perception Questionnaire (2004), Social Anxiety Inventory (SPI), Psychological Injury Questionnaire (SCL-25) and Child and Adolescent Self-Efficacy Questionnaire (SEQ-C) Answered. The statistical method of the research was structural regression equations according to spss24 and Amos23 software.

Findings: The results showed that self-efficacy had a significant mediating role in the relationship between risk perception and psychological vulnerability in adolescents with social anxiety disorder, and there was a significant negative correlation between the components of risk perception and self-efficacy with psychological vulnerability.

Conclusion: The results of this study emphasize the necessity of risk perception as well as the mediating role of self-efficacy on adolescents' psychological vulnerability..

∗ Corresponding author: fakhry1385@yahoo.com

1. Introduction

Anxiety is defined as widespread, pervasive, unpleasant, and ambiguous anxiety, often accompanied by objective symptoms of autonomic nervous system such as headache, sweating, palpitations, chest tightness, and mild stomach upset (Ranjbari, Karimi, Mohammadi, Norouzi, 2017). It always causes restlessness, meaning that one cannot sit or stand for long periods of time and may be with it, and anxiety disorders are among the most common disorders in many areas of the world that cause many problems and complications, One of its most important effects on people's cognitive-behavioral performance is in choosing the right behavior in crucial situations, on the other hand, humans are always responsive to these environmental stimuli, which can have different forms of emotional behavior (Crescimbene, La Longa, Peruzza, Pessina & Pino, 2016).

Risk-taking is a state of being, whether mild or severe, that is manifested through experiences with emotional themes, including diverse, fresh, complex and intense emotions and experiences, and a tendency to risk physical, social, legal, and even experiences. Finance depends on the four main elements of risk taking: excitement and adventure, experience seeking, deterrence and sensitivity to uniformity. Emotionalism is a characteristic that tends to diversify, complexity, excitement, and experience, and risk to experience is a prominent feature (Wickens & Horrey, 2008). Risk in the general definition, it is possible that a particular action (or inaction) may result in unintended and unintended losses or outputs. Almost all human endeavors involve some degree of risk (Miles, Lewis, Hall-Phillips, Morrish, Gilmore & Kasouf, 2016), however some of them carry greater risks. Risk implies a wide range of meanings, such as fear of particular dangers, uncertainty about the benefits gained or lost, fear of the malevolent forces of nature, and the thrill of adventure. Many of the risks in everyday life are quickly and automatically controlled by remembering what happened in the past (Olofsson & Öhman, 2015).

Perception of risk is a feeling that exists in all people around the world. This feeling varies from culture to culture and from country to country and even from person to person, so understanding this process can play an important role in developing a new approach to risk perception. Many safety-related disputes and disputes arise because of differences in risk perceptions of individuals (Motamedi Shelmzari, Kharaman, Ghanbari, 2014). Basically, risk taking is defined as the need for diverse, complex, exquisite and unprecedented experiences and feelings, and a willingness to take risks, which can be greater than the risk predisposing to a degree of psychological vulnerability (Den Hollander, Browne, Arhinful, Graaf & Klipstein-Grobusch, 2018).

Vulnerability is known as a congenital or acquired readiness for maladaptation and mental disorders, and vulnerability consists of biological, cognitive, affective, and social components called vulnerability markers (Fifth Edition Diagnostic Manual of Mental Disorders, 2013). In DSM-5, two revised definitions of mental disorder are presented. In the first definition, Stein et al. (2010) refer to mental disorder as a pattern or pattern of psychological or behavioral disorder that occurs in the individual. This pattern or syndrome reflects an underlying psychological dysfunction, and its consequences are clinically meaningful (for example, impaired in one or more important areas of function) or distress (for example, a painful symptom) (Miles et al., 2016). These syndromes should not be an expected response to a general stressor, a loss (for example losing a loved one), or a confirmed cultural response to a particular event (for example, ecstasy) and primarily due to deviation. They are not social or conflict with society (Mullin, 2014).

In the second definition, the DSM-5 Study Group on the Impairment and Disability Assessment also identifies, in its first criterion, the psychological or behavioral pattern or syndrome that occurs in the individual (Fifth Edition Diagnostic Manual of Mental Disorders, 2013). This template is based on a defect or problem in one or more areas of psychological functioning including general function (eg, consciousness, orientation, intelligence or temperament) or specific functions (eg attention, memory,

emotion, perception and thinking), but limited It is not in these areas (Davies, Martin, Sturge-Apple, Ripple & Cicchetti, 2016). These syndromes should not be an expected response to a general stressor, lack or confirmed cultural response to a particular event and are not primarily due to social deviance or individual conflict with society (Hoffman & Wallace, 2018) and are influenced by cognitive-behavioral contexts. Personality is like self-efficacy and coping strategies (Tahmasian & Gholamrezaee, 2009).

