

Prevalence and Correlates of Secondary Traumatic Stress in Workplace Lay Trauma Counselors

Karen Ortlepp^{1,2} and Merle Friedman¹

Quantitative ($N = 130$) and qualitative ($N = 30$) data were collected to explore the experiences of nonprofessional trauma counselors in the workplace. Counselors, on average, did not experience symptoms of secondary traumatic stress (STS) requiring clinical intervention. Changes to cognitive schemata regarding counselors' world views were found to be present 6 weeks after their last trauma counseling incident. Counselors reported experiencing considerable role satisfaction. Factors related to the nature of the trauma counseling task and counselors' exposure to work and nonwork related trauma were not significantly associated with counselors' STS or role satisfaction scores. Program coordination, self-efficacy, stakeholder commitment, sense of coherence, and perceived social support were significantly related to counselors' experiences of STS and role satisfaction.

KEY WORDS: secondary traumatic stress; role satisfaction; lay counselors; workplace.

Introduction

Levels of criminal violence in South Africa have increased exponentially in the last few years. As Blair (1991) notes, the increase of violence in society is often reflected in a similar increase of violence in the workplace, with this context increasingly becoming the primary site in which violence is experienced. Research in this area shows that there is consistent evidence of violence in the workplace resulting in a traumatic stress response and the onset of posttraumatic stress disorder (PTSD) in employee victims (Flannery, 1996; Kleber & Brom, 1992; Richards, 1994; Williams, 1993).

Bank robberies have become a frequent occurrence in financial institutions in South Africa. One response to this has been the introduction of trauma management interventions utilizing trained, nonprofessional trauma counselors (Friedman, 1997). These trauma counselors aim to assist

colleagues in coming to terms with their involvement in a violent work-based incident. Further potential human costs of traumatic events in the workplace include such caregivers' potential experience of secondary traumatic stress (STS).

Criterion A for PTSD highlights that people can be traumatized without actually being physically harmed or threatened with harm (American Psychiatric Association [APA], 1994). Instead, they can be traumatized simply by learning about a traumatic incident (Figley, 1995a; Figley & Kleber, 1995; McCann & Pearlman, 1990; Stamm, 1995, 1997). Those at risk of being traumatized are the significant others of the primary victim and include family, friends and neighbors, work colleagues, and helping professionals who assist the primary victim (Figley & Kleber, 1995). Despite these noted observations and the specification in the definition of PTSD, nearly all the attention in the field of psychotraumatology has been focused on "people in harm's way and little on those who care for and worry about them" (Figley, 1995a, p. 6). Figley argues further that, "After more than a decade of application of the concept and two revisions of the DSM, however, it is time to consider the least studied and understood aspect of traumatic stress: Secondary Traumatic Stress" (Figley,

¹Psychology Department, University of the Witwatersrand, Johannesburg, South Africa.

²To whom correspondence should be addressed at Psychology Department, University of the Witwatersrand, Private Bag 3, WITS, Johannesburg 2050, South Africa; e-mail: 018kkos@muse.wits.ac.za.

1995b, p. 9). The current study attempts to address this issue by investigating the prevalence and correlates of STS and role satisfaction, that is, the positive and negative consequences associated with trauma work, among non-professional trauma counselors, within an organizational context.

Prevalence and Correlates of STS in Trauma Counselors

Indicators of psychiatric symptoms and negative psychological well-being have been reported by trauma caregivers in a number of studies (e.g., Bartone, Ursano, Wright, & Ingraham, 1989; Hodgkinson & Shepherd, 1994; Straker & Moosa, 1994). Chrestman (1995) notes that the incidence of symptoms in that study did not, on average, fall within the clinical range. Of particular relevance to the current study are the findings of Talbot, Manton, and Dunn (1992) in their work with trauma counselors of victims of armed hold-ups. These helpers reported feelings of isolation, anger, powerlessness, hopelessness, anxiety, symptoms of burnout as well as feelings of suspicion, and fear on entering banks as customers.

