# **Perceived Parenting and Distress Tolerance as Predictors of Mental Health Problems in University Students**

Maha Azhar\* Sadia Saleem\*\* Zahid Mahmood\*\*\*

#### Abstract

Certain perceived parental rearing styles have considerably been linked to mental health problems. The association is yet to be made in terms of its predicting along with an individual's abilities of distress tolerance. Following the correlational research design, 300 university students, age range of 16-25 years (M=20.05, SD=1.75) using purposive sampling strategy was recruited and given a demographic questionnaire, Egna Minnen Betraffande Uppfostran (EMBU-A) Distress Tolerance Scale and Depression Anxiety Stress Scale-Short Form (DASS 21SF). Hierarchical Regression analysis indicated that experiencing high maternal rejection and high maternal over-protection along with having low distress tolerance level predicts more mental health problems in undergraduates of Pakistan. We have further implied the results in the context of collectivist culture which has provided valuable insight for counselling interventions in university setting for future stakeholders of community.

**Keywords**: Anxiety, depression, distress tolerance, over-protection, rejection, stress

#### Introduction

University is a place that offers education at a varying degree levels starting from undergraduate to post-doctoral where students get enrolled to define and refine themselves in a quest of career establishment (Wangeri, Kimani, & Mutweleli, 2012). This age and stage is a biological, psychological and social transition for any individual as they are upgrading from college to university life and from adolescence to adulthood bringing a lot of expectations, demands, roles and responsibilities which could lead to deep anxieties and apprehensions (Rodgers & Tennison, 2009).

Email: sadia.saleem@umt.edu.pk

<sup>\*</sup>Clinical Counsellor, Institute of Clinical Psychology, University of the Management and Technology, Lahore, Pakistan, Email: maha.axhar@gmail.com

<sup>\*\*</sup>Associate Professor (Fulbright Postdoctoral Fellow USA), Institute of Clinical, Psychology (ICP), University of Management and Technology, Lahore, Pakistan.

<sup>\*\*\*</sup>Professor, Director Clinical Services, Institute of Clinical Psychology, University of Management and Technology, Lahore, Pakistan. Email: zahid.mahmood@umt.edu.pk

Moreover, university students, the future of any community are also expected to achieve success of their personal goals including to the familial, social and communal needs which possibly could lead to extra strain (Eisenberg, Gollust, Golberstein, & Hefner, 2007). Hence, university students regardless of the privileges are not immune to negative consequences of mental health problems (Hunt & Eisenberg, 2010). Mental health problems at university time period gets more burdensome in the context of collectivistic Asian cultures where with increased expectations in their social roles and responsibilities, they become more bound to deal with the societal expectations which is more or less related to suppression, making university students to appraise their emotions and stressful situations negatively instilling emotions of anxiety/fear and frustration/powerlessness (Schmidt, Tinti, Levine, & Testa, 2010).

The alarming increase in mental health issues has led many researchers to carry out prevalence studies on university samples around the world. A sample of 3271 students were assessed on the psych-social well-being showing a predominance of physical ailments in women than men and frequently reported problems were financial issues and academic pressures (Ansari, Labeeb, Moseley, Kotb, & El-houfy, 2013). In another study on 1707 university students, depression was found in 14.2% and 16.3% were found anxious (Worfel, Gusy, Lohmann, Topritz, & Kleiber, 2016). Similarly, Mackenzie et al. (2011) has also assessed the depression and suicidal ideations in university students visiting campus counselling centres and found out that 26% women and 25% men are suffering from depression whereas more men as compared to women are having suicidal ideations due to lesser time to work out the emotional outbursts and overwhelming demands of university lifestyle.

With regard to increased frustration, lesser tolerance and adjustment problems in Pakistan, the prevalence of mental health problems is in greater consideration. A study was carried out by Kumar, Shaheen, Rasool, and Shafi (2016) on 398 university students showed that medical students faces more psychological problems as compared to engineering and social sciences students. However, the prevalence of psychological distress is alarmingly high ranging from 21% to 25% depression, 30% to 34% anxiety and 17% to 23% stress associated with low level of life satisfaction in university students. Similarly, Saleem, Mahmood and Naz (2013) found that among 1850 participants, 31% were categorized as *severe* on mental health problems. Considering the high prevalence rate and associated dysfunctionality, researchers have focused their attention to identify the risk and protective factors of disabling mental health conditions in university years. Verger et al. (2009) identified that adjustment issues and daily life stressors are the greatest risk factors in both men and women.

