Dealing with death in custody: Psychosocial consequences for correctional staff

Abstract

The present study investigated experiences of trauma and psychosocial mediators in correctional staff who had dealt with a death in custody within the previous year.

A survey using questionnaire data collection was used. A total of 211 participants (168 males and 43 females) aged between 24 – 58 years old who had been directly or indirectly involved in dealing with a death in custody within the past year. They completed the Trauma Symptom Index (TSI) as well as measures of self-efficacy, optimism, problem-solving style, social support and growth.

The data showed that around 32% of participants were exhibiting symptoms at a clinical level. Prior experience with suicide and level of involvement in the incident were direct predictors of symptom level. Support, optimism, self-efficacy and confidence in problem-solving seemed to be potential protective factors and were also predictive of trauma related growth.

While the current study was cross sectional the data suggest that it may be possible to predict factors that are protective and therefore offer some hope in terms of developing preventative strategies.

Key words: Suicide; Trauma; Optimism; Problem-solving; Support-seeking

Introduction

The term correctional officer is widely used particularly in research literature from the US to describe staff who work in prisons. It has been quite well established from research that the stress of the correctional officer job has a large impact on their home life and health, causing conflicts with family, high divorce rates, and physical illness (Cheek & Miller, 1983; Dowden & Tellier, 2004). In addition to the personal suffering, high levels of sickness absence and turnover and difficulty recruiting and retaining well qualified staff, can also lead to reduced safety for the officers due to lack of sufficient staff levels (Finn, 1998).

Incarcerated prisoners represent individuals who are at a higher risk of suicide than the population average (Towl & Crighton, 2002). While any death occurring within the prison community will have an effect on those who live and work there, (Atkins & Constable, 2001) the area remains largely unexplored, particularly in the case of the effect of a self-inflicted death in custody on prison staff (Snow & McHugh, 2002).

It is widely accepted in the psychological and psychiatric literature that exposure to suicide is a traumatic experience and has the potential to produce Post Traumatic Stress Disorder (PTSD) (Rogers, Mitchell, Curran, Duggan, & Gournay, 2003). The American Psychiatric Association (APA) defines a traumatic event as a “stressful event or situation of an exceptionally threatening or catastrophic nature, which is likely to cause pervasive distress in almost anyone” (APA, 2003).

The Mayo Clinic definition of PTSD, “Post-traumatic stress disorder (PTSD) is a mental health condition that's triggered by a terrifying event — either experiencing it or witnessing it. Symptoms may include flashbacks, nightmares and severe anxiety, as well as uncontrollable thoughts about the event” (<http://www.mayoclinic.org/diseases-conditions/post-traumatic-stress-disorder/home/ovc-20308548> ).

Vocational functioning is both directly and indirectly impaired by PTSD (Strauser & Lustig, 2001), and PTSD is known to impact upon an individual’s ability to engage in effective social interaction in the workplace (Fischler & Booth, 1999; Strauser, 2000). One symptom of PTSD can be mentally reliving the trauma, which is often forced upon prison officers when they are investigated for negligence following a death or suicide in custody.

A study by Boudoukha et al, (2013) highlights how interpersonal violence in prison, and inmate on staff assault can also lead to PTSD or burnout. The study suggests that as the officer deals with the inmates on a daily basis they have to deal with all their frustrations which could eventually ‘sap the well-being’ of employees and cause stress and emotional exhaustion. Depersonalisation can then occur as the inmate becomes more attention seeking. This process will mentally weaken the officer and may further frustrate inmates leading to more inmate on staff assault.

A study by Martinez, (1997) suggested prisoners no longer fear punishment or the authority of the correctional officers. More recent research by Dirkzwager and Kruttschnitt, (2012) suggests that the penal policies in a country may not be reflected in prison practice. They conclude that less punitive policies and sentiments may actually engender more confrontational and punitive practices within the prison.. This may be because attention to security and consistent rule enforcement contributes to a more structured environment. This may lead to perceptions of stability and security which helps to reduce stress (Liebling, Tait, Durie, Stiles, & Harvey, 2005).

