Abstract

Objective: Addiction is a chronic disease that is characterized by impaired individual, physiological, and social functioning. Wisdom and self-transcendence, protective factors, can be effective in predicting tendency to substance use. This study aimed to investigate the relationship of wisdom and self-transcendence with the tendency to substance use among university students. Method: Α descriptive correlational research method was used in this study. In this study, students of Azarbaijan Shahid Madani University constituted the statistical population where a 361-participant sample was selected using multi-stage cluster sampling method. Three-Dimensional Wisdom Scale (3D-WS), Adult Self-Transcendence Inventory (ASTI), and drug use tendency questionnaire were used for the purpose of data collection. The data were analyzed via Pearson correlation coefficient and multiple regression analysis methods. Results: The results showed that there is a significant relationship between components predictor variables and tendency substance use. Moreover, it was revealed that wisdom and self-transcendence can predict and explain variance of tendency to substance use (P<0.01). Conclusion: Since wisdom and self-transcendence can predict and explain variance of tendency to substance use, it is possible to reduce the rate of tendency to substance use by nurturing and promoting such characteristics.

Keywords: wisdom, self-transcendence, tendency to substance use

Explaining the Substance Use Tendency on the Basis of Wisdom and Self-Transcendence

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Introduction

In the past two and three decades, the world has encountered shocking statistics about the prevalence of drug use. According to the United Nation Office on Drugs and Crime (UNODC) (2015), it is estimated that a total of 246 million people (2.5%) or 1 out of 20 people between the ages of 15 and 64 years old around the world were using drugs in 2013. In recent years, drug use has been on the rise not only in adults but also in school students and college students, which has increased the concern of professionals about personal health, since this phenomenon has an adverse effect on students' personality and subsequently has some consequences for the society (Maktabi and Zargar, 2008). Also, the rapid spread of drug use in the student population and its harmful consequences such as lack of academic incentive, academic failure, physical and psychological illnesses, suicide, careless driving, aggressive behaviors, lack of identity, and high-risk sexual behavior indicated the necessity of planning and formulation of preventive intervention strategies (Perkins, 2002, quoted by Karami Rad et al., 2014). Therefore, in order to control this, it is necessary to take advantage of new approaches in prevention programs. In recent years, positive psychology has received much attention by psychologists who emphasize human potentials and talents rather than addressing abnormalities and disorders. This positive approach considers its final aim in identification of the methods that lead to the wellbeing and happiness of human being. Hence, the factors that make people be more adapted to the needs and threats of life are the most fundamental ones in this psychology approach. Meanwhile, wisdom and self-transcendence have special position in mental health and have been identified as protective factors against drug use tendency (Felker, 2011). Over the last few decades, wisdom has become an interesting research topic for psychologists, especially in terms of physical and psychological well-being behaviors (Ardelt, 2003; Kunzmann, & Baltes, 2003). In a wide range of definitions, wisdom is referred to as a set of "specialized knowledge in relation to the meaning and concept of life, and an indicator of emotional, motivational and interpersonal performance" (Cusmin & Baltes, 2003), "a kind of advanced cognitive function" (Dittmann-Kohli and Balts, 1990), "kknowledge of their own ignorance" (Meacham, 1990), "The art of problem-solving" (Arlin, 1990) and a combination of personality traits in cognitive, reflective, and affective dimensions. Ardelt, 2003). Wisdom is developed through thought and experience and in terms of cognitive, reflective and affective dimensions. Cognitive dimension reflects the desire to understand the truth and achieve a deeper understanding of life, including the acceptance of the contradictory aspects of human nature, the limitations of kknowledge, and unpredictability of life. Reflective dimension shows self-awareness and the ability to observe phenomena from different aspects, and emotional dimension is defined as sympathetic and compassionate love to others. It is often assumed that wise people have psychological health, have a unified and developed personality and can cope with life's problems (Assmann, 1994). Therefore, as

