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Impact of Patient Suicide on Psychiatrists and Psychiatric Trainees

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Objective: The authors investigated the impact of patient suicides on trainees and psychiatrists and their utilization of supports. **Methods:** Graduates in practice and trainees of the residency program of the University of Toronto from 1980–1995 (N = 495) were surveyed, retrospectively, with 239/495 responding (48%). Demographic and educational information, exposure to suicide, impact of the suicide(s), use of support systems, acute stress disorder and posttraumatic stress disorder symptoms, and impact of events and social relationship scores were collected. **Results:** One-half of the respondents (120/239) experienced at least one suicide of a patient, 62% of them (74/120) during postgraduate training. Biologically oriented psychiatrists in practice were more at risk for patient suicide. An important minority (one-quarter) among those who experienced patient suicide had substantially higher (morbid) scores than the overall group. They also scored higher on an acute stress disorder and a posttraumatic stress disorder symptom checklist. The impact was more severe when the patient suicide occurred during training than after graduation and was inversely correlated with clinicians' perceived social integration into their relational professional network. **Conclusions:** The experience of patient suicide is common during training and in clinical practice. The majority of trainees and clinicians are able to cope normally with the trauma, but in an important minority the emotional impact approaches morbid levels. Training programs should prepare students for this occupational hazard and implement systematic protocols to support those trainees who are especially vulnerable to their patient's suicide and reduce their social isolation from their peer group. Formal and informal professional networks should heighten awareness of the impact of patient suicide on practicing colleagues and take adequate measures to support them. (*Academic Psychiatry* 2004; 28:104–110)

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The suicide of patients in psychiatric treatment is predictably traumatic for their family and friends. It is also upsetting in varying degrees for the treating clinician. How much more so when this happens during the training period (1)? A patient's suicide typically evokes a range of emotions, including denial, shock, disbelief, guilt, sense of failure, and loss

of confidence in oneself (2–4). Yet, it is an occupational hazard not often examined (1, 5), and few reliable estimates exist in the literature of its frequency among psychiatrists and residents in psychiatric training programs. Earlier studies reported that between 14% and 33% of psychiatric residents experienced patient suicide (1, 6–8), but Henn (9) reported that 60% of third- and fourth-year residents were unaware of the suicide deaths of patients they treated professionally, even though the deaths were registered as such by the coroner's office (an estimated ratio of known to unknown suicides of 1:12). This suggests that the documented prevalence of patient suicide in the literature may be underestimated. The literature indicates a high frequency of distress in therapists following their patient's suicide (1, 5, 10). One may assume that the event is more likely to distress inexperienced psychiatrists (11) as well as those who work in emergency rooms, inpatient wards, and crisis clinics, where suicidal patients are frequently encountered. Their greater vulnerability may relate to their unpreparedness for the event when it occurs (12).

We sought to evaluate the prevalence of patient suicide and its effects on psychiatric trainees and recent graduates from a psychiatric university training program (the largest one in Canada) and to determine whether the risks vary with different career levels. We investigated whether prior exposure to suicide in the respondents' personal lives influenced their reactions to suicide in their patients. Finally, we studied the level of formal and informal social supports that were available to and/or utilized by trainees at the time of their patient's suicide.

METHODS

In November of 1995, we surveyed a cohort of past and current psychiatry residents in the University of Toronto program covering the 15-year period between July 1980 and June 1995 ($N = 495$). Career levels extended from trainees in the first postgraduate year (PGY1) to graduated psychiatrists, up to 15 years in practice. A package was mailed to each person containing an explanatory cover letter, consent form, and a comprehensive questionnaire evaluating demographic and educational data (current age, gender, type of practice, information about their psychiatry

