

## Army Public School Peshawar and Post-Terror Situation: Teachers' Perception Regarding Students' Psycho–academic Adjustment and Achievement

Dr. ObaidUllah\*, Lecturer & Coordinator, Department of Education, National University of Modern Languages, Islamabad

Col. Dr. RoohUl Amin, Deputy Registrar, University of Wah, WahCantt, Pakistan

**Uzma Yaqoob Khawaja**, Lecturer, Department of Education, National University of Modern Languages, Islamabad **Dr. ShahzadiSeema**, Lecturer, Department of Education, The University of Haripur, Haripur

**Abstract-** Psychological stability and wellbeing are a basic component in ensuring quality education at all levels. A study was conducted on the psycho-academic adjustment and achievement of students in the context of post terrorist attack scenario at an Army Public School (APS) in Peshawar, Pakistan. The aims of the study were to examine teachers' perspectives on the academic adjustment of students after APS attack and to explore the psychological adjustment of students in the post APS attack scenario. The sample consists of a random sample of 30 teachers of the Army Public School, Peshawar. The data was collected through validated close ended questions in a questionnaire with a five-point Likert scale. The data was analyzed through Chi-square statistics. The results of the study reveal that students' grades were improved positively after APS attack, the least percentage of failures in the class was recorded and high disciplinary issues were also recorded. The study recommended that the government provide proper guidance and counseling sessions for children and other victims. Teachers could be trained to provide first aid, guidance and mentoring to minimize the harmful effects of a terrorist attack.

#### Keywords: Academic achievements, Terrorist attack, Army Public Schools, psychological adjustment

#### I. INTRODUCTION

Since the attack on the World Trade Center in the United States of America on September 11, 2001, Pakistan has been in the limelight – not for good reasons – and bore the brunt of the problems that pervaded its malaise throughout the length and breadth of the country on the pretext on the so called 'war-on-terror'. Thereafter, law enforcement personnel were deployed in the war zones in Waziristan in northwestern Pakistan. Between 2008– 2011, the law and order situation became worse and suicide attacks and bombings were rampant throughout, especially in the Provinces of Baluchistan, the Khyber Paktunkhwa, and the regions of federally administrated tribal areas (FATAs). The Pakistani law enforcement agencies gave terrorist groups a tough time, but the terrorist organizations responded by attacking the most susceptible and soft targets in the cities.

On the morning of 16<sup>th</sup> December 2014, seven terrorists, fully armed, wearing suicide jackets, entered the Army Public School Peshawar at around 10 am and started indiscriminate brutal murder of children and teachers. The inhumane and brutal incident led to the killing of 149 innocent people, which included 132 school children, teachers and the principal of the school. The quick response of Pakistan Army commandoes and Quick Response Force (QRF) did not allow the terrorist to fulfil their plans of taking large number of student hostages after the killing spree. The terrorists had come with ammunition and rations to stay at the school for many days. However, within hours, the Pakistan Army killed all the seven terrorists.

The event left the nation in shock and parents were unwilling to send their children to school, while the students were also in a state of fear. Naturally, such situations lead to psychological problems, including anxiety and depression, among the affected (children, parents and teachers). Traumatic life experiences may have a far wider impact on mental health, considering that Andrews and Wilding (2004), in their study on 351 students found that 40% participants suffered from psychological disorders, became anxious or got depressed and had difficulties with concentration regarding their academic activities. Similarly, Seligman and Wuyek (2007) argue that students with chronic psychological disorders are less likely to succeed academically. Proposing a person-environment-model, Misra and Mc Kean (2000) suggest developing a sense of competition among students through providing certain challenges in real life settings. When students face any challenge in their academic performance, stress in a positive manner develops a sense of competence, thus enhancing their learning capacity. If this stress is negatively

construed, it ultimately develops hopelessness among students, which results in low academic achievement.

#### Aim

This research aimed at examining teachers' perspectives on the academic adjustment of students after the APS attack and exploring the psychological adjustment of students after their traumatic experience.