Moreover, personality, social support, self-esteem and life satisfaction buffer against mental health functioning (Chioqueta & Stiles, 2007; Hjemdal, Friborg, Stiles, Rosenvinge, & Martinussen, 2006, Mann, Hosman, Schaalma, & de Vries, 2004). Amongst personality variable, recently, distress tolerance has been theorized as an individual difference, the lower levels of which could potentially lead to psychopathology making a person vulnerable and susceptible (Leyro, Zvolensky, & Bernstein, 2010). Many theorists, psychologists and scholars have attempted to define the construct of distress, Simons and Gaher (2005) has defined it as the mean to withstand negative emotional or psychological state which varies according to individual's capacity. In a broader context, Leyro et al. (2010) have defined distress tolerance as the ability to sustain negative emotional states.

Low level of distress tolerance is found to be associated with hording, depression, anxiety, impulsivity and other pathologies (Gaher, Hofman, Simons, & Hunsaker, 2013; Kozak & Fought, 2011; Timpano, Buckner, Richey, Murphy, & Schmidt, 2009). Distress Tolerance has been found to have varying effects on men and women. Daughters et al. (2009) concluded that distress tolerance levels are significantly related to delinquent behaviours and substance use in males whereas it is more linked to internalizing behaviours in females. Distress Tolerance has also been associated to better treatment outcomes for psychopathology specifically for personality disorders (Barlow, Allen, & Chaote, 2004; Orsillo & Roemer, 2005; Gratz & Gunderson, 2006)

Despite the linkages with psychopathology and treatment effectiveness, less empirical evidence is available with reference to distress tolerance as a risk or protective factor in familial context. Although, Daughters et al. (2014) revealed that social and emotional expression of an individual influenced by familial context. Furthermore, lower levels of distress tolerance could possibly be explained by parental behaviours as children who are encouraged by their parents in stressful situations are prone to respond to distress favourably as compared to those children whose parents respond punitively to the distress (Eisenberg, Cumberland, & Spinrad, 1998). It has also been found out that levels of distress tolerance in children and adolescents are learned through observation by family especially parents in terms of emotion-relevant parenting (Morris, Silk, Steinberg, Myers, & Robinson, 2007). Moreover, when parenting gets ineffective adults suffer emotion dysregulation, individual's autonomy does not get developed which ultimately effect the mental health (Manzeske & Stright, 2009). This could possibly explain the linkage of parenting and distress tolerance which is the broader category clustering emotion regulation.

Parental warmth, responsiveness and emotional availability is associated with many positive outcomes such as high self-esteem and psychological well-being and parental rejection, control and harsh behaviours is found to be a risk factor for different mental health problems such as anxiety, depression, ineffective coping (Bilal, Sadiq, &Ali, 2013; Meesters & Muris, 2004; Saleem, Mahmood, & Subhan, 2015). Cusimano and Riggs (2013) suggested that inter-parental conflict is associated with decline in psychological functioning. Similarly, Rhoades, and Wood (2014) have found the relationship of family conflicts and social adjustments with the mediating role of positive and negative emotions about family. Hence, it seems judicious to postulate that parents' behaviours, perceived as controlling and over-protective or rejected by individuals, may impact psycho-social and emotional functioning of an individual and lead to increased vulnerability of mental health problems.

To summarize the above literature, few important themes have been emerged that pave the way to carried out the current research. Firstly, university students because of continues adjustment with changing demands are vulnerable for mental health problems which greatly disrupt their normal functioning. Secondly, an alarming increase in the anxiety, depression and suicidal tendency in university students led the clinicians and researchers to identify the factors which help to prevent young people from the lifelong disabling consequences. Thirdly, among many factors the current research is focused on the identification of the long lasting influence of familial factors and one intrapersonal factor distress tolerance in relation with mental health functioning. As mentioned earlier that parenting is said to have a very influential role in an individual's life and in collectivistic culture like Pakistan, its importance even increase dramatically. The last important factor emerged from literature is the influence of intrapersonal factor which is an individuals' capacity to tolerate distress.