wisdom entails thinking, commitment, and taking responsibility for one's own behaviors and situations, thus as a source of humanity has functionality in the individual and the community life; and has n the following leads to wellbeing. In this regard, the study results of Ardelt (2003) show that there is a relationship between wisdom and general health, and the psychological development and integration of the individual, embodied in wisdom, plays an important role in determining one's well-being. Also, the results of various studies indicate that wisdom increases the ability and one's emotion self-regulation when encountered with difficult situations and reduces anxiety, stress, and mental comfort (Williams, Mangelsdorf, Kontra, Nusbaum, & Hoeckner, 2016; Kiken, & Shook, 2011 and Alberts, & Thewissen, 2011). In addition, researches have shown that wisdom plays a very important role in preventing or incurring addiction, maintaining recovery and avoiding use, and the higher the wisdom of individuals, the lower the drug use tendency (Perry et al., 2002; Felker, 2011; DiGangi, Jason, Mendoza, Miller, & Contreras, 2013).

The concept of self-transcendence is associated with spirituality and wisdom, and its definition is equally difficult (Felker, 2011). Self-transcendence is based on the perception of oneself as part of the world and its surrounding sources, and the ability to accept and perceive oneself and the environment as a whole that has been posited with the idea of mystical presence, religious belief, unconditional dignity and patience (Cloninger, 1991). Self-transcendence is in fact one of the mental needs of man, and is another explanation of human's meaning-seeking that allows one to think in depth and to deal with forces beyond himself/herself (Vachon, Fillion, & Achille, 2009). Reed (2008) suggests that self-transcendence, well-being and vulnerability are three key concepts that are interrelated. At the time of vulnerability (such as disease or addiction), selfinfliction acts as a mediator between vulnerability and well-being; Therefore, during vulnerability (e.g. disease or addiction), vulnerability acts as a mediator between vulnerability and well-being. Thus, as vulnerability experiences increase, wellbeing is reduced and self-transcendence is applied to reduce the negative impact of vulnerability on well-being. Hence, it is expected that by increasing self-transcendence, well-being also increases. In this regard, many researchers have reported a negative relationship between self-transcendence and psychological problems and this construct can be used as a mediator between mental health and many other variables (Jadid Milani, Ashktorab, Abed Saeedi and Alavi Magd. 2011; Coward 1995; Ramer, Johnson, Chan, & Barrett, 2006). Because individuals with high spiritual self-transcendence are interested in the beauty of nature and art and are patient and satisfied with their own life, and when faced with crises and events these personality traits can be useful and have a positive effect on keeping people away from drug abuse, ethical corruption, safety, and delinquency. Self-transcendence also increases the adaptability of people in poor living conditions, including illness, death, etc., which are

inevitable conditions. Hence, the reason that normal individuals don't use drugs is that they have high satisfaction of their life.

Perhaps one of the main reasons for substance abuse is Peoples' dissatisfaction with what they have in their life. On the other hand, the ability of these people to adapt to changes in life and the occurrence of adverse events, including illness and death, which is another reason for substance use, can be considered as a deterrent to drug dependence (Teimuri and Purnaghash Tehrani, 2013).

With regard to the sensitivity of the topic of addiction, especially the increasing prevalence of it among young people, and by taking into account the concepts of wisdom and self-transcendence, that is their consideration of painful issues of human life, vulnerability, spirituality, morality, well-being and mental health, it would seem necessary to consider these variables as protective factors against drugs use in order to take preventive and therapeutic measures by the responsible authorities, psychiatrists and addiction withdrawal professionals. As said, because a few researches have been carried out on the relationship between these variables and the tendency to drug use, the significance of this research is illustrated. Therefore, the purpose of the present research was to answer the question of whether wisdom and self-transcendence are capable of explaining and predicting the drug use tendency.

Method

Population, sample, and sampling method

A descriptive correlational research method was used in this study. Students of Azarbaijan Shahid Madani University constituted the statistical population in the academic year of 2015-2016. Out of 5442 students, a sample of 361 students was selected by Krejci and Morgan based on a multi-stage cluster sampling method from 7 faculties. Among seven faculties, five faculties were selected and of each faculty, two classes were selected and the questionnaires were distributed among students.