residency, personal exposure to suicide in family or friends, professional exposure to suicide, and the use of support systems at the time of the event(s). Those who experienced the suicide of one or more patients were asked to complete a 25-item checklist of potential symptoms derived specifically for this study from the DSM-IV diagnostic criteria (13) for acute stress disorder or posttraumatic stress disorder. Each item (e.g., "I had recurrent distressing dreams of my patient's suicide") carried a possible intensity ranging from "not at all" to "very often." The package also included the Horowitz et al. Impact of Event Scale (14, 15). This self-report relates in a general way to the individual's response to stress and contains two subscales: avoidance and intrusion. It was initially evaluated on 66 psychotherapy patients who had experienced a serious life event (14) and has since been cross-validated (15). The third instrument, the Social Relationship Scale (16), was used to evaluate the quality of the respondent's social relations with professional colleagues subsequent to the patient suicide. This scale measures five aspects of social interaction, which are detailed here with their Cronbach's coefficient alpha values (a measure of internal consistency): perceived availability of support (0.873); validation of the person (0.775); experience of social conflict with colleagues (0.820); objective social integration pertaining to the respondent's participation and organizational involvement (0.886); and subjective social integration, which measures the individual's perception of their involvement with their network of colleagues or other specified reference group (0.820).

In order to preserve respondent anonymity, separate prestamped envelopes were provided for both the return of the consent forms and the completed questionnaires. The cover letter invited the recipient to contact one of the investigators if there were any problems. Only one such call was received. One year following the first mail-out, a second package was sent to those who had not yet responded with their consent forms, which encouraged them to either respond or indicate any difficulties.

Data Analysis

We calculated the frequencies of categorical and ordinal events and carried out contingency analyses.

For continuous variables we calculated the means and standard deviations and 95% confidence intervals between groups. Differences between means on the scales measuring impact of events, posttraumatic stress disorder, and acute stress disorder were simultaneously compared by analysis of variance using the PROC general linear models (GLM) program for unbalanced groups, which is licensed by the SAS Institute Inc. (version 8.1), and by applying the Bonferroni correction. Pearson correlations were calculated for measures of social integration.

RESULTS

After the second mail-out, 239 (48%) of the original 495 surveys were returned. One hundred thirty (55%) were men, and 108 (45%) were women. These proportions were not significantly different. One individual left the gender item blank. Mean age for both gender groups was 41 years (SD=5). When psychiatric training began, the mean age was 27 (SD=4), and it was 32 (SD=4) at graduation. Patient suicide was experienced by one-half of the respondents (50%, 120/239). Seventy men (54% of all male respondents) and 50 women (46% of all female respondents) reported one or more patient suicides (n.s.). Thirty-seven respondents held full-time faculty positions at various universities. One-half of these (54%) reported experiencing patient suicide, similar to the part-time faculty (54% of 83 respondents) and to those who worked in nonuniversity community hospitals (54%). Altogether, 115 of the respondents (48%) were in private practice and one-half (48%) of these reported at least one patient suicide. Of the 94 (40%) psychiatrists who identified themselves as biologically oriented, 64% reported at least one patient suicide, compared with 40% in nonbiological psychiatrists ($\chi^2=13.36$, $df=2$, $p<0.001$). Child and adolescent psychiatrists experienced patient suicide less often (23%). Legal action against the attending psychiatrist was instituted in 10 cases (9%), and two cases went to trial. Eighty-four (70%) of those respondents who reported patient suicide acknowledged receiving some training about suicide during their medical school programs, and 94% received some instruction on suicide during their residency.

Just under one-third of the respondents (31%) reported personal experience with suicide in a close friend or family member. No inquiry was made about

attempted suicidal history in the survey recipients themselves. There was no significant difference, with regard to the frequency of their exposure to patient suicide, between those who did have or those who did not have personal experience of suicide or in their scores on the acute stress disorder, posttraumatic stress disorder (PTSD) and Impact of Event scales. Almost two-thirds (65%) of those who had experienced a patient suicide were married or living common-law at the time of their first patient suicide, 30% were single, and 5% were divorced or separated.

About one-third of respondents (74/239, 31%) reported having experienced the suicide of a patient while they were still in training. Of these, five (7%) reported the event as having occurred preresidency and 39 (53%) during their first residency year, followed by diminishing proportions through each training year, including fellowship. Altogether, 60% of those who experienced a patient suicide during their training (44/74) did so by the end of their first postgraduate year. The majority of trainees who experienced their patient's suicide any time experienced only one (78%), but the other one-fifth of this subgroup (22%) experienced between 2 and 5 events.

