

SOCIAL APPEARANCE ANXIETY OF FITNESS PARTICIPANTS

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ABSTRACT

Background. It is known that there are multiple associations between physical activity and psychology for human health. One of these associations is social appearance anxiety. Social appearance anxiety is a feeling of distress associated with the perceived evaluation of one's physical self. Some individuals feel relatively little anxiety over this perceived evaluation, while others are highly stressed. There are many studies on physical activity and anxiety, but fewer studies on the social appearance anxiety. Therefore, the aim of this research is determining social appearance anxiety of individuals interested in physical activity and examining it according to some variables.

Methods. The study group of the research consisted of 38 women (age = 28.53 ± 9.1 years), 190 men (age = 26.43 ± 7.78 years) from four different fitness centres, with a total number of 228 individuals. The data were collected using Social Appearance Anxiety Scale as a data collection tool. Descriptive statistics, *t* test for independent groups and one-way analysis of variance (ANOVA), Tukey's multiple comparison; Kruskal-Wallis *H* test in the group not normally distributed were used as statistical methods for the evaluation of data.

Results. Adolescents and those aiming at losing weight demonstrated more social appearance anxiety compared to young adults and those aiming to keep fit.

Conclusion. It was determined that outgoing individuals demonstrated moderate levels of social appearance anxiety towards physical activity. Social appearance anxiety of individuals did not vary according to body mass index (BMI) and gender, but it varied in dependence age group and reasons for participating in physical activity. Thus it is said that the variables of age and reasons for participating in physical activity are determinant attributes of social appearance anxiety.

Keywords: exercise, fitness, anxiety.

INTRODUCTION

The importance individuals attach to their appearance is a fact recognized all over the world. Therefore, they try a lot of ways to leave a more favourable impression on others and to look attractive, muscular or beautiful (Yousefi, Hassani, & Shokri, 2009). Under the influence of TV shows, women wish to have a slimmer body while men desire to have a more muscular body.

In TV shows where thinness or attractiveness is represented as a cultural value, physical appearance may often take precedence over an individual's thoughts, behaviour or achievements (Cusumano & Thompson, 1997). This leads individuals to wish for an ideal physique and to experience social

appearance anxiety (Davison & McCabe, 2005). Mc Candles suggests that social life is based on person's physical attributes and bodily attitudes and emphasizes the psychological importance of body image (Özerkan, 2004).

Theoretical foundations of social appearance anxiety show that individuals seek to create a positive impression in the eyes of others, and it has been suggested that social appearance anxiety appears when individuals feel incapable of presenting a desired image to others (Hagger & Stevenson, 2010). Body mass index (BMI) most likely appears to be positively related to appearance-based social anxiety (Titchener & Wong, 2015). Studies have

shown a positive association between BMI and appearance-based social anxiety in female-only or predominantly female samples (Crocker, Sabiston, Kowalski, McDonough, & Kowalski, 2006; Diehl, Johnson, Rogers, & Petrie, 1998; Levinson et al., 2013). Furthermore, some studies have failed to find the BMI and appearance-based social anxiety association (Levinson & Rodebaugh, 2011).

Social appearance anxiety is a concept that has been recently investigated by researchers in association with participation in sports (Berry & Howe, 2004; Brunet & Sabiston, 2009; Dumciene, Gedviliene, & Mickevicius, 2015; Eriksson, Baigi, Marklund, & Lindgren, 2008; Haase, Prapavessis, & Owens, 2002). Studies conducted in exercise psychology have clearly highlighted the positive effects of regular participation in physical activity on physical and psychological health (Aşçı, 2002; Dishman & Jackson, 2000; Fox, 1997; Paluska & Schwenk, 2000). Particularly studies focusing on the effect of physical exercise on a set of psychological variables have indicated that regular participation in physical activity may have a direct positive effect on such psychological variables as depression (Dimeo, Bauer, Varahram, Proest, & Halter, 2001; Tilindienė, Emeljanovas & Hraski, 2014; McKercher et al., 2009; Mikkelsen et al., 2010; Ströhle, 2009), anxiety (Tarakci, Yeldan, Mutlu, Baydogan, & Kasapcopur, 2011; Martinsen, 2008), stress (Salmon, 2001), self-esteem (Fox, 2000), social self-efficacy (Alemdağ, 2013), body image (Hausenblas & Fallon, 2006) and happiness (Özkara, Kalkavan, & Cavdar, 2015) in normal samples.

As seen above, it is possible to find studies on the appearance anxiety of individuals who participate in physical activity. However, there is no study that investigates the reasons for participation in sports and body mass index of individuals interested in fitness along with their appearance anxiety. Thus, the present study aims to identify the perceptions of individuals interested in fitness sports toward appearance anxiety and to compare their perceptions with respect to gender, age, body mass index and reasons for their interest in fitness sports.

