

## EXPLORING THE IMPACT OF PSYCHOLOGICAL CAPITAL AND SOCIAL SUPPORT ON MENTAL HEALTH IN HIGHER EDUCATION

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### Abstract:

*Recent research in Positive Psychology has shown a significant link between Psychological Capital (PsyCap) and Mental Health (MH). However, the role of Perceived Social Support (PSS) in mediating this relationship, particularly within the context of higher education, has not been widely explored. This study aimed to investigate how PSS might mediate the influence of PsyCap on students' mental health. Using a cross-sectional design, the research sampled 443 undergraduate and graduate students from the University of the Punjab, Lahore, Pakistan. The findings, analysed through Partial Least Squares Structural Equation Modeling (PLS-SEM), revealed that both PsyCap ( $\beta = 0.815$ ,  $t = 31.074$ ,  $p < 0.000$ ) and PSS ( $\beta = 0.405$ ,  $t = 28.051$ ,  $p < 0.000$ ) positively impacted students' mental health. Additionally, PSS was identified as a meaningful mediator between PsyCap and mental health ( $b = 0.080$ ,  $t = 2.319$ ,  $p < 0.020$ ). These results underline the importance of fostering both PsyCap and PSS in academic environments to improve student well-being. The findings provide valuable insights for university faculty, psychologists, and curriculum developers, stressing the need to integrate these elements into educational and support programs. By focusing on PsyCap and social support, higher education institutions can create environments that promote mental health and overall student success. This aligns well with growing concerns in academic settings about the mental well-being of students and offers a path forward for practical, evidence-based interventions. These results contribute to the understanding of how psychological and social factors intersect, presenting opportunities for further research and implementation in similar academic settings.*

**Keywords:** Psychological Capital, Perceived Social Support, Mental Health, Higher Education

### 1. Introduction:

Mental health (MH) is a critical component of students' overall well-being and quality of life, particularly in rapidly changing environments. Students with positive MH are more prepared to improve their quality of life and effectively cope with the life processes (Han & Hyun, 2019). As

postulated by the WHO, MH includes the optimal functioning which depicts a state of health through which the affected person can make sound and fulfilling decisions, deal with normal life challenges constructively as well as engage in a meaningful productive activity (Acarturk et al., 2022). Mental health is a vital component of health and according to World Health Organization Whereas the notion of psychological well-being and resilience shares common psychological features involved in positive human functioning( (Sarfaraz, Iqbal, & Iqbal, 2022).

MH encompasses psychological, emotional, and social, which played chief roles in the process of thinking, feeling, and acting. Another fact to support SDG 3e from the WHO is that about one in four people within a given population will have to deal with a mental disorder at least once throughout their lives (WHO, 2022). Even though mental health disorders are a common problem, very few people seek help from a professional. In 2001, data from WHO showed that about 67 % of those affected with mental illness do not seek treatment. This has been as a result of prejudice, lack of interest or concern, abandonment and finding itself on the wrong side of the bipolar stick by swollen populations, which are major constraints to care (WHO, 2001). And the GBD study also presents the global portfolio of mental health concerns showing that in 2016 almost one billion people experienced some kind of mental disorder (Vigo et al., 2016). These statistics highlight how the matters of mental health are not limited in their impact and importance to any particular region, but are of concern to the entire world. Therefore, it becomes paramount to approach mental health as a way of improving individual health and by extension; social and economic returns. As a result, there is a need to improve mental health promotion and combat related stigmatization; simultaneously increase access to competent care for patients suffering from mental disorders.

Pakistan is one of the largest populated countries in the globe, and this country has experienced extensive MH issues especially throughout the COVID-19 crisis (Roche et al., 2022). This revenue generated keeps on suggesting that while there has been a push for better MH publicity and services, the scarcity of facilities still prevents proper MH support in the country (Paul et al., 2020). Snyder et al. (1991) findings were that common MH issues like anxiety and depression are higher among students in institutions of higher learning in Pakistan. This is in line with other studies in showing that, for university students, there is generally a higher prevalence of MH problems than students who are not in university (Hillier et al., 2019). There are several aspects of students' life that may contribute to MH difficulties in higher education students such as life stressor, everyday adversity and academic stressor (Singh et al., 2023). These stressors have a great influence on students' MH state and therefore such students are vulnerable to developing MH issues. Also, MH issues tend to appear in youth, a stage at which people complete their school education and develop their first careers (Westerhof & Keyes, 2010). Thus, university students may get at risk for mental health issues. As a result, it can hardly be overemphasized that the problem of students' mental health in higher education institutions deserves proper solutions. This involves raising awareness not only for MH issues but for improved access to MH resources and other systems. This knowledge enables stakeholders to develop a less hostile environment that the group faces in order to prevent occurrence of mental health issues among university students.

