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# Predicting tendency to risky behaviors in adolescent girls based on emotional dysregulation and self-differentiation

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## Abstract

**Introduction:** One of the factors that all societies, especially our society, are facing today and has become the basis for many problems, is the increasing tendency of teenagers to risky behaviors. The present study was conducted to predict high-risk behaviors based on emotional dysregulation and self-differentiation in adolescent girls. The method of the present research was a correlation.

**Research method:** The statistical population of the research included all teenage girls in Shiraz City, from which 200 people were selected as a sample using a multi-stage cluster sampling method. The data of the research was collected using the high-risk behavior questionnaire, the primary scale of difficulty in emotion regulation, and the self-differentiation questionnaire. Pearson correlation and multiple regression were used for data analysis.

**Findings:** The results showed that there is a significant relationship between emotional dysregulation and the tendency to risky behaviors, there is a significant relationship between self-differentiation and the tendency to risky behaviors, finally, the multiple correlation coefficient is equal to MR=0.404 and the coefficient of determination It was equal to RS=0.163, which was significant at p < 0.017 level. In other words, 16.3% of the variance related to risky behaviors was explained by the mentioned variables.

**Conclusion:** Based on the results of this research, it is possible to predict the tendency of students towards risky behaviors using emotional dysregulation and differentiation.

**Keywords:** alcohol consumption, bullying, emotional disorder, risky behaviors, self-differentiation

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#### **Introduction:**

One of the factors that all societies, especially our society, are facing today, which has caused many problems, is the increasing tendency of teenagers to engage in risky behaviors. Therefore, if those who are in contact with teenagers and their problems, cannot manage this issue; In the future, we will see worse and more serious problems because adolescence is the beginning and the foundation of adulthood. A teenager who cannot manage and control his inner forces and energies in the best possible way; In the future, it will not be able to interact constructively with society and its conditions. Therefore, it is important to know what factors play a role in high-risk behaviors among teenagers and how to direct their inner potential and forces toward constructive and positive goals.

Different theories have implicated various factors in the emergence of high-risk behaviors; One group focused on the non-optimal use of free time and another group highlighted the role of social factors in this context (1). The theory of inherent characteristics believes that the differences between people make them naturally susceptible to risky behaviors (2). However, sufficient reasons have not been provided to prove certain inherent characteristics as the cause of high-risk behaviors (3). In addition, biological patterns refer to genetic factors, hormonal effects, puberty events, etc. (4) and another approach, to the changes in the biological, psychological, and social contexts of adolescence and... (5) and the role of family factors such as family disintegration, parental disharmony, parental mental illness, family's emotions and (6) be effective in the emergence and emergence of risky behaviors. One of the variables that can affect teenagers' tendency to risky behaviors is emotional regulation methods. Sometimes, people have problems regulating their emotions, which is called emotional disorder. Emotions can be both an organizer of attention and an obstacle to its organization, they can both facilitate and hinder problem-solving, and they can also create relationships and destroy them. Emotion regulation is fundamentally related to behavior in that it organizes behavior and allows children and adolescents to control their behavior by responding to what is happening around them show a flexible reaction (7). Many emotion regulation processes are common among humans, but it seems that each person tends to use some specific patterns. These patterns are called emotion regulation strategies and its cognitive domain is called emotion cognitive regulation strategies (8).

Among other variables that can have an effect on teenagers' tendency to risky behaviors; is selfdifferentiation. The concept of differentiation is the most basic concept of Bowen's theory, which refers to the ability to experience intimacy with others and stay in one's emotional atmosphere while being independent of other people (9). According to Bowen, all symptoms related to mental illnesses, physical illnesses, and social problems are related to the level of differentiation (10).

Differentiation, as an intra-individual function, refers to the ability to separate emotional processes from rational processes, and the proper balance between them. As an interpersonal function, it shows the person's relationships with others and the degree of blending of the individual with others (11) Differentiation It is defined as a process to achieve personal goals and values, and at the systemic level, it is defined as the ability of a system/family to regulate itself. The high level

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of differentiation of people leads to compatibility in the family and the system (12). According to the above material, the researcher decided to conduct research in this field, whether emotional disorder and self-differentiation play a role in predicting high-risk behaviors of 16-18-year-old girls in Shiraz city to pay.