The following variables have been shown to be significantly related to the experience of STS: personal trauma history (Hodgkinson & Shepherd, 1994; Kassam-Adams, 1995; Pearlman & Mac Ian, 1995); coping style (Bartone et al., 1989; Follette, Polusny, & Milbeck, 1994; Hodgkinson & Shepherd, 1994); social support (Bartone et al., 1989; Hodgkinson & Shepherd, 1994); professional experience (Chrestman, 1995; Hodgkinson & Shepherd, 1994); and the number and type of trauma cases in a counselor's case load (Chrestman, 1995; Kassam-Adams, 1995; Schauben & Frazier, 1995). Consistency in the direction of these relationships has not always been evident in the studies referred to. Positive consequences associated with this work have been noted. For instance, personal growth, spiritual connection, hope, and respect for human resiliency were identified as positive outcomes by trauma counselors in the studies undertaken by Kassam-Adams (1995) and Schauben and Frazier (1995).

Trauma Work Within an Organizational Context

Green, Wilson, and Lindy (1985) emphasized the need to focus on the interaction between individual and contextual factors in order to make any advances in understanding the nature of an individual's response to exposure to traumatic material. Figley and Kleber (1995, p. 87) argue that "the relationship between work and trauma has

been an ignored subject in scientific research, as well as clinical, practical and organizational matters."

Organizational behavior, including trauma counseling in the work setting, can be analyzed and understood from a systems perspective such as that outlined by Nadler and Tushman (1981). Accordingly, the end results of any organizational intervention are determined by the interaction of four key components, namely, factors related to the individual, the task, and the formal and informal organizational arrangements. On the basis of this model of organizational behavior, and the trends identified in the literature, the present study focused on individual, organizational, and task-related variables in the investigation of the experiences of a sample of lay trauma counselors who worked with victims of bank robberies within the bank setting. Specific task related factors investigated included issues related to the nature of the traumatic incident in terms of the incidence of deaths and serious injuries incurred in bank robbery incidents. Organization-related variables included trauma program coordination strategies, stakeholders' perceived commitment to the program, and social support. Individual factors focused on included counselors' previous exposure to trauma, perceived self-efficacy in the actual task of trauma counseling, experience as a counselor and coping style as it relates to the construction of meaning around life events as operationalized by Antonovsky (1987). Antonovsky (1987) developed the construct called sense of coherence which refers to a global perceptual disposition thought to underlie specific coping strategies relating to various aspects of our lives (i.e. not trauma-specific). According to Antonovsky, sense of coherence is a determining factor in the phenomenon that occurs when some individuals faced with stressful situations, suffer from a range of undesirable effects whereas others fare much better under the same conditions.

The following outcomes were hypothesized based on previous reports.

1. Indicators related to the experience of STS and role satisfaction would be evident.
2. The nature of the bank robbery would be associated with counselors' levels of STS with counselors working in a context where a death or serious injury had occurred experiencing higher levels of STS than those where such events had not occurred.
3. The more frequent the involvement in trauma counseling the higher would be counselors' levels of STS.
4. Counselors' personal trauma history would be related to STS in a positive direction.

5. Perceived levels of self-efficacy and sense of coherence would be inversely related to counselors' levels of STS and positively related to their role satisfaction.
6. Trauma program coordination activities, stakeholder commitment to the program, and social support would be inversely related to levels of STS and positively related to levels of role satisfaction.

Method

Sample

The present research included a quantitative study (Phase 1) and a qualitative substudy (Phase 2). The sample of nonprofessional first line workplace trauma counselors for both Phase 1 ($N = 130$) and Phase 2 ($N = 30$) of the present study was drawn from three different banks. Each participant had received the same training, upgrading, and supervision in trauma counseling skills and each had been involved in counseling bank employees who had been exposed to a bank robbery.

Participation in both phases of this study was voluntary. In the quantitative data collection phase, a total of 302 questionnaires were distributed to all trauma counselors in the three financial institutions and 155 were returned representing a response rate of 51%. Questionnaires were discarded because of incomplete information being provided ($n = 4$) and because some respondents had not yet participated in an actual trauma counseling incident ($n = 20$). The final sample for Phase 1 of this study consisted of 54 men and 76 women of whom 61% had English as their home language, 37% stated Afrikaans as their home language, and 2% spoke an African language at home. All participants had at least a Grade 12 educational background. The mean age of participants was 38.98 years and the mean length of service in their organizations was 13.08 years. Counselors were based in head office (45%), regional centers (40%), and branches (15%). The majority of counselors were middle managers (54%), with 31% being junior managers, 10% senior managers, and 5% performing jobs at a clerical level. Counselors had been involved in the trauma counseling program for an average of 2.88 years and had been involved in the counseling of an average of 28.41 peers.

