Prostitution, Violence, and Posttraumatic Stress Disorder

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ABSTRACT. One hundred and thirty people working as prostitutes in San Francisco were interviewed regarding the extent of violence in their lives and symptoms of posttraumatic stress disorder (PTSD). Fifty-seven percent reported that they had been sexually assaulted as children and 49% reported that they had been physically assaulted as children. As adults in prostitution, 82% had been physically assaulted; 83% had been threatened with a weapon; 68% had been raped while working as prostitutes; and 84% reported current or past homelessness.

We differentiated the types of lifetime violence as childhood sexual assault; childhood physical abuse; rape in prostitution; and other (non-rape) physical assault in prostitution. PTSD severity was significantly associated with the total number of types of lifetime violence \( r = .21, p = .02 \); with childhood physical abuse \( t = 2.97, p = .004 \); rape in adult prostitution \( \text{Student's } t = 2.77, p = .01 \); and the total number of times raped in prostitution \( \text{Kruskal-Wallis } \chi^2 = 13.51, p = .01 \). Of the 130 people interviewed, 68% met...
DSM III-R criteria for a diagnosis of PTSD. Eighty-eight percent of these respondents stated that they wanted to leave prostitution, and described what they needed in order to escape. [Article copies available for a fee from The Haworth Document Delivery Service: 1-800-342-9678. E-mail address: getinfo@haworthpressinc.com]

INTRODUCTION

Most discussions of the public health risks of prostitution have focused on sexually-transmitted disease (Weiner, 1996; Plant et al., 1989). A recent editorial in a major medical journal acknowledged the danger of violence to those prostituted, yet concluded that the overall health risks of street prostitution were minimal (Lancet, 1996). In this paper, we discuss a study of the violence experienced by people working as prostitutes in a city in the U.S.A., and some of the consequent harm to physical and emotional health.

The diagnosis of posttraumatic stress disorder (PTSD) describes symptoms which result from trauma. In the language of the American Psychiatric Association (1994), PTSD can result when people have experienced "extreme traumatic stressors involving direct personal experience of an event that involves actual or threatened death or serious injury; or other threat to one's personal integrity; or witnessing an event that involves death, injury, or a threat to the physical integrity of another person; or learning about unexpected or violent death, serious harm, or threat of death or injury experienced by a family member or other close associate."

Exposure to these events may lead to the formation of a variety of symptoms: re-experiencing of the trauma in various forms, efforts to avoid stimuli which are similar to the trauma, a general numbing of responsiveness, and symptoms of physiologic hyperarousal. The grouping of such symptoms following trauma has been recognized as the clinical syndrome of Post-Traumatic Stress Disorder (PTSD). Authors of the Diagnostic and Statistical Manual of Mental Disorders (American Psychiatric Association, 1994) comment that PTSD may be especially severe or long lasting when the stressor is of human design (for example, rape and other torture).

Several previous studies suggest that the incidence of PTSD among those prostituted is likely to be high. First, most people working as prostitutes have a history of childhood physical and sexual abuse (Belton, 1992; Simons & Whitbeck, 1991; Giobbe, 1990; Bagley & Young, 1987; Silbert & Pines, 1981; Silbert & Pines, 1983; James & Meyerding, 1977). Second, sexual and other physical violence is a frequent occurrence in adult prostitution (Hunter, 1994; Vanwesenbeeck, 1994; Baldwin, 1993; Silbert & Pines, 1982). Third, the presence of dissociative symptoms, which often
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occur in conjunction with PTSD, has been noted among people working as prostitutes (Vanwesenbeeck, 1994; Ross, 1990; Silbert et al., 1982b).

Given the extent of violence in their lives, and the presence of dissociative symptoms, we predicted that people who worked as prostitutes would also experience PTSD. Although numerous populations have been sampled for incidence of PTSD, the frequency of the diagnosis has not been investigated among those prostituting.

Our study was designed to investigate the history of violence and the prevalence of PTSD among people working as prostitutes in San Francisco. We explored the etiology of PTSD by inquiring about interviewees’ lifetime experiences of sexual and physical violence. We used a standard psychometric instrument to identify the sequelae of violence and to diagnose PTSD. We also inquired about respondents’ current needs.

**METHOD**

We interviewed respondents from several regions in San Francisco where street prostitution occurs.

Upon our query, those who told us that they were currently working as prostitutes were asked if they would fill out 2 questionnaires which would take about 10 minutes.