Self-efficacy is derived from the social psychology theory of the renowned psychologist, which refers to one's beliefs or judgments about one's ability to perform tasks and responsibilities (Guimond, Brendgen, Vitaro, Dionne & Boivin, 2015). Social cognition theory is based on a three-way causal model of behavior, environment, and the individual, emphasizing the interrelationship between behavior, environmental effects, and individual factors (cognitive, affective, and biological) that refer to the individual's perception of psychological functions. (Steca, Abela, Monzani, Greco, Hazel & Hankin, 2014). According to this theory, individuals in a three-way causal system influence their motivation and behavior, rejecting one-dimensional effects of the environment on one's behavior, which has been one of the important hypotheses of behavioral psychologists. Humans have some form of self-control and self-regulatory power, with which they control their thinking, emotions, and behaviors and play a decisive role in their destiny (Foster, Russell, Dillon, Bitsko, Godder & Stern, 2014).

Effectiveness automation has three components: size (level), generality, robustness. The first is self-efficacy beliefs, and the level deals with one's beliefs about performance in very difficult aspects. The second dimension of automatic beliefs is the effectiveness of generalization (Miles et al., 2016). Individuals may find themselves working in a context or a small part of it, and the generality of self-efficacy is influenced by several factors: the similarity of activities, the scope, the quality of conditions, and the attributes of the individuals to whom the behavior or activity relates. Robustness leads to persistence of behavior despite the presence of obstacles (Tahmasian & Gholamrezaee, 2009).

In their research, Hosseini, Zahrakar, Davarnia, Shakerami (2016) showed that social support, resilience, problem-solving and ineffective coping strategies, and personality traits of neuroticism were 0.81 correlated with vulnerability to stress and 66% of them. Explain the variance of vulnerability to stress. Also, the effects of extroversion personality traits, openness to experience, adaptability and responsibility, and emotion-focused coping strategies had little effect on the ability to predict stress vulnerability. Peivastegar, Besharat, Pajouhinia & Seifi (2012) showed that secure attachment style had a positive correlation with psychological vulnerability, positive correlation, and avoidant and ambivalent styles had negative correlation with students. Also, attachment styles, especially ambivalent and safe styles, can explain psychological vulnerability to varying degrees and degrees. Tahmasian & Gholamrezaee (2009) showed in their research that social and physical self-efficacy had an indirect and meaningful relationship with peer rejection, whereas this relationship was not found in academic and emotional self-efficacy. In addition, in early adolescence, emotional self-efficacy also predicted peer rejection.Miles et al. (2016) in their research showed that the process of assessment of vulnerability is particularly influenced by the moderating role of risk perception and the effective effectiveness of individuals. Guimond et al (2015) in their study showed that anxiety and the level of psychological vulnerability in individuals in different interpersonal dimensions can be affected by the degree of self-efficacy in different situations. In their research, Herens, Bakker, van Ophem, Wagemakers & Koelen (2014) showed that individuals have an essential role in the quality of life and self-esteem of individuals at the level of their social and interactive vulnerabilities. In their research, Foster et al. (2014) showed that there was a significant relationship between optimism, perceived psychological vulnerability, and academic vulnerability, autonomy, and social self-efficacy in adolescent childhood cancer survivors.

Given that this issue in the family has been associated with many children's trauma related mental disorders, previous studies have linked the issue of domestic violence to women and the development of professional relationships. It is, therefore, theoretically important to require expert studies. The present