#### **Objectives of the study**

The objectives of the study were to:

a) explore the academic adjustment of students after the terror attack on their school

b) Explore the psychological adjustment of students after the terror attack on their school

c) Suggest recommendations for the psycho-academic adjustment of APS students and those of similar experiences.

#### **Research hypotheses**

The research hypotheses of the study were as follows:

- 1. Ho =There is an association between the students' academics and terror attacks.
- 2. Ho = Students were psychologically disturbed after the terror attack on APS.

#### Significance of the study

Terror attacks on schools have huge implications for the well-being and education of children. Bearing the brunt of militancy and extremism, one of the most affected areas in Pakistan is Khyber Pakhtunkhwa, where learning has become a challenge for students, their teachers, and parents. No one has any idea about the halt of war on terror in Pakistani territory, and in such circumstances, there is a dire need to provide a complete security package to educational institutes to commute the attacks on *soft targets*. The terrorist attacks on APS has created havoc among students who may be suffering from severe psychological distress, which eventually affects their academic achievement. It has also been reported that students still experience nightmares believing that terrorists are trying to harm them.

The current study will provide some knowledge and insights for psychologists, teachers, educators, policy makers and researchers about the enhancement of students' academic enrichment both vertically and horizontally and their possible adjustment after the huge massacre. After the attack on the Army Public School, the situation in Pakistan was worse and all the academic institutes were on security alert. This study proposes certain measures which can be implemented in an academic institution following a terrorist attack.

#### II. LITERATURE REVIEW

According to Greene, Barrios, Blair and Kolbe (2004), in any academic institute, teaching and nonteaching staff are actively engaged in providing an environment that is conducive for learning and are the lookout for any and everything that may create stress, anxiety or trauma in students' lives. For instance, in the bombing at Oklahoma City on April 19, 1995 and September 11, 2001, the children were busy learning at their respective schools, when terrorist attacks caused huge casualties. During such situations, most often, teachers and school managers take the initiative and responsibility of saving students and try to protect students even at the cost of their lives.

Norris, Friedman, Watson and Byrne (2002) point out that severe distress, pessimism and anxiety is developed among students after terror attacks. In a similar vein, Galea, Ahern, Resnick, Kilpatrick, Bucuvalas and Gold (2002) interviewed 1008 adults and found out that 7.5 % of individuals suffered Post-Traumatic Stress Disorder (PTSD) after the terror strikes, while 9.7 % suffered symptoms of depressive disorders. They stated that those who live in the vicinities of the World Trade Center (WTC) had more severe PSTD (20%) while those living in far flung areas had low levels of PTSD. A study conducted by Adams, (2005), with a sample of 2368 individuals, sought to check the mental health of students in the nearby vicinities of WTC. The results revealed that 40% of individuals had developed high

fear of being attacked in the future. This supports the statement of Galea*et al*, (2002) that the higher the intensity of exposure, the more severe the consequences on the mental, emotional, and social dimensions of individuals.

#### Factors influencing distress among individuals

According to Benight and Bandura (2004), some individuals have a strong potential to cope with any mishap or trauma they experience in their life. Such individuals can sometimes minimize the distress through their self-efficacy or the learned capabilities regarding the recovery from the post-traumatic situations. In relation to education, Mearns and Cain (2003) state that, if the teaching and non-teaching staff have high self-efficacy and emotional control, students can better cope in post terrorist attack scenarios. The study also indicated that teachers ought to be provided with first aid training to cope with medical emergencies or disastrous situations.

Silverman and La Greca (2002) stated that the emotional and psychological control of teaching and nonteaching staff during terrorist attacks has a huge impact on the psychological wellbeing of students because in such situations the students often look at the reaction of their *spiritual parents* (the teachers) to measure their safety level. In case of terror attacks or any traumatic experience, if the reaction of teachers is stable and strong, post-traumatic effects of students can be minimized and vice versa. Such stability in behavior can be sought after giving situation-specific training to teachers.