Respondents read and signed a consent form. We offered to read the questions and write in the answers for those who appeared hesitant to write or who had difficulty reading. Respondents were offered the first author’s phone number for referral in the event that they were distressed by the questions.

**Instruments**

Interviewees responded to a 23-item questionnaire which inquired about their histories of physical and sexual violence, and what was needed in order to leave prostitution.

Interviewees also completed the PTSD Checklist (PCL) which asks respondents to specify the presence and severity within the last 30 days of each of the symptoms of PTSD identified in DSM IV (Weathers et al., 1993). The PCL includes B symptoms of PTSD (intrusive re-experiencing of trauma); C symptoms of PTSD (numbing and avoidance); and D symptoms (physiologic hyperarousal). A diagnosis of PTSD requires that the person have at least 1 B symptom, 3 C symptoms, and 2 D symptoms. Weathers et al. (1993) used the rule that if a subject scores 3 or above
("moderately," "quite a bit," or "extremely") on any item, that person can then be considered as having that symptom of PTSD. A diagnosis of partial PTSD requires that the person meets at least 2 or the 3 criteria for PTSD (Houskamp & Foy, 1991). We report the number of respondents who scored at symptomatic level for each of the 17 items, and the proportions reporting symptoms justifying diagnoses of partial and full PTSD.

**Analyses**

Standard descriptive statistics have been used to analyze the responses to the two questionnaires. Percentages were calculated for those who responded to each item. The strengths of associations between pairs of measurements were analyzed with correlation coefficients. The statistical significance of the associations between measurements was evaluated using standard parametric and non-parametric tests as appropriate.

**RESULTS**

**Gender, Race, and Age**

Of the 136 people who were working as prostitutes we approached, 4% refused to participate in this research. Several of those who refused were in the process of being hired by a customer; two appeared to be pressured by pimps into refusing.

Seventy-five percent of the 130 interviewees recruited for this study were women, 13% were men, and 12% were transgendered. Thirty-nine percent were White European American, 33% were African American, 18% were Latina, 6% were Asian or Pacific Islander, and 5% described themselves as of mixed race or left the question blank.

Mean age was 30.9 yr., with a standard deviation of 9.0 yr. Median age was 30.0 yr., with a standard deviation of 9.0 yr. Ages ranged from 14 to 61 yr.

**Childhood Violence**

Fifty-seven percent reported a history of childhood sexual abuse, by an average of 3 perpetrators. Forty-nine percent of those who responded reported that as children, they had been hit or beaten by a caregiver until they had bruises or were injured in some way.

**Violence in Prostitution**

Eighty-two percent of these respondents reported having been physically assaulted since entering prostitution. Of those who had been physically
assaulted, 55% had been assaulted by customers. Eighty-eight percent had been physically threatened while in prostitution, and 83% had been physically threatened with a weapon. Eight percent reported physical attacks by pimps and customers which had resulted in serious injury (for example, gunshot wounds, knife wounds, injuries from attempted escapes).

Sixty-eight percent of these respondents reported having been raped since entering prostitution. Forty-eight percent had been raped more than five times. Forty-six percent of those who reported rapes stated that they had been raped by customers. Forty-nine percent reported that pornography was made of them in prostitution; and 32% had been upset by an attempt to make them do what customers had seen in pornography.

We examined the relation of gender to level of violence experienced in prostitution. The 3 gender groups differed in incidence of physical assault and in incidence of rape. Among those working as prostitutes, women and the transgendered were more likely than men to experience physical assaults in prostitution (chi square = 8.96, df = 2, p = .01). Women and the transgendered were more likely than men to be raped in prostitution (chi square = 9.68, df = 2, p = .01).

We did not find differences in likelihood of physical assaults and rapes on the basis of race.

**Homelessness**

Eighty-four percent of these interviewees reported current or past homelessness.

**Physical Health**

Fifty percent of these respondents stated that they had a physical health problem. Fourteen percent reported arthritis or nonspecific joint pain; 12% reported cardiovascular symptoms; 11% reported liver disorders; 10% reported reproductive system symptoms; 9% reported respiratory symptoms; 9% reported neurological symptoms, such as numbness or seizures. Eight percent reported HIV infection. Seventeen percent of these respondents stated that they would choose immediate admission to a hospital for an acute emotional problem or drug addiction or both. Five percent reported that they were currently suicidal.