The Trauma Counseling Intervention

The counseling intervention is designed to ensure that no counselor is involved in the counseling of his or

her own immediate colleagues and that the counselor is not involved in the counseling process occurring in his or her own specific place of work. Trauma counseling is a voluntary activity over-and-above full-time employment responsibilities. Counselors are officially only allowed to be required to respond to a trauma counseling call-out once a month and are officially restricted to counseling a maximum of five employees involved in a given bank robbery. The specific trauma counseling intervention involves a 4-phase one-on-one contact model: the first trauma counseling contact occurs on the day of the bank robbery while subsequent follow-up contacts are made the next day, a week later, and, finally, a month later (Friedman, 1997). All trauma counselors in the current study had attended a 2-day training course on trauma counseling skills which are grounded in theory and practice previously described as fundamental and common to successful interventions for trauma, namely, the provision of support and encouragement of mastery integrated with cognitive restructuring (Van der Kolk, McFarlane, & Van der Holt, 1996). Counselors are also trained in skills to deal with resistant individuals and techniques for ensuring that individuals do not feel pressurized into counseling but are assured of help should the need arise.

Measures

Secondary Traumatic Stress and Role Satisfaction

The 66-item self-report Compassion Satisfaction/Fatigue Test (Stamm & Figley, 1998) was used to measure STS and role satisfaction. The Compassion Satisfaction/Fatigue Test is a self-report scale comprising three subscales, namely, compassion fatigue, burnout, and compassion satisfaction scored according to a 0 (*not at all*) to 5 (*very often*) Likert-type scale. The scores are summed for each of the three subscales. The test originally had two subscales, compassion fatigue and burnout. The psychometric properties of these scales are established (Figley, 1995a), with reported reliabilities of .85–.94 on a sample of 142 psychotherapy practitioners. Additional psychometric information, which included the additional compassion satisfaction scale, was reported by Rudolph, Stamm, and colleagues (Rudolph et al., 1999; Stamm, in press). The results of these studies showed compassion satisfaction alpha of .87, burnout alpha .90, and compassion fatigue at .87.

According to Figley (1995a), compassion fatigue refers to the natural and disruptive by-products of working with traumatized and troubled clients. The compassion fatigue subscale comprises 23 items such as "I have

flashbacks connected to the people I have debriefed.” Burnout can be viewed as a state of physical, emotional and mental exhaustion resulting from long term involvement in emotionally demanding situations (Pines & Aronson, 1989). Items such as “I have felt weak, tired, run down as a result of my work as a trauma counselor” formed the 17-item burnout subscale. Scores on the compassion fatigue and burnout subscales were interpreted according to theoretically derived scale values ranging from extremely low risk to extremely high risk for experiencing compassion fatigue and burnout (Stamm & Figley, 1998). The compassion fatigue and burnout subscales were used as indicators of STS in the present study. The 26-item compassion satisfaction subscale was reverse scored and comprised items such as “I feel invigorated after working with the people I counsel.” Compassion satisfaction refers to the satisfaction experienced by trauma counselors from being able to help people who have been through a traumatic event (Stamm & Figley, 1998) and was used to operationalize role satisfaction in the present study. Scores on this subscale were interpreted according to theoretically derived scale values ranging from extremely high potential to low potential for experiencing compassion satisfaction (Stamm & Figley, 1998). In this study, the Compassion Satisfaction/Fatigue total scale was found to have an overall internal reliability score of .91. The Cronbach’s alphas for the subscales in this study were .84, .83, and .85 for compassion fatigue, burnout, and compassion satisfaction, respectively.