The MH continuum ranges from positive MH, which is a state of positive wellness to adverse MH which is a state of mental disease (Visser & Wyk, 2021). The WHO solves positive MH as an essential component of human beings into their productive working world for them to be productive in their various fields (Langeland, 2022). Despite the fact that most of the studies have focused on MH risks, such as disorders and unpleasant behaviors (Ciby et al., 2020), the concept

of building up positive MH is not clearly conceptualized (WHO, 2001). It is the same way we have shifted our focus to aspects like diet and exercises to avoid diseases (WHO, 2005).

The papers derived from the positive psychology perspective have claimed that the overall positive psychological worldview can enhance the well-being (Jackman & Sisson, 2022). PsyCap built on positive psychology corresponds with the theoretical concept of arrays of psychological resources of hope, self-efficacy, resilience and optimism described as the 'HERO' (Luthans and Avoutine, 2014). Hope enables the individual to work towards achievement of certain goals and change strategies any time there is an obstacle, resiliency allows the person to rebound in the event of adversity, optimism enables the individual expect the best in life and self-efficacy increases confidence of the individual in completing tasks, The elements of PsyCap work in synergy to produce a better result than any single factor individually; they improve personal and organizational outcomes (Luthans et al., 2008).

Prior meta-analyses and reviews indicated that psychological capital (PsyCap) is positively connected to a diverse range of individual and organizational outcomes (Roche, 2023). PsyCap is one of the most important areas of research that has been advanced by Fred Luthans, who pointed out that it is an agentic research area that affects mental health (Maurya & Srivastava, 2022). Research indicates that PsyCap increases academic achievement in students (Salavou et al., 2023) and that PsyCap is related to well-being in college samples (Ciby et al., 2020). In a study conducted by Wang et al. (2023) revealed a negative relation between students' PsyCap and their feelings of sadness and stress during the COVID-19 situation; consequently, it proves that the improvement of PsyCap can help to reduce students' negative emotions.

A group intervention for a boost in PsyCap enhance the mental health and alleviated depression among Pakistanis university students (Qian et al., 2022). This shows that there is opportunity to infuse PsyCap into mental health intervention plans in higher education in Pakistan. Additionally, impact of SHS is significant whereas, higher PSS is essential for health and which moderate stressors (Ferber et al., 2022) besides increase PsyCap (Prasath et al., 2022).

## **2. Literature review:**

The perceived social support (PSS) is the extent of available and supportive relationships from the viewpoint of the recipient, whereas received social support measures the amount of received help (Permatasari et al., 2021). PSS is often associated with reducing perceived stress (PS) (Ozmete and Pak, 2020), with most research on the impact of PSS on MH being done (Poudel and al., 2020). A study suggests that efforts to enhance MH must consider social support as a modifiable resource that can independently cause MH enhancement or detriment, particularly among stressed people (Chen et al., 2020). Some of self-efficacy has noticeable correlation with MH and social support; self-efficacy has a way to boost happiness through MH, moreover the social support modifies this relationship (Lara et al., 2020). On the other hand, study conducted by Sarfaraz and associates (2022) reported that Psychological well-being is the ability to maintain a sense of autonomy, self-acceptance, personal growth, purpose in life and self-esteem. Moreover, psychological well-being is fundamentally focused on positive emotional outlook, which is involved with the actualization of human potentials.

Moreover, PSS enhances the psychological well-being of elderly careers (Bermejo et al., 2020). Although PsyCap has been established to have a strong connection to MH (Bedaso et al., 2021), MH still requires further investigation concerning applicability to diversification among different population groups.