A study by Tait (2011) found regimes in two UK prisons (male and female) to be poor which led to increasing prisoner frustrations. Prisoners were locked up for long periods of time and had nothing to do when they were let out. For prisoners with mental health problems this could worsen their mental state and cause them even more distress. This in turn could then contribute to raising the risk of suicide among the prison population. Officers had insufficient training to help prisoners with such issues, which would also contribute to increasing the risk of suicide. Post trauma care for officers was found to be lacking in prisons (Tait, 2011) and there was no support for prison officers to express emotions about working with prisoners (Tracy, 2005).

There tends to be a macho culture among prison officers and expression of emotion can be seen as an occupational hazard (Crawley & Crawley, 2008; Tait, 2011). This culture also encourages the officers to ignore their difficult emotions and to pretend that they are unaffected so as to seem tough in front of the prisoners and sometimes also their peers. Officers may also try to keep up this outward appearance so as to appear strong in front of their family members. This is particularly true of men who often feel they are the providers of the household and want their family to feel safe and protected by them.

It is suggested (Tait, 2011) that length of service of a prison officer may be related to their caring approach towards prisoners. More recently appointed officers were seen to be the most caring with a desire to help people but were more likely to be exploited. Officers with around 12 years of service were deemed to be conflicted in their opinions of prisoners and tended to be less caring towards them. They viewed many as manipulative, untrustworthy, and undeserved of care, and were more likely to create confrontation when dealing with prisoners. Whereas officers with over 20 years of service were able to solve prisoners’ problems hassle free in return for compliance. They were also better at detecting exploitation and were committed to helping prisoners, and occasionally informally chatted with them. Longer experience in the job allows for officers to better establish their reputation of authority among the prisoner population as a reliable source of rule enforcement and problem solving. Tracy (2005) suggested officers who view emotion labour (controlling emotions in difficult tasks to keep a tough exterior) as a strategic exchange, are more likely to find their job easier and even fun. This kind of frame of mind or attitude toward the role may also increase resilience to traumas.

A study by Bourbonnais, Jauvin, Dussault, and Vézina, (2007) found that psychological distress in correctional officers was increased when reward at work was scarce and when there was an imbalance between reward and effort at work. This suggests that better rewards for officers’ small successes in their job could decrease their psychological distress. Some organisational health literature suggests that correctional staff may occasionally feel responsible for the self-harming of a prisoner and feel helpless to prevent it (Hayward, Tilley, Derbyshire, Kuipers, & Grey, 2005). The resulting feelings of guilt could cause the officer to distance themselves from the prisoner as a coping mechanism (Marzano, Adler, & Ciclitira, 2015).

Marzano, Adler, and Ciclitira, (2015) point out that as prison officers deal with self-harm and suicide they can incur tensions of role conflict and ambiguity as they are often required to balance authority with understanding and compassion. Mackay, Cousins, Kelly, Lee, and McCraig, (2004) showed role conflict to be a consistent predictor of psychological strain and low job satisfaction. Officers were able to eventually build up a ‘tolerance’ to the self-harming after dealing with many instances and were able to emotionally detach (Marzano, Adler, & Ciclitira, 2015). Officers who are able to build up resilience to such traumas or emotionally detach, should be less likely to experience burnout, provided they have been able to sufficiently process and deal with the initial trauma. A similar study of support for officers dealing with self-harm (Marzano, & Adler, 2007) found that although there seemed to be support in place for officers it was inadequate.

Knoll (2010) states that there are challenges associated with caring for suicidal people, such as not being able to predict behaviours with low base rates. This can make it more difficult for an officer to cope as they may be unable to prevent a suicide. A study by Shaw and Turnbull, (2006) describes major criticisms for the prison service suicide prevention strategy and describes a better assessment and strategy that should be implemented to better help reduce suicides.