Workplace Trauma Counselors’ Experiences

The 36-item self-report Workplace Trauma Debriefers Scale (WTDS; Ortlepp, 1998) was developed and first used in the current study to measure the work-related experiences of the trauma counselors. This self-report scale consists of three subscales measuring perceptions pertaining to specific aspects of trauma counseling in the workplace, namely, program coordination, self-efficacy, and stakeholder commitment. The 9-item program coordination subscale deals with trauma program coordination strategies and includes items related to policies and procedures for counselors to follow, counseling of the counselors, monitoring of the trauma program, and perceived demonstrated appreciation of counselors’ involvement. For example, “There are clear policies and guidelines to assist me in my role as a trauma counselor” and “I am satisfied with the debriefing I receive after being involved in a counseling incident.” The 15 items comprising the self-efficacy subscale are related to the perceived effectiveness of the trauma counseling training course in

terms of skills enhancement, for example, “The trauma debriefing training course did not equip me to deal with people who were resistant to participating in the counseling process.” In addition, self-efficacy includes items related to trauma counselors’ own perceptions of their effectiveness as trauma counselors, for example, “All in all, I feel that I am a successful and effective debriefer.” Items in the 12-item stakeholder commitment subscale refer to the perceived commitment to the trauma program of key stakeholders, namely, senior management, trauma counselors’ managers, colleagues, and employees involved in the robbery, for example, “My manager is committed to the trauma counseling program.” Participants are requested to respond to the items in terms of how they generally feel about their experiences as trauma counselors in their organization. Items are scored according to a 5-point Likert scale ranging from *strongly disagree* to *strongly agree*. The scores are summed for each of the subscales as well as for the total scale. The WTDS and its three subscales have demonstrated acceptable internal reliability (Cronbach’s alpha = .85, .85, .82, and .83 for WTDS [total], program coordination, self-efficacy, and stakeholder commitment respectively; Ortlepp, 1998).

Exposure to Previous Trauma

To determine whether participants had been exposed previously to a potentially traumatic event other than that of trauma counseling in the workplace, an adapted version of the Traumatic Stress Schedule (Norris, 1990) was used in this study. The original instrument developed by Norris was designed to be used in personal screening interviews. Esprey (1996) revised this slightly to use it in a survey research project in the South African context. This 7-item self-report scale measures the occurrence of a cross section of widely agreed on traumatic life events, for example, loss of a loved one through accident, homicide, or suicide. In the present study, this instrument was used to determine whether people had been exposed to potentially traumatic events in situations other than trauma counseling. Since it is a life events scale, no indicators of internal consistency are available.

Social Support

Social support was measured by using the 7-item self-report Crisis Support Questionnaire developed by Joseph, Andrews, Williams, and Yule (1992). This scale determines respondents’ perceptions of emotional and instrumental support available to them after exposure to a potentially traumatic event. In the present study, this event

referred to a trauma counseling incident. The scale includes items such as “Are people sympathetic and supportive?” with a 4-point Likert scale ranging from *never* to *always*. This measure yields a continuous sum score. In a South African study Esprey (1996) included a further six questions pertaining to the source of the perceived support such as family and friends, for example, “Who is sympathetic and supportive?” This approach was adopted in the present study and was extended to incorporate the trauma program support system, as well as support from managers and colleagues as response options. In the present study a Cronbach’s alpha of .85 was found for the Crisis Support Questionnaire.

Sense of Coherence

Antonovsky’s 29-item self-report Orientation to Life Questionnaire (Antonovsky, 1987) was used to measure the construct of sense of coherence. The self-report Orientation to Life Questionnaire (OLQ) incorporates three subscales related to the constructs of manageability, meaningfulness, and comprehensibility. In the present study the total score on the OLQ was used as recommended by Antonovsky (1993), and a satisfactory indication of internal consistency was found (Cronbach’s alpha = .92).

Qualitative Data

To further investigate the findings that emerged from the quantitative study, focused interviews were conducted with 30 lay trauma counselors in the workplace (10 from each of the three organizations). The focused interviews in the present study were conducted 6 weeks after counselors had been involved in a trauma counseling incident following a bank robbery. The interviews were conducted by the primary author at the work location of each trauma counselor. Counselors who had been involved in a trauma counseling incident 6 weeks prior to the scheduled interview date were approached to participate in this phase of the research. Participation was voluntary and all 30 of the counselors initially approached agreed to being interviewed. At the outset of each interview, the trauma counselor was assured of anonymity in the reporting of the findings. Counselors’ potential experiences of STS were elicited from questions exploring their thoughts and feelings during and following the trauma counseling process in which they had been involved 6 weeks previously. Other questions included the impact of that specific trauma counseling experience on their work and home lives and their world views. The information gathered from the open-ended questions related to these themes was then analyzed

by means of thematic content analysis (Kerlinger, 1986). As such, responses were categorized according to themes which emerged from the responses to each of the questions asked in the interviews and the frequency of responses applicable to each theme were calculated.

