

Effects of Attitude towards Fashion on Participation of Adolescent Students in Physical Activity: Applying the Theory of Planned Behavior

Ali Ghadami¹, *Taher Bahlekeh², Asra Askari², Zynalabedin Fallah³

¹PhD Student, Department of Physical Education, Gorgan Branch, Islamic Azad University, Gorgan, Iran.

²Assistant of Professor, Department of Physical Education, Gorgan Branch, Islamic Azad University, Gorgan, Iran. ³Associated of Professor, Department of Physical Education, Gorgan Branch, Islamic Azad University, Gorgan, Iran.

Gorgan, Iran.

Abstract

Background

Consequences of fashion tendency on adolescents' behaviors are not well documented. Therefore, the purpose of the present study was to investigate the effects of attitudes toward fashion on participation of adolescents' students in physical activity and sport. We applied the theory of planned behavior as theoretical basis in the present study.

Materials and Methods: The present descriptive-correlational study was conducted on 384 students (192 boys and 192 girls) aged 12 to 15 years (mean age of 13.81 ± 0.75 years) in grades 1, 2, and 3 from regular middle schools of Saqqez city, Kurdistan province, Iran, in 2019. The dependent variables included attitude, subjective norms, perceived behavioral control, intention, and actual physical activity which were measured by standard questionnaires. Mann-Whitney U test, Spearman test, and structural equation method by using Smart-PLS software were utilized to analyze data.

Results: Results of Mann-Whitney U tests revealed no significant differences between boys and girls in all research variables. There were significant relationships between the components of the theory of planned behavior (e.g., attitude, subjective norms, and perceived behavioral control) regarding fashion with intention to physical activity and actual physical activity behavior in adolescents (all $P < 0.001$). Furthermore, the results of path analysis indicated that the components of the theory of planned behavior (e.g., attitude, subjective norms, and perceived behavioral control) regarding fashion significantly influenced intention to physical activity and actual physical activity behavior of adolescents (all $T > 1.96$).

Conclusion

People who tend to use fashion might consider sport and physical activity as a means to achieve good body fitness so that the clothes look more beautiful on their bodies.

Key Words: Adolescents, Fashion, Physical activity, Theory of Planned Behavior.

*Please cite this article as: Ghadami A, Bahlekeh T, Askari A, Fallah Z. Effects of Attitude towards Fashion on Participation of Adolescent Students in Physical Activity: Applying the Theory of Planned Behavior. Int J Pediatr 2021; 9(1): 12893-900. DOI: [10.22038/IJP.2020.51426.4087](https://doi.org/10.22038/IJP.2020.51426.4087)

*Corresponding Author:

Dr. Taher Bahlekeh, Assistant of Professor, Department of Physical Education, Gorgan Branch, Islamic Azad University, Gorgan, Iran

Email: talihaoner@yahoo.com

Received date: Jul.18, 2020; Accepted date: Nov.12, 2020

1- INTRODUCTION

One of the social phenomena that is spreading in today's society is fashion. Excess in fashion tendency is identified as one of the social behaviors of today's environments. The word "fashionism" is a temporary method that regulates the taste of the people of a society and lifestyle, including the form of clothing, the type of etiquette and socializing, and the decoration and architecture of the house. Fashionism refers to the sudden and frequent change of tastes of all or some people in a society and leads to a tendency to a certain behavior, or the consumption of a particular good, or to adopt a certain lifestyle (1- 3). Some claim that fashion is a manifestation of individualism, and some consider it a collective thing to follow individuals to common patterns of cultural consumption, including tastes and fashion. Thus, fashion is a form of symbolic consumption by which people show their individuality and uniqueness in the context of urban communities and contemporary masses (4, 5).