In order to create an effective intervention that is appropriate to the prison community, more needs to be understood about possible mediators of distress, particularly the distress being suffered by the prison officers. Not all survivors of traumatic events develop severe or chronic distress (Joseph, Williams, & Yule, 1997), indicating that, although the experience of a traumatic event may be a necessary cause, it is not a sufficient cause.

The current study aims:

(1) To investigate the incidence of trauma and trauma related symptoms in members of prison staff who have experienced a recent prisoner suicide.

(2) To test the role of control beliefs, problem solving style, optimism/pessimism, and social support, in mediating the impact of suicide in custody on staff dealing with the event.

Method:

Design

The design of the study consisted of a cross sectional survey using self-report questionnaire data collection methods.

Participants

There were a total of 211 participants (168 males and 43 females) aged between 24 – 58 years old who had been directly or indirectly involved in dealing with a death in custody within the previous 12 months.

Materials

The Trauma Symptom Inventory (TSI) (Briere, 1995). This scale is a 100-item scale which produces an overall score of posttraumatic stress as well as 10 clinical scales which identify separate clinical level symptoms. The clinical scales are: Anxious Arousal; Depression; Anger/irritability; Intrusive Experiences; Defensive Avoidance; Dissociation behaviour; Sexual Concerns; Dysfunctional Sexual Behaviour; Impaired Self-reference; and Tension Reduction Behaviour. There are also 12 critical items which include suicidal ideation, substance abuse, psychosis, and self-mutilation and are used to identify the existence of PTSD. The inventory has demonstrated a 90% accuracy in predicting PTSD in an independently assessed sample.

The Locus of Control of Behaviour Scale (LCBS) (Craig, Franklin, & Andrews, 1984). This is a 17 item scale which produces a score of perceived locus of behaviour. The scale shows satisfactory internal reliability ( = .95 in the current sample), test-retest reliability in the absence of treatment, independent of age, sex and social desirability, and able to distinguish clinical disorder from normal non-clinical subjects. After retest during therapy a reduced score can predict maintenance of behaviour and an increase can predict relapse (Craig, Franklin, & Andrews, 1984)..

The Problem Solving Style Questionnaire (PSQ) (Cassidy & Long, 1996). This scale is a 28 item scale which produces a measure of seven factors of problem-solving style: helplessness ( = .94), problem-solving control ( = .87), creative style ( = .86), problem-solving confidence ( = .86), avoidance style ( = .76), approach style ( = .83), and support seeking in problem situations ( = .77). The factors differentially predict different affective states and clinical disorders. It has been shown that problem solving style is much more useful and enhanced when treated as a multi-dimensional construct. The scale is a valid, reliable, and useful measure of problem solving style.

The Life Orientation Test - revised (LOT-R) (Carver, Scheier, & Segerstrom, 2010). This is a 10-item scale which produces a measure of dispositional optimism. It is defined in terms of generalised outcome expectancies. Optimism has been shown to be highly significantly associated with measures of coping, symptom reporting and negative effect. The scale factors into 2 dimensions separately measuring optimism and pessimism (Vautier, Raufaste, & Cariou, 2003). In this sample the internal reliability of the dimensions were optimism ( = .89) and pessimism ( = .83).

The Multi-dimensional Scale of Perceived Social Support (Zimet, Dahlem, Zimet & Farley, 1988). This 12-item measure assesses perceived support available with 3 subscales; friends ( = .88), family ( = .84), and significant others ( = .75). The scale predicts high levels of perceived social support is associated with low levels of depression and anxiety symptomology.

Procedure

Once the governor’s permission was granted eligible participants were identified by the establishment’s Suicide Prevention Co-ordinator (SPC), using the criteria that they were members of staff who had been closely involved in dealing with a specific prisoner suicide in the previous 12 months. Eligible members of staff were approached by the SPC and asked if they would be willing to take part in the study. Seventeen staff declined to participate because they had nothing to say or had not been closely involved, and four declined because they felt too distressed to take part. Participants were given an envelope containing the measures, and information sheet and a consent form, and asked to complete it and return it to the co-ordinator.