This study, thus, would develop insight regarding associations of individual's psychological and familial factors to be prolific for their growth and advancement. Till date, there is a paucity of literature in outlining the association of parental rearing styles, distress tolerance and mental health problems in university students. Pakistan, being a traditionalistic society reinforces others' demands and expectations more than one's own well-being where this study would aid in maintaining the association of intrinsic and extrinsic factors for the overall well-being. The objective of the study is to identify the predictive relationship in parenting styles, distress tolerance and mental health problems in university students.

#### Method

**Participants.** Purposive sampling strategy was used to recruit a sample of 300 university students age ranging from 16 - 25 years (M=20.05, SD=1.75) enrolled in Bachelor's degree program from a government and a private university.

**Table: 1**Demographic Characteristics of the Participants (N=300)

Variables	f	%
Gender		
Men	153	51
Women	147	49
$\mathbf{Age}$		
16 – 21 years	203	68
21 - 25 years	97	32
University		
Government	151	50
Private	149	50
Education		
BS (Year 1)	71	24
BS (Year 2)	75	25
BS (Year 3)	78	26
BS (Year 4)	76	25

As shown in Table 1, majority of the participants belonged to the middle age range of 16-20 years. However, the participant were equal in terms of and type of university where 151 students were from government sector and 149 were from private sector. Amongst the total sample, 71 were from the freshman year of university, 75 were from the sophomore years, 78 from junior years and 76 were from the senior years of graduation.

#### Measures

All the questionnaires were in Urdu language to facilitate the comprehension of native population of Pakistan and all of them have been validated in the collectivist cultural context to ensure the generalizability of finings with reference to traditionalistic society of Pakistan.

# Egna Minnen Betraffande Uppfostran (EMBU-A, Perris, Jacobsson, Lindström, von Knorring, and Perris, 1980)

This measures was initially developed in Spanish language to assess memories of parental rearing behaviours. It was further translated into English language by senior authors and a certified translator. It consists of 27 items with three subscales: Emotional Warmth (15 items), Rejection (6 items), and Over-Protection (6 items). Response

options are 0 (*never*), 1 (*sometimes*), 2 (*often*), and 3 (*always*). Participants completed this measure twice, once in reference to their father and once in reference to their mother. For the present study, Cronbach's alpha of all three subscales for mothers (Emotional Warmth  $\alpha = .81$ ; Rejection  $\alpha = .76$ ; Over Protection  $\alpha = .79$ ) and fathers (Emotional Warmth  $\alpha = .83$ ; Rejection  $\alpha = .71$ ; Over Protection  $\alpha = .77$ ) indicated adequate reliability of all subscales of this measure in our sample.

# Distress Tolerance Scale (DTS)

The measure was indigenously developed to assess distress tolerance in university students. A 49 items likert type scale measuring on 0 (*never*), 1 (*sometimes*), 2 (*often*), and 3 (*most of the time*). Higher scores indicate greater problems with distress tolerance. The internal consistencies for the lack of emotional regulation subscale ( $\alpha$  = .89) and the *negative appraisal* subscale ( $\alpha$  = .84) were both strong.

# Depression Anxiety Stress Scale-Short Form (DASS-21SF, Lovibond & Lovibond, 1995)

To assess the mental health problems namely depression, anxiety and stress of university students, DASS-21 was employed. It consists of 21 and answered on the following 4-point Likert scale: 0 (*not at all*), 1 (*occasionally*), 2 (*often*), and 3 (*always*). Items are summed and multiplied by 2, to obtain scores that are comparable to the full version of the DASS with Cronbach's alpha of .87 in our sample.

# Demographic questionnaire

It was used to get basic information of age, gender, education, and type of university.

