



Journal of Social Issues and Development (JSID)

(Himalayan Ecological Research Institute for Training and Grassroots Enhancement (HERITAGE))

ISSN: 2583-6994 (Vol. 3, Issue 1, January-April, 2025. pp. 148-162)

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

Rupali Joshi

ABSTRACT

Anxiety is one's response to stress. These symptoms can be psychological, physical or environmental challenges. Loneliness is also a condition of human life, an experience of humanizing which enables the person to sustain, extend, and deepen his/her humanity. Social support is an aspect that should be given due consideration while understanding stress and its effects since it is described as both buffer against life stressors as well as an agent promoting health and wellness. The study was aimed to explore the moderating effect of social support on the relationship of academic stress with loneliness and anxiety. The study was conducted on 200 IIT students from BHU. The level of anxiety was measured by using State, Trait and Free Floating Anxiety Scale developed by Tripathi and Rastogi (1986). Social Support Scale (Arora & Kumar, 1998) which assesses functional support in four areas - emotional, informational, instrumental and companionship, were administered. U.C.L.A. Loneliness Scale (Russell, Peplau, & Ferguson, 1978) was used to assess loneliness. Findings suggested that Social Support does not moderate the impact of stress on Anxiety and loneliness exhibited by Technology Students. However, Social Support has a direct significant negative impact on Anxiety and loneliness.

Assistant Professor, I.B.P.S.

Sarason (1958) defined anxiety in behavioral terms as a conditioned response to a perceived threatening stimulus which could be learnt or inherited. Anxiety is a psychological disorder that is associated with significant suffering and impairment in functioning. It is a blend of thoughts and feelings characterized by a sense of uncontrollability and unpredictability over potentially aversive life events (Wilson, Nathan, O' Leary, & Clark, 1996). Feryal (2007) has quoted Speilberger's definition according to which anxiety is the subjective feeling of tension, nervousness and worry associated arousal of the nervous system.

Anxiety is one's response to stress. These symptoms can be psychological, physical or environmental challenges. Anxiety is a natural physiological response that arouses the fight or flight sensation as an appropriate fear response. An individual get anxious in response to fear in order to protect himself or herself. It is only when anxiety becomes debilitating and disconnected to a known situation or stimuli that it becomes a problem. There are various forms of anxiety including excessive worrying, a sense of fear, restlessness, overly emotional responses and negative thinking. This situation can turn so bad and it may interrupt the quality of life. Anxiety includes stress, panic, avoidance, irrational fears, and fear of losing control and problems of sleeping and/or eating (Samantha & Robert, 2009). Free- floating anxiety is severe, generalized anxiety having no apparent connection to any specific object, situation, or idea.

The relationship between anxiety and academic performance has been studied in a variety of laboratories and natural settings. Individuals experiencing anxiety show apprehensions that often interfere with performance in everyday life as well as in academic situation. Mostly university students suffer to some degree with small level of anxiety. In some of the earlier studies it has been found that student's performance in university is influenced by anxiety (Anson, Bernstein, & Hobfoll, 1984) which could lead to difficulties in concentration, lack of motivation and interest, poor attendance and physical health such as headache and fatigability and these conditions are likely to affect student's academic achievement. In a study conducted by Anson et al. (1984) on the relationship between anxiety and academic performance, it was found that anxiety was significantly and negatively correlated with grades obtained by the students.

The psychological symptoms of anxiety among students include feeling nervous before attending classes, panicking, going blank during a test, feeling helpless while doing assignments or lack of interest shown

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

in subjects which are considered difficult whereas the physiological symptoms include sweaty palms, racing heart beat or an upset stomach (Ruffin, 2007). The anxiety level creates normal life difficult for some students and relaxation is nearly impossible and for others the anxiety interferes with everyday functioning like studies, their daily activities and social life among students. In classroom setting, anxiety disorders may manifest in student's behaviors. Anxiety is a major predictor of academic performance (McCraty, 2007, McCraty, Dana, Mik, Palm, & Stepher, 2000) and low academic performance among students. Researchers have been looking at the correlates of anxiety sources and their effect on academic performance. Students with higher level of anxiety achieve a lower academic performance (McGraty, 2007; Heather & April, 2008) and greater anxiety is associated with poorer academic achievement (Luigi, Francesa, Maria, Eleonora, Valenting & Benedetto, 2007). The prevalence of anxiety among university has been acknowledged by students and educators.