Instrument

1-Three-Dimensional Wisdom Scale (3D-WS): three-dimensional wisdom scale is based on the concept of wisdom developed by Clayton and Birren (1980), which was designed by Ardlt in 2003 and consists of 39 questions. In this scale, wisdom is considered as a latent variable with cognitive, reflective, and affective indices. These three dimensions are not independent of each other. Reflective dimension is very important as the foundation for the growth of two other dimensions. The two 5-point Likert scale are used to measure the data, ranging from 1 to 5 (1 = totally agree, 5 = totally disagree, 1 = very correct, 5 = not at all true). In the study of Ardlet in evaluation of validity and reliability of this scale, Cronbach's alpha of cognitive, reflective and affective dimension is 0.71, 0.75 and 0.66, respectively in the student sample, and 0.78, 0.75, and 0.74 in elderly sample. Cronbach's alpha of the total of three dimensions of wisdom in the

student sample was 0.72 and in the elderly sample was 0.66 (Ardelt, 2003). In this research, Cronbach's alpha of total scale is 0.77

2-Adult Self-Transcendence Inventory (ASTI): This questionnaire is designed by Lonson et al. (2005) and consists of 18 self-report items. In this questionnaire, each person is asked to compare his opinion with regard to the characteristics that assesses self-transcendence compared to the five years ago. The items are rated on a four-point Likert scale from totally disagreed to totally agree. In the factor analysis, this questionnaire revealed two factors: self-alienation and self-transcendence that are negatively correlated. A questionnaire was conducted on 341 university students in a large sample of professors, staff and students. For analysis, Cronbach's alpha was used and acceptable internal consistency was shown for subscales (self-transcendence, 0.75 and self-alienation, 0.64). To assess the convergence validity, the Neo trait questionnaire (Mccrae, & Costa, 1989) was applied. The results showed that the scores of this questionnaire had a negative relationship with neuroticism (0.86) and positive relationship with openness to experience (0.74), agreeableness (0.73), conscience (0.85) and extraversion (0.79).

3-Drug use tendency questionnaire: This questionnaire has 16 questions and its overall objective is to measure the tendency to addiction in three dimensions: individual, social and environmental. The responding rate to the questionnaire is Likert scale (very low = 1, very high = 5). In order to obtain the overall score of the questionnaire, the total score of all questions is collected together. This score ranges from 16 to 80, and the higher the score, the greater the tendency of the respondent to addiction, and vice versa. The validity of this questionnaire has been obtained in the research of Mirhasemi (2009) as 0.79.

Findings

The samples were 201 males and 160 females aged 18 to 35 years old. The mean age of boys was 21.67 ± 1.42 and the mean age of girls was 21.37 ± 2.87 . Table 1 presents descriptive statistics of study variables.

Table 1: Descriptive Statistics of Variables Studied by Sex

Variables	Component	Girl (n=160)		Boy (n=201)		Total (n=361)	
		Mean	SD	Mean	SD	Mean	SD
Wisdom	Cognitive	46/11	7/16	42/11	7/85	43/89	7/80
	Reflective	38/77	5/46	35/82	4/30	37/13	5/06
	Affective	40/77	6/84	38/14	5/92	39/31	6/47
Self- transcendence	Self- transcendence	27/40	3/54	27/19	3/67	27/28	3/61
	Self-alienation	15/79	3/84	17/98	3/06	17/01	3/59

The correlation matrix of wisdom and self-transcended with the tendency to drug use is presented in Table 2.

Table 2: Correlation Matrix of Dimensions of Wisdom and Self-transcended with Drug Use Tendency

Diag est rendency							
Variables	Environment	Individual	Social	Total drug use tendency			
Cognitive	*-0/12	-0/10	**-0/15	**-0/16			
Reflective	**-0/21	**-0/15	*-0/11	**-0/20			
Affective	0/009	-0/08	-0/06	-0/06			
Total wisdom	**-0/14	**-0/15	**-0/15	**- 0/19			
Self- transcendence	-0/09	**-0/13	*-0/13	**-0/15			
Alienation	*0/12	**0/17	*0/11	** 0/17			

^{*}p<0/05 **p<0/01

To test the hypothesis, multiple regression analysis with concurrent method was used. Before the analysis, the regression assumptions were examined. One of the presumptions of the sample size regression is that the various authors have had different suggestions in this regard. Tebakhning and Fidel (2007) presented the following formula for calculating the sample size according to the number of predictor variables: N > 50 + 8m (number of predictor variables = m). In this research, there are two predictor variables that according to the formula should have a sample size greater than 66; with a sample size of 361, this assumption is established. In order to investigate the role of wisdom components in predicting the tendency to use drugs, multiple regression analysis was used as enter method. The results showed that the wisdom dimensions were able to predict 5 percent of changes in drug use tendency. The calculated regression coefficients are presented in Table 3.

