EXAMINING THE RELATIONSHIP BETWEEN PSYCHOLOGICAL RESILIENCE AND MENTAL HEALTH AMONG HIGHER EDUCATION STUDENTS

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ABSTRACT

University students frequently encounter various stressors, including academic pressure, social transitions, and financial challenges, which can adversely affect their mental health. Psychological resilience has been increasingly recognised as a key protective factor that enables individuals to adapt positively to adversity and maintain emotional well-being. This study examined the relationship between psychological resilience and mental health among higher education students in Malaysia. A quantitative research design was employed using an online survey administered to 136 undergraduate students from Universiti Putra Malaysia (UPM), Universiti Kebangsaan Malaysia (UKM), Universiti Teknologi MARA (UiTM), and Universiti Tenaga Nasional (UNITEN). The survey included demographic questions, the Depression, Anxiety and Stress Scale (DASS-21), and the Resilience Scale (RS), both presented in validated Malaylanguage versions to ensure cultural relevance. Data were analysed using descriptive statistics and Spearman's rank-order correlations to assess the associations between resilience and mental health outcomes. The results revealed significant negative correlations between resilience and depression ($\rho = -.24$, p = .005), resilience and stress ($\rho = -.33$, p < .001), and resilience and anxiety ($\rho = -.22$, p = .010), indicating that higher resilience is associated with lower psychological distress. Although the correlations were weak to moderate, the findings support existing evidence on the protective role of resilience. The study highlights the importance of integrating resilience-building programs into university mental health initiatives to enhance students' coping abilities, well-being, and academic success.

Keywords: resilience, depression, stress, anxiety, university students, mental health

INTRODUCTION

University students face a unique set of challenges that can significantly impact their mental health. Academic pressure, social adjustments, financial concerns, and the transition to adulthood create a high-stress environment that may contribute to psychological distress, including depression, anxiety, and stress (Farizal et al., 2023; Das & Krishnan, 2022). Mental health problems among undergraduates are increasingly recognised as a critical public health issue, as they not affect

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academic performance but also influence overall well-being and future professional functioning (Abbas et al., 2024).

In recent years, resilience has emerged as an essential protective factor that enables students to cope with adversity and maintain their psychological well-being. Resilience refers to the capacity to adapt positively in the face of stress, challenges, or trauma, and it can influence both the experience of psychological distress and the ability to recover from it (García-Pérez et al., 2025). Studies have shown that students with higher resilience scores exhibit lower levels of depression, anxiety, and stress, indicating that resilience functions as a buffer against mental health difficulties (Madihie et al., 2024).

Furthermore, resilience is not merely the absence of distress; it also supports positive adaptation and psychological growth during challenging periods, including crises such as the COVID-19 pandemic (Suhaimi et al., 2024; Abulfaraj et al., 2024). Resilient students tend to utilise adaptive coping strategies, maintain emotional regulation, and derive meaningful experiences from adversity, which collectively enhance mental health outcomes (Toper et al., 2025). Given the protective role of resilience, understanding its relationship with mental health among university populations is crucial for developing effective interventions and support programs that promote students' psychological well-being (Das & Krishnan, 2022; Abbas et al., 2024).

Resilience is widely recognised as a protective factor that enables individuals to adapt positively to stress and adversity. Among university students, resilience encompasses emotional regulation, adaptive coping strategies, and the ability to recover from academic, social, and personal challenges (García-Pérez et al., 2025). In contrast, mental health issues such as depression, anxiety, and stress are prevalent in this population due to academic pressure, transitional challenges, and social stressors (Farizal et al., 2023; Das & Krishnan, 2022). Research suggests that higher resilience is associated with reduced psychological distress and increased psychological well-being, highlighting its buffering role in mental health outcomes (Abbas et al., 2024).

Multiple studies have examined the relationship between resilience and mental health among university students. For instance, a cross-sectional study conducted among medical and non-medical students found that students with higher resilience reported lower levels of depression, anxiety, and suicidal ideation (Abbas et al., 2024). Similarly, the Kerman University of Medical Sciences (2025) demonstrated that resilience significantly predicted mental health outcomes, emphasising its protective effect in high-stress academic environments.

Resilience influences mental health through multiple mechanisms. First, resilient students tend to employ adaptive coping strategies that mitigate the negative effects of stress (García-Pérez et al., 2025). Second, resilience supports emotional regulation, enabling students to maintain stable psychological functioning despite academic or personal challenges (Suhaimi et al., 2024). Third, resilience facilitates post-traumatic growth, allowing students to derive positive psychological outcomes from adverse experiences, such as natural disasters or pandemic-related disruptions (Toper et al., 2025).