Loneliness is also seen as a normal experience that leads individual to achieve deeper self-awareness, a time to be creative, and an opportunity to attain self- fulfilment and to explore meaning of life (Yalon, Borys & Perlman,2001). According to the American Psychological Association (APA, 2020), loneliness is “a subjective feeling of social isolation or being alone despite being surrounded by other people”.

Loneliness is also a condition of human life, an experience of humanizing which enables the person to sustain, extend, and deepen his/her humanity (Moustakes,1961). According to Weiss (1973) loneliness is caused not by being alone but being without some definite needed relationship or set of relationships. Loneliness appears always to be a response to the absence of some particular relational provision, such as deficits in the relational provisions involved in social support (Ditommaso, Branhem, Ross & Burgess, 2003).

However, the experience of loneliness is likewise unpleasant and distressing. Loneliness may also lead to people to submerge themselves into dependency relations, following direction, imitation, being like others, and striving for power and status (Peplaw,1997, Rokaach & Block, 1982). Reading, watching TV, using the internet, social activities, attending parties, drinking, and also using drugs do not only signal loneliness, but these also may be some adaptive or maladaptive coping strategies university students use to overcome this unpleasant and distressing experience – loneliness (Yeh, 2002). Researchers have indicated that adolescents experience more loneliness than any other

age groups (Jones, 1991). Late adolescence and early adulthood (i.e., university age) are especially high risk for experiencing loneliness (Deniz & Hamarta, 2005). University is a transition period from being an adolescent to being an adult. It is a period for university students to seek and fulfil their sense of individuality and, at the same time, to seek and build close and social relationships with others. For many university students, this may be the first time they live away from their parents. They may move from the emotional and social support of their families. They leave home as well as their hometown friends. Once entering the university, they need to re-evaluate their past relationships with parents, teachers, friends, and girlfriend/boyfriend. They begin to learn how to deal with the attachment and separation processes of interpersonal situations in normal psychological growth and begin to create their own unique self- image. Lack of social and emotional support for university students, may lead to the experience of social and emotional loneliness (Cutrona, 1982) from being an adolescent to being an adult. It is a period for university students to seek and fulfil their sense of individuality and, at the same time, to seek and build close and social relationships with others. For many university students, this may be the first time they live away from their parents. They may move from the emotional and social support of their families. They leave home as well as their hometown friends. Once entering the university, they need to re-evaluate their past relationships with parents, teachers, friends, and girlfriend/boyfriend. They begin to learn how to deal with the attachment and separation processes of interpersonal situations in normal psychological growth and begin to create their own unique self- image. Lack of social and emotional support for university students, may lead to the experience of social and emotional loneliness (Cutrona, 1982). The complexity of life and the competitive environment have caused people to become absorbed in their work, leading to isolation. Starting university can pose significant emotional challenges for students, as they often have to leave behind their hometown, family, and friends (Yung et al., 2023). This shift can be challenging, as it requires them to balance maintaining their hometown connections while forging new friendships in their university environment. Before forming new bonds, the physical distance from longstanding relationships can leave university students vulnerable to loneliness. Changing one's environment, social connections, and expectations can result in notably elevated levels of loneliness, and these challenges are particularly prominent among university students. Similarly, university students in academia face

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

constant pressure and competition, which has led to a kind of isolation. The rigorous and result-oriented university environment has turned them into input-output machines as a result, loneliness has become a common problem among university students (Holzer et al., 2023)

It has been recognized that the relationship between stress and strain may not be a direct one. A number of factors are likely to influence this relationship and one of the most prominent one is the role of social support. It has been recognized that the relationship between stress and strain may not be a direct one. A number of factors are likely to influence this relationship and one of the most prominent one is the role of social support. Social support is an aspect that should be given due consideration while understanding stress and its effects since it is described as both buffer against life stressors as well as an agent promoting health and wellness (Stephanie, Maya, William, Elizabeth, Gali & Giovanna, 2004). Social support refers to the experience of being valued, respected, cared about and loved by others who are present in one's life (Gurung, 2006). It may come from different sources such as family, friends, teachers, community or any social group to which one is affiliated. Social support is an element that can help individuals to reduce the amount of stress experienced as well as to help individuals cope better in dealing with stressful situations.

The term social support is used for broad range of concepts and partly overlapping functions but major distinction is made between two of its aspects- structural and functional support.

Structural and Functional Social Support

Cohen and his colleagues (Cohen & Syme, 1985, Cohen & Wills, 1985) proposed a distinction between structural and functional support measures.