Fashion is a phenomenon that has spread dramatically in today's world. This social process is unprecedentedly rooted in the social layers of modern societies, so that many consider it inevitable or some even emphasize its positive functions for social life (1, 6, 7). In this regard, several theories have been developed that will be enlightening to strengthen the systematic insight and attitude to understanding fashionism. Modern society has turned the human body and related issues into social phenomena with cultural and symbolic value. The development of health technology, nutrition and sports, beauty and fashion industry, increasing interest in youth and the mediation of culture (especially the emphasis on having a beautiful and young body) have been influential in the improved position of the body and the physicalization of culture (8, 9). Thus, beliefs towards fashion might

affect participation of adolescents and young people into sport participation. Sport participation and decreasing sedentary behaviors can positively promote healthy outcomes and decrease healthy problems in human being (10-13). Therefore, the purpose of the present study was to investigate whether beliefs towards fashion can affect sport participation of adolescents. The present study was theoretically based on the propositions of the theory of planned behavior (14, 15).

The theory of planned behavior has been proposed by Ajzen (14-15) and was based on the propositions of the theory of logical action (16). This theory predicts the occurrence of a special behavior in human-being. According to this theory, the intention to perform a behavior is predicted by three factors including "attitude towards behavior", "subjective norms" and "perceived behavioral control" (**Figure. 1**).

"Attitude towards behavior" refers to the extent to which the respective behavior is desirable, pleasant, useful or enjoyable to the person; which depends on the individual's judgment about the effects and consequences of behavior. "Subjective norms" refers to the amount of social pressure perceived by the individual to perform the behavior (i.e., the reflection of social influence on the individual). "Perceived behavioral control" is the degree to which a person feels that he or she is in voluntary control over performing or not-performing a behavior (14-15).

A large body of research investigated the propositions of the theory of planned behavior in the physical activity and sport participation context. For example, Tsorbatzoudis (17) tested the effectiveness of an intervention based on the theory of planned behavior on participation of high school students in sport and exercise. Results indicated that the intervention improved attitudes towards physical activity, perceived behavioral control,

intention, and self-reported actual behavior. Jackson et al. (18) examined propositions of the theory of planned behavior with additional variables (descriptive norm, moral norm, anticipated affective reaction, self-identity and past behavior) for physical activity intentions and participation. Moral norm, self-identity and past behavior each explained additional variance in intentions, over and above the theory of planned behavior variables. Past behavior moderated the impact of descriptive norm on intentions. Intentions, self-identity and past behavior were significant predictors of physical activity behavior.

Bae et al. (19) analyzed adolescents' participation behavior in new sports through the extended theory of planned behavior, including prior knowledge. The results found that attitude, subjective norm, and perceived behavioral control had a positive influence on participation intention, which further leads to participation behavior. In addition, prior knowledge had a positive influence on adolescents' attitudes and participation intention. Chatzisarantis and Hagger (20) investigated the application of an intervention based on the theory of planned behavior in promoting physical activity attitudes, intentions, and behavior among young people. Results demonstrated that participants presented

with the persuasive message targeting modal salient behavioral beliefs reported more positive attitudes and stronger intentions than participants presented with the message targeting non-salient behavioral beliefs. Although the theory of planned behavior is well documented in the physical activity domain, there are many other variables that can potentially affect sport participation among adolescents. One of these variables is beliefs toward fashion, which is an important factor in today's life of adolescents and young people.

Because the effect of attitudes toward fashion in adolescents' participation in physical activity and sport has not been well understood, the purpose of the present study was to investigate the effects of attitudes toward fashion on participation of adolescents in physical activity and sport on the basis of the propositions of the theory of planned behavior.

Based on the theory of planned behavior, it was hypothesized that 1) attitudes, subjective norms, and perceived behavioral control would positively affect intention to physical activity in adolescents, 2) subjective norms would positively affect actual physical activity behavior of adolescents, and 3) intention to physical activity would positively affect actual physical activity in adolescents (**Figure. 1**).