PsyCap is a relatively new conceptual area, with available research data being scarce, especially pertaining to the impact that it has on MH of students from higher education in Pakistan (Luthans et al., 2010). While prior research has examined the co-variance model of PsyCap and MH, little work has been done on the mediating role of PSS. Therefore, this research aims at filling this gap by adopting the proposition that PsyCap ways affects MH with PSS as moderator. The study is especially important with reference to the context of higher education in Pakistan where social support is known to influence mental health of the students in a very much stressful environment. This research makes several contributions: it analyzes the impact of PsyCap on MH, investigates moderations of this relationship, and incorporates PSS as a moderator variable. In addition to this, it expands the few existing studies that examined these variables in relation to higher education enrollment by shedding light on the mechanisms through which PsyCap influences MH.

### **2.1 Conceptual model and hypotheses:**

MH and well-being of the general population and university students were significantly determined by the proposed PsyCap constructs such as hope, self-efficacy, resilience, and optimism (Prasath et al.). This relationship agrees with COR theory that posited, individuals with higher levels of a certain resource, PsyCap have higher potential of having other several resources that can countercheck stresses and other negative impacts on mental health (Kuijpers et al., 2020). However, the previous study already shows that PsyCap has a positive association with MH (Luthans and Youssef-Morgan, 2017); yet, no previous study assesses what variables either can mitigate or enhance this PsyCap-MH relationship. Therefore, to meet this gap, it is helpful to explore social support as a mediator. This study is alike to other studies that have been done in the past, and its uniqueness is the fact that help from friends, families as well as the public has time and again served as a buffer to mental health problems as identified in the findings of Silva (2005). In one sigma confirmation it was noted that social support decreases stress and psychological disorder and self-rated health any age group. Ahlborg et al. (2022) showed that family, friends, and neighbors influenced the youth's mental health and suggested that it is potential support frameworks through which aspects of... psychological issues may be highly influenced.

Castillo & Lopez-Zafra's (2022) study showed that the positive impact of PsyCap on mental health is more significant if people have good social support to back them. Correlates of PsyCap and mental health of participants and moderate, perceived social support demonstrated that participants with higher perceived social support were significantly more likely to exhibit better mental health than participants with lower perceived social support regardless of having higher PsyCap. This implies that social support acts as a reinforcement factor helping to boost the efficiency of the psychological assets such as PsyCap. Therefore, social support is not a mere form of protection against the adverse results, but a resource which enhances the impact of the favorable resources. It is important for me to note that this relationship between PsyCap, social support, and mental health may be explained more fully by reference to COR theory. Self-reported coping can be predicted by numerous stressors based on COR theory, where resources offer information about appraisal of pressure. According to Hobfoll (1989), resources may be described as an object, condition, personal attribute, or energy that is wanted by people or is useful in attaining other valued commodities. PsyCap as a construct comprises of hope, resilience, self-efficacy as well as optimism and it is believed that PsyCap is a personal resource which determines an individual's ability to face stress levels or aeration and maintain psychological health (Ciby & Sahai, 2020). On the other hand, social support can be conceptualized as a situational or contextual resource, and more importantly, a resource from outside the person, but a resource that is critical to stress



coping. The occurrence of supportive people in one's life can add to one's resource stock, which protect against negative effects of stressors on mental health (Silva, 2005). Most important COR Theory also postulate that more resourceful individuals are less exposed to jeopardy of resource loss and more capable of gaining more resources. In this regard, PsyCap and social support can be viewed as cross reinforcing assets that as a whole enhance positive psychosocial wellbeing.

The interaction between PsyCap and social support for the prediction of the given indicators can have vast theoretical implications for the study of mental health dynamics. PsyCap affords the inward coping strengths, and social supports supplement and strengthen up the efficacy of these internal assets. Hence, this research posits that social support interferes between PsyCap and mental health such that an individual's internal psychological resources influences his or her outside environment. Based on the theoretical and empirical foundations reviewed earlier in this article, this study attempts to test a conceptual model that hypothesizes that PSS mediates the relationship between PsyCap and mental health. The conceptual model comprises three main constructs: PsyCap as the independent variable, effected through the mediator PSS with the goal of improving mental health, the dependent variable (see Fig. 1). The current model assumes that the relationship between PsyCap and mental health is mediated in part by amount of social support one feels they have. Therefore, it is hypothesized that higher levels of PsyCap should lead to better mental health status and this relationship should be moderated by high level of perceived social support.