Research across different populations highlights that the resilience mental health relationship is consistent but may vary in strength depending on cultural and contextual factors. For example, studies among Malaysian undergraduates indicate that resilience mitigates stress and anxiety in a collectivist cultural context where academic performance is highly valued (Das & Krishnan, 2022; Farizal et al., 2023). Similarly, systematic reviews of international studies suggest that resilience-based interventions improve mental health outcomes across diverse student

populations, demonstrating their universal relevance (Abulfaraj et al., 2024; García-Pérez et al., 2025).

Given the strong correlation between resilience and mental health, universities are encouraged to implement programs that enhance resilience among students. Strategies may include mindfulness training, cognitive-behavioural techniques, peer support systems, and structured stress management programs (Abbas et al., 2024; Abulfaraj et al., 2024). Promoting resilience not only helps prevent psychological distress but also supports positive adaptation and academic success.

University students are increasingly recognised as a population vulnerable to mental health challenges due to academic pressure, social transitions, financial stress, and personal life changes (Zahit, Omar Lim, & Ling, 2022). Cross-sectional studies conducted in Malaysia and other countries have documented high levels of depression, anxiety, and stress among undergraduate students, particularly during the COVID-19 pandemic, highlighting the urgent need for effective interventions to support student well-being (Fariza et al., 2023). Similarly, research in China reported that academic and pandemic-related stress contributed to increased psychological distress, reinforcing the global prevalence of mental health issues in university populations (Pan et al., 2024). This study, thus, aims to examine the relationship between resilience and mental health among higher education students in Malaysia.

METHODS

Research Design and Data Collection

A quantitative research design was employed in this study, utilising a structured survey to collect data. The established translated questionnaire was administered online via Google Forms. A total of 136 undergraduate students participated in the study by completing the survey.

Research Instruments

The questionnaire used in this study was divided into three main sections. The first section collected demographic information from participants, including gender, age, ethnicity, and faculty of study. These data were used to identify respondents' backgrounds and to enable comparative analyses based on demographic factors. The second section comprised the Depression, Anxiety, and Stress Scale (DASS-21), while the third section included the Resilience Scale (RS). For this study, the questionnaire employed validated Malay-language versions that had been previously utilised in empirical research, ensuring both reliability and cultural relevance for the participants.

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

The Depression, Anxiety and Stress Scale (DASS-21) is a 21-item questionnaire used to measure the severity of symptoms of depression, anxiety, and stress experienced in the past week. It is a shorter version of the original 42-item DASS.

The Resilience Scale (RS)

The Resilience Scale (RS), developed by Gail Wagnild and Heather Young in 1993 (and published in a 1995 paper, though often cited with the 1993 publication year of the original research), is a widely used 25-item self-report assessment tool that measures the degree of individual resilience. It was developed to focus on positive personality characteristics that enhance adaptation to stress and adversity.

Participants and Sampling

A total of 136 students participated in this study, of whom 61% (n = 83) were female and 39% (n = 53) were male. Participants were recruited based on predefined inclusion criteria using purposive sampling. The study population comprised students from Universiti Putra Malaysia (UPM), Universiti Kebangsaan Malaysia (UKM), Universiti Teknologi Mara (UiTM), and Universiti Tenaga Nasional (UNITEN). These universities were selected on the basis of their location within the Klang Valley, the region with the highest population density in Malaysia. As the Klang Valley also accommodates the nation's largest and most diverse higher education student population, these institutions constitute a representative and appropriate sample for addressing the objectives of this study Regarding age, only individuals aged 18 years and above were eligible to participate. This criterion was applied to ensure that respondents possessed adequate cognitive and emotional maturity to provide informed consent. Additionally, participants were required to be actively enrolled students at their respective universities at the time of data collection. This requirement was implemented to maintain the validity of the study by ensuring that the data accurately represented the current experiences of the student population, excluding individuals such as alumni or students who were not actively attending university.

Data Analysis

The collected data were analysed using descriptive statistics and Pearson correlation analysis to

Variable		Resilience	Anxiety
Resilience	Correlation Coefficient	1.000	220*
	Sig. (2-tailed)	_	.010
	N	136	136
Anxiety	Correlation Coefficient	220*	1.000
	Sig. (2-tailed)	.010	
_	N	136	136

examine the relationship between psychological resilience and mental health.

RESULT AND DISCUSSION

Table 1 : Spearman's rho Correlation Between Resilience and Anxiety

Note. p < .05 (2-tailed).