#### Role of school administration in student's psycho-social recovery

Murphy (2005) stated that teachers exercise influence and can shape the behavior and attitude of their students. Teachers are the spiritual guide and overseer who provide appropriate and suitable guidance to their students regarding their psychological and academic problems and issues. Murphy (2005), agreeing with Haris and Muijs (2002), argues that teachers are social catalysts who can bring positive change in the behavior of students in terms of their approach towards the solution of academic or psychological problems experienced by students at various times. When students have problems, teachers can provide mentoring and appropriate guidance and counseling.

Wolmer, Laor, and Yazgan (2003) argue that teachers may serve as clinical mediators in providing psychosocial recovery interventions to students' post disaster in schools. Under routine conditions or small events, school psychologists and counselors are the first-choice professionals for emergency response. However, the very nature of a wide-scale disaster (such as a terrorist attack on a school) can impede this. In these situations, school counselors and psychologists can take training and supervisory role and assist teachers to be clinical mediators. Thus, teachers can be a resource to provide classroom-based socio-emotional recovery efforts. The authors suggest that teachers occupy this role because they have a central role in the lives of children; they are viewed as trustworthy by students and parents, and many are amenable to being trained for a more therapeutic role (Wolmer, Laor, Dedeoglu, Siev, &Yazgan, 2005). In a study of a teacher-provided intervention with child survivors of an earthquake in Turkey, the rate of recovery over a 3-year period was faster for intervention students than for control students (Wolmer*et al.*, 2005). This finding suggests that teachers can be used to lessen the long-term suffering of students.

In a similar vein, Wolmer*et al.* (2003) focused on the provision of classroom-based programs that emphasized the social and emotional stability of students in schools. Such approaches often demonstrate that strong teacher-student relationships result in curtailing the PTSS in the context of post-traumatic events. Many schools had developed precautionary measures and interventions to deal with unpleasant issues and provide possible remedial solutions. The classroom provides holistic information about any event that happened in the school premises, with immediate feedback, which helps in rectifying the problem.

As far as the academic institutions are concerned, teachers and non-teaching staff provide or act as primary triggers in executing the academically relevant activities and need to be aware of students' behavioral psychology, in order to provide proper guidance and counseling to students suffering from disruptive behavior. That said, problem arises when the teachers are also suffering from stress and traumatic issues; then the intervening mode of teacher is not as effective in the context of students counseling (Wolmer*et al.*, 2003).

The frequency of terrorist attacks in the recent past in Pakistan had increased to the extent that it affected the overall infrastructure of the country. These terrorist attacks widely disturbed the society with fatal consequences and effects, felt for a prolonged period of time. Although many studies have been conducted on the impact of terrorist activities on the economy of the country (Frey, *et al.*, 2007), there appears to be a paucity of studies on how a terrorist attack affects a school or education institute.

#### III. METHODOLOGY

For exploring the objectives of the study, a quantitative research methodology was chosen. Based on a sample of teachers, this descriptive research provides in-depth information about students' academic achievement in APS that had a fatal terror attack on both students and teachers.

#### Population and sample of the study

All the teachers of the Army Public School constituted population of the study (n=45). The sample was selected through simple random sampling technique, using standard protocol of sample size determination (Krijice, 1970). A total of 30 teachers were selected from the Army Public School Peshawar, where the terrorists had struck.

#### **Research Instrument**

The research instrument consisted of a questionnaire with closed questions, using a five-point Likert Scale. The questionnaire was developed through an empirically driven context-bound approach and from the review of relevant literature. The questionnaire encompassed various crucial dimensions for exploring and measuring teachers' perspectives on the psycho-academic adjustment and achievement of students.

#### Validation of the research instrument

The questionnaire was validated by a focus group discussion, with at least three experts from the relevant field, with hands on experience. Minor corrections were made to the questionnaire as per the suggestions of these experts of the focus group. Questions having ambiguity were clarified, following which the questionnaire was ready for the data collection phase.