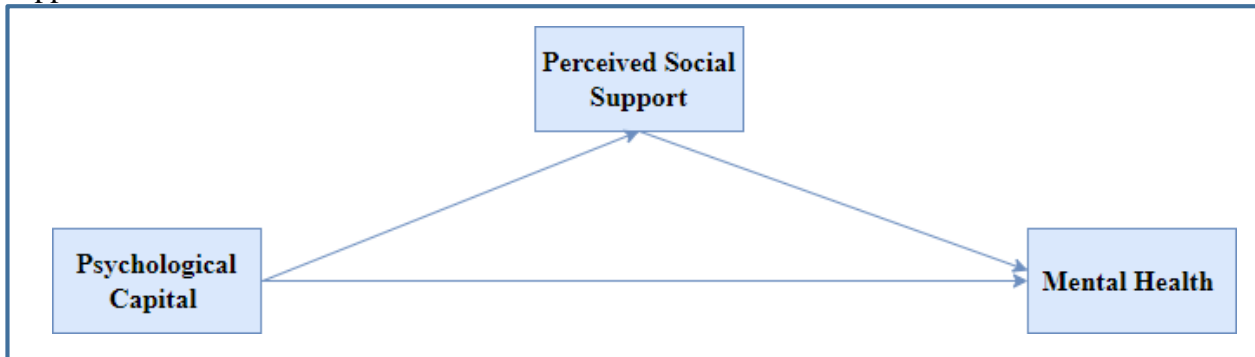


Figure 1: Conceptual Model

**H1: PsyCap has significant effect on MH.**

**H2: PsyCap has significant effect on PSS.**

**H3: PSS has significant effect on MH.**

**H4: PSS mediates between the relationship of PsyCap and MH.**

### 3. Methodology:

The current research study was cross-sectional because data was collected at a single point in time. Ethical approval must be sought and sought from the participants to ensure that they give appropriate and time and energy to their response. It is also dangerous to have to 'fill in the gaps' which would in turn lead to invalidity of the research done. There were two modes of the survey, online and face to face, and each student filled it in independently. In total, respondents spent approximately 20 minutes to fill in the questionnaire. The questionnaire began by briefly outlining the purpose of the research and then the participant consent form. Participants were ensured that they were free to participate voluntarily, and they could drop out of the research exercise at any one time without any explanation. Despite the fact that the course credits were offered to students,

the respondents had been given no other inducements to respond. Following the ethical standards of the University, the established procedures of the study and the chosen instruments were fully consistent with the ethical norms of the study. This compliance maximized the possibility of conducting the research with ethical propriety and strictly respecting the participants' rights.

The participants of the study were purposively selected from undergraduate and graduate students of the University of the Punjab in Lahore Pakistan. This university was chosen because of its number of students and for its academic performance. With regard to the estimation of the sample size to PLS-SEM, as a measure taken in the present research, it has been done according to the general rules of sample size estimation often employed in academic research. One of the most commonly applied rules for assessment of sample size is the '10 times rule'. In accordance with this rule, the number of participants should be tenfold the number of indicators that define the constructs in the model. This rule is a common rule when it comes to determining sample size to be used within PLS-SEM, commensurate with other scholarly works such as that of Ferine et al. 2021. In this manner, the work has intended to provide reliable and valid data free from coercion or undue influence and compliant with ethical academic norms. The study also maintained high credibility because participation was voluntary, and the researchers complied with the ethical codes.

We used 5 point Likert scale from 1= strongly disagree to 5 strongly agree. The psychological capital has 12 items taken from the previous study ( Sato et al., 2022). The Perceived social support has 12 items taken from the previous study (Zimet et al., 2010). The Mental Health I has 12 items taken from the previous study (HU et al 2007).