#### **Procedure**

Keeping in view the ethical considerations, official permissions were taken from the university authorities assuring the utility of the research. Following that, participants were systematically selected given the briefing about aims and objectives of research. After taking the verbal informed consent, research protocol having demographic questionnaire, DTS, EMBU-A, and DASS-21, was given to participants in small groups having 15 to 20 students each. It took t25 minutes on average to completely fill the research protocol followed by a debriefing session regarding the emotional arousal (if any) during the study.

# **Ethical Considerations**

The research proposal and study protocol was approved by the Ethical Committee of Institute of Clinical Psychology, University of the Management and Technology. After that, permissions were gathered from the Head of the Departments of the respective Government and Private universities of Lahore, Pakistan. The competent authorities were assured about the anonymity, privacy and the confidentiality of research participants.

# Results

To assess the direction of association amongst variables, correlation analysis was carried out revealing significant correlations between perceived parental rearing styles, distress tolerance and mental health problems (Table2):

**Table: 2** *Inter-Correlations of Perceived Parental Rearing Practices, Distress Tolerance and Mental Health Problems in University Students (N=300)* 

	1	2	3	4	5	6	7	8	9	10	11	М	SD
1 Emotional Warmth- Mother		- .29* *	.50** *	.90** *	24*	.45**	01 <sup>ns</sup>	10 <sup>ns</sup>	.04 <sup>ns</sup>	05 <sup>ns</sup>	04 <sup>ns</sup>	27.72	10.32
2 Rejection-Mother			.16*	- .26**	.85** *	.17*	.36**	.40** *	.34**	.31**	.40** *	3.65	3.47
3 Over Protection-Mother				.42** *	.16**	.86** *	.30**	.24*	.24*	.30**	.30**	7.80	3.46
4 Emotional Warmth-Father					- .26**	.42** *	05 <sup>ns</sup>	12*	.02 <sup>ns</sup>	11 <sup>ns</sup>	08 <sup>ns</sup>	26.68	10.13
5 Rejection-Father						.22*	.34**	.39** *	.29**	.30**	.37**	3.34	3.37
6 Over Protection-Father							.26**	.20*	.21*	.24*	.25*	7.47	3.33
7 Distress Tolerance								.70** *	.58** *	.72** *	.77** *	51.94	24.77
8 Depression									.64** *	.68** *	.89** *	6.58	3.69
9 Anxiety										.59** *	.84** *	6.33	3.33
10 Stress											.88**	7.08	3.88

*Note. df*=299; , \*p<.05 , \*\*=p<.01,\*\*\*=p<.001, ns=non-significant

Parental Emotional Warmth and Over Protection was found to have negative relationship with levels of distress tolerance. However, rejection as a parental rearing practices were found significant positive relationship with levels of distress tolerance and mental health problems. Whereas, over – protection despite being perceived as positive parenting styles turned out to have a significant positive relationship with mental health problems. Likewise, low levels of distress tolerance was also found to have significant positive relationship with depression, anxiety and stress.

# Hierarchical Regression Analyses

It was used to identify the predictors of mental health problems in university students. In model 1, demographic characteristics of participants like age, gender, type of university and education (in years) were entered. In model 2, maternal rearing styles of participants were entered while in model 3 paternal rearing styles were added. While, in model 4, distress tolerance along with its two factors were added (Table 3).

All the designed models were found to be statistically significant except model 1 that was based on personal characteristics of the participants like age, gender, education (freshman, sophomore, junior high, senior high) and type of university (government, private).

In model 2, type of university was found to be a negative predictor of mental health problems reflecting that being a student of Government sector universities puts an individual in high risk for having mental health problems like depression, anxiety and stress. Similarly, individuals who experiences rejection and over protection by mother experiences more mental health problems. In model 3, type of university was again found to be a significant predictor for mental health problems. Interestingly, regardless of the rearing practices of father, maternal rearing practices like rejection and over-protection were still found to be more statistically significant for mental health problems of both men and women. Likewise, in model 4, lack of emotional regulation and negative appraisal turned out to be the significant positive predictors of mental health problems in university students.