#### Pilot Study and Tool Reliability

The validated questionnaire was administered to a small sample, selected from the population for the purpose of piloting. This sample was selected through Adaptive Trail Design approach (Thabane et al., 2010). The main aim of piloting the questionnaire was to know about and establish any discrepancies or errors, which could create problems to respondents in understanding and answering the questionnaire was checked through Adaptive Treilability of the questionnaire was checked through Cronbach Alpha (Tavakol&Dennick, 2011), which was 0.74 (Range is 0.4–0.9) and hence suitable for data collection from the chosen sample.

#### Administering the research instrument and Data Collection

The questionnaire was administered to the respondents personally by one of the researchers. The rate of return of questionnaire was 100 percent, following which the data was prepared for data analysis. The Board of Management in the school provided ethical approval for the research. Research ethics were given due consideration in the process of collecting data from the respondents in terms of ensuring anonymity, openness, objectivity and dealing carefully with the human subject sensitivities (Resnik, 2011). Formal consent was thus taken from all the participants of the study.

#### Data analysis

The collected data was organized and input into SPSS version 17. The data was analyzed using chi-square test statistics; this test was used because the nature of the variables were independent and dependent, the sample size was more than two and the nature of data was ordinal (Cohen, Manion, and Morrison, 2002).

#### IV. RESULTS

After analyzing the data through chi–square test statistics, results were produced, which have been presented and discussed below:

	N	SDA	DA	Ν	А	SA	Calculated	Tabulated
							value	Value
	30	-	-	8	15	7	3.8	5.99
Df = v = 2							CI = 95% or (	).05

 Table 1 Effect of terrorist attacks on students' academics

Table 1 reveals that the calculated value falls in tabulated value or critical region, and hence it can be concluded that the statement "effect of terrorist attacks on students' academics" is supported by the statistical test.

Table 2 Interest level of students was good towards their academics before the APS incident.

-	Ν	SDA	DA	Ν	А	SA	Calculated	Tabulated
							value	Value
_	30	5	13	2	10	-	9.7	7.8
Df = v = 2	3					(	Cl =95% or 0.05	;

The Table above reveals that the calculated value does not fall in the tabulated value or critical region, and hence we conclude that the statement "interest level of students was good towards their academics before the APS incident" is not supported by the statistical test.

Table 3 Percentage of failures was less in the class

					,,,			
	Ν	SDA	DA	Ν	А	SA	Calculated	Tabulated
							value	Value
	30	5	11	5	9	-	3.6	7.8
Df = v = 3					С	l= 95%	or 0.05	

The Table reveals that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "percentage of failures was less in the class" is supported by the statistical test.

#### Table 4 Ratio of disciplinary issue was high Tabulated Ν SDA DA Ν А SA Calculated value Value 30 5 10 9 2.26 7.8 6

Df = v = 3

Table 4 above shows that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "ratio of disciplinary issue was high" is supported by the statistical test.

	N	SDA	DA	N	А	SA	Calculated	Tabulated
							value	Value
	30	1	9	6	10	4	9.0	9.4
Df = v = 4					С	l= 95%	6 or 0.05	

The Table depicts that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "constant counseling sessions are needed to the affected students" is supported by the statistical test.

Table 6 There is a visible improvement in students' grades after terrorist attacks.

	N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
	30	-	7	7	13	3	6.8	7.8
Df = v = 3						Cl=	95% or 0.05	

Cl= 95% or 0.05

The Table shows that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "there is a visible improvement in students' grades after terrorist attacks" is supported by the statistical test.

 Table 7 Students are more motivated towards their studies after terrorist attacks.

	N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
	30	3	3	10	9	5	7.3	9.4
Df = v = 4			Cl= 9	95% or	0.05			

Table 7 highlights that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "students are more motivated towards their studies after terrorist attacks" is supported by the statistical test.

 Table 8 Students' interest for classroom tests is better than before the terrorist attacks.

N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
30	5	9	6	10	-	2.26	7.8

Table 8 above shows that the calculated value falls in the tabulated value or critical region, and hence it can be concluded that the statement "Students' interest for classroom tests is better than before the terrorist attacks" is supported by the statistical test.