Two-thirds of all the respondents (both trainees and graduates from the program) who recalled experiencing a first patient suicide at any career level (76/120, 69%) remembered a considerable emotional impact, including shock, on first receiving the news. In one-third (36%) of the respondents, this adverse reaction lasted up to one month. In one-eighth (13%) of the respondents, it lasted up to 3 months, and it persisted longer than 3 months in 7%. One-quarter of respondents (29%) admitted that the experience had an enduring effect on their roles as physicians.

Almost two-thirds of trainees who experienced patient suicide (64%) found their peers to be helpful, and a similar proportion (66%) found their supervisors to be supportive. Families were helpful in 45% of cases. About 17% turned to personal psychotherapy in their crisis. A psychological autopsy/case conference was held in less than one-third (30%) of cases and an administrative inquiry in one-quarter (28%) of cases. When held, the administrative inquiries were believed to be beneficial. More than one-half the respondents (59%) contacted the bereaved families of their patients to offer condolences and/or assistance.

Following their first patient suicide, more than two-thirds (71%) felt helpless, and one-half (55%) ac-

knowledgeable recurrent feelings of horror. Almost one-half (44%) of trainee respondents began to experience substantial feelings of anxiety. One-third were plagued with recurrent recollections of the events that led up to the suicide. In spite of their acknowledged distress, one-quarter (27%) found themselves unable to ask for help. This was in spite of the fact that 71% said they believed that someone was available to help them, and 76% knew of someone to contact in the emergency. For a variable time period after the fatality, the vast majority who lost patients by suicide (79%) felt professionally devalued and that they would henceforth not be respected professionally. Following the suicide, 70% of respondents said they "pretty much kept to themselves" after the tragic event, avoiding contact with their peers. Nevertheless, the majority (75%) said they continued to identify subjectively with their professional peers. A minority (13%) said they felt strongly alienated.

The scores on the psychological inventories demonstrated that a significant minority among those who reported patient suicide during training approached clinical levels of emotional disturbance. The mean score on the intrusion subscale of the Impact of Events Questionnaire for those with patient suicide experience was 8 (SD=6), which is higher than that found by Horowitz et al. (14) in their sample of medical students, but less than they found in their stress clinic patients. However, one-quarter of our sample (24%) scored substantially greater (12 or higher) than the overall mean intrusion score. The overall mean avoidance score on the Impact of Event Scale was 6 (SD=5), greater than found in Horowitz's sample of male medical students (4.4) and comparable to their female medical students (who scored 6.6), but substantially lower than their stress clinic patients. However, 23% of our group scored substantially higher than the overall mean avoidance score, equaling or exceeding 10, indicating substantively more impairment than their colleagues. (Our respondents' retrospective recall may possibly have resulted in their recording lower scores than might have been determined in a prospective design.) A minority of trainees with patient suicide 16/74 (22%) met clinical criteria for acute stress disorder (3 or more criteria), and 20% met criteria for PTSD. The impact of the trauma appeared to be greater overall when it happened during the training period than if it occurred later in the respondent's career. Table 1 compares the

mean scores on the Impact of Event Scale, acute stress disorder and PTSD scales when the first patient suicide occurred during training and after graduation. On almost every measure, the distress and symptom levels were significantly greater for those whose first experience of patient suicide occurred during training.

At any stage of the psychiatrist's career, the impact of the event correlated inversely with the individuals' perception of their integration with their professional reference group (i.e., those who perceived themselves as isolated from their colleagues experienced greater distress overall). Pearson coefficients for correlations between the respondents' subjective integration scores on the Social Relationship Scale and the other scales were highly significant. They were as follows: the impact of events-intrusion scores, -0.31 ($p \leq 0.002$); impact of events-avoidance scores, -0.50 ($p \leq 0.000$); acute stress disorder symptom severity, -0.52 ($p \leq 0.000$); and posttraumatic stress disorder symptom severity, -0.52 ($p \leq 0.000$).