A drug abuse problem was reported by 75% of these respondents and an alcohol abuse problem by 27%. Duration of the drug or alcohol problem ranged from 3 mo to 30 yr (mean = 6.5 yr.; standard deviation = 8.2 yr.).
Posttraumatic Stress Disorder

We summed respondents’ ratings across the 17 items of the PTSD Checklist (PCL), generating a measure of PTSD symptom severity. Overall mean PCL score for our respondents was 54.9 (SD = 17.81). Table 1 describes the percentage of our 130 respondents who had each of the 17 symptoms of PTSD, and the means for each of the 17 PCL items.

Eighty-eight percent of these respondents reported one or more B symptoms; 79% reported 3 or more C symptoms; and 74% reported 2 or more D symptoms. On average, these respondents scored at PTSD symptom level for 2 of the 4 DSM III-R B criteria, for 5 of the 7 DSM III-R C criteria, and for 4 of the 6 D criteria.

Sixty-eight percent of our respondents met criteria for a PTSD diagnosis. Seventy-six percent met criteria for partial PTSD.

Relation Between History of Violence and PTSD

PTSD severity was related to childhood physical abuse (Student’s t = 2.97, df = 60, p = .004), but was not related to report of childhood sexual abuse.

PTSD severity was related to occurrence of rape in adult prostitution (Student’s t = 2.77, df = 103, p = .01), and the number of times raped in adult prostitution (chi-square = 13.51, df = 4, p = .01).

PTSD severity was significantly related to interviewees’ report of having been upset at being pressured into imitating pornography (Student’s t = -2.60, p = .01). PTSD severity was significantly related to report of chronic physical health problems (Student’s t = 2.11, df = 85, p = .04). PTSD severity was not here related to physical assault in prostitution, or length of time spent in prostitution. Neither race nor gender affected overall PTSD severity.

We investigated four different types of lifetime violence experienced by these interviewees: childhood sexual assault, childhood physical assault, rape in adult prostitution, and physical threat and/or assault in adult prostitution. Only 6% reported no violence, while 16% reported one of these four types of violence; 30% reported two different types of violence; 33% reported three types of violence, and 15% reported all four types of violence.

We investigated the cumulative effect on PTSD of the four types of lifetime violence. The more types of violence reported, the greater the severity of symptoms of PTSD (r = .21, p = .02), and the greater the likelihood of meeting criteria for a PTSD diagnosis (r = .18, p = .04). There was a significant association between the number of types of life-
TABLE 1. Group Means and Percentages of People Working as Prostitutes Who Experienced Each of 17 Symptoms of Posttraumatic Stress Disorder

<table>
<thead>
<tr>
<th>Description of item</th>
<th>Mean</th>
<th>SD</th>
<th>Percentage of persons with symptom at “moderate,” “quite a bit,” or “extremely”</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Intrusive re-experiencing (B symptoms)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Memories of stressful experiences from the past</td>
<td>3.20</td>
<td>1.42</td>
<td>65%</td>
</tr>
<tr>
<td>Dreams of stressful experiences from the past</td>
<td>2.71</td>
<td>1.46</td>
<td>47%</td>
</tr>
<tr>
<td>Act/feel as if stressful experiences happening again</td>
<td>2.97</td>
<td>1.34</td>
<td>62%</td>
</tr>
<tr>
<td>Very upset when reminded of stress from past</td>
<td>3.27</td>
<td>1.42</td>
<td>67%</td>
</tr>
<tr>
<td><strong>Numbing and avoidance (C symptoms)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Avoid thinking or feeling about past stress</td>
<td>3.37</td>
<td>1.40</td>
<td>71%</td>
</tr>
<tr>
<td>Avoid activities which remind you of past stress</td>
<td>3.25</td>
<td>1.45</td>
<td>69%</td>
</tr>
<tr>
<td>Trouble remembering parts of stress from past</td>
<td>2.75</td>
<td>1.48</td>
<td>63%</td>
</tr>
<tr>
<td>Loss of interest in activities you used to enjoy</td>
<td>3.43</td>
<td>1.47</td>
<td>71%</td>
</tr>
<tr>
<td>Feeling distant or cut off from people</td>
<td>3.50</td>
<td>1.43</td>
<td>69%</td>
</tr>
<tr>
<td>Emotionally numb: unable to have loving feelings</td>
<td>3.01</td>
<td>1.54</td>
<td>59%</td>
</tr>
<tr>
<td>Feel as if future will be cut short</td>
<td>3.34</td>
<td>1.46</td>
<td>67%</td>
</tr>
<tr>
<td><strong>Hyperarousal (D symptoms)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Trouble falling or staying asleep</td>
<td>3.08</td>
<td>1.63</td>
<td>59%</td>
</tr>
<tr>
<td>Feeling irritable or have angry outbursts</td>
<td>3.23</td>
<td>1.49</td>
<td>63%</td>
</tr>
<tr>
<td>Difficulty concentrating</td>
<td>3.01</td>
<td>1.14</td>
<td>62%</td>
</tr>
<tr>
<td>“Superalert” or watchful or on guard</td>
<td>3.65</td>
<td>1.40</td>
<td>78%</td>
</tr>
<tr>
<td>Feeling jumpy or easily startled</td>
<td>3.33</td>
<td>1.49</td>
<td>67%</td>
</tr>
<tr>
<td>Physical reactions to memories of past stress</td>
<td>3.16</td>
<td>1.54</td>
<td>63%</td>
</tr>
</tbody>
</table>
time violence and average severity of C (numbing) criteria symptoms of PTSD \( r = .19, p = .03 \). There was also a significant association between number of types of lifetime violence and average severity of D (hyper-arousal) criteria symptoms \( r = .21, p = .02 \). There was a trend toward an association between average severity of B (intrusive re-experiencing) criteria symptoms and number of different types of lifetime violence reported \( r = .14, p = .11 \).

