
Loneliness and Worry as Predictors of Psychological Well-Being among College Students

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Abstract

College years represent a transitional period between adolescence and adulthood. At this stage, students face several crisis/challenges like academic competition, identity formation, career related uncertainty, and changing social networks. The psychological well-being is actively developing during emerging adulthood. These developmental challenges expose students to emotional stressors, among which loneliness and worry are especially prevalent. Therefore, present study examined the loneliness and worry as predictors of psychological well-being among college students. A sample of 312 students (108 males and 204 females) aged between 16 and 25 years ($M = 19.5$) participated in the study. Psychological well-being was measured using the Psychological Well-Being Scale developed by Ryff and Keyes (1995), loneliness was assessed using the UCLA Loneliness Scale developed by Russell (1996), and worry was measured using the Brief Penn State Worry Questionnaire (Topper et al., 2014). Correlation and regression analyses were conducted. Results revealed that loneliness was significantly and negatively correlated with overall psychological well-being and its dimensions. Worry was also negatively correlated with psychological well-being. Regression analysis indicated that loneliness significantly predicted psychological well-being, whereas worry did not significantly contribute when loneliness was controlled. The findings highlight the critical role of perceived social connectedness in promoting psychological well-being among college students.

Keywords: Loneliness, Worry, Psychological Well-Being

Introduction

Psychological well-being has emerged as a central construct in positive psychology and mental health research. It refers to optimal psychological functioning and experience. According to Carol D. Ryff (1989), psychological well-being is a multidimensional construct consisting of autonomy, environmental mastery, personal growth, positive relations with others, purpose in life, and self-acceptance. Unlike hedonic approaches that focus primarily on happiness, this eudaimonic perspective emphasizes personal growth and meaningful functioning (Ryff & Keyes, 1995).

Emerging adulthood, particularly the college period, is characterized by identity exploration, academic pressure, career uncertainty, and social transitions. These developmental challenges often expose students to emotional stressors, among which loneliness and worry are especially prevalent. Humans are social animals and have basic need to live together (Baumeister and Leary, 1995). Loneliness arises when an individual's basic need is not fulfilled by the environment, resulting in perceived social isolation (Hawkley and Capitanio, 2010; Hughes et al., 2004). Thus, loneliness is a subjective sense that is not always related to the quantity but rather the quality of social contacts (Hughes et al., 2004).

Loneliness is a painful and worldwide phenomena with an evolutionary origin. Loneliness reminds us of our pain and warns us about the dangers of becoming alone. Loneliness is defined as the absence of necessary social ties and a lack of affection in current social relationships (Rubin, 1982). It is a key measure of social well-being. Loneliness research has grown substantially over the last two decades; nonetheless, despite the mental health hazards associated with loneliness, the association between loneliness and psychiatric diseases has received little attention (West Kellner & Moore, 1986). In India very little research has been done on psychological and physical affects of loneliness. However, most of these studies were done in elderly patients only (Acharya, 2012; Singh & Mishra, 2009; Bhatia, Swamy & Thakur, 2007).

Loneliness is defined as the subjective perception of social isolation resulting from a discrepancy between desired and actual social relationships. Cacioppo and Hawkley (2009) conceptualized loneliness as a distressing psychological state that affects emotional regulation, cognition, and behavioural responses. Persistent loneliness has been linked with depression, anxiety, reduced life satisfaction, and diminished well-being (Cacioppo & Hawkley, 2009).

Worry, on the other hand, is a repetitive, future-oriented cognitive process involving uncontrollable negative thoughts. Borkovec (1985) described worry as a chain of negatively affect-laden thoughts that contributes significantly to generalized anxiety. While moderate worry can motivate problem-solving, chronic worry interferes with emotional regulation and adaptive functioning. Chronic worrying can affect one's daily life so much that it may interfere with appetite, lifestyle, sleep pattern, and job performance level (Bruce, 2024; Newman et al., 2019).

Loneliness and worry often coexist. Social isolation may increase rumination about rejection and social evaluation, while excessive worry may promote withdrawal behaviours that reinforce loneliness. Despite extensive research examining loneliness and worry independently, comparatively fewer studies have investigated their combined predictive role in psychological well-being among college students.