Table 9 Students' study habits in terms of study hours have improved

N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
30	7	8	2	13	-	8.1	7.8
					Cl= 9	5% or 0.05	

$$Df = v = 3$$

Df = v = 3

Table 9 depicts that the calculated value does not fall in the tabulated value or critical region, and hence we conclude that the statement "Students' study habits in terms of study hours are improved" is not supported by the statistical test.

	N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
	30	7	10	6	6	1	7	9.4
Df = v = 4						Cl= 959	% or 0.05	

Table 10Ratio of failures in classroom tests is decreased

The Table above reveals that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "Ratio of failures in classroom tests is decreased" is supported by the statistical test.

Table 11Parents became more concerned about their children academics

	N	SDA	DA	N	А	SA	Calculated value	Tabulated Value
	30	-	8	7	10	5	1.7	7.8
Df= 3					(	Cl= 95%	6 or 0.05	

The Table shows that the calculated value falls in the tabulated value or critical region, and hence we conclude that the statement "parents became more concerned about their children' academics" is supported by the statistical test.

N	SDA	DA	Ν	А	SA	Calculated	Tabulated				
						value	Value				
30	1	4	5	14	6	15.9	9.4				
	Cl= 95% or 0.05										

Table 12 Parental concern regarding their children's security in the context of post terrorist attack

The Table above reveals that the calculated value does not fall in the tabulated value or critical region, and hence we conclude that the statement "Parental concerned regarding their children's security in the context of post terrorist attack scenario" is not supported by the statistical test.

	value Va
30 1 12 6 7	4 11.0 9

Table 13Dropout rate from APSACS has increased after the incident

Table 13 shows that the calculated value does not fall in the tabulated value or critical region, and hence we conclude that the statement "Dropout rate from APSACS has increased after the incident" is not supported by the statistical test. This table shows that although the parents were afraid and scared, still they want their children to continue their studies.

#### V. DISCUSSION

This research primarily focused on exploring 30 teachers' perceptions of their students following the terrorist attack on their School. Due to their proximity and closeness to the children they teach, teachers are good judges of their students' behavior. After the terrorist attacks on APS, initially the students were distressed; yet, this was followed by an improvement in their academics (perhaps students worked harder as a coping strategy for their traumatic experiences). Although, it was a huge trauma to witness the loss of many of their peers and teachers, after constant counseling sessions and motivation, students were capable of focusing on their studies. Murphy (2005) argues that teachers are the most influential personalities in school, responsible for shaping the behavior and attitude of students. Besides other responsibilities, teachers often provide academic guidance and counseling to the students, even though, there are individual differences among the students in a class. Due to individual differences, different students perceive academic concepts differently. The APS incident was also perceived in a different manner by students in that it may increase or decrease academic performance, but this could also be related to study habits and the intelligence level of students.

The APS incident was a huge trauma for many young students; it was a catastrophe because initially they were unable to cope with their age fellows within an educational institute. In order to cope with this trauma, constant counseling sessions were arranged for students. It was the responsibility of the institutes to arrange and organize such sessions to help not only the children but also their parents because they were traumatized and scared to send their children to school after the attack. Parents were also terrified at the scope and brutality of the massacre. Parents wanted that terrorism be rooted out but they were unable to express their views due to the lack of a platform and fear. Appropriate platforms are required for parents, so that they can express their views because they are important stakeholders. Parents need to feel that their children are safe at school and that schools have adequate security.

#### VI. CONCLUSION

The aim of this small-scale quantitative survey was to examine thirty teachers' perspectives on the socioacademic adjustment of students after the APS attack and to explore the psychological adjustment of students in the post APS attack scenario. Undoubtedly, the APS attack had a significant psychological impact on Pakistan and particularly on young children who witnessed the brutal massacre of their friends and teachers. In such a situation, the academic achievement of students suffers; however, in this study there was a visible improvement in students' grades after the terrorist attacks and students were more

Df=4

Df=4

motivated towards their studies after the terrorist attacks. This could be due to initiation of the classroom-based programs, which helped students to become emotionally stable. Wolmer (2003) believes that, emotional stability and helping to cope the post-traumatic stress of students can be resolved through the initiation of classroom-based programs. In these programs, teachers can get swift feedback from the students regarding their psycho-academic problems, which can be overcome in a timely fashion. After the APS attack, most of the schools had developed precautionary measures to deal with emergency situations and to ensure maximum safety of students. Caution should be exercised in the interpretation of the results of this study due to its small-scale nature; it is recommended that a large-scale study be conducted in which the findings would be generalizable to larger populations.