As this is a highly sensitive area ethical permission was obtained through both the University Ethics Committee and the research committee for HM Prison Service. Suicide Prevention Co-ordinators are clinically trained and work with other clinical services within the prison. All participants were offered counselling support and those identified with clinical level PTSD were referred to psychological services. Participants were informed that this would be done and were referred confidentially.

Results

Based on the Critical Items TSI cut off scores 31.8% of participants exhibited clinical levels symptoms of PTSD. Using this cut off score these 31.8% of participants were designated as the trauma indicated group. The remaining 68.2% who scored below the cut off were designated as the non-trauma group.

First analysis explored differences between the trauma indicated group and the non-trauma group on the dimensions of the Trauma Symptom Index. Differences were statistically significant for all dimensions. (p < 0.05). (Table 1).

Insert Table 1 about here

Similarly, differences on perceived control, optimism, pessimism, and the problem-solving style dimensions of helplessness, problem-solving control, problem-solving creativity, problem-solving confidence, approach style, avoidance style, and support seeking were explored. All differences were statistically significant (see Table 2).

Insert Table 2 about here

A binary logistic regression was next used to identify the relationship of time in the prison service, length of time in the job, level of involvement in the incident, previous experience of dealing with a death in custody, perceived control, problem-solving style, optimism, and perceived support to clinical trauma. The logistic regression model was statistically significant (2(18) = 202.94, p<.001). The model explains 63.9% (Cox & Snell *R*2) to 89.9% (Nagelkerke *R*2) of the variance in critical trauma and correctly classified 95.0% of cases. Wald test showed significant effects for optimism (Wald (1) 6.164, p=.013; Exp (B) =0.131), pessimism (Wald (1) 5.206, p=.023; Exp (B) =3.497), creative problem-solving (Wald (1) 5.936, p=.015; Exp (B) =0.134), confident problem-solving (Wald (1) 4.024, p=.045; Exp (B) =0.231), avoidance problem-solving (Wald (1) 4.914, p=.027; Exp (B) =7.416), approach problem-solving (Wald (1) 7.808, p=.005; Exp (B) =0.075), support-seeking (Wald (1) 9.719, p=.002; Exp (B) =0.007), and level of involvement in the incident (Wald (1) 6.100, p=.014; Exp (B) =3.387). This suggests that optimism reduces the odds of being in the trauma group by 77% while pessimism inreases the odds of being in the trauma group by a factor of 3.497. Similarly creative problem-solving, confidence in problem-solving and approach style problem-solving each reduce the odds of being in the trauma group while avoidance style problem-solving increases the odds of being in te trauma group. Seeking support reduces the odds very significantly while the more directly involved in the incident increases the odds of critical trauma.

Discussion

Of the total of 211 participants, 31.8% exhibited clinical level symptoms of Post-Traumatic Stress Disorder (PTSD) which is of concern, however, 68.2% did not exhibit symptoms, which begs the question what protective factors are in operation. The data shows that although all differences were significant, the biggest differences shown between the trauma and non-trauma groups on the trauma symptom inventory, were on intrusive thoughts, dysfunction, impairment, and tension, showing that these may be the most affected variables by trauma. The results also show that the non-trauma group have higher levels of perceived control, optimism, problem solving control, creativity, confidence, problem solving approach, and support seeking, than the trauma group. These could be described as protective factors or contributors to resilience, but it can only be speculated as a measure of well-being would be required. It cannot be assumed that absence of clinical symptoms equates with well-being. The trauma group who developed symptoms seem to have a profile of lower perceived control, less optimism and more pessimism, and to have a less positive problem-solving style. Such factors can be targeted in intervention to help with coping skills and reduce the effects of trauma. The binary logistic regression shows that the best predictors of not developing critical levels of trauma are optimism, creative, confident and approach style problem-solving, and seeking support. In addition, it would appear the being more directly involved in the incident (being first or second on the scene and being involved in recovery of the body), adopting an avoidance style of problem-solving and being more pessimistic are risk factors for trauma.