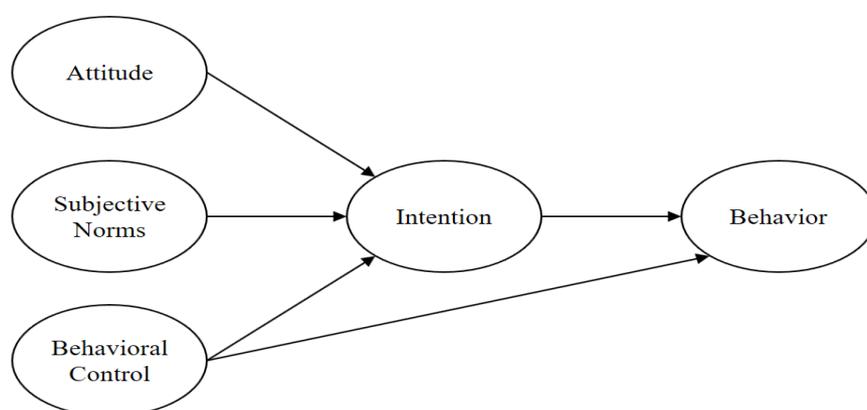


Fig.1: Proposed research model.

2- MATERIALS AND METHODS

2-1. Study design and population

This study used a descriptive-correlational approach. The participants were 384 students (192 boys and 192 girls) aged 12 to 15 years (mean age of 13.81 ± 0.75 years) in grades 1, 2, and 3 from regular middle schools of Saqqez city, Kurdistan province, Iran, in 2019 who were selected by using a simple random sampling method. The specified sample size was selected according to G*Power statistical software with an effect size of 80%, a test power of 0.8, and a significant level of 0.05 (21).

2-2. Measuring tools

Dependent variables included attitude, subjective norms, perceived behavioral control, intention, and actual physical activity. A questionnaire with 10 questions was used to measure the variables of the theory of planned behavior including attitude (4 questions), subjective norms (3 questions), and perceived behavioral control (3 questions). This questionnaire has used a five-point Likert scale from "strongly agree (5)" to "strongly disagree (1)". This questionnaire was adopted from Kim and Karpova (5) and in this study, its validity was assessed by twelve experts and its reliability was assessed where the Cronbach's alpha coefficient was 0.90, as well. Intention to physical activity was measured by using a 3-item scale which was adopted from Chatzisarantis and Hagger (20). First question of this scale has utilized a five-point Likert scale from "strongly agree" (5) to "strongly disagree" (1), and second question has applied an eight-point Likert scale from zero days (0) to seven days (7). In the current study, twelve experts corroborated the validity of this questionnaire and its reliability was assessed where the Cronbach's alpha coefficient was 0.90. Leisure-time physical activity was assessed using the Physical Activity Behavior in Leisure-Time Scale

(22), including three questions scored based on an eight-point Likert scale from zero days (0) to seven days (7). In the current study, twelve experts corroborated the validity of this questionnaire and its reliability was assessed where the Cronbach's alpha coefficient was 0.90.

2-3. Inclusion and exclusion criteria

Inclusion criteria included studying in Saqqez middle schools and consent to participate in the study.

2-4. Ethical approval

This study was approved by Ethics Committee of Islamic Azad University of Aliabad Katoul Branch (ID-Code: IR.IAU.AK.REC.1399.012). The participants voluntarily participated in the present study and written informed consent was obtained from the subjects and their parents.

2-5. Data analysis

In the current study, descriptive statistics consisted of means and standard deviations were used to describe the research variables. Kolmogorov-Smirnov test was used to measure normality of data. Mann-Whitney U test was used to compare the research variables between boys and girls. Spearman test was used to assess correlation between research variables. Structural equation method by using Smart-PLS software was utilized to test the proposed model of this study. Significance level was set at $P < 0.05$.

3- RESULTS

3-1. Descriptive data and gender differences

According to **Table. 1**, boys' and girls' means and standard deviations of ages were 13.78 ± 0.73 and 13.85 ± 0.77 years, respectively. The results of descriptive statistics showed that boys and girls had almost identical scores in attitude, subjective norms, behavioral control,

intention, and leisure-time physical activity (**Table.1**). Results of Kolmogorov-Smirnov test showed that research variables were not normally distributed (all $P<0.05$). Therefore, we used Mann-Whitney U test for analyzing gender

differences across research variables. Results of Mann-Whitney U tests revealed that there were not significant differences between boys and girls in all research variables (**Table.1**).

Table-1: Means of research variables in boys and girls.