Review of Literature

Empirical research consistently demonstrates a negative relationship between loneliness and psychological well-being. Russell (1996) finding has shown that higher loneliness predicts lower life satisfaction, increased depressive symptoms, and reduced psychological adjustment. Longitudinal investigations by Cacioppo and colleagues found that chronic loneliness impairs emotional regulation, cognitive functioning, and overall well-being (Cacioppo & Hawkley, 2009). Their research suggests that perceived social isolation activates psychological and physiological stress responses, ultimately undermining mental health.

Similarly, research on worry emphasizes its harmful effects on psychological well-being. Borkovec (1985) acknowledged worry as a central traits of generalized anxiety disorder. Studies using the Penn State Worry Questionnaire demonstrate that high levels of worry are associated with emotional instability, low environmental mastery, and poor life satisfaction. Among college students, academic demands and forthcoming uncertainties frequently contribute to persistent worry. Such cognitive preoccupation has been linked to sleep disturbances, stress, and impaired concentration, all of which negatively affect psychological well-being.

Although both loneliness and worry independently predict psychological distress, research examining their simultaneous predictive contribution remains limited. This gap highlights the need for integrative models that consider both emotional and cognitive vulnerabilities.

Methods

Sample

The sample consisted of 312 participants, and the descriptive statistics indicated that the mean age of respondents was 19.50 years (SD = 1.42), suggesting that the sample largely represents late adolescents.

Tools Used:

1. Loneliness Scale

Loneliness was measured by using the UCLA Loneliness Scale (Version 3) developed by Daniel Russell (1996). The scale is intended to assess subjective feelings of loneliness and perceived social isolation. The UCLA Loneliness Scale contains 20 items that measure the frequency of loneliness-related experiences. Responses are recorded on a 4-point scale ranging from 1 (Never) to 4 (Always). Higher scores indicate greater levels of loneliness. The scale has demonstrated high internal consistency, test-retest reliability, and construct validity across diverse populations.

2. Worry Scale

Worry was measured by using the Brief Version of the Penn State Worry Questionnaire (Brief PSWQ) developed by Maaïke Topper et al. (2014). The instrument assesses the severity and frequency of worry experienced by individuals. The Brief PSWQ consists of 5 items rated on a 5-point Likert scale ranging from 1 = “Not at all typical of me” to 5 = “Very typical of me”. Higher scores indicate greater levels of worry. The scale has shown satisfactory psychometric properties and is considered an efficient measure for assessing generalised worry in research settings.

3. A. Psychological Well-being Scale

Psychological well-being was assessed using the Psychological Well-being Scale developed by Ryff and Keyes (1995). In the present study, the 42-item long version was used. The scale measures six major dimensions of psychological well-being, namely, Autonomy, Environmental Mastery, Personal Growth, Positive Relations with Others, Purpose in Life, and Self-Acceptance. Each item is rated on a 7-point Likert scale ranging from strongly disagree to strongly agree. Higher scores on the scale indicate greater psychological well-being.

Results and Interpretation

Pearson’s product–moment correlation analysis revealed a significant positive relationship between loneliness and worry ($r = .320, p < .01$). Findings suggest that students experiencing social isolation also tend to report higher cognitive anxiety. Loneliness showed a strong negative correlation with overall psychological well-being ($r = -.520, p < .01$). It was negatively associated with autonomy, environmental mastery, personal growth, purpose in life, and self-acceptance. These findings consistent with the theoretical framework of Ryff (1989). The Ryff model emphasizes relational support as a focal point of positive functioning. Consistent with prior findings (Cacioppo & Hawkley, 2009), students experiencing loneliness may face with emotional regulation and diminished meaningful life. However, loneliness did not significantly correlate with positive relations. This may indicate that loneliness reflects subjective dissatisfaction rather than objective absence of social contacts.

Table-1

Relationship among Loneliness, Worry and dimensions of Psychological Well-being

	Autonomy	Environ. Mastery	Personal Growth	Positive Relation	Positive in Life	Self- acceptance	Psychological Well-being
Loneliness	-.233**	-.255**	-.312**	-.111	-.349**	-.326**	-.520**
Worry	-.184**	-.113*	-.117*	.119*	-.110	-.246**	-.212**

Multiple regression analysis indicated that loneliness and worry together explained 27.2% of the variance in psychological well-being ($R^2 = .272, p < .001$). However, loneliness emerged as the only significant predictor ($B = -1.019, p < .001$), whereas

worry did not significantly predict well-being when loneliness was controlled ($p = .324$). This suggests that social disconnection plays a more central role in determining psychological well-being among college students.