**Table: 3**Hierarchical Regression Analysis of Predictors for Mental Health Problems of University Students (N=300)

Model	SEB	β	t	p<
Step 1 (R <sup>2</sup> =.01, ΔR <sup>2</sup> =.01)				
Step 2 ( $\mathbb{R}^2$ =.25, $\Delta \mathbb{R}^2$ =.23)				
Type of University	1.04	13	-2.38	.02*
Rejection-Mother	.16	.35	6.14	.001***
•				

Over Protection-Mother	.17	.29	4.51	.001***					
Step 3 ( $R^2$ =.26, $\Delta R^2$ =.24)									
Type of University	1.04	14	-2.55	.01**					
Rejection-Mother	.28	.27	2.68	.01**					
Over Protection-Mother	.30	.34	3.10	.01**					
Step 4 ( $R^2$ =.26, $\Delta R^2$ =.24)									
Lack of Emotional Regulation	.03	.41	7.05	.001***					
Negative Appraisal	.05	.35	6.42	.001***					

*Note*. Only significant results are reported. \*p<.05, \*\*p<.01, \*\*\*p<.001

Step 1 F(4, 299)=1.22, p>.05, Step 2 F(7, 299)=13.93, p<.001\*\*\*, Step 3 F (10, 299)=10.23, p<.001\*\*\*, Step 4 F(12, 299)=40.63, p<.001\*\*\*

Conclusively, a student who studies in a government university, has experienced rejection and over-protection by mother, has lack of distress tolerance, are at risk of experiencing more mental health problems.

### **Discussion**

Extant literature have reflected the correlation between perceived parental rearing styles and mental health problems of individuals across the lifespan (Bilal et al., 2012; Saleem et al., 2015). The present study was aimed to understand the predictive relationship of perceived parental rearing style, distress tolerance and mental health problems of university students where interaction of parenting factor with personality correlates like distress tolerance was hypothesized to be significant for mental health problems. Results have reflected consistent with the previous literature that positive parental rearing practices (emotional warmth, over-protection) have significant negative relationship with low distress tolerance (Rhoades & Wood, 2014). Over-protection, unlike Western literature (e.g. Perez, 2017), has been found to be a positive parental rearing practice which is in line with the results of previous Pakistani literature (e.g. Saleem et al., 2015) because in our culture, parents are expected to be overly-indulgent in the lives of their children. This induces the feelings of security in them and being dependent on their parents is appreciable in society giving them a sense of well-being. However, when a childhood period prolongs, it become problematic that children gets

unable to build their own psychological resources like Distress Tolerance. Furthermore, parental over-protection and rejection are found to have significant positive relationship with mental health problems like depression, anxiety and stress. Previous studies (e.g. Anestis et al., 2007; Leyro et al., 2010; Schiffrin et al., 2014,) also support this notion that over-protecting and rejecting behaviours of parents are correlates of depression, anxiety and stress hence suppressing the adults' abilities of adapting in stressful circumstances where they have to deal with negative emotional experiences making them less distress tolerant.

Correlation analyses helped in understanding the direction of relationship (i.e. positive or negative) but to estimate the prediction power of each variable, regression analyses were carried out using the mode of hierarchical regression analyses. The significance of hierarchical regression analysis is that it helps in explaining the variances of dependent variable (i.e. mental health problems) on account of independent variables (i.e. demographics, parental rearing practices, distress tolerance) in terms of models being generated (Pallant, 2005). The findings have revealed that a student who studies in government sector university, has experienced rejection and over – protection by mother, tend to have lack of emotional regulation and negative appraisal leading to more mental health problems. Previous researches have also established the fact that students who study in private sector universities has high psychological well-being as compared to students who studies in government sector university (Masood & Arshad, 2014) which could be due to the better resources and smaller family unit of individuals studying in private sector having a better socio-economic status. Whereas, a student who is striving for excellence in government sector university is combating with many social and familial stressors hampering his or her mental health. It has also been found that parental over-protection and rejection is a well-established correlate of mental health problems (Keough et al., 2010) while in our study mothers were found to be related more strongly as compared to father both in terms of variance and correlation. It is noteworthy that in collectivist culture like Pakistan, mothers are the primary caregiver who spends more length of time with children at home as compared to father who is available either on the dinner table or over weekends and hence the behaviours and rearing styles of mother influences the individuals' psychological health to a greater extent. Findings from Goldscheider, Thornton, and Yang (2001) advocate that emerging adults regarded to expect extra parental support than ever before, further featuring that parental involvement can be viewed as much less excessive at some point of the developmental phase. This is why, it gets crucial that with the allowance of independence, parents must made themselves available for their children even when they are university-going to foster their well-being. Moreover, distress tolerance has also been linked with maladjusted behaviours and psychopathologies like depression (Ellis et al., 2010), anxiety (Keough et al., 2010) and stress (Huang et al., 2009) that was established by our study as well. When individuals lack emotional regulation and appraises events negatively depicting low distress tolerance face psychopathology to a greater extent.

