

Original Article

Association of Body Dissatisfaction with Mental Health Problems among Youth: The Moderating Role of Gender

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Abstract

Present study aims to investigate the moderating role of Gender between body shape dissatisfaction and mental health problems (i.e., depression, anxiety & stress) among young adults. A cross-sectional study design was conducted with a sample of 200 young adults ages between 19 to 27 years ($M = 21.30$, $SD = 2.80$) from different areas of Karachi. An online survey was forms were prepared which were comprised of Socio-demographic Information Form, DASS-21, and BSQ was distributed using convenient simply technique. Results show gender that gender is moderating the relationship between body dissatisfaction and mental health issues among youth. Regardless of mental health, gendered socialization in Pakistan, which encompasses appearance evaluations, dietary restrictions, and marriage expectations, has a distinct effect on body image. The study highlights the perception of youth's own body shape and its effect on mental health issues. In Pakistani culture body shape has been associated with the beautification of an individual, and females are much affected by this culturally sanctioned belief. Any youth are under continuous pressure to make their physique more attractive to be accepted and appreciated. If they are unable to meet those standards then they are at risk for mental health issues. To address this issue, it is crucial to change the perception of individuals to improve their wellbeing.

Keywords: Body dissatisfaction, mental health issues, depression, anxiety, stress, young adults

INTRODUCTION

Body dissatisfaction, defined as unpleasant thoughts and feelings about individual's body size, shape, or appearance, and it is a common condition that affects many people throughout their lives (Cash & Pruzinsky, 1990; Grogan, 2016). It is also known to be a major cause of disordered eating and it leads to mental health problems. It is sometimes said to be the first sign of an issue with one's body image (Grogan, 2016; Mitchison et al., 2017; Thompson & Stice, 2001).

Findings of an epidemiological study found that a significant number of young individuals are affected by body dissatisfaction, Moderate body dissatisfaction was observed in 37.9% of boys and 20.7% of girls. Clinically significant discontent was reported by 6.8% of boys and 19.6% of girls (McLean & Paxton, 2021). An another survey found that the number of people

aged 16 to 25 years reported to be unhappy with their bodies went up from 44.2% in 2009 to 75.2% in 2015.

A study conducted by Halliwell (2017) found that women are more likely to experience body dissatisfaction and internalize societal beauty standards, men also deal with significant dissatisfaction, particularly when it comes to their muscularity. Approximately 40% of men reported a negative body image, compared to 60% of women. other researchers like Stice et al. (2013) found that body dissatisfaction forecasted subsequent disordered eating in both sexes. The association was significantly influenced by gender, with a more pronounced effect observed in females, suggesting a gender-specific susceptibility to mental health problems.

Individual's body satisfaction/dissatisfaction is affected by socio-cultural factors which



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disproportionately affecting women and girls compared to boys and men, particularly through media, peer influence, and familial dynamics (Calogero & Thompson, 2010; Swami et al., 2009).

In Pakistan, body dissatisfaction is a significant growing concern for individuals of all ages and genders. Research indicates that females generally report higher levels of body dissatisfaction and internalization of societal appearance ideals. However, males also experience substantial dissatisfaction, particularly in relation to their muscularity. Sociocultural pressures, particularly those that target women and girls through media, peer, and familial channels, exacerbate these gendered patterns (Thompson et al., 1999).

Globally, body dissatisfaction is on the rise and it has been linked with mental health issues like depression, anxiety, and stress. According to research, people of both sexes are unhappy with their bodies, but women are more likely to have psychological effects as a result of societal and internalized beauty standards (Ricciardelli & McCabe, 2016; Stice et al., 2013). However, a recent study suggests that men are likely being concerned, particularly with body image and muscle standards (Ricciardelli and McCabe, 2016). Despite these findings, little study has been conducted particularly in non-Western countries such as Pakistan to determine whether gender plays any role in the relationship between body dissatisfaction and mental health issues among youth. The primary purpose of this study is to address a significant gap by investigating how gender influences the intensity and direction of the relationship between body dissatisfaction and mental health issues of young people in Pakistan.