Statistical Analysis

Initial analyses undertaken in the quantitative study revealed that the three organizational subsamples only differed significantly on the research variable program coordination, $F(2, 127) = 7.81, p < .001$. Post hoc analyses showed that there was a significant difference between the mean score of Organization 1 on program coordination ($M = 37.18$) as compared to those of Organization 2 ($M = 32.79$), and Organization 3 ($M = 31.48$). Data obtained from the measuring instruments in the quantitative study were analyzed utilizing a combination of Pearson product-moment correlations and analysis of variance. To avoid any possible biases due to unexplained differences in the three organizations, all ANOVAs were performed taking the random effect of site into account.

Results

Prevalence of STS and Role Satisfaction

Table 1 summarizes the descriptive statistics related to the indicators of STS as operationalized by measuring the constructs of compassion fatigue and burnout, as well as those pertaining to role satisfaction as operationalized in the compassion satisfaction scale.

When considering the compassion fatigue and burnout risk scores, the majority of respondents were found to be at an extremely low risk (69%) and low risk (10%) of experiencing compassion fatigue, with 95% of respondents having an extremely low risk of experiencing burnout. A

Table 1. Descriptive Statistics for the Measures of STS, Role Satisfaction, Personal, and Organizational Factors ($N = 130$)

Variable	Minimum	Maximum	<i>M</i>	<i>SD</i>
Compassion fatigue	3	58	22.27	10.83
Burnout	4	53	19.52	9.66
Compassion satisfaction	55	120	95.38	11.38
WTDS (total)	72	118	97.32	12.33
Program coordination	107	170	145.64	15.45
Self-efficacy	14	45	37.18	6.64
Stakeholder commitment	43	71	63.6	5.71
Sense of coherence	30	60	48.95	7.45
Social support	91	197	151.52	19.84

Note. WTDS = Workplace Trauma Debriefers Scale.

total of 11, 2, and 8% of respondents were found to be at a moderate, high, and extremely high risk, respectively, of experiencing compassionate fatigue. Similarly, only 5 and 7% of respondents were at moderate or high risk of experiencing burnout. From these results it can be seen that, in general, this sample of nonprofessional workplace trauma counselors did not experience STS at levels indicating the need for clinical intervention (i.e. high risk), as a result of their trauma counseling responsibilities.

Three percent of the participants fell into the range of extremely high potential for experiencing compassion satisfaction with 14 and 75% showing high potential and good potential respectively for experiencing compassion satisfaction. A minority of counselors were found to have modest (6%) or low (2%) potential for experiencing compassion satisfaction. The findings from the compassion satisfaction subscale used in Phase 1 of the present study therefore indicate that, in general, trauma counselors potentially experienced a considerable degree of satisfaction from their trauma counseling responsibilities.

Correlates of STS and Role Satisfaction

To explore whether exposure to previous work related trauma is related to the experience of STS, Pearson product-moment correlations were computed between the indicators of STS and the length of time a person had been operating as a lay trauma counselor in that organization, the total number of people a person had counseled and the time lapse since the person was last involved in trauma counseling. The only result found to be statistically significant was the relationship between compassion fatigue and the time lapse since the person was last involved in trauma counseling, $r(130) = -.20$; $p < .01$.

The potential relationship between trauma counselors' previous exposure to nonwork related trauma and their current experience of STS was explored by computing Pearson product-moment correlations between counselors' total scores on the Traumatic Stress Schedule (TSS; Norris, 1990) and the indicators of STS. Once again, no statistically significant results were found. Therefore, it would seem accurate to conclude that previous exposure to work or nonwork related trauma, as operationalized in the present study, did not have any statistically significant relationship to counselors' potential experiences of the measured indicators of STS.

