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THE MEDIATING ROLE OF SELF ESTEEM IN PERSONALITY AND MENTAL HEALTH PROBLEMS IN UNIVERSITY STUDENTS WITH TRAUMATIC EXPERIENCES

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■ ABSTRACT

Objective: The current study explores the mediating role of self-esteem in the relationship of extraversion and mental health problems in traumatized university students.

Methodology: Out of a total of 265 individuals, 215 potential participants were selected for further procedures based on their response to the "happened to me" item on the Life Event Checklist. This sample comprised 215 university students, of which 31% were male and 69% female, with ages ranging from 18 to 26 years (M= 20.78; SD= 2.46). The Self-Esteem Scale for University Students, Big Five Personality Inventory, and the Depression Anxiety Stress Scale were employed to measure the participants' self-esteem, extraversion, and mental health issues, respectively.

Results: Correlation analysis outcomes revealed a positive relationship between extraversion and self-confidence (r =.136, p < .05*), as well as between anxious self-esteem and mental health problems (r = 541, p <.001***). Additionally, findings also demonstrated a negative relationship between extraversion and anxious self-esteem (r = 257, p < .001***), extraversion and mental health problems (r = 218, p < 05*), and self-confidence and mental health problems (r = 138, p < .05*). Nevertheless, elements such as low self-esteem, resilience, and sociability did not demonstrate a significant connection with extraversion or mental health problems. Following these observations, mediation analysis disclosed a significant mediating role of both anxious self-esteem and self-confidence in the relationship between extraversion and mental health issues.

Conclusion: These findings indicated that boosting the self-esteem level can ensure the psycho-social well-being of traumatized university students.

Keywords: Self-Esteem; Extraversion; Mental Health Problems; University Students; Trauma

■ INTRODUCTION

Human beings tend to have numerous psychological and traumatic experiences that may cause many psychosocial and emotional consequences that impairs their psychological well-being.[1,2] Epidemical studies indicate that almost half the population suffer from any kind of trauma globally.[3-5] The most common reported reactions of nay traumatic exposure include, fear, anxiety, depression, helplessness, depersonalization, suicidal ideation and PTSD.[6]

Several research studies have shown that mental health problems resulted from any traumatic experience tend to heal over time.[7,8] The recovery from trauma may involve the interplay of many socio- emotional variables including demographic characteristics, trauma related factors, cognitive and emotional stability and social support.[9-11] Among other factors, personality said to have a great influence on the maintenance and recovery from trauma.[12,13] Empirical evidence suggests that neuroticism and introversion are positively associated with the psychological distress of a traumatic experience.[14-17]

Self-esteem is one the key components of mental health which can be defined as a self-evaluation and self-regard which play a role of a protective factor against adversities.[18,19] Fluctuating self-esteem is also a common consequence of many psychological and emotional problems.[20,21] Having the higher level of self-esteem is associated with positive outcomes including academic achievement, social skills, and psycho-social well-being and quality of life.[22,23] On the other hand, having the low level of self-esteem is linked with numerous adverse outcomes like loneliness, substance use, suicidal ideation, poor academic performance, and greater mental health problems and issues.[24]

To conclude, traumatic experience such as loss of beloved one, natural disaster or manmade disaster may lead to serious mental health problems which may include anxiety, depression, suicidal thoughts and loss of interest. Researches also demonstrated that personality and self-esteem can be a buffer or risk factors for poor mental health functioning in individuals. A lot of literature is devoted to investigate traumatic reactions especially PTSD in trauma sufferers yet very few attempts made to explore the impact of trauma on mental health functioning in young adults. If these effects are identified early may help in the prevention of serious consequences.

METHODOLOGY

The current investigation focused on a sample of 215 university students, comprising 31% males and 69% females aged between 18 and 26 (M= 20.78, SD= 2.46). These students were selected via a purposive sampling technique from various government and private universities in Lahore. The sample size was determined according to the Harris (1985) formula, which suggests 30 participants for each variable. The majority of students (63%) were from nuclear families, with 37% coming from joint family systems. The Trauma Event Checklist[29] was utilized to identify individuals who have experienced trauma, specifically those who indicated that a traumatic event had "happened to me". Participants who had undergone at least one traumatic event in the past five years were included, excluding those whose traumatic experience was less than a year old.

The initial step involved using the Life Event Checklist (LEC)[28], developed at the National Center for Posttraumatic Stress Disorder (PTSD), to identify traumatized individuals. This 17-item checklist uses a 5-point rating scale where 0 signifies "doesn't apply" and 4 denotes "happened to me". Next, the

Self-esteem Scale for University Students[26] was employed to evaluate participants' self-esteem. This 21-item scale with five factors (low self-esteem, resilience, anxious self-esteem, sociability, and self-confidence) uses a 4-point rating scale from 0 "not at all" to 3 "most of the time". It demonstrated satisfactory internal consistency with a Cronbach's alpha value of .79.