### VII. RECOMMENDATIONS

In light of the discussion, the following recommendations have been proposed:

#### 1. Ensure security of academic institution – *the soft targets*

The government must ensure the security of children and teachers in their schools and other academic institutes, because they can be soft targets for terrorists. Schools and other academic institutes may have no strict security. Some schools do not have a register to record the in and out time of visitors, which increases their vulnerability to terrorist attacks. It is recommended that administrators of academic institutes maintain records of visitors along with the purpose of visit. Similar to schools in the USA, schools should have a lock down policy so that no one can enter the school once school begins.

### 2. Provide special clinical counseling

The relevant authorities should arrange appropriate guidance and counseling sessions for the affected students, parents and teachers to minimize the effects of such traumatic events and to help the students to come to terms with what has happened and to focus on their academic development. After the APS, the Department of Psychology, University of Peshawar arranged specific counseling sessions to reduce the severe effects of the terrorist attack on school children. This intervention was halted after a certain period of time.

#### 3. Parental counseling to send their offspring to schools

In the aftermath of the terrorist attack parents were reluctant to send their young children to schools, which affect their children's academic attainment. In such cases, it is imperative to provide counseling to parents to support them in their decision to send their children to school.

#### 4. Appointment of psychologist in schools and colleges

Time should be allotted to clinical psychologists or therapists to provide counseling to children in schools. The school classroom is a complex mix of cultures and a school will contain children of different intelligences, some of whom may suffer from psychological problems or disorders, which need immediate redressal through several counseling sessions. It is important that the government appoints clinical psychologists to schools and colleges for providing counseling services to students with psychological ailments.

#### 5. Provide first aid training to teachers and students on interval basis

It is important that the government provides first aid training to teachers and students because they are the first responders to a medical crisis in a school. Qualified doctors or nurses could visit schools and raise awareness about the life saving protocols in case of an emergency in the future. First aid training could be provided on a regular basis.

#### 6. Developing a sense of awareness and vigilance among students

Students could be guided by teachers to be vigilant and to observe every event keenly, in order to develop a sense of responsibility among them. They should be instructed that if they observe any suspicious event or activity or an individual, it should be immediately reported to law enforcement agencies.

# 7. Notification and provision of emergency numbers of law enforcement agency to teachers and students

The school administration should provide emergency response numbers prominently on the notice board, which may be used in case of emergency. Moreover, the teachers and students need to record such numbers to ensure their safety during emergency.

#### 8. Formation of cluster based Quick Response Force

Each academic institute needs to establish their own Quick Response Force (QRF) in collaboration with law enforcement agencies. It could be as simple as ensuring that each door has a lock and that children are instructed to hide under tables. Suitable and light training could be given by law enforcement agencies to cope with weaponized activities, because this strategy will ultimately become the first block for the terrorist.

#### 9. Emergency evacuation system

In each floor of the school, it is mandatory to design the emergency evacuation system, so that the students, teachers and other managerial staff ought to evacuate in dangerous situations. Besides these, a continuous drill and exercise need to be implemented in schools, colleges and universities for minimizing casualties.