Structural support

Structural support refers to measures describing the existence of and interconnections between social ties (e.g., marital status, number of relationships or number of relations who know one another). It is the availability of significant others (e.g., spouses, family members, friends, co-workers, social and religious groups) irrespective of the actual exchange of support. Structural support is also referred to as social integration (Cohen et al, 2000). One way of assessing social support has been to explore the social network of an individual without focusing on the nature of the support or its perception by the recipient.

In structural terms, social support is the number of interacting social contacts, or persons that an individual approach in times of need, frequency of interaction among its members, its density and extensiveness, the reciprocity, durability and intensity of its interpersonal relationship (House and Kahn, 1985). The underlying idea is that the presence of social network provides a quantitative measure of the potential of the network to provide help in situations when needed.

Functional Support

Functional support, by contrast, is a subjective measure of the perception of support, depending on individual characteristics and expectations (Yopp, 1988, Connell & D'Augelli, 1990). Functional measures assess whether interpersonal relationships serve particular function (e.g., provide affection, feeling of belonging or material aid). House and Kahn (1985) social network and social relationship categories would be classified as structural, whereas their social support category would be classified as functional. The perception of support is strongly influenced by personal characteristics (Liem & Liem, 1978; Cohen & Wills, 1985; Lakey & Cohen, 2000).

Types and sources of functional social support may vary. House (1981), described four main categories of functional social support:

- Emotional Support** : It generally comes from family and close friends and is the most commonly recognized form of social support. It includes empathy, concern, caring, love and trust.
- Appraisal support** : It involves transmission of information in the form of affirmation, feedback and social comparison. The information is often evaluative and can come from family, friends, co-workers or community sources.
- Informational Support** : It includes advice, suggestions or directives that assist the person to respond to personal or situational demands.
- Instrumental Support** : It is the most concrete direct form of social support, encompassing help in the form of money, time, assistance in-kind and other explicit interventions on the person's behalf.

Structural and functional support are not necessarily highly correlated as perceived social support has been strongly correlated with well-being than structural support (Wethington, & Kessler, 1986),

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

and it is suggested that interventions should be focused on increasing functional support rather than structural support. In practice, however, intervention opportunities on the structural support level by adding health professionals or peers seem more feasible than changing people's perception of support.

Researchers indicate that there are two major mechanisms which social support operates leading to positive outcomes for an individual. These two mechanisms are referred to as Main effect and Stress Buffering models of social support.

Studies Related to Anxiety

Pevekar, Kotkunde and Padma (2023) conducted a study on 159 students. It was found academic stress, financial concerns relationship issues and social pressure were identified as significant risk factors.

Suryanigrum (2021) conducted a study to analyze whether in the current era social anxiety problems are still developing among college students whether there are any difference in the level of social anxiety was based on the year of entry and gender. Results showed that 76.9% of the subjects experienced social anxiety. There was no difference in the level of social anxiety among new college students and old college students nor between male and female college students.

Jia (2024) reported the key factors contributing to student anxiety and it was found academic pressure financial pressure and future uncertainty are the main contributors of stress among college students,

Studies Related to Loneliness

Ozdemir and Tuncay (2008) conducted a study on 721 students and it was found that 60.2% of the students experienced loneliness furthermore there are significant correlation between the needs of economical support, social interaction and loneliness. Result also showed that there were significant relationships, parents status and loneliness. Participant's loneliness levels were relatively higher who had not any romantic relationship and were not from married families.

Khatib (2010) investigated the relationship between loneliness, self-esteem, self-efficacy and gender among college students. Sample size was 495 college students. Loneliness was measured by revised UCLA Loneliness Scale (Russell, 1996) and found that loneliness was associated with various negative emotions and behavior.

Moeller and Seehuus (2019) explored the relationship between

verbal social skills (encoding and decoding) and anxiety and depression by measuring the extent to which loneliness mediates these relationship on 2,054 students and results indicated verbal social skills play an important role in students experience of loneliness as well as depression and anxiety.

Rezar (2007) explored how university student's loneliness are predicted by their level of psychological well-being (self-acceptance, personal growth, purpose in life, positive relations with others, environmental mastery and autonomy). UCLA- R Loneliness (Russell, Pepleue & Cutrona, 1980) and psychological well- being scale (Ryff, 1989a) were used. The sample consisted 268 university students. The results has shown the best predictor of loneliness was positive relations with other.

Bhagchandani (2017) collected data on 101 college students by using UCLA Loneliness Scale (1982) and found there was a significant negative relationship between loneliness and psychological well-being.