Furthermore, the Big Five Inventory[27] was used, which comprises 44 items with a 5-point rating scale from 1 "strongly disagree" to 5 "strongly agree". The inventory assesses five dimensions of personality: neuroticism, extraversion, agreeableness, openness, and conscientiousness. For this study, only the extraversion subscale was utilized, and it exhibited good internal consistency with a Cronbach's alpha value of .71.

The Depression Anxiety Stress Scale (DASS)[28], a set of three self-report scales, was utilized to measure the mental health problems of the participants. Each of the three DASS-21 scales contains 7 items on a 4 point-rating scale ranging from 0 "not at all" to 3 "every time", and demonstrated excellent reliability with a Cronbach's alpha value of .93.

Upon obtaining approval from the Ethical Review Board (IRB#2019-05-074), Ref#ICPY/20/158, the study gained permission from the competent university authorities by outlining the primary aims and objectives of the study. Data was collected from 215 participants after receiving verbal consent and ensuring the confidentiality of their information. The data collection process was conducted in groups, with an average of 10 participants per group. All participants were given an opportunity to ask questions regarding the study protocol, and were able to complete all measures within 18 to 20 minutes. Debriefing sessions were conducted after data collection.

RESULTS

The Pearson Product Moment Correlation was applied to discern the relationships between extraversion, anxious self-esteem, self-confidence, and mental health problems. Results highlighted a significant negative correlation between extraversion and anxious self-esteem (r = 257, p < .001***) as well as mental health problems (r = 218, p < 05*). Similarly, the findings demonstrated a significant positive correlation between anxious self-esteem and mental health problems (r = 541, p <.001***). Moreover, a significant positive correlation was found between extraversion and self-confidence (r =.136, p < .05*), and a significant negative correlation between self-confidence and mental health problems (r = 138, p < .05*).

These findings underlined the interconnectedness of extraversion, anxious self-esteem, self-confidence, and mental health problems. Consequently, the mediating roles of anxious self-esteem and self-confidence in the relationship between extraversion and mental health problems were examined using Hayes (2018) bootstrapping methodology.

Table 1 presents the results of the mediation analysis. It shows a significant total effect of extraversion on mental health problems (path c). It also reveals a significant indirect effect of extraversion on anxious self-esteem and self-confidence (paths a1 and a2). Additionally, significant direct effects of anxious self-esteem and self-confidence on mental health problems were found (paths b1 and b2). The results of the mediation analysis suggested that anxious self-esteem and self-confidence fully mediated the relationship between extraversion and mental health problems, as the direct effect of extraversion on mental health problems (path c') became non-significant after controlling for the mediators anxious self-esteem and self-confidence.

Table 1: Mediation Analysis of Extraversion, Anxious Self-Esteem, Self-Confidence, and Mental Health Problems (N=215)

Antecedents												
		M1(ASE)				M2(SC)				Y(MHP)		
		β	SE	P		β	SE	P		β	SE	p
E(X)	a1	-.25	.06	.001***	a2	.15	.12	.03*	c'	.03	.16	.56
ASE(M1)									b1	.57	.17	.001***
MHP(M2)									b2	-.20	.09	.001***
Constant	i	15.46	1.58	.001***	I	21.63	3.06	.001***	i	14.18	4.62	.001***
	R2=.06				R2=.02				R2=.30			
	F (1,213) =14.67, p =.001				F (1,213) = 4.61, p = .03				F (3,211) =29.97, p =.001			

Table 2: Indirect Effects of Extraversion on Mental Health Problems through Anxious Self-Esteem and Self-Confidence

Effects	Product of Coefficients		95% CI	
	β	SE	LL	UL
Total Indirect Effects	-.17	.04	-.27	-.09
E→ASE→MHP	-.37	.03	-.16	-.01
E→SC→MHP	-.03	.09	-.57	-.19

Note. CI = confidence interval; LL = lower limit; UL = upper limit; E = extraversion; ASE = anxious self-esteem; SC = self-confidence; MHP = mental health problems
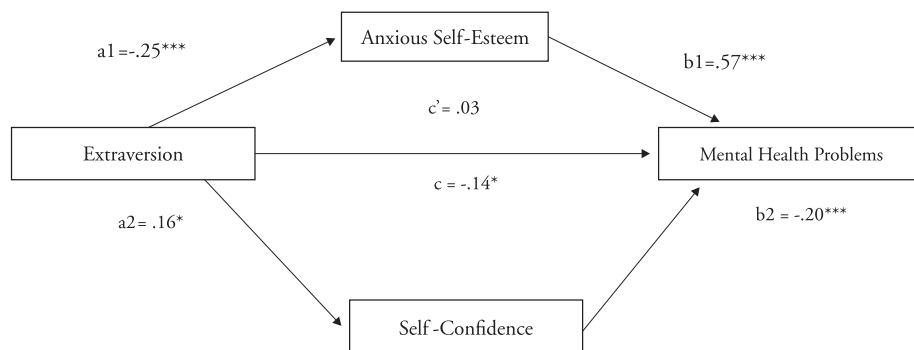