METHODS

Participants. The study group of the research consisted of 38 women (\bar{x} (age) = 28.53 ± 9.1 years), 190 men (\bar{x} (age) = 26.43 ± 7.78 years) from four different fitness centres, with a total number of 228

individuals who completed a questionnaire package that included *Social Appearance Anxiety Scale* and some demographic information. The sample group was just randomly selected from a fitness centre, so women's sample size was extremely lower than men's because men generally prefer such sports centres a lot in many parts of Turkey.

Procedures. This research used a questionnaire as data collection method. The questionnaire is a commonly utilized data collection tool in quantitative research (F. C. Nachmias & D. Nachmias, 1996). The questionnaires were distributed after obtaining the necessary permits from fitness centres' managers. The participation in the survey was voluntary.

Instrument. *Personal Information Form.* The Personal Information Form consisted of five questions related to the independent variables studied in the present research. These were as follows: gender, age, height, weight and the reason for going to the fitness centre (lose weight, keep fit, muscle mass, etc.) In this study, age categories were defined as follows: adolescents, 12–19 years; young adults, 20–34 years; and middle adults, 35–50 years, because most people who used fitness centres usually were in these age groups. Additionally, height and weight measurements were taken using standard protocol (height with a portable stadiometre, weight with portable electronic scales and without shoes) and then BMI (body mass index) was calculated using that data. Finally, research team asked all participants about the reasons for exercising and then they had to sign their answers on the questionnaire. Soon all the information except for height and weight was collected using a questionnaire.

Social Appearance Anxiety Scale (SAAS). The Social Appearance Anxiety Scale (Hart et al., 2008) is a 16-item assessment of anxiety about being negatively evaluated by others because of one's overall appearance, including body shape. Items are rated on an agreement scale from not at all (1) to extremely (5). Research on the psychometric properties of the SAAS demonstrated high test-retest reliability, good internal consistency, good factor validity, incremental validity (e.g., it was a unique predictor of social anxiety above and beyond negative body image indicators), and divergent validity in samples of nonclinical college men and women (Hart et al., 2008; Levinson & Rodebaugh, 2011). Internal consistency reliability in the present study was excellent for women (coefficient alpha = .97) and men (coefficient alpha = .96).

Statistical analysis. The data were collected using *Social Appearance Anxiety Scale* and personal information form as a data collection tool. Independent simple *t* test was used to assess differences between social appearance anxiety and gender, one-way ANOVA was used to access age differences, and Kruskal-Wallis *H* test in the group not normally distributed was used as a statistical method for the evaluation of data. The analysis was conducted using SPSS (Version20). A *p*-value of < .05 was used as the criterion for significance

RESULTS

Independent simple *t* test was conducted to test whether there were significant differences according to gender in the SAAS points.

Analysis showed that there were no significant differences between social appearance anxiety and gender of participants ($t_{(226)} = -1.19, p > .05$) (Table 1).

One way ANOVA was conducted to test whether there were significant differences according to age in the SAAS points. Analysis showed that there were significant differences between social appearance anxiety and age of participants ($F_{(2,225)} =$

3.62, $p < .05$). In other words, social appearance anxiety of participants was different depending on their age. According to the result of the Tukey's HSD test which was performed to determine which groups made differences between age groups, social appearance anxiety of the participants in the 12–19 age group ($\bar{x} = 2.02$) was determined to be higher than the social appearance anxiety of the participants in the 20–34 age group ($\bar{x} = 1.75$).

BMI of the participants, Kruskal-Wallis *H* test results taken from the SAAS scores are presented in Table 3. Analysis show that there is no significant differences between social appearance anxiety and BMI of participants.

Kruskal-Wallis *H* test results taken from the SAAS scores of participants who came to the gym for different reasons are given in Table 4. Analysis showed that there were significant differences between social appearance anxiety and causes of participants go to the gym ($\chi^2 (sd = 3, n = 228) = 14.44, p < .05$). This finding indicates that the reason to go to the gym shows different effects on the social appearance anxiety of the participants. Considering the average numbers of groups, apparently the highest concern seems to be with those who went to the gym to lose weight.

Table 1. Distribution of the SAAS points by gender

SAAS	Gender	<i>n</i>	\bar{x}	<i>Ss</i>	<i>sd</i>	<i>t</i>	<i>p</i>
	Women	38	1.70	0.69			
Men	190	1.84	0.65	226	-1.19	.24	

Notes. $p > .05$, SAAS – Social Appearance Anxiety Scale.

Table 2. Distribution of the SAAS points by age

SAAS (points)	Age	<i>n</i>	\bar{x}	<i>Ss</i>	<i>sd</i>	<i>F</i>	<i>p</i>	Sig. Dif.
	(1) 12–19	53	2.02	0.68				
(2) 20–34	138	1.75	0.61	2–225	3.62	.03*	1–2	
(3) 35–50	37	1.77	0.73					

Notes. $*p < .05$, SAAS – Social Appearance Anxiety Scale.