#### **Research Method:**

The design of the current research is a predictive correlation that predicts high-risk behaviors based on emotional dysregulation and self-differentiation. In this research, the field method was used to collect information. The statistical population of the present study consists of all teenage girls who are studying in the academic year 2020-2021 in Shiraz City. From this statistical population, a sample of 200 people was selected by multi-stage sampling method. Research tool:

Risk scale of Iranian adolescents: Iranian youth risk-taking scale was used to measure the tendency to risky behaviors. Zadeh Mohammadi, Ahmadabadi, and Heydari (13) compiled this questionnaire in 38 statements, which shows the vulnerability of adolescents in 7 categories of high-risk behaviors such as violence, dangerous driving, smoking, drug use, alcohol use, relationship and sexual behavior and It measures the tendency towards the opposite sex. Respondents express their agreement or disagreement with these items on a 5-option scale from completely agree with a score of 5 to disagree with a score of 1. In the research of Zadeh-Mohammadi et al .(13)

The construct validity of this scale was evaluated. Exploratory factor analysis with principal components showed that this questionnaire is a seven-dimensional scale, which explains 64.84% of the variance of risk-taking. Zadeh-Mohammadi et al. (13) obtained Cronbach's alpha value of 0.94 for the whole scale and its subscales in the range of 0.74 to 0.93, which indicated the good reliability of this scale. The reliability of this questionnaire in the present study was obtained through Cronbach's alpha method for its components in the range of 0.71 to 0.83.

The primary scale of difficulty in emotion regulation: The primary scale of difficulty in emotional regulation was a 41-item self-report measurement tool that was developed to assess difficulty in emotional regulation from a clinical point of view. The items of this scale were compiled and selected based on numerous conversations with colleagues familiar with emotion regulation texts (Gertz and Roer, 2004). Generalized expectation scale of negative emotional regulation (14). It has been used as a model in compiling this scale.

To assess difficulty in regulating emotions during times of agitation (when emotion regulation strategies are necessary), many DERS statements begin similar to NMR or "When I'm upset." The range of answers is on a Likert scale of 1 to 5. One means rarely (0-10%), two means sometimes (11-35%), three means half the time (36-65%), four means most of the time (66-90%) and five It means almost always (91 to 100 percent). One item was removed due to its low correlation with the whole scale and 4 items were due to low factor loading. In this way, 36 items remained from the total of 41 initial items on the scale. This scale measures different aspects of differences in emotional regulation. This scale has six components, the non-acceptance of emotional responses includes six questions 11, 12, 23, 25, and 29, the component of difficulty in performing purposeful

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behavior includes five questions 33, 26, 20, 18, and 13, the component of difficulty in impulse control includes six Question 27, 24, 19, 14, 3 and 23, the component of lack of emotional awareness includes six questions 34, 17, 10, 8, 6 and 2.

The component of limited access to emotional regulation strategies includes eight questions 36, 35, 31, 28, 22, 16, and 15 and the component of lack of emotional clarity includes five questions 9, 7, 5, 4, and 1. Questions 7, 6, 2, 1, 8, 10, 17, 20, 22, 24 and 34 have reverse scoring. Higher scores mean more difficulty in emotional regulation. The scale has an overall score from the sum of the scores of all questions as well as 3 scores related to the subscales. Factor analysis showed the presence of 6 factors non-acceptance of emotional responses, difficulty in performing purposeful behavior, difficulty in impulse control, lack of emotional awareness, limited access to emotional regulation strategies, and lack of emotional clarity. The results indicate that this scale has a high internal consistency, 0.93 (14). All six DERS subscales have Cronbach's alpha above 0.80. Also, DERS has a significant correlation with the NMR scale and the Acceptance and Action Questionnaire (AAQ, Hayes et al.) (14). Based on the data obtained by Azizi, Mirzaei, and Shams (15), Cronbach's alpha of this questionnaire was estimated at 0.92. The reliability of this questionnaire in the present study was obtained through Cronbach's alpha method of 0.89.

**Self-differentiation questionnaire:** The self-differentiation questionnaire by Drake and Murdock is designed based on this form with 46 questions in 4 subscales and 20 questions, which includes the subscales of emotional reactivity, my place, emotional avoidance, and mixing with others. Its scoring method is based on a five-point Likert scale. It is scored from 1 not completely correct to 5 completely correct. The reverse items of this questionnaire are: 2, 4, 5, 6, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, and 20 (That is, "It is completely correct" is given a score of 0 and "Not at all correct" is given a score of 5). To calculate the score of each subscale, add the score of each item related to that subscale together. To calculate the total score of the questionnaire, add the scores of all the questionnaire items together. The score range of this questionnaire will be between 0 and 100. The higher the score obtained from this questionnaire, the higher the level of self-differentiation and vice versa.