Smith and Victor (2019) conducted a longitudinal study on 7,032 students at California University and results revealed that those students expressing isolation and loneliness were more likely to report physical and mental health problems.

Arslan (2021) conducted a study on 244 participants from Turkey and found that loneliness partially impacts mental health.

Verma and Singh (2024) conducted a study on 200 University students by using UCLA Loneliness Scale by Russell (1995) and Mental Health Inventory by Veet and Ware (1983). The study was aimed to investigate the loneliness's impact on University student's mental health. The result revealed there was a negative correlation between the variables loneliness and mental health. Loneliness has an impact on the mental health of university students.

Studies Related to Social Support

Social support is in general believed to have beneficial effect on the stress levels and consequent strains either through main effect on well being or as a buffer.

Pimple and Parikh (2022) conducted a study to assess gender differences in the context of perceived social support and resilience on 116 undergraduate students. The study suggested enhancing perceived social support can increase the resilience among youth across both the genders.

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

McLean, Gaul and Penco (2022) planned a study on 315 first year students both male and female students reported moderate levels of social support and perceived stress while those with higher levels of social support reported lower levels of stress.

Vicary , Kapadia , Bee , Bennion and Broobs (2024) conducted ten studies on 3669 participants. Findings indicated high social support significantly mitigated against suicide , depression , anxiety and psychological distress.

Beri and Thakur (2024) planned a study on 190 university students. The results suggested that while social support is a significant predictor of well-being. Academic support is not an effective predictor and thus better initiatives should be taken by the relevant organisations with respect to creating upsurge in the social support levels.

Objectives

- (1) To explore the moderating effect of social support on the relationship of academic stress with loneliness.
- (2) To explore the moderating effect of social support on the relationship of academic stress with anxiety.

Hypothesis

- (i) Social support is expected to moderate the relation between stress and loneliness.
- (ii) Social support is expected to moderate the relation between stress and anxiety.

Methodology

Sample—Data was collected in the classrooms after making prior arrangements with the teachers concerned and ensuring that it would not interfere with their teaching schedule. The total number of student was 200. All the students belonged to first year and resided in hostel. All the students were from IIT BHU.

Tools

State, Trait and Free-floating Anxiety Scale

The level of anxiety was measured by using State, Trait and Free Floating Anxiety Scale developed by Tripathi and Rastogi (1986). The scale has three parts , viz. state part, trait part and the free floating anxiety part. In the present study only the free floating anxiety subscale

has been used. This sub scale has 24 items and there are both positive and negatively worded items. There are 14 positive items and 10 negative items. The responses are to be given on a five point rating scale ranging from 5 to 1. The reliability of the sub scale is .869.

U.C.L.A. Loneliness Scale

U.C.L.A. Loneliness Scale (Russell, Peplau, & Ferguson, 1978) was used to assess loneliness. It has 20-items to be rated as O (“I often feel this way”), S (“I sometimes feel this way”), R (“I rarely feel this way”) or N (“I never feel this way”). The scale’s Coefficient alpha ranges from .89 to .94 and test-retest reliability .73. Convergent validity and construct validity of the test is also found to be very high.

Social Support Scale

The Social Support scale developed by Arora and Kumar (1998) has been used to assess the perceived social support. The scale assesses the structural and functional aspects of perceived social support. The structural aspects of social support refers to the source or the support network of persons like parents, friends, roommates or any other person perceived as being available as support givers. The functional aspects refer to the perception of support being available in different areas.

It consists of 38 items divided into four areas of functional support. Responses to the items are to be given on a 7- point scale ranging from ‘not at all’ (score=1) to very much (score= 7). Brief descriptions of these different types of social support assessed through this scale are given below.

1. Emotional Support (15 Items): It consists of warmth and friendliness; it reflects opportunity for expression of concern, encouragement and trust. This kind of support is offered when people let others know that they love and care about them.
2. Informational Support (6 Items): It has been called advice, appraisal support and cognitive guidance, advice and information. This kind of support helps in defining, understanding and solving problematic events.
3. Companionship Support (6 Items): It refers to providing company to a person, to be available for sharing the free time and leisure time activities. To be available for sharing the fun and enjoyment with a person and to keep company when the person is happy or sad.