DISCUSSION

The main limitations of the study are those inherent in a retrospective design with a 15-year time range. Inevitably, most studies of suicide are retrospective. A prospective validation of the findings would be desirable, but it would take years to develop a satisfactory sample size and be hugely expensive. Our overall response rate (48.3%) is similar to that (46%) obtained by Chemtob et al. (11), a landmark North American investigation in this field. A related European study achieved higher participation (18), but this may have been facilitated by the different cultural environment and respondent group mind set. Given that the proportion of our respondents who experienced patient suicide (one-half of all respondents and one-third during residency training) falls well within the range reported in the literature (10), we have no evidence to suggest that the findings from our sample are biased in any direction. Our results are, however, based on trainees and graduates from one program, albeit a large one, and should be cautiously generalized to other training settings.

In this study, the suicide of one or more patients that they treated was a probable and distressing event for psychiatrists during their residency training and in subsequent practice. Practicing psychiatrists who

were biologically oriented (i.e., focused on pharmacological treatment and/or ECT) experienced substantively higher risk of patient suicide, probably reflecting the greater prevalence of severe mental disorders and psychoses in their practices, higher prevalence among patients of suicidal ideation with intent, higher patient volume, and more frequent prescription of powerful psychotropic drugs that might be used in overdose. Although one-third of respondents reported previous personal experience of suicide in their family or friends, this did not affect their scores on the acute stress disorder, PTSD, and Impact of Event scales or their likelihood of experiencing patient suicide. In spite of these negative findings, we speculate that the experience of suicide in one's personal life may be an important, underexplored factor in psychiatric practice. The prevalence of personal suicide in our sample (31%) seems rather high and might be connected with the individual's original motivation to study psychiatry, although we have no way to compare the frequency with that in the general public.

One-third of respondents reported experiencing a patient suicide during their residency, comparable to an earlier study (1). Notably, 60% of those trainees who experienced patient suicide did so by the end of their first postgraduate year, a finding that should highlight the high level of risk for patient suicide facing residents during their early training years. Typically, junior residents are placed in the front lines (inpatients and emergency) during the first or second year of training, where acuity and severity are high. Other investigators (1, 11) have directed attention to increased emotional vulnerability to patient suicide occurring during training. Our study clearly dem-

onstrates that those who may well be the most vulnerable, presumably both on account of their inexperience and their deployment in acute clinical settings, are exposed to the highest risks early in their careers. Close supervision and support would seem indicated.

While most trainees who reported patient suicide experienced only one event, one-fifth encountered between 2 and 5 suicides during residency. There is a paucity of data in the literature on the experience of multiple patient suicides. An earlier study (1) found a rate of 9%. We are unaware of any study that has examined the cumulative impact of multiple patient suicides either on psychiatrists or trainees. These individuals would be most vulnerable intuitively. We are aware of one resident who experienced three patient suicides over a single year and dropped out of the program in a state of depression and isolation. Fortunately, he eventually returned. Another resident related the onset of his diabetes to the shock of experiencing patient suicide.

Our findings showed that more than two-thirds of respondents who encountered suicide of their patients stated they "pretty much" kept to themselves after the tragic event, (i.e., they withdrew at a time when they most needed assistance). Trainees who experience a patient suicide unquestionably need to receive support from teachers and peers. Scores on the Impact of Event-intrusion and Impact of Event-avoidance subscales exceeded minimal criteria for clinical impairment in one-quarter of trainees with patient suicide. A similar proportion reported symptoms meeting criteria for a diagnosis of acute stress disorder, and one-fifth for PTSD. These clinical data compel us to look more closely at the significant mi-

TABLE 1. Effect of First Experience of Patient Suicide During Training versus Beyond Training

Measure	During Training		After Training		p ^a
	Mean	95% CI	Mean	95% CI	
Impact of Event					
Intrusion	8.23	6.86 to 9.60	4.26	2.36 to 6.17	0.000
Avoidance	6.09	4.79 to 7.39	3.31	1.56 to 5.07	0.005
Acute stress disorder					
Symptoms	22.14	17.91 to 26.37	11.47	5.54 to 17.40	0.001
Criteria	1.35	1.02 to 1.68	0.44	0.01 to 0.87	0.000
PTSD					
Symptoms	20.98	16.92 to 25.05	10.50	4.75 to 16.26	0.001
Criteria	1.19	0.82 to 1.56	0.35	-0.14 to 0.84	0.002