#### **4. Data analysis:**

Accurate results depend on the elimination of non-normal distributions and multicollinearity during data analysis. The study revealed that Sekaran (2003) did a detailed analysis of missing values. The personal distribution of questionnaires gave respondents time to recollect their answers and edit any incorrect responses. By applying the stem-and-leaf method the study located outliers and indicated any inconsistencies within the data. P-plots and histograms were used to determine normality with clear evidence that the frequency distributions nearly fitted a regression line and showed a bell-shaped curve. These results indicate that the data followed the requirements for normality. In addition to this examination the study analyzed skewness and kurtosis which were found to be within the recommended range of  $\pm 1$  and  $\pm 3$  according to Byrne (2010). These figures added evidence to the fact that the data followed a normal distribution. The research reviewed multicollinearity that emerges when the variables are closely related and may alter the regression equation. To determine if multicollinearity existed in the dataset they reviewed the correlation coefficients (Tabachnick & Fidell, 2007). All correlation coefficients remained below 0.85 and showed that this dataset did not face multicollinearity.

#### **4.1 Measurement Model:**

*Table 1: Measurement Model*

<b>Variables</b>	<b>Cronbach alpha</b>	<b>Factor loadings</b>	<b>CR</b>	<b>AVE</b>
<b>Mental Health(MH)</b>	<b>0.796</b>		<b>0.870</b>	<b>0.629</b>
MH9		0.754		
MH10		0.862		

MH11		0.887		
MH12		0.645		
<b>Perceived Social support (PSS)</b>	<b>0.866</b>		<b>0.893</b>	<b>0.584</b>
PSS1		0.641		

PSS2		0.763		
PSS3		0.676		
PSS6		0.783		
PSS7		0.685		
PSS8		0.684		
PSS10		0.636		
PSS11		0.701		
PSS12		0.675		
<b>Psychological Capital (PSY)</b>	<b>0.942</b>		<b>0.952</b>	<b>0.713</b>
PSY1		0.832		
PSY2		0.868		
PSY3		0.836		
PSY4		0.818		
PSY5		0.817		
PSY6		0.881		
PSY7		0.807		
PSY8		0.890		

Constructs were evaluated for reliability and validity by using Cronbach's alpha and mean variance extracted (AVE). It has been reported by Hair et al. (2019) that Cronbach's alpha count of 0.7 or higher is regarded as sufficient for consistency within the construct while the minimum level of AVE necessary is 0.5 to confirm that the latent construct explains more than half of the indicators' variance. With a Cronbach's alpha of 0.796 the Mental Health (MH) construct meets the minimum acceptable standard of internal consistency. MH item factor loadings vary from 0.645 to 0.887 and show CR and AVE values of 0.870 and 0.629. Results indicate that the MH construct possesses reliability and convergent validity since the AVE is greater than 0.5.

The reliability of the Perceived Social Support (PSS) construct is shown by a Cronbach's alpha of 0.866. Loadings are between 0.636 and 0.783 along with an AVE and CR of 0.584 and 0.893. In Hair et al., the CR of over 0.7 reflects sound composite reliability and the AVE of more than 0.5 proves validity in the construct.

High reliability is demonstrated by the Cronbach's alpha of 0.942 for the PSY construct that goes above the advised threshold of 0.9 for exceptional internal consistency. With a CR of 0.952 and an AVE of 0.713 the factor loadings from 0.807 to 0.890 highlight that the PSY construct exhibits strong reliability and convergent validity. The high level of the AVE (over 0.7) means that many aspects of the variance are due to the construct and confirms the reliability of measuring psychological capital.

#### 4.2 Discriminant Validity:

*Table 2: HTMT RATIO*

Variables	1	2	3
Psychological Capital (PSY)			
Perceived Social support (PSS)	0.572		
Mental Health(MH)	0.480	0.707	