Our confidence on the study findings is lifted by a number of methodological strengths. Firstly, the questionnaires were culturally validated where the language was also native so that chance of ambiguity was limited. Secondly, using stratified sampling strategy made us able to have a representative sample from the various strata of government and private sector urban universities. However, our current study have certain shortcomings like the data was centered primarily on urban sector of major city of Pakistan which could have better generalization if the sample data become more expanded. Also, the age band of the sample was narrow which could be expanded by including postgraduate students for a comparative study purposes. For further researches, parental account can also be taken in terms of parental rearing practices and distress tolerance to better understand the phenomenon in family context. Also, more researches are needed to be done with regards to intervention strategies for university students experiencing parental rejection and have low distress tolerance.

### Conclusion

Largely, it has been sought that there is a strong negative relationship between Parental Rearing Practices (Emotional Warmth and Over-Protection) and Distress Tolerance with Mental Health Problems. Overall, maternal rearing styles are more predictive both in terms of distress tolerance and mental health problems which could be due to the length of time individuals spend with their mother as compared to their father in a collectivistic cultural setup.

#### Conflict of Interest

None

## References

- Anestis, M.D., Selby, E.A., Fink, E.L., & Joiner, T.E. (2007). The multifaceted role of distress tolerance in dysregulated eating behaviours. *International Journal of Eating Disorders*, 40(8), 718-726.
- Ansari, W. E., Labeeb, S., Moseley, L., Kotb, S., & El-houfy, A. (2012). Physical and psychological well-being of university students: Survey of eleven faculties in Egypt. *International Journal of Preventive Medicine*, *4*(3), 293-310. PMCID: PMC3634168.
- Barlow, D. H., Allen, L., & Choate, M. (2004). Toward a unified treatment for emotional disorders. *Behaviour Therapy*, *35*, 205–230.
- Bilal, K., Sadiq, U., & Ali, S. (2013). Parenting practices and well-being outcome in young adulthood. *Pakistan Journal of Social and Clinical Psychology*, 11(1), 84-87
- Chioqueta, A. P., & Stiles, T. C. (2007). The relationship between psychological buffers, hopelessness, and suicidal ideation. *Crisis*, 28, 67-73. doi: 10.1027/0227-5910.28.2.67
- Cusimano, A.M., & Riggs, S.A. (2013). Perceptions of interparental conflict, romantic attachment, and psychological distress in college students. *Journal of Couple and Family Psychology: Research and Practice*, 2(3), 45-59. doi:10.1037/a0031657
- Daughters, S. B., Reynolds, E. K., MacPherson, L., Kahler, C. W., Danielson, C. K., Zvolensky, M., & Lejuez, C. W. (2009). Distress Tolerance and Early Adolescent Externalizing and Internalizing Symptoms: The Moderating Role of Gender and Ethnicity. *Behaviour Research and Therapy*, 47(3), 198–205. doi: 10.1016/j.brat.2008.12.001
- Daughters, S.B., Gorka, S.M., Rutherford, J.V.H., & Mayes, L.C. (2014). Maternal and adolescent distress tolerance: the moderating role of gender. *Emotion*, 14(2). 416-424. doi:10.1037/a0034991
- Eisenberg, N., Cumberland, A., & Spinrad, T.L. (1998). Parental socialization of emotion. *Psychological Inquiry*, *9*, 241-273. doi:10.1207/s15327965pli0904\_1
- Eisenberg, D., Gollust, S.E., Golberstein, E., & Hefner, J.L. (2007). Prevalence and correlates of depression, anxiety, and suicidality among university students. *American Journal of Orthopsychiatry*, 77, 534-542.
- Ellis, A.J., Fischer, K.M., & Beevers, C.G. (2010). Is dyptheria about being red and blue? Potentation of anger and reduced distress tolerance among dysphoric individuals. *Cognition & Emotion*, 24, 596-608.
- Gaher, R., Hofman, N., Simons, J., & Hunsaker, R. (2013). Emotion Regulation Deficits and Mediators between Trauma Exposure and Borderline Symptoms. *Cognitive Therapy and Research*, *37*, 466-475. doi: 10.1007/s10608-012-9515-y