Variables	Age	Attitude	Subjective Norms	Behavioral Control	Intention	Physical Activity
Boys (n=192)	13.78(0.73)	3.16(0.84)	3.59(0.93)	3.35(0.85)	3.41(0.73)	3.41(0.73)
Girls (n=192)	13.85(0.77)	3.17(0.84)	3.50(0.94)	3.37(0.84)	3.44(0.74)	3.44(0.74)
Mann-Whitney U	17295.00	18247.00	18345.00	18201.00	18121.00	18319.00
P-value	0.261	0.864	0.934	0.830	0.771	0.916

3-2. Relationship between variables:

Because research variables were not normally distributed, we utilized Spearman test to analyze the relationship between research variables (**Table.2**). As observed, there were significant relationships between the propositions of the theory of planned behavior (including attitude, subjective norms, and perceived

behavioral control) regarding fashion with intention to physical activity and actual physical activity behavior in adolescents (all $P<0.001$). Moreover, perceived behavioral control and intention to physical activity had significant relationships with actual physical activity behavior in adolescents (all $P<0.001$).

Table-2: Results of Spearman correlation tests between research variables.

Variables	1	2	3	4	5
1. Attitude	-				
2. Subjective Norms	$r=0.768^*$ $P=0.000$	-			
3. Behavioral Control	$r=0.786^*$ $P=0.000$	$r=0.700^*$ $P=0.000$	-		
4. Intention	$r=0.740^*$ $P=0.000$	$r=0.802^*$ $P=0.000$	$r=0.703^*$ $P=0.000$	-	
5. Physical Activity	$r=0.883^*$ $P=0.000$	$r=0.845^*$ $P=0.000$	$r=0.734^*$ $P=0.000$	$r=0.750^*$ $P=0.000$	-

*Significant at $P<0.001$.

3-3. Structural equation method: Table. 3 and Figure.1 represent the results of structural equation method. The results of path analysis indicated that the propositions of the theory of planned behavior (including attitude, subjective norms, and perceived behavioral control) regarding to the fashion had significantly influenced intention to physical activity

and actual physical activity behavior of adolescents (all $T>1.96$). In addition, intention to physical activity had significant impacts on actual physical activity behavior ($T>1.96$). Finally, intention to physical activity played a mediating role in the relationship between perceived behavioral control and physical activity behavior of adolescents ($P<0.01$).

Table-3: Results of path analysis between research variables.

	Path	β	T-value
1	Attitude - intention	0.493	6.55*
2	Subjective norms - intention	0.176	2.06*
3	Perceived behavioral control - intention	0.294	4.11*
4	Perceived behavioral control - physical activity	0.689	13.36*
5	Intention - physical activity	0.212	2.76*
		Z	P-value
6	Perceived behavioral control - intention - physical activity	3.113	P<0.01**

*T>1.96, **P<0.01.

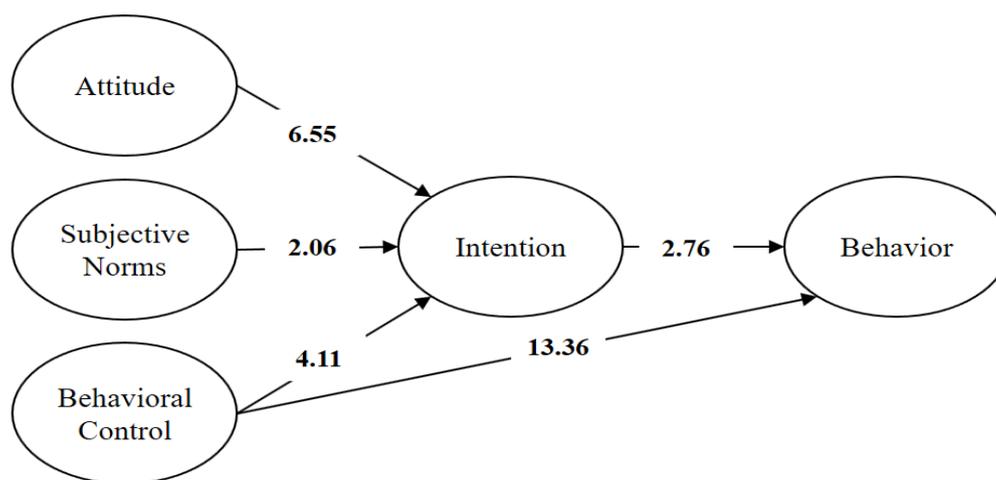


Fig.1: Research model in the form of T-values, *T>1.96.

