

The investigation of personality characteristics in athlete and non-athlete students

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ABSTRACT

The purpose of this study was comparison of big five personality traits including Neuroticism, Extraversion, Openness to experiences, Agreeableness and Conscientiousness between athlete (n=263) and non-athlete (n=263) students. To evaluation of variables, NEO-FFI (revised short form) personality questionnaire used that designed by Costa & McCrea (1992). Independent T-test was used to comparison of athlete and non-athlete students in five personality traits. The research results showed that there were significant differences between groups in neuroticism, extraversion, agreeableness and conscientiousness, but, no any differences observed between groups in openness to experiences. Athletes' group gained higher score at Extraversion, Agreeableness and Conscientiousness and lower score at Neuroticism.

Key words: Personality, Big Five Personality Traits, Athlete Students, Non-Athlete Students.

INTRODUCTION

Today, psychology pays great attention to the subject of personality, to an extend that most psychologists try to put light on its many different dimensions through varying perspectives [14]. Connecting the subject of personality to athletics, it is worthy to note one of the most eminent ideologies that states: exercising, through various ways, plays a positive role in a person's mood and character. These positive effects may be temporary or permanent, however, personality growth cannot be denied as one of the most important factors resulting from exercise. In addition to personality growth, athletics has played an important role in the presentation of a person's title or social position [2]. Exercising serves as an opportunity in facing problems and extracting suitable ways in defying them [6]. A grand part of the research done on the subject of sport psychology has over-reviewed different aspects of characterization or personality in the athletic and the non-athletics. A revision of the NEO Personality Inventory by Costa and McCrae (1992) is a type of a self-test about personality aspects, which is based on a well-known characterization model, called the 'Five Factor Model'/ Big Five personality traits. Presently, a vast number of psychologists believe that the foundation of a human being's personality is dependent on and shown by these five factors [10]. Everybody deals with these factors and their personality profile, consisted of the five factors, can be drawn out. Based on this model, a character or personality is consisted of the five major aspects of: Neuroticism (N), Extraversion (E), Openness to Experiences (O), Agreeableness (A), and Conscientiousness (C) [5]. Out of the five factors, two of the Extraversion and Agreeableness are connected to the personality attributes related to a second person. The Conscientiousness factor, fundamentally, includes attributes connected to an aim-oriented behavior and also controlled manners that are connected to being socially acceptable [8]. In the Neuroticism factor, a force of aroused stability is in conflict with a handful of negative excitements, for instance, grief, negative stimulation, panic, etc. Openness to Experience, on the other hand, is related to a person's inner growth, depth and level of mind

complication, as far as personal experience is concerned [12]. Using the Five Factor scale, Kajtna et al. (2004) compared the personality differences between athletes doing high-risk sports (Alpine climbing, skiing, paragliding, white-water rafting, mountain biking, motorcycling, Ski jumping, and speed skiing) and athletes doing low risk sports [swimming, athletics, Kayak sailing, mountaineering, Nordic walking, karate, canoeing). They arrived to the conclusion that in comparison to low risk sport athletes, high-risk sport athletes gained better scores on emotional stability and lower points on Conscientiousness and Openness to Experience. As far as the Agreeableness was concerned, there was no difference between the two groups. This survey had been done using the Five Factor Model, nonetheless, it did not study the difference between athletes and the non-athletes [7]. In another survey, Filho et al. (2005) studied the difference in character between the non-athletes and renowned Brazilian athletes (in volleyball, basketball, judo and swimming) and noticed differences between the two groups regarding eight personality traits. These were: avoiding to expressing one's feelings, moodiness or quick sensitivity, rudeness or impoliteness, laziness, justness, health issue cares, frankness and excitement patterns. In this survey, a Twelve Factor Model had been used, where eight of the factors turned differing [6]. The aim of our survey, on the other hand, was to compare five personality elements in both groups of athletic students and non-athletic students in Tehran University, in order to answer the question whether there are personality differences between people who do sports and ones who do not, in general and if yes, to what degree.

MATERIALS AND METHODS

The present research is from the explanatory, reason-comparative type. Primary information has been collected by NEO-FFI personality questionnaire (the shortened and revised version of the Big Five Personality traits by Costa and McCrae (1992).

Research Sampling: The research board consists of all male students in Tehran University who had studied during the first half of the 88-89 academic years. To indicate the bulk of the sample, first, the male, athletic and the non-athletic students were separated. Then, by the use of Cochran's bulk indicating formula, the bulk of the athletic sample students, that of the 263 persons, was indicated. Later the same number was used to sample non-athletic students. Finally, after the bulk indication, questionnaires were distributed among and later collected from the sample groups, according to accidental sampling conditions.

Variables in the Research: Independent variables in this research were that of the physical activity and exercise. The dependent variables were those of the five factors of personality: psychiatric affliction or Neuroticism, Extraversion, Agreeableness, Openness to Experiences and Conscientiousness.

Analyzing the data: After having made sure that the distributed were those of the normal type, by Kolmogorov-Smirnov test; to find out the differences between the groups, the Independent T- test was used.

RESULTS

The highest average of the relevant personality factors in the athletics' group was scored for Extraversion with an average of 4.16 and the lowest for the Conscientiousness with an average of 3.00 (table 1).