The implications from these findings are mainly, a) the level of involvement in an incident of death in custody needs to be monitored and those most closely involved offered intensive support, b) the level of support-seeking following an incident should also be considered as a potential warning sign and ease of access to help should be a priority for support services, and c) assessment of staff following an incident should consider their psychological characteristic and their problem-solving style.

The fact that some of those experiencing self-inflicted death in custody do not develop critical trauma and remain optimistic with positive approaches to problem solving including seeking support suggests that serious consideration needs to be given to the context within which these officers work. The ‘macho’ culture which is widely recognised within the prison service works against help-seeking (Pogrebin & Poole, 1991). Officers are expected to be able to deal with traumatic instances alone and not be seen to be affected, which mitigates against them trying to deal with their emotions and encourages them to hide their problems. Boudoukha et al, (2013) pointed out, dealing with prisoners and their problems and frustrations daily can be stressful if not processed can reduce an officer’s ability to deal with a traumatic experience. The macho culture may help the officers to seem more authoritative to the prisoners which may help to reduce the occurrence of exploitation. When it extends to the staff culture, it makes it less likely that colleagues will support each other or for individuals to seek support for themselves. It can also extend to the home damaging relationships. Multi-level interventions are required which tackle this macho culture in order to enable more effective coping and help-seeking.

Of course, not all individuals under stress may get PTSD. This study has provided some evidence on warning signs or situations as well as possible protective factors that aid in resilience. The study by Marzano, Adler, and Ciclitira, (2015) found that officers were able to emotionally detach from self-harming inmates after a number of occasions dealing with them, and were also able to build up a tolerance to the amount that it affected them. Previous research has suggested that further training, clinical supervision, problem focused interventions that seek to develop and strengthen skills, and cognitive reappraisal strategies, should be explored as means of improving staff responses to self-harm or related traumas (Marzano, Adler, and Ciclitria, 2015; McCraty, & Atkinson, 2012). The current study would support such interventions as needed to reduce the poor performance, turnover and sickness absence experience in prisons and to support staff in developing resilience (Anderson et al, 2015; Finn, 2000). Future research should focus on identifying factors that contribute to resilience with an eye to preventive intervention.

References

Andersen, J. P., Papazoglou, K., Koskelainen, M., Nyman, M., Gustafsberg, H., & Arnetz, B. B. (2015). Applying resilience promotion training among special forces police officers. *SAGE open, 5(2),* 2158244015590446.

Atkins, C., & Constable, A. (2001). A suicide on the wing. *Prison Service Journal, 138,* 10– 12.

Berkowitz, L. (1972). Social norms, feelings, and other factors affecting helping and altruism. *Advances in Experimental Social Psychology, 6*, 63-108.

Boudoukha, A. H., Altintas, E., Rusinek, S., Fantini-Hauwel, C., & Hautekeete, M. (2013). Inmates-to-staff assaults, PTSD and burnout: Profiles of risk and vulnerability. *Journal of Interpersonal Violence, 28(11),* 2332-2350.

Bourbonnais, R., Jauvin, N., Dussault, J., & Vézina, M. (2007). Psychosocial work environment, interpersonal violence at work and mental health among correctional officers. *International Journal of Law and Psychiatry, 30(4),* 355-368.

Briere, J. (1995). *Trauma symptom inventory: Professional manual*. Florida, USA: Psychological Assessment Resources, Inc.

Carver, C. S., Scheier, M. F., & Segerstrom, S. C. (2010). Optimism. *Clinical Psychology Review, 30*, 879-889.

Cassidy, T. (2011). Stress, coping, resilience, and health. In T. J. Devonport (Ed). *Managing Stress: From Theory to Application. Hauppauge.* NY. Nova Science Publishers, Inc. ISBN 978-1-61470-691-5

Cassidy, T., & Long, C. (1996). Problem-solving style, stress and psychological illness: Development of a multifactorial measure. *British Journal of Clinical Psychology, 35,* 265– 277.