Table 3: Regression Coefficients of the Tendency to Substance Use based on the

		Component	s of wisdom		
Variables -		Non-Standard coefficients		T	Sianifia ana a
	B Value	Standard error	β	statistics	Significance
Constant	54/75	3/90	-	14/03	0/0005
Cognitive	-0/14	0/06	-0/13	-2/27	0/023
Reflective	-0/29	0/08	-0/18	-3/38	0/001
affective	0/03	0/07	0/02	0/44	0/656

To investigate the role of self-transcendence components in the prediction of drug use tendency, multiple regression analysis was used as enter method. The results showed that self-transcendence dimensions were able to predict 12 percent of changes in drug use tendency. The calculated regression coefficients are presented in Table 4.

Table 4: Regression coefficients of drug use tendency based on self-transcendence components

components						
Variables	Non-standard coefficients		Standard coefficients	T	Significance	
variables	value B	Standard error	β	statistics	significance	
Constant	37/55	3/64	-	10/30	0/0005	
Self-transcendence	-0/36	0/11	-0/15	-3/18	0/002	
Alienation	-0/26	0/12	0/11	2/19	0/02	

Discussion and Conclusion

The results of the study showed that wisdom has a negative relationship with drug use tendency. That is, the higher the wisdom of students, the lower the tendency to use drugs. This finding is in line with the findings of Perry et al. (2002), Felker (2011) and Daigangi et al. (2013). In explaining this, it can be said that wisdom is regarded as a valuable personality trait that is associated with knowledge and communication with oneself, the environment and others (Berry, 1987, and Golmen, 1995) and includes a kind of intelligence that derives from individual experiences (Jeste et al., 2010). Wisdom is also a multifaceted structure that incorporates knowledge related to ambiguity of life and evaluates the individual's ability to understand reality from different aspects, caring for others and interpersonal attitudes (Ardelt, 2003). Therefore, since wisdom involves thinking, commitment and taking responsibility for its own behaviors and situations, it can act as a strong protector against substance abuse. Also, in definitions that emphasize the combination of cognition and affection, wisdom requires a cognitive transformation that is associated with the transformation of "I", in which cognition, affection and personality are interconnected and their common ground is the will. In these conceptualizations, in addition to cognitive abilities, social relationships and important experiences in life and personality traits should also be considered (e.g. affection and sensitivity to emotional indicators), which makes possible the perception of the intentions of others and facilitates empathic perception (Marchand, 2003; Asadi et al., 2015). From the viewpoint of theorists, wisdom consists of three dimensions of cognitive integration, objectivity in action, and a positive impact on oneself and others in the long term to keep their interests (Young, 2013). When the integration of these dimensions is increased, one can use it to resolve conflicts that arise from life plans, values, motivations, self-assessments, ideal behavior, and the actual behavior of individuals and different knowledge. (Ardelt, 2003). Therefore, it seems that such ability helps people to cope with the difficulty of life and find solutions to it and give dynamics to their life. Such dynamics probably helps people gain a deeper meaning of life and become more resistant to issues like addiction. According to Adler's theory, one of the dimensions of wisdom is the cognitive dimension that in the present study negatively predicted the tendency

toward drug use. The cognitive dimension refers to the individual's ability to understand life, perceive deep meaning of inner and interpersonal issues. Individuals who get high scores in this dimension can consider the positive and negative aspects of human nature and tolerate uncertainties and unpredictable aspects of life (Ardelt, 2004). Such people have a rational approach to the world and its problems, and they can solve barriers and problems of life in a rational way, and they can take an objective and rational path to understand reality. Therefore, it seems that such features prevent a person from being inclined to use drugs and can be useful.