A Spearman's rank-order correlation was conducted to examine the association between resilience and anxiety in a sample of 136 participants. The analysis revealed a significant, weak negative correlation between resilience and anxiety, $\rho(136) = -.22$, p = .010, indicating that higher resilience is associated with lower anxiety levels.

The results of this study demonstrate that resilience is significantly associated with mental health outcomes among public higher education students. Although the correlation between resilience and anxiety was statistically significant, its weak magnitude suggests that anxiety is influenced by a broad range of factors beyond resilience alone. Prior research similarly indicates that psychological outcomes such as anxiety arise from complex interactions between biological predispositions, environmental stressors, coping styles, and social resources (Qirtas et al., 2023). Thus, resilience should be considered an important, but not exclusive, component within a broader framework of psychological risk and protection.

From a practical standpoint, the findings highlight the relevance of incorporating resilience-building strategies into mental health interventions for university students. Programs that strengthen adaptive coping, emotional regulation, and problem-solving skills may help reduce anxiety and enhance well-being. However, effective intervention requires more than enhancing individual traits; it must also involve creating supportive academic and social environments that can buffer stress and promote positive mental health outcomes (Sarah et al., 2024).

Existing literature reinforces the need for a multifaceted approach. Several studies show that factors such as social support, mindfulness, and hope can strengthen the protective effects of resilience on mental health, whereas loneliness, academic overload, and pandemic-related restrictions may weaken these effects (Zheng et al., 2025; Qirtas et al., 2023; Sarah et al., 2024). These findings underscore the importance of addressing both personal and contextual factors when designing interventions for student populations.

Resilience and Stress

Table 2: Spearman's rho Correlations Between Stress and Resilience

Variable		Stress	Resilience
Stress	Correlation Coefficient	1.000	333**
	Sig. (2-tailed)		<.001
	N	136	136
Resilience	Correlation Coefficient	333**	1.000
	Sig. (2-tailed)	<.001	_
	N	136	136

Note. p < .01 (2-tailed)

The correlation analysis demonstrated a statistically significant negative relationship between resilience and stress among the participants, p(136) = -.33, p < .001, indicating that higher levels of resilience are associated with lower levels of stress (Table 2). This aligns with existing findings showing that resilience serves as a protective factor against psychological distress. Although the effect size represents a small-to-moderate association, the relationship remains practically meaningful, especially within the context of student mental health.

Resilience broadly defined as the capacity to adapt positively in the face of adversity encompasses emotional regulation, effective coping, and the ability to recover from setbacks (Al Omari et al., 2023; Gong et al., 2023). Numerous studies show that higher resilience is associated with lower levels of depression, anxiety, and stress, as well as better psychological well-being overall (Suhaimi et al., 2024). For instance, Zheng, Zakaria, Md. Akhir, and Hassan (2025) reported that perceived social support mediates the relationship between resilience and mental health, suggesting that resilient students effectively utilise interpersonal resources to maintain well-being.

Resilience-enhancing interventions have been widely supported as effective approaches to reducing psychological distress and promoting positive adaptation. Mindfulness training, stress management courses, and coping-skills workshops have been shown to strengthen resilience and improve mental health outcomes across diverse student populations (Abulfaraj et al., 2024; Sarah et al., 2024). These interventions are particularly valuable during periods of heightened stress such as the COVID-19 pandemic—when students face increased academic and personal challenges (Pan et al., 2024; Gong et al., 2023).

The broader body of literature consistently highlights a robust negative association between resilience and psychological distress among university students. Those with high resilience tend to report lower levels of depression, anxiety, and stress, while low-resilience students are more susceptible to mental health problems (Al Omari et al., 2023; Suhaimi et al., 2024). Cross-sectional studies in Malaysia and Oman further support resilience as a significant predictor of mental health outcomes and a buffer against stress and burnout (Farizal et al., 2023; Al Omari et al., 2023).

Moreover, resilience appears to promote adaptive coping and post-traumatic growth. Yildiz et al. (2024) found that highly resilient students experienced positive psychological development following exposure to adverse events such as natural disasters. Likewise, Torres Cruz, Coaquira Flores, and Condori Quispe (2023) observed that resilient students demonstrated lower levels of depression even under high academic load, reinforcing resilience's role as a buffer against environmental stressors. Collectively, these findings support the conclusion that resilience is a critical factor influencing university students' mental health. Although resilience does not fully account for the complexity of psychological outcomes, it remains a key component within a multidimensional framework of student well-being, and an essential target for interventions aimed at reducing stress and fostering psychological resilience in educational settings.