^aANOVA (SAS GLM procedure).

nority of psychiatric trainees who experience the devastating impact of patient suicide and feel both distressed and unsupported within the training program. The findings on the Social Relationship Scale indicate a positive relationship between a sense of isolation and the distress and other morbid symptoms attributable to the trauma of patient suicide. A sizable minority experiencing patient suicide recalled losing confidence in their professional judgment, feeling as though they had lost peer and supervisor respect, and withdrawing into themselves. In essence, an important minority of both trainees and practicing psychiatrists experienced several dimensions of negative impact of the trauma.

The need for support following a patient's suicide extends to psychiatrists at any level of experience (10,17-19). A Scottish study of consultant psychiatrists, with a mean of 17.5 years in practice, reported 33% as being affected with insomnia and dysphoria as a result of patient suicide, and 15% considered taking early retirement (18). Hendin et al. reported "profound loss and sadness," shock, guilt, fear of blame or reprisal, anger and betrayal, self-doubt, and shame in 26 clinicians who lost patients to suicide (10). Although we observed reports of greater distress among the trainees than among the practicing psychiatrists, our data show that vulnerability to patient suicide can persist throughout one's career.

Experience of patient suicide by psychiatric trainees in the United States, Canada, Europe, Australia, and New Zealand (1, 6- 8, 17, 19) ranges from 14-68%, increasing in recent years. Clearly, university psychiatric training programs everywhere have a compelling responsibility to ensure adequate clinical teaching about suicidal patients, to closely supervise trainees treating or encountering patients at high risk for suicide, and to support those who lose a patient to suicide. The immediate impact of learning of one's patient's suicide is an upsetting event for nearly all clinicians. Fortunately, most have the resilience to cope normally with the experience. We should not, however, forget the important minority who are vulnerable and in whom the effects are more severe and lasting a long time. One-quarter of our sample declared that the experience had a profound and enduring effect on them throughout their careers as physicians.

One-quarter of trainee respondents in a recent study (8) declared that they received no support after

their patients committed suicide. Brown (1987) called avoidance of the problem of patient suicide by training program administrators a "hot potato" (1). His survey suggests that the majority of psychiatric trainees overcome the trauma of patient suicide during their careers, in spite of such administrative inattention to the problem. Again, our findings highlight the needs of the significant minority of residents who are emotionally troubled by such events and who may perceive the training program as being unavailable or inadequately supportive.

Colleagues need to cut through the silence and reach out supportively to their peers at any stage of their careers whenever such a tragedy is experienced. The remarks of one of our graduate women residents in a focus group led by one of us (R.R.) echo the thoughts of Hendin et al. (10): "The knowledge that a patient suicide is neither a unique event nor a personal failure... can help decrease the (sense of) isolation. Staff help diminish the stigma by presenting their own experiences of patient suicide and freely discussing this with residents." Hendin et al. also found that therapists of patients who committed suicide benefited from reviews of their cases by "a disinterested independent group with no institutional ties to the therapists" (10). Contrary to supporting the bereaved clinicians, in some cases the corporate institutions reacted toward them with hostility, as if investigating a clinical wrongdoing. In the hands of personnel, even physician or nursing colleagues acting for the administration, a review might take on the characteristics of an inquisition; hence, the suggestion by Hendin et al. that reviews should be undertaken by outside clinicians "that do not threaten to levy judgments or sanctions." Our experience supports this conclusion, especially when a review functions as a group learning opportunity for the team as a whole rather than a single clinician. Team-oriented management is the current established approach to institution-based clinical practice. Most institutions are, however, required to have a member of their staff review the case for the "medical audit" or "mortality rounds." These are performed for defensive medicolegal purposes and aim to assure the appropriate agencies that clinical standards of care have been upheld. Hospitals might well refrain from conducting such inquiries until the above educational reviews have taken place. The staff members conducting the audit would likely benefit from the less inquisitorial,

broader, and informed perspective that would likely emerge from the educational review.

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