Reflective dimension is another aspect of wisdom that negatively predicted drug use tendency. Reflective dimension refers to the ability to perceive reality without any distortion, and represents a person who reflects from the different perspectives by considering situations an events to develop their insight and selfawareness (Ardelt, 2003). Those who achieve higher scores in this dimension of wisdom do not necessarily have more facts than other people, but they understand the deeper meanings of the generally known facts for themselves and the others, and instead of the mere reaction to phenomena and events, they examine them from different perspectives. Actually, they acquire awareness through reflection on their own behavior and go beyond self-centeredness, subjectivism, and projection, which are the main causes of distortion of the truth. These features make it possible for someone to protect himself when exposed to vulnerability situations such as addiction. The last component of wisdom is the affective dimension, indicating the individual's behavior towards others and a level of compassionate and sympathetic love. This dimension measures the person's positive behaviors and excitement toward other people in the absence of negative emotion and indifference. The results of the study showed that the affective dimension of wisdom has no significant relationship with drug use tendency and can not predict it. Since the questionnaire of dependent variable (drug use tendency) emphasizes on individual issues, affective dimension in wisdom questionnaire is compassionate and empathic love to other people; the tendency towards substance use and affective dimension are not in the same direction, so the affective dimension is not able to predict the tendency to drug use.

Another finding of this study is that self-transcendence is negatively related to drug use tendency, and the higher the student's self-esteem score, the lower the tendency to drug use in them. It also predicted a negative tendency toward drug use. This finding is consistent with the results of the studies of Ali Mohammadi, Shibani Noghabi and Zahedi Tajrishi (2012), Oruki, Makeri, Kiayi Zayrabi (2013) and Felker (2011). In the explanation of this study, it can be said that self-transcendence represents individual differences in the judiciary and ethical functions and expresses characteristics such as neglecting oneself, accepting spirituality. According to Maslow, self-transcendence is a need helping each person to perceive his potential through realization of potential

talents (Sanzo, 2009). In his view, self-transcendence is formed when a person searches a reason beyond himself and seeks empathy and intimacy experience beyond his boundaries (Venter, 2012). According to this view, a healthy person refers to a person who is not self-centered and is successful in adaptive behaviors such as mastery and competence. Therefore, their personal growth is not affected by the environment. Maslow believes that individuals at this motivated level go beyond their dual nature and are guided by internal rules instead of social criteria and rely on their inner voice to develop the values and laws of life (Venter, 2012). Thus, individuals can increase self-transcendence through increasing selfawareness of perspectives that create negative excitement and decrease positive emotion (Cloninger, 2006), and protect themselves against risk factors of tendency to drug use. Reed (2008) considers self-transcendence to be an evolutionary feature that increases one's awareness of the environment and provides a deeper insight into life, and acts as a mediator between vulnerability (such as addiction) and wellbeing. Therefore, while vulnerability experiences increase, wellbeing is reduced and for reducing the negative impact of vulnerability on well-being, self-transcendence is applied. Hence, it is expected that by increasing self-transcendence, well-being also is increased (Reed, 2008). Individuals who gain high scores in self-transcendence are described as easygoing, contentious, creative, happy, and satisfied with life. These characteristics increase the adaptability of people in adverse conditions of life, thus, they can be considered as a deterrent to substance dependence. On the other hand, after alienation, it showed a positive relationship with the tendency towards drug use and predicted it positively and significantly. Self-alienated individuals are defined with some characteristics such as shyness, excessive sensitivity, isolation, lack of socialization, alienation sense, and separation from others and avoiding close relationships. Since isolation and escape from collective interactions are facilitators of narcotics tendency; young people who feel alienated have a social panic in relation to entering the community and prefer isolation and loneliness more to be present in the community. The risk of addiction threatens them more than others. Alienation itself can be due to the fact that one assumes that his life is planned and controlled not by himself, but by others. Thus, he is disappointed and believes that he is unable to control the factors that affect him (Jafarinia, 2009). Such people are confused when they are in a vulnerable and critical condition or are pressurized by their peers for drugs use, they can not assess their strengths and weaknesses, they are inexperienced in dealing with their individual and social actions, and this lack of social development can be considered a serious threat along with addiction.

Based on the findings of the research, it is recommended to prevention specialists to pay close attention to the dimensions of wisdom and self-transcendence in individuals at various levels of planning and to pay attention to the above-mentioned capacities in adolescents and young people through social and cultural interventions.

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