study addresses the effect of risk perception on psychosocial vulnerability by mediating the role of self-efficacy in adolescents with social anxiety disorder, so the main question of research is whether risk perception is related to psychosocial vulnerability. Does self-efficacy play a role in adolescents with social anxiety disorder? Based on the stated problem, the following conceptual model has been formulated based on previous findings on the topic (Figure 1).
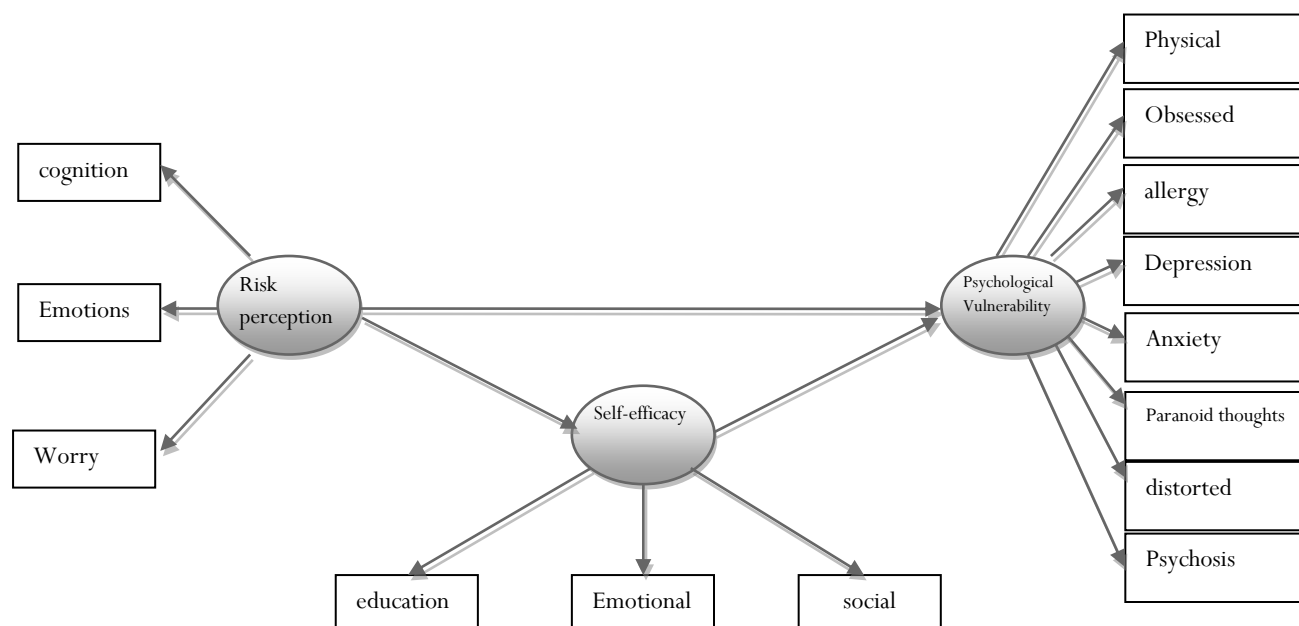

figure 1. Proposed conceptual model of research

2. Methodology

The research method was descriptive-correlational based on Structural Equation Modeling (SEM). The statistical population of this study consisted of all first year students of second high school in Sari city in the academic year 2018-19. To be consistent with the structural equation model, the sample number must be at least 15 times the observed variables (Stevens, 1994, quoted by Hooman, 2014). In this study, to determine the sample size with respect to the number of observed variables and assigning a coefficient of 15 to each observed variable (17 variables observed in the model), and 260 subjects were selected as the sample size by purposive sampling method (considering the criterion of having social anxiety in students).

Inclusion criteria were: 1) Gender; male and female; 2) Completion of written consent. 3) First year secondary education in Sari in the 2018-19 school year and inclusion criteria were: 1) No consent for continued cooperation. 2) Abolish collaboration in the process of conducting research.

The Rundmo & Iversen (2004) Risk Perception Questionnaire has 10 questions and three subscales of cognition-based risk perception (4 questions) and emotion-based risk perception (4 questions) and worry (2 questions from the other two subscales). The Likert scoring method is very low with a score of 1 and very high with a score of 5. A higher score indicates better perception than risk; the validity and reliability of this questionnaire has been validated in various external studies such as Randmo & Aborson (2004) and Randmo et al. (2011). Cognitive-based risk perception scale (0.88), affective risk perception (0.84), worry (0.89) and overall score (0.91) were obtained.