LITERATURE REVIEW

The issue of dissatisfaction with physical appearance impacts people of all ages and both sexes. Women are more likely to internalize the beauty standards expected by society and to report significant degrees of dissatisfaction with their bodies. Nevertheless, young men also experience significant dissatisfaction, particularly with their muscularity, with estimates spanning from 29% to 85% in specific studies, this is particularly related to their muscularity (Halliwell, 2017).

Barker and Galambos (2003) found that internalizing media images of perfect body types

can make people, especially young women, feel bad about their bodies and make them unhappy. However, there exist numerous strategies to mitigate the impact of these stressors. Researchers (i.e., Wood-Barcalow et al., 2011; Swami et al., 2008) found that people who have high psychological strength, social support, and self-esteem are less likely to be unhappy with their bodies. Individual is influenced by number of factors including family, peer, relatives, and media. An individual is trying to meet their expectation of how a smart, beautiful and attractive individual can be. Inability to meet those standards can negatively affect the individual. Researcher (i.e., Barker & Galambos, 2003) found that young women are more likely to internalize media images of ideal body types, which can lead to body dissatisfaction and self-shaming. Another study conducted by Halliwell (2017) found that people who are experiencing psychological distress are considerably more likely to have a negative perception of their bodies.

A study conducted by Rashid et al. (2021) found an association between psychological discomfort and body image concerns among students. Body dissatisfaction was found to explain 40% of the variance in unhappiness, with men exhibiting greater concern than women, contradicting Western norms. A recent study (Saeed et al., 2023) found 76.9% of men and 87.6% of women reported to be unhappy with their bodies. These findings highlight the need to look at gender as an influencing factor, as Pakistani men might experience pain and unhappiness like women but with a different cultural lens.

Research Questions

- Does gender play a role in relationship between the body dissatisfaction and mental health problems among young adults?
- Is there are significant difference between males and females on the variables of body shape dissatisfaction and mental health problem (depression, anxiety and stress).

Hypotheses

- H₁: Gender would moderate the relationship between body dissatisfaction and mental health problems
- H₂: There would be a significant difference between males and females on the variables of body dissatisfaction and mental health problems (i.e., depression, anxiety and

stress).

METHOD

Sample

We recruited 200 individuals (99 males, 101 females) aged 16 to 27 years ($M = 21.3$, $SD = 2.8$) from universities and institutions in Karachi, Pakistan, via convenience sampling through social media. The sample had a varied demographic (see Table 1): around 47% of participants were aged 15 to 22, while the remaining 52.5% were aged 19 to 27 years. The majority (79.9%) had attained their education up to Matriculation, while 6.3% had achieved up to Intermediate level. Furthermore, 5.8% were undergraduates, while 5.5% were pursuing master's degrees. Regarding socioeconomic status, 51% of participants belonged to lower, 32.5% from middle, and 16.5% from upper socioeconomic backgrounds. Further, among 58.5% were living in a joint family setup, whereas 41.5% were living in nuclear family setup.

Measures

Depression, Anxiety, and Stress Scale (DASS-21)

Lovibond and Lovibond (1995) created the DASS-21 (Depression, Anxiety, and Stress Scale—21 items) as a popular self-report tool for assessing emotional distress in response to stress, anxiety, and depression. Each subscale consists of seven items, each with a 4-point Likert scale ranging from 0 (not at all applicable) to 3 (very much or most of the time applicable), which reflect participants' experiences over the previous week. Our sample had excellent internal consistency, with Cronbach's $\alpha = .89$ for Depression, $\alpha = .82$ for Anxiety, and $\alpha = .84$ for Stress.

Body Shape Questionnaire (BSQ-16)

The Body Shape Questionnaire-16 (BSQ-16; Evans & Dolan, 1993) is a concise, validated self-report tool designed to evaluate body dissatisfaction. "Have you ever felt embarrassment regarding your physique?" is one of the 16 inquiries. Individual scores are assessed using a six-point Likert scale, from one ("Never") to six ("Always"), yielding a total range of 16 to 96. Nonetheless, scores are typically recalibrated to align with the complete 34-item version, which ranges from 34 to 204. In this study, the Cronbach's alpha for the BSQ-16 was .93, signifying strong reliability. The overall

scores were classified into four groups according to their severity: no concern (≤ 80), mild (81–110), moderate (111–140), and severe (> 140) based on the established grading criteria.