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

4. Practical Support (11 Items): It is also referred to as instrumental support and is considered as direct assistance given to another person. Instrumental aid may help reduce stress by direct resolution of instrumental problems or by providing the recipient with increasing time for activities such as relaxation or entertainment. Instrumental support is also known as aid, material support and tangible support. Thus, instrumental support reflects access to practical services and material resources.

Results

Moderation Effect of Social Support

Hierarchical regression procedures were performed to test the moderating effect of social support on the relationship of stress and measures of loneliness and anxiety. The order of entry in the hierarchical regression model was as follows. At step 1, the predictor variable (stress) was entered into the regression equation. At step 2, the moderator variable (social support) and the interaction of stress × social support was added. The significant change in R² in model 2 indicates significant moderation effect. Following tables summarize the moderation analysis performed for Stress-Loneliness relationship among Science and Technology Students by considering Social Support as a moderating variable.

Table 1: Model Summary of Regression Model with Social Support as Moderating Variable in relation between Stress and Loneliness.

Model Summary									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df 1	df2	Sig. F Change
1	0.290 ^a	0.084	0.082	11.072	0.084	36.656	1	398	0.000
2	0.414 ^b	0.171	0.165	10.559	0.087	20.877	2	396	0.000
a. Predictors: (Constant), Stress									
b. Predictors: (Constant), Stress, Social Support, Stress*Social Support									

Source: IBM-SPSS

Table-2 Regression Model Coefficients with Social Support as Moderating Variable in relation between Stress and Loneliness.

Coefficients ^a						
Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	18.359	0.553		33.204	0.000
	Stress	0.066	0.011	0.290	6.054	0.000
2	(Constant)	18.324	0.533		34.379	0.000
	Stress	0.056	0.010	0.248	5.360	0.000
	Social Support	-0.069	0.011	-0.296	-6.417	0.000
	Stress*Social Support	0.000	0.000	-0.020	-0.447	0.655

a. Dependent Variable: Loneliness

Source: IBM-SPSS

The model summary (see Table 2) shows that the p-value (0.000) < 0.05 corresponding to the R² change is significant at 5% level. Thus, when the moderating variable Social Support added in the regression model it improved the prediction of the model. Stress ($\beta = 0.248$, $p < 0.01$) significantly predicted Loneliness in the second step. The Social Support factor added a significant increment to the model in step two, where Social Support ($\beta = -0.296$, $p < 0.01$) was significantly and negatively related to Loneliness after controlling other variables. Moreover, the interaction between stress and Social Support ($\beta = -0.020$, $p > 0.05$) was not significant. These findings suggest that Social Support does not moderate the impact of stress on Loneliness exhibited by Technology Students. However, Social Support has a direct negative impact on Loneliness.

The model summary (see Table 4) shows that the p-value (0.000) < 0.05 corresponding to the R² change is significant at 5% level. Thus, when the moderating variable Social Support added in the regression model it improved the prediction of the model. Stress ($\beta = 0.315$, $p < 0.01$) significantly predicted Anxiety in the second step. The Social Support factor added a significant increment to the model in step two, where Social Support ($\beta = -0.120$, $p < 0.01$) was significantly and

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

Table 3: Model Summary of Regression Model with Social Support as Moderating Variable in relation between Stress and Anxiety.

Model Summary									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	0.336 ^a	0.113	0.110	11.026	0.113	50.665	1	398	0.000
2	0.363 ^b	0.132	0.125	10.934	0.019	4.361	2	396	0.013
a. Predictors: (Constant), Stress									
b. Predictors: (Constant), Stress, Social Support, Stress*Social Support									

Source: IBM-SPSS

Table 4: Regression Model Coefficients with Social Support as Moderating Variable in relation between Stress and Anxiety.

Coefficients ^a						
Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
		1	(Constant)	51.042		
	Stress	0.077	0.011	0.336	7.118	0.000
2	(Constant)	50.929	0.552		92.272	0.000
	Stress	0.072	0.011	0.315	6.671	0.000
	Social Support	-0.028	0.011	-0.120	-2.529	0.012
	Stress*Social Support	0.000	0.000	-0.066	-1.399	0.163

a. Dependent Variable: Anxiety

Source: IBM-SPSS

negatively related to Anxiety after controlling other variables. Moreover, the interaction between stress and Social Support ($\beta = -0.066$, $p > 0.05$) was not significant. These findings suggest that Social Support does not moderate the impact of stress on Anxiety exhibited by Technology Students. However, Social Support has a direct significant negative impact on Anxiety.