Social Anxiety Inventory (SPI): The Social Anxiety Questionnaire was designed by Connor et al. (2000) In order to assess social anxiety. The questionnaire measures three clinical domains of social phobia, namely fear, avoidance, and physiological symptoms. The benefits of this questionnaire are its

shortness and ease of scoring, which makes it easy to use on large populations, such as students. One of the uses of this questionnaire is to test treatment response in patients with social anxiety disorder. The Connor Social Phobia Inventory (SPI) is a self-assessment scale consisting of 3 items and consists of three subscales of fear (1 item), avoidance (2 items), and physiological discomfort (2 items). Scoring this scale is based on a five-point Likert scale and the rating of each option is that it scores from 0 to very high (4). Based on the results obtained for interpreting the scores, cut-off point with 2% accuracy detection and cut-off point 2% yield distinguishes those with social phobia from non-affected individuals (Fathi Ashtiani, 2009). According to the creators of this questionnaire, the questionnaire has high validity and reliability. Its validity was 0.87 to 0.89 in groups with diagnosed social phobia disorder and its internal consistency coefficient (Cronbach's alpha) in a normal group was 0.94. Also reported for the subscales of fear 0.89, avoidance 0.91 and physiological distress 0.80. The validity of the questionnaire was compared with the results of two groups of subjects diagnosed with social phobia disorder and subjects with normal psychiatric disorder without psychiatric diagnosis (salajegheh & bakhshani, 2014).

Psychological Injury Questionnaire (SCL-25): The Psychiatric Injury Questionnaire (SCL-25) was developed by Najarian and Davoodi (2001). The questionnaire has 25 items that are recorded on a 5-point range from zero to four. The questionnaire (SCL-25) is referred to as the Mental Health Questionnaire, but in fact the questionnaire measures the individual's psychopathology, which includes 8 main factors; Practical (1, 2, 3) 1- Interpersonal sensitivity (1, 2, 3) 2- Depression (2, 2) 2- Anxiety (2, 2, 2) 2- Morbid phobic anxiety (2, 2, 2) 1. Paranoid thoughts (1) 2. Evaluates psychosis (1, 2, 3) in the past week. Scoring is considered from none (1) to strongly (5). Includes the interpretation of the questionnaire scores as lower individual scores indicate higher mental health and higher scores indicate poorer mental health. Mean scores of two and above in the raw scores of the whole questionnaire are considered to be indications of serious symptoms. The reliability of the Mental Health Questionnaire (SCL-25) was 0.97 for the female sample and 0.98 for the male sample. Test-retest reliability coefficient in a sample of 312 students of Shahid Chamran University with a 5-week interval was reported 0.78.

The Child and Adolescent Self-Efficacy Questionnaire (SEQ-C) was developed by Morris in the year 2001 and was adapted from the Bandura, Barberanelli, Kapara, and Pastorelli self-efficacy questionnaires. The self-efficacy questionnaire for children and adolescents consists of 23 items and is scored on a Likert scale ranging from (1) to very (7).

Children and adolescents' self-efficacy questionnaire (SEQ-C) consisted of three subscales of social self-efficacy (1-8), academic self-efficacy (16-9) and emotional self-efficacy (23-17) and tested the subjects' ability in situations. It is different. Scores range for overall self-efficacy from 23 to 115, for social and academic self-efficacy from 8 to 40, and for emotional self-efficacy from 7 to 35. A higher score means more self-efficacy. In exploring the factor structure of the questionnaire, Morris (2002) confirmed the self-efficacy questionnaire of three social, educational, and emotional factors. In the Morris study (2001), in addition to assessing the convergent and divergent scales, social self-efficacy subscale reliability,0/78 and emotional self-efficacy, 0/80 and academic self-efficacy, were reported to be 0/87. In the Tahmassian study (2007), the internal consistency coefficient of the whole scale was 0/73, social self-efficacy 0/66, emotional self-efficacy 0/84 and academic self-efficacy 0/74. The test-retest reliability was reported for the whole scale of 0/89, social self-efficacy of 0/81, emotional self-efficacy of 0/88 and academic self-efficacy of 0/87.

3. Findings

In the descriptive statistics section, with respect to the two indices of dispersion and the tendency index to center, mean and standard deviation, as well as minimum and maximum variables of risk perception, psychological vulnerability and self-efficacy can be seen in Table (1).

Table 1. Variable descriptive statistics of risk perception, psychological vulnerability, and self-efficacy

Variable	Min	Max	Average	The standard deviation
Cognitive risk	4	21	12/83	4/81
Emotion-based risk perception	5	19	8/92	4/34
Worry	2	9	4/27	5/51
Risk perception	8	35	22/39	4/48
Physical complaints	6	17	12/38	3/68
Obsessive and Practical	3	12	8/33	3/26
Interpersonal sensitivity	3	11	6/41	3/1
Depression	4	11	8/66	3/25
Anxiety	3	10	8/43	4/02
Morbid phobic anxiety	2	11	7/66	3/75
Paranoid Thoughts	3	12	7/8	3/28
Psychosis	2	10	7/62	3/46
Psychological Vulnerability	0	93	58/44	16/06
Social self-efficacy	10	50	29/34	6/85
Academic self-efficacy	11	51	31/05	8/87
Emotional self-efficacy	9	48	26/86	5/16
self-efficacy	27	142	89/27	13/49

Descriptive data including mean and standard deviation of the research variables along with their subscales are observable.