#### References

- 1. Adams, R. E., &Boscarino, J. A. (2005). Stress and well-being in the aftermath of the world trade center attack: The continuing effects of a communitywide disaster. *Journal of Community Psychology*, *33*(2), 175 190. doi: 10.1002/jcop.20030.
- 2. Andrews, B., & Wilding, J. M. (2004). The relation of depression and anxiety to life-stress and achievement in students. *British Journal of Psychology*, *95* (4), 509-522.
- Benight, C. C., & Bandura, A. (2004). Social cognitive theory of posttraumatic recovery: The role of perceived self-efficacy. *Behaviour Research and Therapy*, 42, 1129 1148. doi: 10.1016/j.brat.2003.08.008.
- 4. Cohen, L., Manion, L., & Morrison, K. (2002). *Research methods in education*. New York, NY: Routledge.
- 5. Frey, B. S., Luechinger, S., &Stutzer, A. (2007). Calculating tragedy: Assessing the costs of terrorism. *Journal of Economic Surveys*, 21(1), 1-24.
- Galea, S., Ahern, J., Resnick, H., Kilpatrick, D., Bucuvalas, M., Gold, J., (2002). Psychological sequelae of the September 11 terrorist attacks in New York City. New England Journal of Medicine, 346(13), 982 – 987.
- Greene, B., Barrios, L. C., Blair, J. E., & Kolbe, L. (2004). Schools and terrorism: A supplement to the Report of the National Advisory Committee on Children and Terrorism. Journal of School Health, 74, 39 – 51.
- 8. Haris, A. & Muijs, D. (2002). Teacher leadership, A review of Research. Nottingham: National College for school leadership.
- 9. Krijice, R.V., Morgan, D. W., (1970). Determining sample size for research activities. *Educational and Psychological Measurement, 30*, 607 610.
- Mearns, J., & Cain, J. E. (2003). Relationships between teachers' occupational stress and their burnout and distress: Roles of coping and negative mood regulation expectancies. *Anxiety, Stress & Coping: An International Journal, 16*(1), 71 82. doi:10.1080/1061580021000057040.
- 11. Misra, R., & Mc. Kean, M. (2000). College students' academic stress and its relation to their anxiety, time management, and leisure satisfaction. *American Journal of Health Studies*, 16 (1): 41-52.
- 12. Murphy, J. F. (2005). *Connecting teacher leadership and school and school improvement*, London: Corwin.
- Norris, F. H., Friedman, M. J., Watson, P. J., & Byrne, C. M. (2002). 60,000 disaster victims speak: Part 1. An empirical review of the empirical literature, 1981-2001. *Psychiatry*,65(3), 207 – 239. doi: 10.1521/psyc.65.3.207.20173.

- 14. Resnik, D. B. (2011). What is ethics in research & why is it important. *National Institute of Environmental Health Sciences*, 1-10.
- Seligman, L. D., &Wuyek, L. A. (2007). Correlates of Separation Anxiety Symptoms among First-Semester College Students: An Exploratory Study. *The Journal of Psychology*, 141 (2): 135-146.
- Silverman, W. K., & La Greca, A. M. (2002). Children experiencing disasters: definitions, reactions, and predictions of outcomes. In A. M. La Greca, W. K. Silverman, E. M. Vernberg, & M. C. Roberts (Eds.), *Helping children cope with disasters and terrorism*. (pp. 11–33). Washington, DC: American Psychological Association. 10.1037/10454 -001.
- 17. Tavakol, M., &Dennick, R. (2011). Making sense of Cronbach's alpha. *International journal of medical education*, *2*, 53.
- 18. Thabane et al. BMC Medical Research Methodology 2010, 10:1 http://www.biomedcentral.com/1471-2288/10/1
- 19. Wolmer, L., Laor, N., Dedeoglu, C., Siev, J., &Yazgan, Y. (2005). Teacher-mediatedinterventionafter disaster: A controlled three-year follow-up of children's functioning.Journal of ChildPsychology and Psychiatry, 46, 1161 1168. doi:10.1111/j.1469-7610.2005.00416.
- Wolmer, L., Laor, N., &Yazgan, Y. (2003). School reactivation programs after disaster: Could teachers serve as clinical mediators? *Child and Adolescent Psychiatric Clinics of North America*, 12, 363 – 381. doi: 10.1016/S1056-4993(02)00104-9.