**Current Needs of Interviewees**

Eighty-eight percent of these respondents stated that they wanted to leave prostitution. They also voiced a need for: a home or safe place (78%); job training (73%); treatment for drug or alcohol abuse (67%); health care (58%); peer support (50%); and self-defense training (49%). Forty-eight percent stated that they needed individual counseling; 44% wanted legalized prostitution; 43% needed legal assistance; 34% needed childcare; and 28% wanted physical protection from pimps.

**DISCUSSION**

We investigated history of violence and its association with the symptoms and diagnosis of PTSD among our 130 respondents, who were working as prostitutes on the streets of San Francisco.

The 57% prevalence of a history of childhood sexual abuse reported by these respondents is lower than that reported for those working in prostitution in other research. It is likely that, in the midst of ongoing trauma, reviewing childhood abuse was probably too painful. Several respondents commented that they did not want to think about their past when responding to the questions about childhood.

Many seemed profoundly uncertain as to just what “abuse” is. When asked why she answered “no” to the question regarding childhood sexual abuse, one woman whose history was known to one of the interviewers said: “Because there was no force, and, besides, I didn’t even know what it was then—I didn’t know it was sex.” A number of respondents reported having been recruited into prostitution at the age 12 or 13, but also denied having been molested as children.

All participants either filled out the questionnaires themselves or were assisted by interviewers who read the questions and recorded subjects’ responses. Intoxication from alcohol or crack cocaine may have contributed to some interviewees’ inability or unwillingness to delve into past
trauma. As noted in Results, 75% of our respondents reported having a drug abuse problem, while 27% reported having an alcohol abuse problem. However, previous research with addicts has noted their high degree of accuracy in reporting life events (Bonito et al., 1976).

Whether drug abuse tends to precede prostitution, or whether drugs were used after entering prostitution to numb the pain of working as a prostitute is unclear. Clinical experience suggests that drug and alcohol abuse may begin in latency or adolescence as a form of self-medication after incest or childhood sexual assault.

Pervasive violence was evident in the current lives of these people, with 82% reporting physical assault since entering prostitution and 68% reporting rape in prostitution. Female and transgendered people experienced significantly more violence (physical assault and rape) than did men. To be female, or to be perceived as female, was to be more intensely targeted for violence.

Sixty-eight percent of our respondents met criteria for a diagnosis of PTSD, with 76% qualifying for partial PTSD. These figures may be compared to those of help-seeking battered women, where PTSD incidence varies from 43% when self-rating scales are used (Houskamp & Foy, 1991) to 84% with use of clinical interviews (Kemp et al., 1991).