Table 2. Fit indices obtained from data analysis and variables after four correction steps

Conclusion	The values obtained	Optimal values	Goodness of fit indicators
-	296/754	Nil	Test(χ^2)
Acceptable fit	0/982	90. ≥.	(GFI)
Acceptable fit	0/984	90≥. .	(NFI)
Acceptable fit	0/979	90≥. .	(CFI)
Acceptable fit	0/041	0/08≥.	(RMSEA)
Acceptable fit	2/747	3≥.	(χ^2/df)
	108	0≤.	(df)

Statistics obtained from the three comparative, absolute and purposive indices show that the model obtained after correction has acceptable fits and the model is correct in the path of errors and variances obtained.

Table 3. Weighted regression statistics and critical ratios of the research variables

P	t	β	b	intrinsic variable	Direction	extrinsic variable
0/001	4/425	-0/348	-0/45	Psychological Vulnerability	←	Risk perception
0/001	3/532	-0/199	-0/303	Psychological Vulnerability	←	Self-efficacy

The standardized and non-standardized values represent the prediction paths of the exogenous research variables over the endogenous variables together with respect to the t value obtained in the model. In general, all the values obtained are significant and represent a significant prediction.

Table 4. Direct estimation of the model with maximum likelihood method (ML)

R^2	β	b	Variable
0/174	-0/348	-0/45	Risk perception on psychological vulnerability
0/060	-0/199	-0/303	Risk perception on psychological vulnerability

In view of the above, the final model of the research can be plotted between the explicit and hidden variables in the results of the measurement model and the conceptual model is generally approved. Therefore, it can be examined the research hypothesis: risk perception mediating self-efficacy mediates the role of self-efficacy in adolescents with social anxiety disorder has indirect effect. Considered indirect According to the standardized values (β) obtained, the indirect path, risk perception on the level of psychological vulnerability was mediated by the role of self-efficacy according to Bootstrap estimation method.

Table 5. Indirect estimation of the model using Bootstrap method

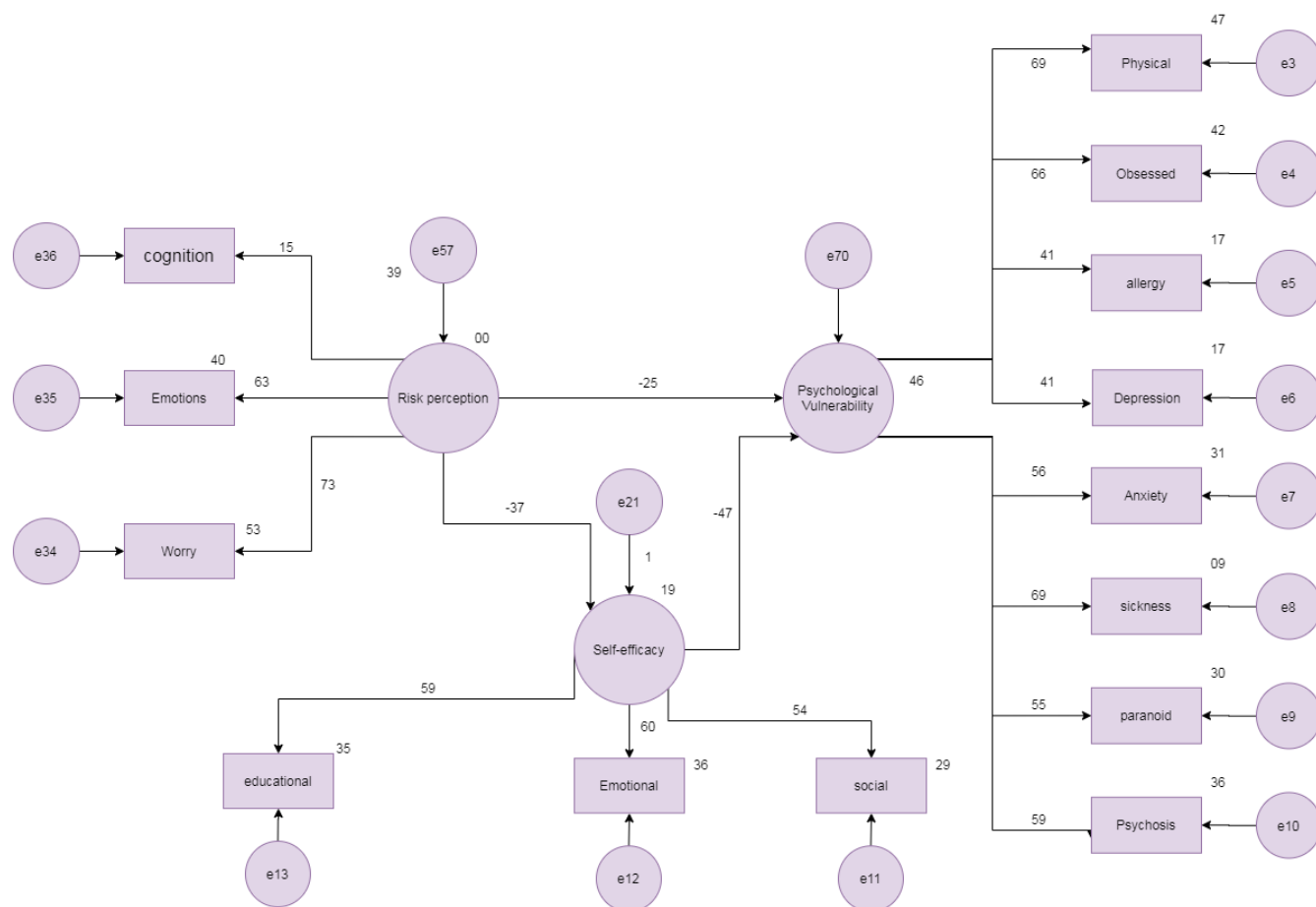| p	upper line	Lower limit	B	Variable
0/000	0/531	0/274	0/451	Risk perception affects psychological vulnerability by mediating its role