4- DISCUSSION

Attitudes toward fashion is considered as an important phenomenon in today's life of adolescents and young people. However, the effects of attitudes toward fashion in adolescents' participation in physical activity and sport has not been well investigated. Therefore, the purpose of the present study was to investigate the effects of attitudes toward fashion on participation of adolescents in physical activity and sport on the basis of the propositions of the theory of planned behavior (14-15). Based on the theory of planned behavior, it was hypothesized that 1) attitudes, subjective norms, and perceived behavioral control would positively affect intention to physical activity in adolescents, 2) subjective norms would positively affect actual physical activity behavior of adolescents, and 3) intention to physical activity would

positively affect actual physical activity in adolescents. In this study we investigated the propositions of the theory of planned behavior in the context of fashion as well as its effects on the participation of adolescents in physical activity and sport. As proposed by the theory of planned behavior, we found that attitude toward fashion, subjective norms, and perceived behavioral control were positively associated with intention to physical activity in adolescents. Furthermore, perceived behavioral control and intention to physical activity were positively associated with actual physical activity behavior in adolescents. The indication here is that if a person had a positive attitude toward fashion (attitude), wearing fashion is then socially acceptable by his or her peer group and other people surrounding (e.g., family members) that person (subjective norm). Additionally, the

perceived ability to control other factors (perceived behavioral control), then that person is likely to engage with the behavior. In other words, it was found that the adolescents wearing fashion are likely to have a positive attitude toward fashion, positive support from parents and friends, and a higher level of perceived behavioral control over wearing fashion. The results of the present study are consistent with previous research that attempted to investigate the propositions of the theory of planned behavior in sport and exercise contexts (17-20).

To interpret why attitude toward fashion might increase participation of adolescents in sport and physical activity, it can be stated that people who have favorable attitudes toward fashion are likely to express stronger intention to participate in physical activity and sport, because people consider sport and physical activity as a means to achieve good body fitness, and on the other hand, people who tend to use fashion also tend to have good fitness so that the clothes look more beautiful on their bodies. The results of the study by Sterlan et al. (23) are also consistent with the above finding that the more the women feel that they lack fitness, the more they turn to exercise because fashionable clothes that rely on slimming cause dissatisfaction among women.

Therefore, as mentioned above, the prevalence of style and design of clothing in society as a fashion can affect the tendencies of young people towards fitness, and of course, gaining fitness will be possible by participating in sports activities. The most important strength of the present study was that the relationships between attitudes toward fashion and participation of adolescents in sport and physical activity were examined by using the theory of planned behavior, which is one of the most famous theories in studying the predictors of people's behavior. Furthermore, among the

limitations of this research is its cross-sectional research design, which creates limitations for examining causal effects of attitudes toward fashion on participation of adolescents in sport and physical activity.

5- CONCLUSION

To conclude, the present study showed that attitude toward fashion, subjective norms, and perceived behavioral control were positively associated with intention to physical activity in adolescents. Furthermore, perceived behavioral control and intention to physical activity were positively associated with actual physical activity behavior in adolescents. These results may indicate that, today, fashion plays an important role in adolescents' life and authorities and parents must pay more attention to fashion tendencies of children and adolescents. Our findings can have some practical implications for authorities and parents. Based on the results of the present study, it can be recommended that authorities make decisions regarding design of fashionable clothes in accordance with the culture of the country. Moreover, it can be recommended that parents have more control over their children's use of fashion.

6- ACKNOWLEDGMENTS

We thank all teachers, students and their parents who cooperated in this study.

7- CONFLICT OF INTEREST: None.