- Gratz, K. L., & Gunderson, J, G. (2006). Preliminary data on an acceptance-based emotion regulation group intervention for deliberate self-harm among women with borderline personality disorder. *Behaviour Therapy*, *37*(1), 25-35. doi:10.1016/j.beth.2005.03.002.
- Goldscheider, F. K., Thornton, A., & Yang, L. S. (2001). Helping out the kids: Expectations about parental support in young adulthood. *Journal of Marriage and Family*, 63(3), 727-740.
- Hjemdal, O., Friborg, O., Stiles, T. C., Rosenvinge, J. H., & Martinussen, M. (2006). Clinical Psychology and Psychotherapy, 13(3) 194-201, doi: 10.1002/cpp.488
- Huang, K., Szabo, M., & Han, J. (2009). The relationship of low distress tolerance to excessive worrying and cognitive avoidance. *Behaviour Change*, 26, 223-234.
- Hunt. J., & Eisenberg, D. (2010). Mental health problems and help-seeking behaviour among college students. *Journal of Adolescent Health*, 46, 3-10.
- Keough, M.E., Riccardi, C.J., Timpano, K.R., Mitchell, M.A., & Schmidt, N.B. (2010). Anxiety symptomology: The association with distress tolerance and anxiety sensitivity. *Behavior Therapy*, *41*, 567-574. doi:10.1016/j.beth.2010.04.002
- Kozak, A. T., & Fought, A. (2011). Beyond alcohol and drug addiction. Does the negative trait of low distress tolerance have an association with overeating? *Appetite*, *57*(3), 578-581. doi: 10.1016/j.appet.2011.07.008
- Kumar, H., Shaheen, A., Rasool, I., & Shafi, M. (2016). Psychological Distress and Life Satisfaction among University Students. *Journal of Psychology & Clinical Psychiatry*, 5(3), 1-7. doi: 10.15406/jpcpy.2016.05.00283
- Leyro, T. M., Zvolensky, M. J., & Bernstein, A. (2010). Distress Tolerance and Psychopathological Symptoms and Disorders: A Review of the Empirical Literature among Adults. *Psychological Bulletin*, *136*(4), 576–600. doi: 10.1037/a0019712
- Lovibond, S.H. & Lovibond, P.F. (1995). *Manual for the Depression Anxiety Stress Scales*. (2nd. Ed.) Sydney: Psychology Foundation.
- Mackenzie, S., Wiegel, J. R., Mundt, M., Brown, D., Saewyc, E., Heiligenstein, E., Fleming, M. (2011). Depression and suicidal ideation among students accessing campus healthcare. *American Journal of Orthopsychiatry*, 81(1), 101-107. doi: 10.1111/j.1939-0025.2010.01077.x
- Mann, M., Hosman, C. M., Schaalma, H. P., de Vries, N. K. (2004). Self-esteem in a broad-spectrum approach for mental health promotion. *Health Education Research*, 19(4), 357-72. doi: 10.1093/her/cyg041
- Manzeske, D.P., & Stright, A. (2009) Parenting styles and emotion regulation: the role of behavioural and psychological control during young adulthood. *Journal of Adult Development*, 16(4), 223-229. doi:10.1007/s10804-009-9068-9