---

[1]. maximum likelihood

figure 2. The final model of the tested routes with standardized forecast statistics

4. Discussion

The purpose of the present study was to determine the effect of risk perception on psychological vulnerability by mediating the role of self-efficacy in adolescents with social anxiety disorder. According to the final model of the research, the effects of direct and indirect paths were 66% of the variable of psychological vulnerability explained by risk perception and self-efficacy.

According to the results of the analysis, risk perception on psychological vulnerability mediated by self-efficacy role in adolescents with social anxiety disorder has indirect effect, and these results are correlated with findings of these variables. Motamedi et al. (2014), Tahmassian et al. (2009), Miles et al. (2016), Guimond et al. (2015), Foster et al. (2014), Deholander et al. (2018), Cressmanbane et al. (2016), Lewis Et al (2016), Alfonson and Ohman (2015).

It is stated that pursuing long periods of anxiety and lack of effective coping as well as inappropriate perception disrupts one's performance and avoids common individuals. Because it is indifferent to induce anxiety and stress, which can reduce one's effectiveness in the process (Foster et al., 2014), and sometimes increase the level of stress and stress, and long-term anxiety about the substance of executive functions Who is the one who deviates from the psychic equilibrium (Dehulander et al., 2018). According to the results of the analysis, the effect of self-efficacy on psychological vulnerability in adolescents with social anxiety disorder has a direct effect. Miles et al. (2016), Guimond et al. (2015), Foster et al. (2014), Steca et al. (2014).

Self-efficacy is one of the hallmarks of positive psychology, characterized by characteristics such as one's ability to achieve success, consistent behavior, and perseverance in pursuing goals, creating positive self-image, and tolerating problems, which are always defined as Defensive shield against abnormal psychological factors such as anxiety, depression, etc., which can be found that one of the pillars and objective manifestations of injury in the absence of these positive psychological structures can be appropriate behavioral incompatibility and ignoring values. And the norms (Guimond Et al., 2015).

Such self-efficacy enables individuals to better cope with stressful situations, to be less stressed, to be able to face difficulties, to have a clear view of themselves, to behave well with others, and to experience appropriate norms, and They are less affected by daily events and individual and interpersonal stressors, so they also have higher psychological well-being and compliance (Steca et al., 2014). Self-efficacy encompasses the positive aspects of human life and reveals human and social capital, is easily observable and can be easily measured and controlled, while self-efficacy is more potential, and difficult to measure (develop) (Foster et al., 2014).