Our 130 interviewees' overall mean PCL score of 54.9 (an index of PTSD severity) may be compared to means of several other samples on the same measure: 50.6 for 123 PTSD treatment-seeking Vietnam veterans (Weathers et al., 1993); 34.8 for 1006 Persian Gulf war veterans (Weathers et al., 1993); and in a random sample of women in an HMO, 30.6 for 25 women who reported a history of physical abuse in childhood; 36.8 for 27 women who reported a history of physical and sexual abuse in childhood; and 24.4 for 26 controls in the same study (Farley, unpublished data).

Eighty-eight percent of these interviewees reported one or more B symptoms of intrusive reexperiencing of trauma. It is likely that memories of past traumatic events were triggered by the similarities in current violence.

Seventy-nine percent of our respondents reported 3 or more C symptoms of numbing and avoidance. When in the middle of the "combat zone" (as some areas of prostitution are called), it may be emotionally unsafe to acknowledge either one's trauma history or the extent of current danger.

Vanwesenbeek (1994) found that dissociation in people working as prostitutes was significantly related both to experiences of childhood violence and to violence in prostitution. A formal measure of dissociation
would have been informative. Dissociative amnesia may have been intensified among our respondents because of their ongoing trauma.

Seventy-four percent of these respondents reported 2 or more D symptoms of physiologic hyperarousal. Hypervigilance is necessary for survival while working as a prostitute.

Following Follette et al. (1996), we investigated the cumulative effect of different types of trauma on symptoms of PTSD. We looked at the effects on PTSD severity of four types of lifetime violence: childhood physical abuse, childhood sexual abuse, physical assault in prostitution, and rape in prostitution. The more types of lifetime violence reported, the higher the overall PTSD severity, and the more often respondents tended to report C (numbing/avoidance) and D (physiological hyperarousal) symptoms of PTSD. B symptoms (intrusive re-experiencing) showed a similar trend but did not quite attain statistical significance. We interpret these results to mean that traumatic events accumulated over one's life increase the likelihood of PTSD-like symptoms.

This study is one of several current research projects which investigates the range of emotional and physical health consequences of prostitution. El-Bassel et al. (1997) found significantly more psychological distress among women who used drugs and who also prostituted than among drug-using women who did not prostitute. The authors suggest that their findings, like ours, indicate a need for assessment and treatment of psychological distress among women working as prostitutes. One of our respondents noted the failure of therapists to connect her history of violence with symptoms of PTSD: "I wonder why I keep going to therapists and telling them I can't sleep, and I have nightmares. They pass right over the fact that I was a prostitute and I was beaten with 2 x 4 boards, I had my fingers and toes broken by a pimp, and I was raped more than 30 times. Why do they ignore that?"

When prostitution has been discussed in the health literature, there has been a tendency to focus almost exclusively on STD, especially HIV. In a literature review, Vanwesenbeeck (1994) commented: "Researchers seem to identify more easily with clients than with prostitutes . . . ." Although HIV has certainly created a public health crisis, we propose that the violence which is described here, and the psychological distress resulting from the violence must also be considered a public health crisis. Any intervention attempting to reduce HIV risk behavior among people working as prostitutes must also address physical violence and psychological trauma.

Eighty-eight percent of this group of prostituted people expressed a desire to leave prostitution, with 84% reporting current or past homeless-
ness. Homelessness is connected with prostitution in that survival may involve the exchange of sexual assault for a place to stay, and food. Our interviewees said that they needed the same services which were proposed by El Bassel et al. (1997): housing, education, viable employment, substance abuse treatment, and participation in the design of treatment interventions for their communities.

Trauma research has been criticized for its failure to attend to social attitudes and behaviors which cause trauma (Allen, 1996). One of Vanweesenbeeck's (1994) respondents described prostitution as "volunteer slavery," clearly articulating both the appearance of "choice" and the overwhelming coercion behind that "choice." The extreme violence suffered by these respondents suggests that we cannot view prostitution as a neutral activity or simply as a vocational choice. Instead, prostitution must be understood as sexual violence against women (Dworkin, 1997; Jeffreys, 1997; MacKinnon, 1993). We must focus our attention on changing a social system which makes prostitution possible.

Without an understanding of the psychological harm resulting from prostitution, treating prostitution survivors is impossible. We recommend further study of the effect of prostitution on the development of physical symptoms, on PTSD, and on dissociation and multiplicity. It is not clear whether the sequelae of street prostitution discussed here also occur in outcall, massage parlor and brothel prostitution. This is an important question which is currently being investigated by the authors. We encourage others to more fully investigate the physical and psychological consequences of prostitution.

REFERENCES