- Masood, T., & Arshad, T. (2014). *Demographic correlates and psychological well-being of university students* (Bachelor's Thesis). University of the Punjab.
- Meesters, C., & Muris, P. (2004). Perceived parental rearing behaviours and coping in young adolescents. *Personality and Individual Differences*, 37(3), 513-522
- Morris, A.S., Silk, J.S., Steinberg, L., Myers, S.S., & Robinson, L.R. (2007). The role of family context in the development of emotion regulation. *Social Development*, *16*, 361-388. doi:10.1111/j.1467-9507.2007.00389.x
- Orsillo, S. M., & Roemer, L. (2005). Acceptance and mindfulness-based approaches to anxiety: Conceptualization and treatment. New York: Springer Science + Business Media.
- Pallant, J. (2005). SPSS survival manual: A step by step guide to data analysis using SPSS for Windows (Version 12). Australia: Allen & Unwin.
- Perez, C. M. (2017). Over-parenting and emerging adults' mental health: the mediating role of emotional distress tolerance (Master's Theses). Available from: http://aquila.usm.edu/masters\_theses/271.
- Perris, C., Jacobsson, L., Lindstorm, H., von Knorring, L., & Perris, H. (1980). Development of a new inventory for assessing memories of parental rearing behaviour. *Acta Psychiatrica Scandinavica*, *61*, 265-274.
- Rhoades, G.K., & Wood, L.F. (2014). Family conflict and college-student social adjustment: the mediating role of emotional distress about the family. *Journal of Couple and Family Psychology: Research and Practice*, 3(3). doi:10.1037/cfp0000024
- Rodgers L. S., & Tennison, L. R. (2009). A preliminary assessment of adjustment disorder among first-year college students. *Archives of Psychiatric Nursing*, 23(3), 220-230.
- Saleem, S., Mahmood, Z., & Naz, M. (2013). Mental health problems in university students: A prevalence study. *FWU Journal of Social Sciences*, 7(2), 124-130
- Saleem, S., Mahmood, Z., & Subhan, S. (2015). Perceived parental practices and mental health problems: Cross-cultural validation of EMBU-C on Pakistani adolescents. *FWU Journal of Social Sciences*, *9*(1), 44-52.
- Schiffrin, H.H., Liss, M., Miles-McLean, H., Geary, K.A., Erchull, M.J., & Tashner, T. (2014). Helping or hovering? The effects of helicopter parenting on college students' well-being. *Journal of Child and Family Studies*, *23*(1), 548-557. doi:10.1007/a10826-013-9716-3
- Schmidt, S., Tinti, C., Levine, L. J., & Testa, S. (2010). Appraisals, emotions and emotional regulation: An integrative approach. *Motivation and Emotion*, *34*, 63-72. doi: 10.1007/s11031-010-9155-z

- Simons, J. S., & Gaher, R. M. (2005). The distress tolerance scale: Development and validation of a self-report measure. *Motivation and Emotion*, 29(2), 83 102. doi: 10.1007/s11031-005-7955-3
- Timpano, K. R., Buckner, J. D., Richey, J. A., Murphy, D. L., & Schmidt, N. B. (2009). Exploration of anxiety sensitivity and distress tolerance as vulnerability factors for hoarding behaviours. *Depression and Anxiety*, 26(4), 343-53. doi: 10.1002/da.20469.
- Verger, P., Combes, J. B., Kovess-Masfety, V., Choquet, M., Guagliardo, V., Rouillon, F., Peretti-Wattel, P. (2009). Psychological distress in first year university students: Socioeconomic and academic stressors, mastery and social support in young men and women. *Social Psychiatry and Psychiatric Epidemiology*, 44(8), 643-650. doi: 10.1007/s00127-008-0486-y
- Wangeri, T., Kimani, E., & Mutweleli, S. M. (2012). Transitional Challenges Facing University First Year students In Kenyan Public Universities: A Case of Kenyatta University. *Interdicsiplinary Review of Economics and Management*, 2(1), 41-50
- Worfel, F., Gusy, B., Lohmann, K., Topritz, K., & Kleiber, D. (2016). Mental health problems among university students and the impact of structural conditions. *Journal of Public Health*, 24(2), 125-133. doi: 10.1007/s10389-015-0703-6