Self-efficacy therefore involves explaining one's self, the goal of achieving success and resilience to problems. Self-efficacy equips individuals with constructive thoughts, beliefs, and behaviors that are more capable, motivated, and motivated to cope with stressful situations, and less vulnerable to problems. Self-efficacy constructs have been studied separately, but studies of the self-efficacy of these constructs are related to one another and consider the commonalities of these variables (Tahmassian and Gholamrezaee, 2009), in other words, self-efficacy, a rank construct. It is considered higher, meaning that these four variables combine to form a synergistic whole, and it is expected that the whole structure will have a greater impact on performance than the individual constituent variables.

Difficulty in managing behavior and cognition causes difficulty in tolerance and self-efficacy tendencies and this leads to failure in the management of these individuals' behavioral and cognitive states. Also, the significant importance of cognitive and emotional adjustment in the psychopathology of these individuals has been highlighted. It can be stated that the study of perceptual factors in anxiety-related behavior is of particular importance, one of the factors of lower risk perception in anxious individuals is their lower self-efficacy and reduced motivation for change (Motamedi Shelmzari et al., 2014). Proper behavior and less frustration of these people can lead to many areas of psychological damage, in general, misunderstanding about anxiety when overwhelmed by human beings can be disadvantaged in different situations, so environmental pressures Receives more data and reduces its performance.

Because anxiety is described as unbearable and unbearable by negative anxious stress and cannot manage these states without relying on avoidant and emotional coping strategies, they use these behavioral mechanisms. On the other hand, according to the behavioral perspective, when the person has a behavior that makes him or her more relaxed, it can lead to his or her positive desire (Davies et al., 2016) and the person concerned in this regard is primarily concerned with reducing anxiety. It will not be acceptable because risk in turn is anxious and in turn this inactivity leads to a decrease in self-efficacy and somehow the individual with anxiety has some ability but due to the inability to create cognitive-emotional behavioral management of withdrawal activity. Limitations of the research can be pointed to the research method, which uses self-report tools, and the subjects' responses may be affected by some degree of social desirability, cross-sectional approach, including mental states and personal status. Individuals in the interval of completing the tools have an impact on how the tools are completed and the research is limited to first year secondary school students in Sari.

Regarding the effects of cognition on the quantity and quality of psychological injury caused by families and relevant authorities in the educational system of the country with regard to the component of social support and its relation to self-efficacy, it is suggested to arrange appropriate training to identify mental status and strategies Provide adolescents with coping with stressful situations, and using mindfulness-based approaches and creating a spirit of accountability to succeed in different dimensions can be effective. It is

also suggested to consider the level of perceptions, fears and negative thoughts about some of their unpleasant behaviors in treatment plan of anxiety patients and to consider medication, treatment and training of stress coping skills.

References

American Psychiatric Association. (2013). Diagnostic and Statistical Manual of Mental Disorders, 4th Edn, Washington D.C: APA.

Crescimbene M, La Longa F, Peruzza L, Pessina V & Pino N A. (2016). The seismic risk perception in Italy compared to some hazard, exposure and vulnerability indicators. In International Conference of Urban Risk.

Davies P & Cummings E. (2005). Children's perceived agency in the context of marital conflict: Relations with marital conflict over time. Merrill-Palmer Quarterly. 51: 121-144.

Davies P, Cummings E & Winter M. (2004). Pathways between profiles of family functioning, child security in the interparental system, and child psychological problems. Development and Psychopathology, 16: 525- 550.

Den hollander G C, Browne J L, Arhinful D, van der Graaf R & Klipstein-Grobusch K. (2018). Power Difference and Risk Perception: Mapping Vulnerability within the Decision Process of Pregnant Women towards Clinical Trial Participation in an Urban Middle-Income Setting. Developing world bioethics. 18(2): 68-75.

Fathi Ashtiani A. (2009). Psychological tests - personality assessment and mental health. Be'sat Publications.

Foster R H, Russell C C, Dillon R, Bitsko M J, Godder K & Stern M. (2014). Relations among optimism, perceived health vulnerability, and academic, self-regulatory, and social self-efficacy in adolescent survivors of childhood cancer. Journal of psychosocial oncology. 32(2): 207-223.

Guimond F A, Brendgen M, Vitaro F, Dionne G & Boivin M. (2015). Peer victimization and anxiety in genetically vulnerable youth: The protective roles of teachers' self-efficacy and anti-bullying classroom rules. Journal of abnormal child psychology. 43(6):1095-1106.