Counseling in an incident where a death or serious injury had occurred formed the focus of the investigations into the role of the nature of the trauma counseling incident on workplace trauma counselors' experiences. One-way ANOVAs were computed to determine whether

the experience of STS was affected by the occurrence of, firstly, a death or, secondly, a serious injury. Twenty-nine percent of trauma counselors reported counseling in an incident where a death had occurred, whereas 32% reported their involvement in a counseling incident characterized by serious injury. Contrary to expectation, trauma counselors who counseled in an incident where a death occurred did not differ from their counterparts on any of their scores on the STS indicators. Similarly, no differences on these indicators were found between trauma counselors who counseled colleagues in incidents where there had been serious injury and those who had not counseled within that setting.

Pearson product-moment correlations were computed to explore the relationship between the measures of STS and role satisfaction and total and subcomponent scores of the WTDS, sense of coherence, and social support. The results are presented in Table 2.

Participants were requested to indicate the source of the perceived social support in a number of the items of the Crisis Support Questionnaire (Joseph et al., 1992). Counselors in the current study identified sources of social support in their home environments, the workplace in general and colleagues associated with the trauma program in particular. When asked whether trauma counselors were satisfied with the support they receive after counseling, so as to obtain a general sense of their perceived satisfaction with the social support received in this context, the following results emerged; never (3%), sometimes (29%), often (33%), always (35%). Thus, the majority of counselors indicated that they were more frequently than not, satisfied with the support received after a trauma counseling incident.

Qualitative Findings

The results pertaining to the generally low prevalence of STS obtained in Phase 1 of the present study were supported by the interview findings. Participants reported

Table 2. Correlations of STS and Role Satisfaction With the WTDS, Sense of Coherence, and Social Support ($N = 130$)

	Compassion fatigue	Burnout	Compassion satisfaction
WTDS (total)	-.31**	-.41***	.50***
Program coordination	-.37***	-.29**	.27**
Self-efficacy	-.25**	-.43*	.61***
Stakeholder commitment	-.21*	-.26**	.38***
Sense of coherence	-.56***	-.59***	.51***
Social support	-.39***	-.38***	.41***

Note. WTDS = Workplace Trauma Debriefers Scale.
* $p < .05$. ** $p < .01$. *** $p < .001$.

symptoms of STS shortly after the incident but not 6 weeks later, supporting the generally low levels of STS found in Phase 1 of the study. Thus, in line with suggestions in the literature lay trauma counselors in this study reported feelings of intense compassion (47%), helplessness (20%), anger (17%), sadness (3%) during the trauma counseling process. A number of counselors reported experiencing symptoms of STS such as feelings of exhaustion (20%), personal vulnerability (17%), concern for the employees counseled (37%), depression and increased sensitivity (17%) directly following the trauma counseling incident. In addition, some counselors reported increased emotional arousal (13%), dreaming of the incident (3%), and feeling fearful at the prospect of entering a bank again (13%). The need to be more vigilant about their own and their families' safety was raised by a number of counselors (10%). The majority (67%) of counselors interviewed reported that there was no negative impact on their work as they were able to reschedule their work commitments and complete their work responsibilities in their own time. Only a small number of counselors (2%) reported lapses in their concentration at work directly following a trauma counseling incident. However, none of the counselors interviewed in the current study reported still experiencing these symptoms of STS 6 weeks after the trauma counseling incident. Instead they indicated that they lasted for between 1 and 7 days following the first day's trauma counseling call-out and can thus be seen as potentially indicative of Acute Stress Disorder (Koopman, Classen, Cardena, & Spiegel, 1995).

Another potential consequence of exposure to traumatic material in the trauma counseling context, is the disruption to counselor's cognitive schemata about self and the world, as conceptualized by Janoff-Bulman (1992) and McCann and Pearlman (1990). This characteristic of STS was focused on in the interviews in that trauma counselors were asked whether the trauma counseling experience had resulted in them reevaluating their views about life. Lay trauma counselors in the present study reported changes to their cognitive schemata concerning their world view, affect tolerance and interpersonal relationships. More specifically, 43% of the counselors interviewed reported being sensitized to the suffering of others as well as becoming more aware of their own and their loved one's vulnerability (20%). The heightened awareness of the importance of family and other key relationships was reported by 30% of the counselors interviewed, together with the need to appreciate life more due to its transitory nature (23%). Counselors in the present study indicated that, while these beliefs and attitudes were triggered by their involvement in the trauma counseling process, they were still held at the time of the interviews

indicating a more permanent change in the way they think and feel about themselves, the world, and others.