Table 1. Descriptive statics of Personal traits in athletic and non-athletic students				
	athletic students		non-athletic students	
Factor	Mean	S.d	Mean	S.d
Neuroticism	3.30	1.30	3.93	1.17
Extraversion	4.16	0.88	3.41	1.00
Openness to Experiences	3.06	1.44	2.82	1.25
Agreeableness	3.33	1.05	2.52	1.17
Conscientiousness	3.00	1.29	2.19	1.03

Table 2- T-test for Equality of Means					
	Levene's Test for Equality of Variances		T-test for Equality of Means		
	F	Sig.	t	df	Sig. (2-tailed)
Neuroticism	0.122	0.729	-3.35	524	0.001
Extraversion	0.289	0.593	2.96	524	0.01
Openness to Experiences	0.179	0.189	0.860	524	0.091
Agreeableness	0.483	0.489	3.36	524	0.001
Conscientiousness	0.073	0.788	2.56	524	0.022

The highest average of the studied personality traits in the non-athletic group belonged to that of Neuroticism with an average of 3.93 and the lowest to Conscientiousness with an average of 2.19 (table 1). T-test results showed that there are meaningful statistical differences between the athletic and non-athletic student groups regarding the factors

of Neuroticism, Extraversion, Agreeableness, and Conscientiousness. On the other hand, the groups did not show any significant differences for Openness to Experience. In conclusion, the variable averages show that the athletic students are on a higher stand regarding the three traits of Extraversion, Agreeableness and Conscientiousness, in comparison to the non-athletics. However, they remain on a lower stand regarding the Neuroticism trait.

DISCUSSION AND CONCLUSION

This research has been aimed towards the comparison of the Big Five personality traits, OCEAN, among the athletic and non-athletic male students in Tehran University. Results showed that there is significant difference between the two types of students when looking at the Neuroticism and Extraversion traits. The research findings are parallel to results by Shokri et al. (2009), Mohammadi (2009), Burnik et al. (2005) and Phil Ive et al. (2005); however, in contrast with Steere (2002), Naseri Tafti (2002) and Reiter et al. (2007) findings. The reason for such differences could be resulting from the different approaches and tools for collecting information. In our research, an edited NEO-FFI form was used. In addition, when examining, a different society, differing sexual behavior should also be considered. Other findings in the present research are the lack of a considerable difference for the Agreeableness trait in between the two student groups. This certain finding from the research, from the content's perspective, is parallel to Naseri Tafti (2007), Burnik et al. (2005) and Reiter et al. (2007) findings; but again different from Steere's (2002). There was considerable difference between the athletic and the non-athletic students for traits such as Agreeableness and Conscientiousness. This part of the findings is again parallel to results from Naseri Tafti (2004) and Besharat (2008) but, this time, there were no dissimilar results from other researcher. Most of the research done in this area show a higher score for Agreeableness and Conscientiousness in athletic rather than the non-athletics.

In general, even though different researchers had used different methods to compare the athletic and the non-athletic people's personality traits, their findings have all been, more or less, the same. The observed differences in researches done during the many number of years could be a result of a few things. One of the reasons, as already mentioned, could be that of using different tools. In addition, interfering and changing variables (social position, economic situation, sexuality, age, etc.) in different societies should not be neglected. With regards to all said, researches show that, in general, people who do sports are much different in personality than those who don't. These differences do not necessarily show one group's superiority or preference to the other.

REFERENCES

- [1] Besharat MA, *Journal of Psychological Science*, **2008**, 23: 233-247.
- [2] Bettina FP, Noemi K. *Journal of Community Health*, **2006**, 31(2): 136-145.
- [3] Burnik S, Jug S, Kajtna T, Tusak M, *Acta Univ, Palaka, Olomuc, Gymn*, **2005**, 35(2): 13-18.
- [4] Costa PT, McCrae RR, Revised NEO Personality Inventory (NEO-PI-R) and NEO Five-Factor Inventory (NEO-FFI) professional manual, Psychological Assessment Resources, Odessa, FL, **1992**
- [5] De Fruyt F, De Clercq BJ, van de Wiele L, Van Heeringen K, *Journal of Personality*, **2006**, 74(2), 479-510.
- [6] Filho MGB, Ribeiro LCS, García FG, *Rev Bras Med Sport*, **2005**, 11(2): 114-118.
- [7] Kajtna T, Tušák M, Barić R, Burnik S, *Kinesiology*, **2004**, 36(1):24-34.
- [8] McGhee RM, Ehrler DJ, Buckhalt J, *Five factor personality inventory - children (FFPI-C)" Austin, TX: Pro-Ed*, **2007**.
- [9] Mohammadi Z, *MA Thesis, Faculty of Education and Psychology, University of Isfahan*, **2009**.
- [10] Naseri Tafti, *MA Thesis, Faculty of Education and Psychology, Shahid Beheshti University, Tehran*, **2007**.
- [11] Reiter MD, Liput T, Nirmal R, *College Student Journal*, **2007**, <http://www.findarticles.com/>.
- [12] Saulsman LM, Page AC, *Clinical Psychology Review*, **2004**, 23: 1055-1085.
- [13] Shokri, Daneshvarpour, Asgari, *Journal of Behavioral Science*, **2009**, 2: 127-142.
- [14] Skelton L, Dennis MA, *Perceptual and Motor Skills*, **1991**, 72: 175-182.