Herens M, Bakker EJ, van Ophem J, Wagemakers A, Koelen M.(2016). Health-Related Quality of Life, Self-Efficacy and Enjoyment Keep the Socially Vulnerable Physically Active in Community-Based Physical Activity Programs: A Sequential Cohort Study. 11(2):1024-1038.

Hoffman G J & Wallace S P. (2018). The cost of caring: Economic vulnerability, serious emotional distress, and poor health behaviors among paid and unpaid family and friend caregivers. Research on aging. 40(8): 791-809.

Hooman H A. (2014). Structural Equation Modeling Using LISREL Software. Tehran: Side, first edition.

Hosseini A, Zahrakar K, Davarnia R, Shakarami M. (2016). Prediction of Vulnerability to Stress Based on Social Support, Resiliency, Coping Strategies and Personality Traits among University Students. Research in Cognitive and Behavioral Sciences. 6(2):27-42.

Peivastegar M, Besharat M A, Pajouhinia Sh, Seifi A K. (2017). Explanation of Psychological Vulnerability Based on the Attachment Styles in Students of Mixed-state Universities of Tehran. Knowledge & Research in Applied Psychology, 13(47):29-38.

Miles M P, Lewis G K, Hall-Phillips A, Morrish S C, Gilmore A & Kasouf C J. (2016). The influence of entrepreneurial marketing processes and entrepreneurial self-efficacy on community vulnerability, risk, and resilience. Journal of Strategic Marketing, 24(1): 34-46.

Motamedi Shelmzari A, Kharaman A, Ghanbari B. (2014). Assessment of Occupational Injury Affected by Hard Disorders, Perceived Social Support and Risk Perception and PTSD (Post Traumatic Stress Disorder) and Depression, First National Conference on Education and Psychology, Marvdasht, Andisheh Sazan Co. Young inventor.

Mullin A. (2014). Children, vulnerability, and emotional harm. Vulnerability. New Essays in Ethics and Feminist Philosophy, 12: 266-287.

Muris P. (2001). A brief questionnaire for measuring self-efficacy in youths. Journal of Psychopathology and behavioral Assessment, 23(3): 145-149.

Muris P. (2002). Relationships between self-efficacy and symptoms of anxiety disorders and depression in a normal adolescent sample. Personality and individual differences, 32(2):337-348.

Najarian B, Davoodi I. (2001). Manufacture and validation of SCL-25 (short form SCL-90-R). Journal of Psychology: 2 (18):136-149.

Olofsson A, Öhman S. (2015). Vulnerability, values and heterogeneity: one step further to understand risk perception and behaviour. Journal of Risk Research. 18(1): 2-20.

Ranjbari T, Karimi J, Mohammadi A, Norouzi M R. An Evaluation of the Contributions of the Triple Vulnerability Model to the Prediction of Emotional Disorders. IJPCP. 23 (4) :408-423.

Rundmo T, Iversen H. (2004). Risk perception and driving behaviour among adolescents in two Norwegian counties before and after a traffic safety campaign. Safety science, 42(1): 1-21.

Rundmo T, Nordfjærn T, Iversen H H, Oltedal S & Jørgensen S H. (2011). The role of risk perception and other risk-related judgements in transportation mode use. Safety science, 49(2): 226-235.

salajegheh S, bakhshani N. (2017). Effectiveness of Combined Group Exposure Therapy and Coping with Stress Skills Training on Social Anxiety Rate of University Students. Knowledge & Research in Applied Psychology, 15(56): 96-104.

Schimmenti A, Passanisi A, Caretti V, Marca L L, Granieri A, Iacolino C, Gervasi A M, Maganuco N R & Billieux J. (2017). Traumatic experiences, alexithymia, and Internet addiction symptoms among late adolescents: A moderated mediation analysis. Addictive Behaviors, 64: 314-320.

Steca P, Abela J, Monzani D, Greco A, Hazel N & Hankin B. (2013). Cognitive Vulnerability to Depressive Symptoms in Children: The Protective Role of Self-Efficacy Beliefs in a Multi-Wave Longitudinal Study. Journal of abnormal child psychology.

Tahmasian K, Gholamrezaee M. (2009). The Relationship between Self-efficacy and Peer Rejection. Journal of Modern Psychological Researches, 4(14):107-123.

Wickens C D, Horrey W J. (2008). Models of attention, distraction, and highway hazard avoidance. Driver distraction Theory, effects and mitigation. 15: 79-249.