With reference to role satisfaction, in the interviews, the majority (63%) of counselors reported very positive attitudes toward the principle of trauma counseling in the work environment, stating that it was a necessity in the current South African context. Thirteen percent of the counselors mentioned the specific positive outcomes associated with personal growth and the acquisition of skills that can be applied in other areas whereas 43% of counselors interviewed stated explicitly that they found trauma counseling extremely rewarding and that they liked being in a position to help others. With only one exception, all counselors expressed their commitment to continue trauma counseling.

Discussion

Prevalence of STS

In line with the findings of other researchers in this area (Bartone et al., 1989; Hodgkinson & Shepherd, 1994; Straker & Moosa, 1994; Talbot et al., 1992) participants in the present study did report experiences symptomatic of STS. However, similar to Chrestman (1995), the incidence of symptoms did not, on average, fall within the clinical range. In the present study, counselors adopted their trauma counseling responsibilities over-and-above their other full-time work commitments and this combination of different work roles may have buffered them from the development of STS levels requiring clinical intervention. Another factor which is of relevance here, is the procedural rule pertaining to the restriction on the frequency of trauma counselor call-outs and the limits on the number of trauma survivors any one counselor can counsel per incident. In this way, trauma counselors' exposure to traumatic material is purposefully controlled. These findings support Schauben and Frazier (1995) who found that the greater the number of trauma cases in a counselor's caseload, the more PTSD symptoms were reported. This suggests that structural parameters of trauma counseling, similar to those in the current study, may prevent PTSD symptoms.

These findings are in line with Figley's conceptualization of the development of compassion fatigue (Figley, 1995c). Accordingly, compassion fatigue results from prolonged exposure to traumatic stress and the ensuing traumatic recollections provoked by this exposure. Thus, the periodic exposure to traumatic material experienced by the trauma counselors in this study may well have made a significant contribution to the relatively low levels of STS experienced by this sample of counselors.

From the interview findings a number of changes to counselors' cognitive schemata were evident 6 weeks after the counselors' involvement in a trauma counseling incident. This is in accordance with the ideas and findings of McCann and Pearlman (1990). Furthermore, as suggested by Pearlman and Mac Ian (1995), some shifts in cognitive schemata following exposure to traumatic material, may well be considered positive. A number of the comments made by the counselors interviewed clearly demonstrate a form of personal growth and a deeper connection with individuals and the human experience culminating in a greater awareness of all aspects of life, as described by Pearlman and Mac Ian (1995). The lay trauma counselors reported feelings of vulnerability and the need for increased vigilance should be seen within the context of the heightened levels of criminal violence currently being experienced in South Africa. As such, trauma counselors who reported the need to make increased efforts to protect themselves and their families as well as their fear of entering banks, may well represent an awareness of real danger rather than phobic avoidance behaviors.

The interview findings from the present study regarding the experience of STS in the short term seem to concur with Koopman et al.'s discussion of Acute Stress Disorder (ASD; Koopman et al., 1995). Clearly, it appears that counselors reported experiencing some of the symptoms associated with ASD when they reported anxiety symptoms, dissociative behaviors, reexperiencing the traumatic material, and avoidance behaviors (APA, 1994). In line with one of the other criteria related to ASD, counselors reported experiencing these symptoms for between 1 and 7 days. However, one of the fundamental criteria of ASD pertains to symptoms markedly interfering with social or occupational functioning (APA, 1994). This fundamental criterion for ASD diagnosis was certainly not evident in the responses of trauma counselors in the current study. However, future research in this area is needed to investigate the incidence of ASD in trauma counselors.

Correlates of STS

Contrary to previous research, the nature of the task of trauma counseling, as measured by the degree of injury inflicted in the bank robberies, was not found to be statistically significantly related to the trauma counselors' STS indicator scores. Furthermore, the findings of this study supported those of Follette et al. (1994), and contradicted those of Hodgkinson and Shepherd (1994), Kassam-Adams (1995), and Pearlman and Mac Ian (1995) in that prior exposure to both work and nonwork related trauma was not found to be statistically significantly related to counselors' levels of STS.