Resilience and Depression

Table 3: Spearman's rho Correlation Between Resilience and Depression

Variable		Resilience	Depression	
Resilience	Correlation Coefficient	1.000	239**	
	Sig. (2-tailed)		.005	
	N	136	136	
Depression	Correlation Coefficient	239**	1.000	
	Sig. (2-tailed)	.005		
	N	136	136	

Note. p < .01 (2-tailed)

The analysis revealed a statistically significant but weak negative correlation, $\rho(136) = -.24$, p = .005, indicating that individuals with higher levels of resilience tended to report lower levels of depression (Table 3). Although the association is modest, it is consistent with the broader literature highlighting resilience as a protective factor against various forms of psychological distress.

During the COVID-19 pandemic, the importance of resilience became particularly evident. Madihie, Chin Chew Lin, and Muslihati (2024) reported that counselling students with higher resilience were better able to manage the challenges posed by online learning and exhibited lower levels of perceived stress. Similarly, a systematic review by Vasileiou et al. (2024) found that resilience-enhancing interventions significantly improved university students' mental health and overall well-being during crisis situations, reinforcing the widespread benefits of resilience across contexts.

Resilience appears to influence mental health through several mechanisms. First, resilient students are more likely to employ adaptive coping strategies such as problem-solving and cognitive reappraisal which help buffer the adverse effects of stress (García-Pérez et al., 2025). Second, resilience supports emotional regulation, enabling students to maintain stable psychological functioning despite academic pressures or personal challenges (Suhaimi et al., 2024). Third, resilience contributes to post-traumatic growth, allowing individuals to derive positive psychological changes following difficult or traumatic experiences, including natural disasters or pandemic-related disruptions (Toper et al., 2025).

Evidence from different cultural and educational contexts suggests that the relationship between resilience and mental health is consistent but may vary in magnitude depending on contextual factors. For instance, studies among Malaysian undergraduates indicate that resilience helps mitigate stress and anxiety within a collectivist culture where academic success is highly emphasised (Das & Krishnan, 2022; Farizal et al., 2023). International systematic reviews also highlight that resilience-based interventions are effective across diverse student populations, demonstrating the universal relevance of resilience in promoting mental health and well-being (Abulfaraj et al., 2024; García-Pérez et al., 2025).

Overall, the present findings add to growing evidence showing that resilience serves as a meaningful buffer against depression and other mental health difficulties among university students, even though its influence may be modest. Strengthening resilience, therefore remains a valuable target for mental health promotion efforts within higher education institutions

CONCLUCION

Overall, the findings of this study demonstrate that resilience plays a significant protective role in university students' mental health. The results consistently revealed weak to moderate negative correlations between resilience and depression, resilience and stress, and resilience and anxiety, indicating that higher resilience is associated with lower psychological distress across multiple domains. These results align with previous research showing that resilience supports emotional regulation, adaptive coping, and the ability to recover from adversity (García-Pérez et al., 2025; Suhaimi et al., 2024). Evidence from recent studies further highlights that resilient students experience fewer symptoms of depression, anxiety, and stress, even during periods of heightened challenge such as the COVID-19 pandemic (Madihie et al., 2024; Abulfaraj et al., 2024). Given the high prevalence of mental health issues among university students (Farizal et al., 2023; Das & Krishnan, 2022), these findings underscore the importance of resilience-building initiatives as part of campus mental health strategies. Interventions that strengthen coping skills, emotional

regulation, and adaptive responses to stress may help mitigate psychological distress and promote long-term well-being among students (Abbas et al., 2024; Toper et al., 2025). Therefore, enhancing resilience represents a valuable pathway for supporting student mental health and improving outcomes within demanding academic environments. Resilience interventions, such as mindfulness, stress management, and coping skills training, have been shown to improve mental health outcomes, reduce psychological distress, and promote positive adaptation in university students (Abulfaraj et al., 2024; Sarah et al., 2024). These interventions are particularly important during periods of crisis, including the COVID-19 pandemic, when students face heightened academic and personal challenges (Pan et al., 2024; Gong et al., 2023).