Cheek, F.E., & Miller, M.D. (1983). The experience of stress for correction officers: A double-bind theory of correctional stress*. Journal of Criminal Justice, 11*, 105-120.

Craig, A. R., Franklin, J. A., & Andrews, G. (1984). A scale to measure locus of control of behaviour. *British Journal of Medical Psychology, 57,* 173–180.

Crawley, E. & Crawley, P. (2008). Understanding prison officers: Culture, cohesions and conflict. In J. Bennett, B. Crewe, & Wahidin, A. *Understanding Prison Staff*: Cullumpton: Willan Publishing.

Dirkzwager, A. J., & Kruttschnitt, C. (2012). Prisoners’ perceptions of correctional officers’ behavior in English and Dutch prisons. *Journal of Criminal Justice*, 40(5), 404-412.

Dowden, C., Tellier, C. (2004). Predicting Work-Related Stress in Correctional Officers: A Meta-Analysis. *Journal of Criminal Justice, 32(1),* 31-47.

Finn, P. (1998). Correctional Officer Stress-A Cause for Concern and Additional Help. Fed. *Probation, 62,* 65.

Finn, P. (2000). *Addressing Correctional Officer Stress: Programs and Strategies*. Issues and Practices.

Fischler, G., & Booth, N. (1999). Vocational impact of psychiatric disorders: A guide for rehabilitation professionals. Gaithersburg, MD: Aspen. Joseph, S., Williams, R., & Yule, W. (1997). *Understanding Post-traumatic Stress: A psychosocial perspective on PTSD and treatment.* Chichester: John Wiley and Sons Limited.

Hayward, P., Tilley, F., Derbyshire, C., Kuipers, E., & Grey, S. (2005). ‘The ailment’ revisited: Are ‘manipulative’ patients really the most difﬁcult? *Journal of Mental Health, 14*,291–303.

Joseph, S., Williams, R., & Yule, W. (1997). *Understanding Post-traumatic Stress: A psychosocial perspective on PTSD and treatment*. Chichester: John Wiley and Sons Limited.

Knoll IV, J. L. (2010). Suicide in correctional settings: Assessment, prevention, and professional liability*. Journal of Correctional Health Care, 16(3),* 188-204.

Liebling, A., Tait, S., Durie, L., Stiles, A., & Harvey, J. (2005). *An evaluation of the safer locals programme. A summary of the main findings*. Cambridge Institute of Criminology Prisons Research Centre. Cambridge.

Mackay, C., Cousins, R., Kelly, P. J., Lee, S., & McCaig, R. H. (2004). ‘Management standards’ and work-related stress in the UK: Policy background and science. *Work and Stress, 18,* 91 –112.

Martinez, A. R. (1997). Correctional officer: The “other” prisoner. *The Keeper’s Voice, 18*, 8-11.

Marzano, L., & Adler, J. R. (2007). Supporting staff working with prisoners who self-harm: A survey of support services for staff dealing with self-harm in prisons in England and Wales. *International Journal of Prisoner Health, 3(4),* 268-282.

Marzano, L., Adler, J. R., & Ciclitira, K. (2015). Responding to repetitive, non‐suicidal self‐harm in an English male prison: Staff experiences, reactions, and concerns. *Legal and Criminological Psychology, 20(2),* 241-254.

McCraty, R., & Atkinson, M. (2012). Resilience training program reduces physiological and psychological stress in police officers. *Global Advances in Health and Medicine, 1(5)*, 44-66.

Rogers, P., Mitchell, D., Curran, J., Duggan, S., & Gournay, K. (2003). Post-traumatic stress disorder among prisoners. *Prison Service Journal, 146,* 24–30.

Shaw, J., & Turnbull, P. (2006). Suicide in custody*. Psychiatry, 5(8),* 286-288.