Personal coping style, as indicated by Antonovsky's sense of coherence construct, was found to be strongly related to counselors' reactions to their trauma counseling experiences. Thus the higher the counselors' levels of sense of coherence, the lower were their reported levels of STS and the higher their levels of role satisfaction. This finding supports others in which coping style was consistently found to moderate the stress experienced by trauma counselors (Bartone et al., 1989; Follette et al., 1994; Hodgkinson & Shepherd, 1994). In agreement with Bartone et al. (1989) and Hodgkinson and Shepherd (1994), a statistically significant but moderate inverse relationship emerged between social support and counselors' experiences of STS whereas the relationship between social support and role satisfaction was in a positive direction. Recognition from key stakeholders together with their perceived commitment to the trauma program was found to be related to the STS indicators and role satisfaction. However, this relationship was not as statistically strong when compared to the correlations between the other research variables and the STS indicators and role satisfaction.

The self-efficacy subcomponent of the WTDS measured counselors' perceptions of the effectiveness of the trauma counseling training course in terms of the extent to which it provided the counselors with the necessary skills required in their roles as trauma counselors thereby influencing their perceptions of their effectiveness as trauma counselors. Statistically significant relationships emerged between self-efficacy and the STS indicators showing that the stronger the counselors' perceptions of their possession of the skills required in this counseling role and their perceived effectiveness in this role, the less they reported experiences of burnout and compassion fatigue. The results of the study showed that the greater the extent to which counselors viewed the trauma program coordination strategies to be effective, the lower was their experience of STS and the higher was their experience of role satisfaction.

Practical Implications

The findings of the study have a number of practical implications regarding the strategy of introducing trauma intervention programs in organizational settings. Firstly, the present study suggests possible selection criteria in the identification of lay trauma counselors in similar contexts. Antonovsky's scale measuring sense of coherence might be a valuable contributor to the selection process (Antonovsky, 1987). A strong sense of coherence has been shown to be consistently related to the low STS and considerable role satisfaction as experienced by lay trauma

counselors. As such, sense of coherence may be a useful criterion against which to select counselors. The research indicates that a selection criterion could be issues related to whether counselors have been exposed to other traumatic incidents in their lives although it is suggested that the focus is on *how* counselors have coped with these incidents. To this end, the selection procedure should take into account coping mechanisms as a decision-making criterion. It would seem important to explore prospective trauma counselors' work and nonwork resources available to them as the research findings indicate that these are related to the ability to withstand the potential experience of STS.

The perceived effectiveness of the training received by trauma counselors has been shown in the present study to play a significant role in the counselors' feelings of efficacy in the trauma counseling context. Also, trauma counselors' perceptions of the effectiveness of the training have been shown to contribute significantly to the overall satisfaction trauma counselors experience in their trauma counseling roles. As such, it is crucial that the trauma program coordinator, in consultation with experts in the field, monitors the effectiveness of the skills training provided to trauma counselors on a regular basis.

Although trauma counselors in the present study seemed to find inherent satisfaction in the trauma counseling process, the commitment of key stakeholders to the trauma counseling process certainly had the potential to enhance or detract from this role satisfaction. The ongoing marketing of the trauma program in terms of its aims and benefits should therefore form a key area of responsibility for the trauma program coordinator.

All the above factors rely heavily on the trauma program coordination strategy adopted in an organization. The trauma program coordinator thus plays a critical role in the effectiveness of the above components of the trauma program and therefore ultimately the effectiveness of the service being provided to employees in need.

The results of this study need to be considered within the context of the limitations inherent in retrospective cross-sectional research designs of this nature. Although a number of statistically significant relationships emerged among the variables under investigation in Phase 1, at no time should causality be inferred from these findings. Furthermore, the response rate of 51% suggests caution in interpreting the findings due to the voluntary nature of counselors' participation. This study clearly does not account for the levels of STS that may potentially have been experienced by counselors who did not participate in the research or by counselors who had withdrawn from the trauma program and therefore were not part of the population sampled. Despite these limitations, the results serve

to emphasize the complex and dynamic nature of the experience of being a lay trauma counselor in an organizational setting.

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