Procedure

The data for this study were collected via an online questionnaire based on Google Forms, which made it more convenient and accessible for participants. Participants were briefed about the objectives about the study and informed consent was obtained from them upon accessing the survey. They were requested that only those who meet pre-requisite criteria can participate in the study, and those who met the criteria were further given access to proceed. The survey encompassed socio-demographic information forms, the BSQ, and the DASS-21. The completion time was roughly 15 minutes.

Ethical Considerations

The poll results were quickly anonymized to protect individual identity. Participants were clearly informed about their freedom to withdraw at any point, whether during the survey or after submission, without facing any negative consequences. They were assured that their data would be erased upon completion of the study and would not be shared with anyone. Researchers maintained the ethical standards by mitigating risks, emphasizing participant liberty, and safeguarding data integrity throughout the study.

Data Analysis

The Statistical Package of Social Science (SPSS, V. 26) was used to analyze the data. The data was initially summarized using descriptive statistics. The inferential statistics were applied to investigate the primary hypotheses. An independent-samples t-test was used to compare the mean BSQ scores of men and women, and Cohen's d was employed to calculate the effect size. To ascertain whether gender contributed to a greater degree of explanatory power when incorporated into a subsequent phase and whether total psychological distress (DASS) predicted body dissatisfaction, hierarchical multiple regression was used. Variance in body dissatisfaction was more significantly explained by gender than by mental health problems alone. The change in R^2 was used to evaluate the model's fit.

RESULTS

The Data collected from two hundred

students with the age range of 16 to 27. The data collected is analyzed for descriptive findings of demographic characteristics of participants. The

hypothesis then analyzed by t-test for difference of mental health and body dissatisfaction of participants.

Table 1

Socio-demographic characteristics of participants

	N	%
Age		
15 to 22	95	47.5
23 to 27	105	52.5
Gender		
Male	99	49.5
Female	101	50.5
Qualification		
Matric	63	79.9
Intermediate	58	6.3
Undergraduate	55	5.8
Masters	24	5.5
Marital Status		
Single	159	86.5
Married	40	10.5
Family system		
Nuclear	83	41.5
Joint	117	58.5
Socio-economic Status		
Lower	102	51
Middle	65	32.5
Upper	33	16.5
Work Status		
Employee	133	66.5
Unemployed	67	33.5

Note: Sample size consists of two hundred participants from college and university students.

Table 2

Independent Samples t-Test Comparing Males and Females on Depression, Anxiety, Stress, and Body Shape Concern (N = 200)

Variable	Gender	M	SD	T	df	p	Mean Diff
Depression	Male (n = 99)	9.46	5.24	2.62	198	.009	2.01
	Female (n = 101)	7.46	5.59				
Anxiety	Male	7.44	3.91	0.91	198	.365	0.55
	Female	6.89	4.67				
Stress	Male	9.87	4.85	1.37	198	.174	1.02
	Female	8.85	5.64				
Body Shape Concern	Male	41.78	15.80	-7.16	198	.000	-30.08
	Female	71.86	38.74				

Note: P<.05

Table shown that female reported higher body shape concerns (M=71.86) than males. More on depression males reported higher depression

(M=9.46) than females (M=7.46. However, no significant differences were found in anxiety and stress

Table 3

Summary of Moderation Analysis Predicting Body Dissatisfaction and mental health problem (DASS-21), Gender, and Their Interaction

Model 1

Predictor	B	SE	T	P	95% CI (LL, UL)
Constant	-14.39	14.31	-1.01	.316	-42.60, 13.83
DASS-21 Total Score	0.91	0.51	1.78	.077	-0.10, 1.92
Gender (0 = Male, 1 = Female)	35.52	8.48	4.19	.000**	18.80, 52.25
DASS × Gender	-0.10	0.31	-0.33	.741	-0.71, 0.51

Note: BSQ-16 = Body Shape Questionnaire Total; DASS-21 = Depression, Anxiety, and Stress Scale Total; Gender coded as 0 = Male, 1 = Female.