The Heterotrait-Monotrait (HTMT) ratio of correlations is often regarded as a tougher and more trustworthy measure for assessing discriminant validity. The HTMT technique evaluates the typical correlations of constructs assumed to be distinct (heterotrait-monotrait) against the mean correlations of indicators that measure the same construct (heterotrait-monotrait). When the HTMT ratio remains under a set threshold often cited as 0.85 (certain researchers propose 0.90 based on circumstances), discriminant validity is confirmed. The correlation among PSY and PSS equals 0.572 and shows that PSY and PSS possess sufficient discriminant validity if the HTMT value remains below 0.85. The 0.572 figure is well under the 0.85 limit and establishes discrimination validity among these two constructs. The relationship of PSY to MH is 0.480. Support for discriminant validity is apparent when the HTMT analysis produces a number lower than 0.85. Given that 0.480 is a very low correlation that overlaps with the threshold level; the discriminant validity of PSY and MH is established. The association between PSS and MH is 0.707. To demonstrate discriminant validity with HTMT this value has to be under 0.85. Due to the threshold being surpassed 0.707 represents acceptable discriminant validity for PSS in relation to MH according to HTMT guidelines.



### 4.3 Hypothesis Testing:

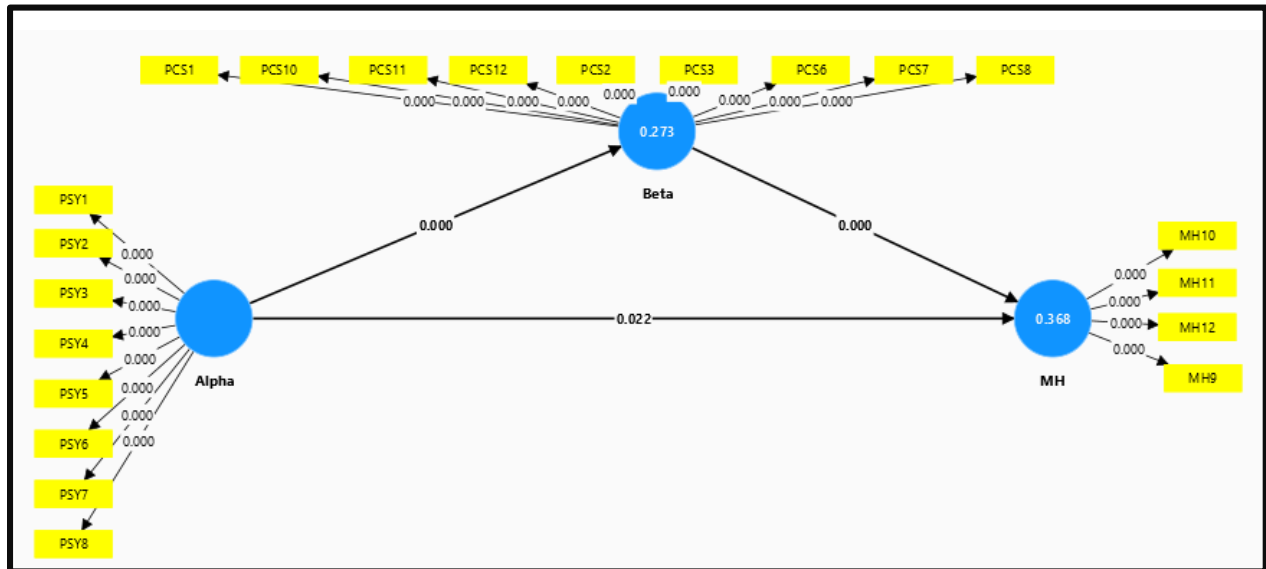


Figure 2: Structural Equation Modelling

Table 3: Hypotheses Results

Relationships	Original sample	Sample mean	Standard deviation	T statistics	P values
PSS -> MH	0.523	0.524	0.057	9.212	0.000
PSY -> PSS	0.153	0.150	0.067	2.297	0.022
PSY -> MH	0.513	0.519	0.061	8.379	0.000
<b>Indirect effect</b>					
PSY -> PSS -> MH	0.268	0.273	0.048	5.528	0.000

The links between the constructs illustrate substantial favorable outcomes. Perceived Social Support (PSS) directly influences Mental Health (MH) with a strong positive association (0.523) and high t-statistic (9.212) and low p-value (0.000). This demonstrates an important impact of social support on mental health. This evidence shows that greater perceived social support correlates with a positive in mental health. The impact of Psychological Capital (PSY) on Mental Health (MH) is positive with a path coefficient of 0.513 and a p-value of 0.000. The relationship between Psychological Capital (PSY) and Perceived Social Support (PSS) yields a positive and significant contribution at a coefficient of 0.153 and a t-statistic of 2.297 despite being weaker in strength compared to others.