8- REFERENCES

1. Aghazadeh A. Investigating the factors affecting the tendency towards fashion among professional athletes. *J Sport Psychol.* 2019; 28:165-78. (In Persian).
2. Khraim HS. The influence of involvement and awareness on UAE women attitude towards fashion clothing. *Int J Mark Stud.* 2018; 10(2):76-85.
3. Yaghoobi H, Mirmahmodi S. Moderation and identity crisis. First National Conference on Islamic Law and Management, Qom, Applied

Scientific University of Qom Governorate. 2016; (In Persian).

4. Bahar M, Zare M. Fashion modeling in Tehran: emphasizing women's coverage. *Women Res.* 2010; (7)3:27-48. (In Persian).
5. Kim H, Karpova E. Consumer attitudes toward fashion counterfeits: Application of the theory of planned behavior. *Cloth Text Res J.* 2010; 28(2):79-94.
6. Gazzola P, Pavione E, Pezzetti R, Grechi D. Trends in the fashion industry. The perception of sustainability and circular economy: A gender/generation quantitative approach. *Sustainability*, 2020; 12(7):2809.
7. Sabori K. Consumption, Tehran: Shiraz publishing house. 2012. (In Persian).
8. Keshkar S, Sattar N, Faridfathi A. The role of fashion on the young girls' tendency towards sport and fitness. *Appl Res Sport Manag.* 2017; 6(1):33-41. (In Persian).
9. Zokaee MS. The Youths, Body and Fitness Culture. *Iranian J Cultur Res.* 2007; 1:117-141.
10. Biswas A, Oh PI, Faulkner GE, Bajaj RR, Silver MA, Mitchell MS, Alter DA. Sedentary time and its association with risk for disease incidence, mortality, and hospitalization in adults: A systematic review and meta-analysis. *Ann Intern Med.* 2015; 162:123-32.
11. Chau JY, Grunseit AC, Chey T, Stamatakis E, Brown WJ, Matthews CE, Bauman AE, van der Ploeg HP. Daily sitting time and all-cause mortality: A meta-analysis. *PLoS ONE.* 2013; 8:80000.
12. Grøntved A, Hu FB. Television viewing and risk of type 2 diabetes, cardiovascular disease, and all-cause mortality: A meta-analysis. *JAMA.* 2011; 305:2448-55.
13. Roychowdhury D. Using physical activity to enhance health outcomes across the life span. *J Funct Morphol Kinesiol.* 2020; 5(2). <https://doi.org/10.3390/jfmk5010002>.
14. Ajzen I. From intentions to actions: A theory of planned behavior. In J. Kuhl & J. Beckmann (Eds.), *Springer series in social psychology* (pp. 11-39). Berlin, Germany: Springer. 1985.
15. Ajzen I. The theory of planned behavior. *Organ Behav Hum Decis Process.* 1991; 50(2):179-211.
16. Fishbein M, Ajzen I. *Belief, attitude, intention and behavior: An introduction to theory and research.* Reading, MA: Addison-Wesley. 1975.
17. Tsorbatzoudis H. Evaluation of a school-based intervention programme to promote physical activity: An application of the Theory of Planned Behavior. *Percept Motor Skills*, 2005; 101(3):787-802.
18. Jackson C, Smith A, Conner M. Applying an extended version of the Theory of Planned Behaviour to physical activity. *J Sports Sci.* 2003; 21(2):119-33.
19. Bae J, Won D, Lee C, Paek S. Adolescent participation in new sports: Extended theory of planned behavior. *J Phys Educ Sport.* 2020; 20:2246-52.
20. Chatzisarantis NLD, Hagger MS. Effects of a brief intervention based on the theory of planned behavior on leisure-time physical activity participation. *J Sport Exercise Psy.* 2005; 27(4):470-487.
21. Faul F, Erdfelder E, Lang AG, Buchner A. *G*Power 3: A flexible statistical power analysis program for the social, behavioral, and biomedical sciences.* *Behav Res Methods.* 2007; 39:175-91.
22. Godin G, Shephard RJ. Godin Leisure-Time Exercise Questionnaire. *Med Sci Sports Exerc.* 1997; 29 June Supplement: S36-S38.
23. Strelan P, Mchaffey SJ, Tiggemann M. Self-objectification and esteem in young women: The mediating role of reasons for exercise. *Sex Roles.* 2003; 48:89-95.