The Cronbach's alpha obtained in this research shows the validity of this questionnaire, except for the subscale of mixing with others before the confirmatory factor analysis in this study, the total Cronbach's alpha score was 0.90, and the Cronbach's alpha of the other subscales It consisted of emotional reactivity 0.86, my place 0.70, emotional avoidance 0.83 and blending with others 0.73 (16).

Also, Aliki and Nazari (16) stated in their research that the internal reliability of this questionnaire using Cronbach's alpha method was 0.81 for the whole differentiation questionnaire and 0.81 for the emotional response subscale, 0.69 for my position, 0.65 for emotional avoidance. 0.60 has been obtained for mixing with others. Rasouli et al. (17) calculated the total reliability of this tool using the alpha method of 0.74. The reliability of this questionnaire in the present study was obtained through Cronbach's alpha method of 0.77.

### Findings:

Table 1 shows the average, standard deviation, minimum, and maximum scores of the subjects in the research variables.

 Table 1. Average, standard deviation, minimum, and maximum scores related to research variables for all subjects

Statistical index Variable	Average	standard deviation	lowest score	highest score
Risky behaviors	95/96	34/68	45	189
Emotional disorder	97/66	30/84	45	178
differentiation-Self	62/03	19/92	23	95

As seen in Table 1. The mean and standard deviation of the research variables are respectively 95.96 and 34.68 high-risk behaviors, emotional dysregulation 97.66 and 30.84, and self-differentiation 62.03 and 19.92.

Table 2 shows the result of a simple linear regression analysis between emotional dysregulation and risky behaviors.

Table 2. Results o	f simple linear re	egression ana	alysis of emotional	dysregulation with ris	ky
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behaviors							
Criterion variable	Risky behaviors						
predictor variable	R	$\mathbf{R}^2$	В	β	Sig		
Emotional disorder	0/27	0/073	- 0/29	- 0/27	0/006		

As the results shown in Table 2 show, there is a significant relationship between emotional dysregulation ( $P<\beta$ , 0.006 = -0.27) and risky behaviors, and emotional dysregulation can be 7.3%. Explain the variance of risky behaviors.

Table 3 shows the result of a simple linear regression analysis between self-differentiation and risky behaviors.

**Table 3.** Results of simple linear regression analysis of self-differentiation with high-risk

benaviors								
Criterion variable	Risky behaviors							
predictor variable	$R \qquad R^2 \qquad B \qquad \beta \qquad Sig$							
differentiation-Self	0/31	0/099	-0/54	-0/31	0/01			

As the results in Table 3 show, there is a significant relationship between self-differentiation (P  $<\beta$ , 0.01=-0.31) and risky behaviors, and self-differentiation can account for 9.9% of the variance.

Explain risky behaviors.

Table 4 shows the results of the multiple regression analysis of emotional dysregulation and selfdifferentiation with high-risk behaviors using the simultaneous entry method.

<b>Table 4.</b> The results of regression analysis related to predictor variables with high-risk behaviors
using the simultaneous entry method

variable Criterion	Risky behaviors				
predictor variable	R	$\mathbb{R}^2$	В	β	Sig
Emotional disorder	0/404	0/163	-0/286	-0/254	0/041
differentiation-Self			-0/522	0/300	0/017

As the results shown in Table 4 show, among the predictor variables of emotional dysregulation (P< $\beta$  0.041=0/254) and self-differentiation (P< $\beta$ , 0.017=-0.300), the two variables of emotional dysregulation and self-differentiation predict high-risk behaviors and explain 16.3% of its variance.

### **Discussion and conclusion:**

The present study was conducted to predict high-risk behaviors based on emotional dysregulation and self-differentiation in adolescent girls. The method of the present research was correlation. The results showed that there is a significant relationship between emotional dysregulation and a tendency to risky behaviors. The results of this hypothesis are in line with the research of Aqiqi, Abbasi, Pirani, and Rezai Fard (18), Farnod Canada (19), and Mikaeli (20). Orbek et al. (18) believe that people who show high levels of emotion regulation defects; More than others, are more likely to engage in risky behaviors that subsequently lead to depression or anxiety. According to these researchers, people who have learned weak emotion regulation strategies may be more prone than others to use risky behaviors as a tool to relieve negative emotions. Emotional dysregulation is a factor in increasing the likelihood of people engaging in risky behaviors, including drug use (18).