Figure1. Mediation analysis of anxious self-esteem and self-confidence in the relationship between extraversion and mental health problems

Table 2 uncovers the indirect effect of extraversion on mental health problems via anxious self-esteem and self-confidence. It highlights a significant total indirect effect of extraversion on mental health problems. Furthermore, when considering the mediating variables separately, the indirect effects of extraversion on mental health problems through anxious self-esteem and self-confidence were also found to be statistically significant. Thus, the current findings met the modern assumptions of Hayes (2018) for mediation analysis16. Hence, it can be concluded that anxious self-esteem and self-confidence significantly mediate the relationship between extraversion and mental health problems.

DISCUSSION

The period of university life often proves to be a formidable and critical juncture, during which students may become increasingly susceptible to stressors. This includes instances of bullying and pressure to perform academically within the university environment.[1-3] Emotional maltreatment, as well as a lack of attention or support from family members, can further exacerbate this stress. Other factors such as disloyalty from a part-

ner in a romantic relationship, and grappling with issues of gender identity can also play a significant role in precipitating depression and various other mental health complications.[4,5] This circumstance amplifies difficulties encompassing economic, cultural, and relational aspects, among others.[6,7] However, for those grappling with any form of trauma, the situation tends to deteriorate further18. Studies have highlighted that the university populace is particularly susceptible to developing psychological problems following a traumatic event[8,9], which can consequently lead to numerous negative outcomes such as high attrition rates, poor academic performance, substance abuse, and diminished psycho-social well-being.[10,11] Therefore, the current study set out to identify the risk factors and protective elements concerning mental health challenges among traumatized university students.[12,13]

Findings of current study suggested that extraversion was significantly negatively associated with anxious self-esteem and mental health problems, and positively associated with self-confidence.[14,15] These findings are in line with previous empirical literature indicating that extraversion acts as a protective factor against mental health issues and boost the level of self-confidence and self-esteem.[16,17] These findings are supported by previous theoretical literature like attachment theory posits that social bond with others are directly related with self-esteem.[14,18] These findings also seem meaningful in the light of cultural context of Paki-

stan which is characterized by social bonds and healthy social relationships as the key determinants of psych-social and personal wellbeing and positive self-concept.[19]

Results also indicated that self-confidence was significantly negatively associated with mental health issues. These results are also supported by previous research work indicating the self-confidence as a defensive and protective factor against mental health issues.[20,21] Having positive self-confidence and belief in abilities during traumatic and stressful situations enable university students to effectively cope and deal with mental health problems caused by traumatic situations, hence ensuring their psycho-social well-being.[22,23]

Moreover, findings of mediation analysis indicated that anxious self-esteem and self-confidence mediates the association of extraversion and mental health problems. Previous empirical and theoretical literature also supported the current findings.[14,24] Previous studies demonstrated that extraversion personality characteristics lead towards self-acceptance, self-confidence and self-worth which are key parts of well-being and help an individual in lowering their mental health issues during traumatic situations.[25-28] Therefore, the current findings suggested that extraversion and self-esteem as risk and protective factors of mental health problems of traumatized university students. So by boosting the level of extraversion and self-confidence and lowering the anxious self-esteem, we can ensure their psycho-social well-being.[13,14,23]

LIMITATIONS

This recent study marks a noteworthy contribution to the existing literature and holds substantial implications for prospective research, it is not without its limitations, offering fertile ground for future inquiry. The first constraint of this study was its exclusive focus on the collegiate demographic, leaving room for the exploration of trauma within other population segments.

CONCLUSION

The current study highlighted the risk and protective factors of mental health problems of traumatized university students. Findings indicated the mediating role of self-esteem in the association of extraversion and mental health problems.

RECOMMENDATIONS

The study relied solely on self-reported measures, presenting an opportunity for future research to incorporate informant-reported assessments. In addition, the sample drawn from the urban population offers scope for replication within rural populations, or the identification of subcultural variations within the Pakistani populace. Lastly, although this study employed a cross-sectional research approach, future explorations may benefit from adopting longitudinal research methodologies.

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Author's Contribution

Conflict of Interest

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