Model 2

No.		R ²	ΔR ²	F	df	p
1.	Main Effects	.295		27.23	(3, 195)	< .00
2.	Interaction Term	.295	.0004			.741

Model 1 and 2 show that the main effects $p < .001$, and 29.5% of the variance in body shape concern. Further Gender was a significant predictor ($p < .001$), where females reporting higher BSQ scores on DASS-21 was marginally significant ($p = .077$). The interaction between DASS and gender was not significant ($p = .741$),

Discussion

The findings of this study reveal significant gender differences in body dissatisfaction and mental health among Pakistani college and university students. Females reported substantially higher body dissatisfaction (BSQ scores) compared to males, which aligns with global research indicating that women experience greater body image concerns due to sociocultural pressures (Frederick et al., 2022; Grabe et al., 2008). Where no significant differences were observed on anxiety and stress. More on table 3 results indicated that the entire model significantly predicted body shape concern and accounted for 29.5% of where gender is also significant predictor ($p < .001$).

The study's findings help us understand how body dissatisfaction and mental health problems affect young people in Pakistan. The gender gap in body dissatisfaction highlights the importance of these disparities in Pakistan's distinct social and cultural environment. This difference is probably be caused by several factors, including the interpretation and adoption of standards of beauty from other cultures. This could affect individual's self-image. The increasing access and usage of social media which has a significant role (Saiphoo & Vahedi, 2019), and deeply rooted gender norms and values that place a premium on women's looks (Ali et al., 2021).

The regression analysis demonstrated that mental health problems were associated with body dissatisfaction, though the effect was not as strong as anticipated. This could be attributed to cultural factors in Pakistan, as people are hesitant about discussing about the mental health issues because of stigma and discrimination associated with these conditions. They conceal their true feelings and emotions and try to disguise the problem to avoid rejection. Socio-demographic characteristics have a significant role in in body satisfaction. In current study, majority of participants (51%) belonged to lower socio-economic background with 86.5% were single and they could also be affected by this body shape dissatisfaction. It can be inferred that society has significant role in body dissatisfaction, such as when it comes to marriage, families expect women to be perfect, and their definition of perfection is the fair complexion and body shape mostly. When a women falls within this criterion then the chances to find a good soul mate is high, otherwise the rejection chances are high, or they have to compromise. Previous research has shown that SES influences body image perceptions, with individuals from lower-income backgrounds often facing greater appearance-related pressures (Swami et al., 2010).

Limitations

Despite these insights, the study has some limitations. The use of convenience sampling may limit the generalizability of the findings, and self-report measures are susceptible to response biases. Future research should incorporate formal assessments to reduce self-report bias and employ longitudinal designs to better understand the causal relationships between

psychological distress and body dissatisfaction.

Implications

The practical implications of these findings highlight the need for gender-sensitive mental health interventions at societal level. Programs to promote self-confidence, hardiness against body shaming, stigma, and societal beauty standards and expectation may help mitigate body dissatisfaction, particularly among young women; this may improve their overall wellbeing. Furthermore, integrating prevention programs using different approaches (primary, secondary and tertiary) both at service and system level to address the burden of body dissatisfaction as compared to their male counterparts.

CONCLUSION

In conclusion, this study underscores the significant gender disparities in body dissatisfaction among Pakistani youth, with women reporting higher levels of both. Psychological distress was linked to body dissatisfaction, but this relationship did not vary by gender. These findings emphasize the importance of culturally tailored interventions that address both mental health and body image concerns across genders. Future research should explore intersectional factors, such as media exposure and cultural norms, to develop more effective prevention and intervention strategies. Cultural customs, beauty standards adopted from other western cultures, and social media significantly increases the stress among young women. Findings of present study emphasize the significance of gender-specific psycho-social interventions that are culturally sensitive and tailored to address gender specific needs; this may ultimately help in improving wellbeing of targeted population.

Implications

These findings have substantial practical ramifications. Given the significant gender discrepancies in body dissatisfaction, interventions must go beyond individual-level techniques and target structural causes. Levine and Murnen (2009) established culturally relevant media literacy programs in Pakistan, challenging both local and western ideals of beauty. Regulations that encourage various types of beauty images while prohibiting media content which challenge the values and norms of the society. Healthcare practitioners should be trained enough to identify the cultural manifestations of body image issues; this

may help them in addressing these issues in therapeutic settings. These findings emphasize the importance of psycho-social interventions in addressing the body image and related issues by considering risk and protective factors both at micro and macro level.

Competing Interests

The authors did not declare any competing interest.

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