In explaining this finding, it can be said that the tendency to perform risky behaviors can be a way to reduce unpleasant emotions, and because a person does not have sufficient and adaptive strategies, he inevitably uses harmful methods, which are effective in the short term, but In the long run, it has adverse effects. In fact, in such situations, high-risk behaviors become a kind of emotional regulation strategy that helps a person escape from a difficult situation or forget and adjust to an unpleasant internal state. Therefore, when a person cannot use appropriate and problem-oriented strategies to deal with his annoying emotions or does not have a proper understanding of his emotions, he inevitably resorts to behaviors and actions with adverse consequences to adjust them and change the results showed that there is a significant relationship between self-differentiation and tendency to risky behaviors. The results of this hypothesis are consistent with the research of Akbari, Mohtashminia, and Salari Fard (21), Afarel and Webichler (22), and Leti (23).

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In the explanation of this finding, it can be said that according to Bowen's theory, self-distinction includes the psychological separation of reason and emotion and independence from others (16). This distinction from the original family enables them to take responsibility for their thoughts, feelings, perceptions, and actions (16). A distinguished person can deal with issues and problems in life logically and rationally and can avoid dealing with issues emotionally .Therefore, these people can solve problems peacefully. People who have a low level of differentiation, have risky behaviors mix more between their intellect and emotions, and experience emotional tensions in their relationships with others. According to Bowen's theory, it can be said that students who have a low level of differentiation have less ability to make rational decisions when dealing with life issues and problems, which in turn increases conflicts and behavioral problems in their lives. As the results show, among the independent variables, the variables of emotion dysregulation and self-differentiation predict the tendency to risky behaviors. In other words, 16.3% of the variance related to the tendency to risky behaviors is explained by the aforementioned variables. People who have a low level of differentiation have risky behaviors and a greater mix between their intellect and emotions and experience emotioned variables.

According to Bowen's theory, it can be said that students who have a low level of differentiation have less ability to make rational decisions when dealing with problems and problems in life, which increases conflicts and behavioral problems in their lives.

### **Research limitations:**

Every research has limitations. Stating limitations in research helps researchers who intend to do research in different fields to approach research in similar fields with an open vision and awareness of the obstacles, shortcomings, and limitations of research. Because the statistical population of this research was high school students, therefore, the results of this research cannot be generalized to other educational levels. The only source of data collection in this research was a questionnaire that has a self-report aspect. For this reason, a single-method bias may have been created in the obtained data. Considering that to evaluate the proposed model, simple correlation and regression methods have been used to predict relationships, cause and effect conclusions should be made with caution.

### **Ethical considerations:**

The subjects were reminded that the information will remain confidential and their names will not be mentioned anywhere, also, they were asked to honestly complete the questionnaires because these questionnaires do not have any evaluation aspect, only to access the research results of They have been used. In addition, the subjects were permitted to refuse to participate in the research if they wished.

### **Conflict of interest:**

The authors hereby declare that this work is the result of independent research and does not have any conflict of interest with other organizations and persons.

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# **References:**

1. Maher F. risky behaviors in youth's free time; Trends and patterns. Youth Studies. 1383; (6): 118-143.

2. Kaplan H. B. Deviant behavior in defense of self, New York, Academic Press; 1980.

3. Rolison M.R, Scherman A. Factors influencing adolescents' decisions to engage in risk-taking behavior, Journal of Adolescence, 2002; 37(147): 585-597. PMID: 12458695.

4. Kimberly L.H., Slater M.D., Oetting E.R. Alcohol Use in Early Adolescence: The Effect of Changes in Risk Taking, Perceived Harm and Friends' Alcohol Use, Journal of Studies on Alcohol, 2005; 66(2): 275-285. DOI: 10.15288/jsa.2005.66.275

5. Lavery B., Siegel A.W., Cousins J.H., Rubovits D. S, Adolescent risk-taking: An analysis of problem behaviors in problem children, Journal of Experimental Child Psychology, 2009; 55: 277-294, doi:10.1006/jecp.1993.1016

6. Sugar M. Female Adolesent Development. Brunner/Mazel. Inc; 1993.

7. Makalum G. Regulation of children's excitement. Translated by Hamidreza Kianpour and Fatemeh Bahrami. Tehran: Esteemed book; 2010

8. Salehi M, Sepah Mansour M, Mahmoudi Gh, Madanipour N. Prediction of eating attitude based on social problem solving ability and cognitive emotional regulation. Psychological Research Quarterly, 2013; 6(24): 117-134.