Snow, L., & McHugh, M. (2002). The aftermath of a death in prison custody. In G. Towl, L. Snow & M. McHugh (Eds.), *Suicide in prisons.* Oxford: BPS Blackwell.

Strauser, D. R. (2000). The impact of psychiatric disorders on the vocational rehabilitation planning process. *Paper presented at the Arkansas State University Rehabilitation Counselling Symposium*. Arkansas State University. [Cited in Strauser & Lustig (2001), p. 28, op cit].

Strauser, D. R., & Lustig, D. C. (2001). The implications of post-traumatic stress disorder on vocational behaviour and rehabilitation planning. *Journal of Rehabilitation, 67,* 26–30.

Tait, S. (2011). A typology of prison officer approaches to care. *European Journal of Criminology, 8(6),* 440-454.

Towl, G., & Crighton, D. (2002). Risk assessment and management. In G. Towl, L. Snow & M. McHugh (Eds.), *Suicide in prisons*. Oxford: BPS Blackwell.

Vautier, S., Raufaste, E., & Cariou, M. (2003). Dimensionality of the Revised Life Orientation Test and the status of the filler items. *International Journal of Psychology, 38*, 390-400.

Waddington, P. A. (1999). Police (canteen) sub-culture: an appreciation. *The British Journal of Criminology,* 287-309.

Zimet, G. D., Dahlem, N. W., Zimet, S. G., & Farley, G. K. (1988). The multidimensional scale of perceived social support*. Journal of Personality Assessment, 52(1),* 30-41.

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| Table 1: Means and standard deviations for TSI variables by trauma versus non-trauma groups. | | | |
|  | Non-trauma (N=144) | Trauma (N=67) |  |
|  | Mean (Sd) | Mean (Sd) |  |
| Critical score | 2.01 (1.77) | 10.79 (4.69) |  |
| Anxiety | 10.59 (6.77) | 17.78 (5.85) |  |
| Depression | 7.40 (5.67) | 14.94 (5.32) |  |
| Anger | 17.42 (7.76) | 24.39 (3.17) |  |
| Intrusive thoughts | 5.26 (5.03) | 14.94 (3.42) |  |
| Defensive | 7.61 (4.68) | 12.39 (5.52) |  |
| Disassociation | 4.74 (5.35) | 12.60 (9.75) |  |
| Sexual | 3.47 (3.59) | 6.66 (4.63) |  |
| Dysfunctional | 2.83 (3.92) | 18.55 (7.45) |  |
| Impaired | 4.20 (4.67) | 18.28 (9.16) |  |
| Tension | 9.62 (7.45) | 18.01 (9.004) |  |
| All differences significant at p<.001 level | | | |

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| Table 2: Means and standard deviations for psychological variables by trauma versus non-trauma groups. | | | |
|  | Non-trauma N=144) | Trauma (N=67) |  |
|  | Mean (Sd) | Mean (Sd) |  |
| Perceived control | 3.33 (1.14) | 2.45 (1.28) |  |
| Optimism | 2.92 (1.16)) | 2.18 (0.98) |  |
| Pessimism | 2.80 (1.55) | 3.57 (1.35) |  |
| Problem-solving helplessness | 2.38 (0.95) | 3.21 (1.19) |  |
| Problem-solving control | 3.71 (1.43) | 2.19 (1.02) |  |
| Problem-solving creativity | 3.16 (1.18) | 2.12 (0.77) |  |
| Problem-solving confidence | 3.42 (1.21) | 2.18 (0.92) |  |
| Problem-solving avoidance | 2.60 (0.95) | 3.57 (1.14) |  |
| Problem-solving approach | 3.11 (1.26) | 1.95 (0.77) |  |
| Problem-solving support seeking | 3.46 (1.02) | 1.58 (0.63) |  |
| Support from significant other | 4.21 (0.85) | 3.74 (0.99) |  |
| Support from family | 4.10 (0.74) | 3.60 (0.83) |  |
| Support from friends | 3.68 (0.74) | 3.22 (0.85) |  |
| All differences significant at p<.001 level | | | |