Discussion and Conclusion

The obtained results do not support the findings of Lee, Koske

and Sales (2004) who concluded that social support moderated and buffered the effect of stress on symptoms, students with high levels of social support were significantly less likely to report symptoms with increasing levels of acculturative stress compared to students reporting low levels of social support. Social support has emerged as a mediating variable and hence a point of intervention to improve first semester student's college adjustment in some of the studies Lidy and Kahn, Jeffery (2006) reported that perceived social support mediated the relationship between personality factors (emotional stability, social blondness and abstractedness) and college adjustment. Tieu and Pancer (2009) also found that the relationship between involvement and adjustment was mediated by social support.

The obtained results in fact provide support for the main effect model according to which presence of social support directly influences the perception of stress. The main effect model, proposes that social resources have a beneficial effect irrespective of whether persons are under stress. The main effect of social support has been suggested to be a result of its ability to suppress the production of the stress hormone cortisol (Heinrichs Baumgartner, Kirschbaum & Ehlert 2003). Because the evidence for this model derives from the demonstration of a statistical main effect of support with no Stress × Support interaction, this is termed the main effect model. This model suggests that social support affects psychological and physical well-being, irrespective of the stress levels of the individual. Boys tend to keep to themselves and even when they affiliate they may do so at a superficial level and do not exchange confidences easily. It is quite possible that it is due to this reason that social support fails to act on the stresses either as main or buffering effect as it does in case of girl.

REFERENCES

- American Psychological Association (2020). Retrieved from <https://www.apa.org/monitor/2019/05/ce-corner-isolation> (11.03.2025).
- Arslan, G. (2021). School belongingness well-being and mental health among adolescents: Exploring the role of loneliness. *Australian Journal of Psychology*, 73(1), 70-80.
- Beri, N. and Thakur, K. (2024). Social Support and academic support as predictors of well Being among Indian and Italian Students. *Web of Conferences* 556.
- Cutrona C.E. (1982). Transition to college: Loneliness and the process of social adjustment. *Loneliness: A sourcebook of theory, research, and therapy*. New York: Wiley; 1982. pp. 291–309.

Moderating Effect of Social Support on Loneliness and Anxiety among IIT Students

- DiTommaso, E., Brannen-McNulty, C., Ross, L., & Burgess, M. (2003a). Attachment social skills and loneliness in young adults. *Personality and Individual Differences*, 35(2), 303–312.
- Deniz M.E., Hamarta E., Ari R. (2005). An investigation of social skills and loneliness levels of university students with respect to their attachment styles in a sample of Turkish students. *Social Behaviour and Personality*.
- Jia, T. (2024). A Study of the Causes and Effects of Anxiety among Students. *The Higher Education* 145, 111-115.
- McLean, L., Gaul, D., & Penco, R. (2022). Perceived Social Support and Stress: a Study of 1st Year Students in Ireland. *International journal of mental health and addiction*, 1–21. Advance online publication.
- McCraty, R., Dana, T., Mike, A., Pam, A., & Stephen, J. (2000). Improving Test-Taking Skills and Academic Performance in High School Students Using Heart Math Learning .Enhancement Tools. Institute of Heart Math.
- Peplau LA. (1982). Loneliness: A Sourcebook of Current Theory, Research and Therapy. John Wiley & Sons Australia, Limited; 1982.
- Pimple, J. & Parikh, P. (2022). Perceived Social Support and Resilience of College Students during COVID-19. *International Journal of Indian Psychology*, 10(3), 1339-1348.
- Pevika, C.K., Kotunkde, S. and Padma, K . (2023) . Anxiety Disorders among College Student: A cross Sectional Study. *Journal of Cardiovascular Disorder Research*, 14, 2426-2433.
- Rokach A, Brock H. (1997). Loneliness: A multidimensional experience. Canada: Ontario University.
- Suryaningum, C. (2021). College Students' Social anxiety : a study of the young People Mental Health in the digital age. *Journal of Konselling den Pendidikan*, 1-10.
- Verma, R. and Singh, S. (2024). Impact of loneliness on Mental Health among University students. *The International Journal of Indian Psychology*, 12 (3), 2595-2603.
- Weiss, R. S. (1973). Loneliness: The experience of emotional and social isolation. The MIT Press.
- Yeh M.C. (2002). Loneliness, Alcohol and Marihuana Use among Male College Student. University of Conneticut.
- Yung, S. T., Chen, Y., & Zawadzki, M. J. (2023). Loneliness and psychological distress in everyday life among Latinx college students. *Journal of American College Health*, 71(5), 407–1416.