9. Klever P. Goal direction and effectiveness, emotional maturity, and nuclear family functioning. Journal of Marital and Family Therapy; 2009; 35(3): 308-342. DOI:<u>10.1111/j.1752-0606.2009.00120.x</u>

10. Knerr M.R. Differentiation and power in couple's therapy. Dissertation Committee, M.S. The Ohio State University; 2008. <u>http://etd.ohiolink.edu/</u>.

11. Aryamanesh S., Fallahchai S.R., Zarei E. A Study of Differentiation between Satisfied Couples in Compare with Conflicting Couples in Bandar Abbas. Research in Clinical Psychology and Counseling, 2013; 3(1): 12 <u>https://doi.org/10.22067/ijap.v3i1.8827</u>

12. Lal A. Relationship among differentiation of self, Relationship satisfaction, Partner support, Depression, Monitoring / Blunting style, Adherence to treatment and quality of life in patients with chronic lung disease. Dissertation of doctor of Philosophy. The Ohio State University, 2006.<u>http://etd.ohiolink.edu/</u>.

13. Zadeh Mohammadi A, Ahmadabadi Z, Heidari M. Construction and Assessment of Psychometric Features of Iranian Adolescents Risk-Taking Scale. IJPCP 2011; 17 (3): 218-225. http://ijpcp.iums.ac.ir/article-1-1417-fa.html

#### https://journal.astara.ir/article\_711430.html?lang=en

14. Gratz K.L. Roemer E. Multidimensional Assessment of Emotion Regulation and Dysregulation: Development, Factor Structure, and Initial Validation of the Difficulties in Emotion Regulation Scale. Journal of Psychopathology and Behavioral Assessment, 2004; 6(5): 11-31. DOI:10.1007/s10862-008-9102-4

15. Azizi A.R., Mirzaei A, SHams J. Correlation Between Distress Tolerance and Emotional Regulation with students Smoking Dependence. Hakim Research Journal, 2010; 13(1): 11-18. http://hakim.tums.ac.ir/article-1-608-fa.html

16. Aliki A., Nazari A.M.. A study correlation between differential of self and marital satisfaction of Tarbiat Moallem university employees. Counseling research and development, 2008; 7(26):7-24.

17. Rasouli M, Asoudeh M.H, Tamrchi F, Hosseini Z. Examining the factorial structure and validation of Derrick and Murdock's Self-Differentiation Questionnaire. Journal of Psychometrics, 20015; 4(16): 1-10.

18. Aqighi A, Abbasi M, Pirani Z, Rezaifard A. The role of negative emotion regulation in predicting students' risky behaviors. The first international conference of psychology and educational sciences; 2014.

19. Gannadi F.M, MahmoudAlilou M. Prediction of Smoking, Alcohol, Drugs, and Psychoactive Drugs Abuse Based on Emotional Dysregulation and Child Abuse Experience in People with Borderline Personality Traits. etiadpajohi 2014; 8 (30) :97-112. <u>http://etiadpajohi.ir/article-1-646-fa.html</u>

20. Mikaili F. Emotion Dysregulation in Individuals with Risky Sexual Behaviors and Normal People. J Mazandaran Univ Med Sci 2014; 23 (109): 206-214. <u>http://jmums.mazums.ac.ir/article-1-3264-fa.html</u>

21. Akbari Booreng M, Mohtashaminia S, Salarifar M.H. Determination of the Tendency to Addiction According to Self-Differentiation and Alexithymia in University Students. J Police Med 2017; 6(2): 31 <u>http://jpmed.ir/article-1-493-fa.html</u>

22. Thorberg F.A., Lyvers M. Attachment, fear of intimacy and differentiation of self among clients in substance disorder treatment facilities. Journal Addict Behav, 2007; 31(4):732-7. DOI:<u>10.1016/j.addbeh.2005.05.050</u>

23. Latty Ch.R. Effects of differentiation on college. East Lansing: Michigan State University; 2016.

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