Table-2

Predictive Effect of Loneliness and Worry on Psychological Wellbeing

Criterion Variable	Predictor	B	T	Sign
Psychological Well-being	Loneliness	-1.019	9.831	.000
	Worry	.064	.988	.324

 $R = .522$, $R^2 = .272$, $F = 57.862$, $p < .000$

Discussion

The findings demonstrate that loneliness is a robust predictor of psychological well-being. In line with Cacioppo and Hawkley (2009), perceived social isolation appears to undermine core components of well-being, including purpose, mastery, and self-acceptance.

Although worry was significantly correlated with well-being, its predictive strength diminished in the regression model. This may indicate that the negative impact of worry operates indirectly through loneliness or other emotional processes. Social belonging fulfils a fundamental human need; when unmet, broader psychological functioning deteriorates. Future research may explore mediation models to examine whether loneliness mediates the relationship between worry and psychological well-being.

Conclusion

The present study concludes that loneliness significantly predicts psychological well-being among college students, whereas worry has a comparatively weaker independent effect. Promoting meaningful interpersonal connections within educational institutions may therefore serve as an effective strategy for enhancing student well-being. Interventions such as peer mentoring, counselling services, and campus engagement initiatives may reduce loneliness and improve psychological functioning.

References

- Acharya, A. (2012). *New Historicist Examination in Graham Greene's The Quiet American* (Doctoral dissertation, Department of English).
- Leary, M. R., & Baumeister, R. F. (1995). The need to belong. *Psychological bulletin*, 117(3), 497-529.
- Bhatia, S. P. S., Swami, H. M., Thakur, J. S., & Bhatia, V. (2007). A study of health problems and loneliness among the elderly in Chandigarh. *Indian Journal of Community Medicine*, 32(4), 255-258.
- Borkovec, T. D. (1985). Worry: A potentially valuable concept. *Behaviour research and therapy*, 23(4), 481-482.
- Bruce, D.F. (2024). How Worrying Affects the Body, Health & Balance Guide, <https://www.webmd.com/balance/default.htm>.
- Cacioppo, J. T., & Hawkley, L. C. (2009). Perceived social isolation and cognition. *Trends in cognitive sciences*, 13(10), 447-454.
- Hawkley, L. C., & Capitanio, J. P. (2015). Perceived social isolation, evolutionary fitness and health outcomes: a lifespan approach. *Philosophical Transactions of the Royal Society B: Biological Sciences*, 370(1669), 20140114.
- Hughes, M. E., Waite, L. J., Hawkley, L. C., & Cacioppo, J. T. (2004). A short scale for measuring loneliness in large surveys: Results from two population-based studies. *Research on aging*, 26(6), 655-672.
- Newman, A., Obschonka, M., Schwarz, S., Cohen, M., & Nielsen, I. (2019). Entrepreneurial self-efficacy: A systematic review of the literature on its theoretical foundations, measurement, antecedents, and outcomes, and an agenda for future research. *Journal of vocational behaviour*, 110, 403-419.
- Rubin, K. H. (1982). Non-social play in preschoolers: Necessarily evil?. *Child development*, 651-657.
- Russell, D. W. (1996). UCLA Loneliness Scale (Version 3): Reliability, validity, and factor structure. *Journal of personality assessment*, 66(1), 20-40.
- Ryff, C. D., & Keyes, C. L. M. (1995). The structure of psychological well-being revisited. *Journal of personality and social psychology*, 69(4), 719.
- Ryff, C. D. (1989). Happiness is everything, or is it? Explorations on the meaning of psychological well-being. *Journal of personality and social psychology*, 57(6), 1069.
- Singh, S., & Mishra, R. C. (2011). Emotion regulation strategies and their implications for well-being. *Social Science International*, 27(2), 179.
- Topper, M., Emmelkamp, P. M., Watkins, E., & Ehring, T. (2014). Development and assessment of brief versions of the Penn State Worry Questionnaire and the Ruminative Response Scale. *British Journal of Clinical Psychology*, 53(4), 402-421.
- West, D. A., Kellner, R., & Moore-West, M. (1986). The effects of loneliness: A review of the literature. *Comprehensive psychiatry*, 27(4), 351-363.