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REFERENCES

- Abbas, A., Zahra, S., Shahid, S., Kashif, M., and Raza, S. 2024. Academic Resilience, Psychological Well-Being and Suicidal Ideation among Medical and Non-Medical Students. *Journal of Health and Rehabilitation Research* 4(1): 76-82. https://doi.org/10.61919/jhrr.v4i1.321.
- Abulfaraj, G. G., Upsher, R., Zavos, H. M. S., and Dommett, E. J. 2024. The Impact of Resilience Interventions on University Students' Mental Health and Well-Being: A Systematic Review. *Education Sciences*, 14(5), 510. https://doi.org/10.3390/educsci14050510
- Al Omari, O., Al Yahyaei, A., Wynaden, D., Damra, J., Aljezawi, M., Al Qaderi, M., Al Ruqaishi, H., Abu Shahrour, L., & AlBashtawy, M. 2023. Correlates of Resilience among University Students in Oman: A Cross-Sectional Study. *BMC Psychology* 11: 2. https://doi.org/10.1186/s40359-022-01035-9.
- Das, P., and Krishnan, P.K. 2022. Cross Sectional Study: Stress, Depression, Anxiety and Coping Styles Among Malaysian University Students. *Journal of Health and Translational Medicine*(JUMMEC) 25(1). https://jummec.um.edu.my/index.php/jummec/article/view/28734/14586.
- Farizal, P. I. A. A., Zuhri, M. N. M., Bijarimi, N. A. M., Medhat, M., and Draidia, S. 2023. A Cross-Sectional Study on the Prevalence of Depression, Anxiety & Stress and Their Correlates among University of Cyberjaya Undergraduates. *International Journal of Science and Healthcare Research* 8(3). https://doi.org/10.52403/ijshr.20230330
- García-Pérez, L., Cepero-González, M., and Padial-Ruz, R. 2025. Resilience as a Key to Mental Well-Being in Higher Education: A Systematic Review of Evidence and Strategies. *Universitas Psychologica* 24: 1-15. https://doi.org/10.11144/Javeriana.upsy24.rkmw
- Gong, Z., Wang, H., Zhong, M., et al. 2023. College Students' Learning Stress, Psychological Resilience and Learning Burnout: Status Quo and Coping Strategies. *BMC Psychiatry* 23: 389. https://doi.org/10.1186/s12888-023-04783-z.

- Kerman University of Medical Sciences. 2025. Resilience as a Predictor of Mental Health among Medical Students: A Cross-Sectional Study Using PLS-SEM. *BMC Medical Education* 25: 1476. https://doi.org/10.1186/s12909-025-08063-0.
- Madihie, A., Chin Chew Lin, and Muslihati. 2024. Relationship Between Perceived Stress and Resilience among Counselling Students Towards Online Learning During COVID-19 Pandemic. *Journal of Cognitive Sciences and Human Development* 10(2): 175-89. https://doi.org/10.33736/jcshd.6828.2024.
- Pan, L., Zhao, J., Pang, M., Wang, J., Chen, R., Liu, H., Xu, X., Su, B., Nie, L., Zhao, J., Li, S., Li, J., Li, H., and Kong, F. 2024. Addressing Psychological Resilience and Its Determinants among University Students During the COVID-19 Pandemic: A Three-Wave Longitudinal Study in Shandong Province, China. *BMC Psychiatry* 24: 823. https://doi.org/10.1186/s12888-024-06175-3.
- Qirtas MM, Zafeiridi E, White EB, and Pesch D. 2023. The relationship between loneliness and depression among college students: Mining data derived from passive sensing. *Digit Health*. 2023. https://doi.org/10.1177/20552076231211104
- Sarah, S., Sari, K., Iskandar, and Amna, Z. 2024. The Relationship between Mindfulness and Academic Resilience in Students of Syiah Kuala University, Indonesia: Cross-Sectional Study. *Journal of Community Mental Health and Public Policy* 6(2): 134-45. https://doi.org/10.51602/cmhp.v6i2.151
- Suhaimi A. F, Ahmad N, and Kamaruzaman H. 2024. Examining the Resilience of University Students: A Comparative Mental Health Study. *Cureus* 16(9):e69293. https://doi.org/10.7759/cureus.69293
- Toper, F., Yanardağ, R., Koca, M., and Baydar, V. 2025. Post-Traumatic Growth in University Students After Earthquakes: The Effect of Perceived Social Support and Psychological Resilience. *Behavioral Sciences*, 15(9), 1178. https://doi.org/10.3390/bs15091178
- Torres Cruz, F., Coaquira Flores, E. E., and Condori Quispe, S. J. 2023. Prediction of Depression Level in University Students through a Naive Bayes based Machine Learning Model. https://arxiv.org/pdf/2307.14371
- Zahit, R. A., Omar Lim, S. L., & Ling, J. L. Y. 2022. COVID-19: Mental Health and Academic Performance among University Students. *Trends in Undergraduate Research* 5(1): e1–9. https://doi.org/10.33736/tur.3861.2022
- Zheng, Y., Zakaria, E., Md. Akhir, N., and Hassan, N. 2025. Resilience, Dispositional Hope, and Psychological Well-Being among Chinese College Students: Perceived Social Support as a Mediator. *Journal of Population and Social Studies [JPSS]* 34: 178-98. http://doi.org/10.25133/JPSSv342026.010

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