The investigation of indirect relationships demonstrates that Psychological Capital (PSY) indirectly shapes Mental Health (MH) by way of Perceived Social Support (PSS). With a coefficient of 0.268 and associated t-statistic of 5.528 the evidence suggests that perceived social support impacts the connection between psychological capital and mental health. The indirect effect underscores the value of both psychological capital and social support in promoting mental health results. The merge of direct and indirect effects illustrates the detailed interactions among these elements that affect mental well-being.

### **5. Discussion:**

The research uncovers how relationships among Psychological Capital (PsyCap), mental health (MH), and support from peers and loved ones at higher education institutions in Pakistan are linked. We predicted that PSS acts as a link between PsyCap and MH for higher education students. Our initial focus was to investigate the direct as well as indirect relationships involving (a) PsyCap and Mental Health and (b) PSS and Mental Health. The results uncovered a direct association between PsyCap and mental health among students from Pakistan matching research by Nafees and Jahan (2017). Higher degrees of PsyCap linked to better mental and bodily health according to the results.

The findings of Youssef-Morgan & Luthans (2015) align with evidence that greater PsyCap improves students' mental health and their satisfaction. The findings from Avey et al. (2010) and Krasikova et al. (2015) back the relationship between PsyCap and enhanced student mental health. Krasikova & Lester (2015) reported that elevated PsyCap amounts significantly lowered emotional health challenges including addiction and depression. These results propose that reduced PsyCap scores could enhance risk for mental health issues. Past investigations demonstrate that PsyCap is inversely tied to anxiety and workplace deviance as well as burnout outcomes. The research underlines that PsyCap has a significant impact on boosting mental wellness while decreasing psychological distress in various areas like academics. By examining PSS as a mediator for PsyCap effects on mental health outcomes this study expands knowledge in the field.

This analysis uncovered a meaningful relationship between social support perception (PSS) and mental health (MH) (Bond, 2007; Magson et al. 2014). This connection fits with the Conservation of Resources (COR) model which implies that individuals enhanced with strong levels of one resource (PsyCap or community support) usually achieve greater amounts of additional resources like MH. In addition, we investigated the effects of PSS on the PsyCap-MH relationship revealing that PsyCap and PSS promote MH as predicted by the study's hypothesis (H1). Higher PSS values boosted the link between PsyCap and MH; by contrast lower PSS values diminished this bond. Finding evidence points out the significance of social support as a situational asset according to COR theory that underscores the essential function of that resource in stress relief.

Our results endorse the stress-reduction theory of social support by Avey et al. (2010), indicating that PSS serves as a safeguard in the link between PsyCap and well-being. Our results fit with earlier studies led by Ciby and Sahai (2020), showing how social support boosts mental well-being when facing psychological challenges like resource losses or struggles to find resources (Hobfoll & Shirom 2000). In colleges and universities students deal with diverse stressors like feelings of inadequacy and life struggles that can negatively influence their mental status. PSS contributes importantly to lowering these effects.

### **Conclusion**

This analysis points out the significant effect of perceived social support (PSS) on the promotion and improvement of mental health (MH) within higher educational settings. In examining the

effects of social support on mental well-being in the past; our study clearly focuses on the mediating effect of PSS on the relationship between PsyCap and MH. Higher student mental wellness can be boosted by having many social resources to handle stress.

Several disadvantages occur within this study. It examines only university students in Pakistan which reduces how applicable the results are. We could investigate various groups to improve our knowledge of these links in future studies. This study depended entirely on data given by participants through self-report which might skew analysis. More methods should be adopted by future research to accurately represent the complex links among MH and PsyCap. In addition to focusing on PSS as a mediator in this study future analysis might investigate the impact of other factors too. These variables could supply extra understanding of the relationship of mental health. Future investigations may benefit from using a longitudinal or time-lag approach to monitor changes with time and improve insight into the lasting impact of PsyCap and PSS on MH. This method will reveal a richer perspective on the changing dynamics of these interactions over time and facilitate more detailed investigations into causality.

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