Table 3. The distribution of the SAAS points by BMI

SAAS (points)	Groups	<i>n</i>	Mean rank	χ^2	<i>sd</i>	<i>p</i>
	Low weight	7	118.50			
Normal	127	110.24	6.872	4	.14	
High weight	75	118.05				
Obesity-1	15	109.43				
Obesity-2	4	195.25				

Notes. $p > .05$, SAAS – Social Appearance Anxiety Scale.

SAAS (points)	Groups	<i>n</i>	Mean rank	χ^2	<i>sd</i>	<i>p</i>	Sig. Dif.
	(1) Lose weight	41	136.61	14.442	3	.00*	1–2
	(2) Keep fit	109	100.47				
	(3) Muscle mass	63	129.52				
	(4) Other	15	92.93				

Table 4. Distribution of the SAAS points by the reason of attending the fitness centre

Notes. $p < .01$, SAAS – Social Appearance Anxiety Scale.

DISCUSSION

This study conducted to examine social appearance anxiety of individuals participating in physical activity established that males had higher levels of social appearance anxiety than females but there was no significant difference between social appearance anxiety of males and females. This result is in parallel with those of the study conducted by Altintas and Asci (2005). Dogan (2009) also reported that men had higher levels of social appearance anxiety than women. The present study has also similar results to the study by Alemdag and Oncu (2015) on preservice teacher's participation in physical activity and social appearance anxiety. There may be a number of reasons behind such results. For instance, men are socially expected to undertake more initiatives, and fear and avoidance behaviours that arise due to social anxiety cannot be attributed to the male identity. Therefore, men may have higher social anxiety. However, Villiers (2009) reported that men had lower social anxiety than women. Such dissimilarity between the result of the present study and that of Villiers may be based on national differences in culture and gender relations. Western people are more relaxed communicating with each other easily and this is one type of culture for them, but Turkish society imposes more responsibility to men, thus men usually should be more sociable in Turkey if they wish to communicate with someone. This is why possibility of social appearance anxiety on men in Turkey is higher than that in women, and this is an expected result.

Based on the study results, there was a significant difference between Social Appearance Anxiety Scale (SAAS) scores of individuals participating in physical activity in terms of age variable. This difference was visible in the mean SAAS scores of individuals in the age group of 12–19 years participating in physical activity and those in the age group of 20–34 years. This result is similar to that of the study conducted by Alemdag (2013) on university students. Previous research

also lends support to this similarity (Schneier, Johnson, Hornig, Liebowitz, & Weissman, 1992; Kessler, Berglund, Demler, Jin, & Walters, 2005). Alemdag (2013) indicated that students in the age group of 17–19 years had the highest mean score of social appearance anxiety. This may result from the fact that individuals in the age group of 17–19 years still bear the traces of adolescence and have not yet completed their cognitive processes.

In the present study, no significant difference was found between SAAS scores and BMI of individuals participating in physical activity. This result is in parallel with the study by Örsel, Canpolat, Akdemir, & Özbay (2004). This result suggests that social appearance anxiety results from the discrepancy between the perceived and ideal body (Gruber, Pope, Lalonde, & Hudson, 2001; Ogden & Evans, 1996).

The study results revealed a significant difference between individuals participating in physical activity for different reasons (losing weight, keeping fit, looking muscular and others) in terms of their social appearance anxiety. The difference was observed between individuals participating in physical activity for losing weight and those participating in physical activity for keeping fit. Recent research also lends support to this result (Fox, 2000; Krane, Waldron, Stiles-Shipley, & Michalenok, 2001). Given that individuals participating in physical activity for losing weight are currently fat, it is an expected result that these individuals have high social appearance anxiety. Accordingly, it is a normal result that individuals participating in physical activity for keeping fit have low social appearance anxiety since they are currently fit. There are studies on the reasons for participation in physical activity (Kolt, Driver, & Giles, 2004; Jakobsson, Lundvall, & Redelius, 2014; Allender, Cowburn, & Foster, 2006) while the literature lacks a study that discusses these reasons with social appearance anxiety. Thus, the present study is believed to contribute to the literature in this area.

CONCLUSION

All in all, it seems that positive changes occur in the levels of social appearance anxiety of individuals participating in physical activity. On the one hand, physical activity leads to a change in the physical appearance of individuals; on the other hand, this change enables individuals to enhance their self-esteem and to have positive thoughts about the self. As it is clearly apparent

that participation in physical activity has numerous benefits to individuals, our most important task is to tell people the importance of physical activity and to set up areas and projects that attract them to physical activity. Moreover, in order to better understand the impact of physical activity on these concepts, such variables as a larger sample group, the role of the parent on sport, the economic condition of the parent and the availability of sports facilities in their neighbourhood should be discussed in future studies.

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