

Personality Profiles, Dissociation, and Absorption in Women Reporting Repressed, Recovered, or Continuous Memories of Childhood Sexual Abuse

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Women reporting either repressed, recovered, or continuous memories of childhood sexual abuse or no abuse history completed questionnaires tapping personality traits, absorption (fantasy proneness), dissociation, depression, and posttraumatic stress. Planned contrasts indicated that recovered memory participants scored higher on absorption and dissociation than did those reporting either continuous memories or no abuse history; repressed memory participants scored nonsignificantly higher than did recovered memory participants. On measures of distress, continuous memory participants were indistinguishable from nonabused participants, repressed memory participants scored highest, and recovered memory participants scored midway between continuous and repressed memory participants.

Few controversies in psychology have been as contentious as the one concerning repressed and recovered memories of childhood sexual abuse (CSA; H. G. Pope, Hudson, Bodkin, & Oliva, 1998; K. S. Pope, 1996). According to one perspective, some CSA victims develop a dissociative coping style that hampers their subsequent ability to remember their abuse (e.g., Terr, 1991). These repressed (or dissociated) memories presumably remain relatively unaltered by the passage of time, underlie certain post-traumatic symptoms (e.g., sensory flashbacks), and distort personality and interpersonal functioning. Advocates of this perspective believe that clinical improvement requires recovery and integration of dissociated memory fragments into a healing narrative (Brown, Schefflin, & Hammond, 1998).

According to another perspective, there is no convincing evidence for a mechanism that dissociates memories of CSA, blocking their accessibility to awareness (e.g., H. G. Pope et al., 1998). Moreover, skeptics hold, amnesia rarely results from traumatic events that have been corroborated as having occurred. Although many people have reported recovering repressed memories of CSA, psychologists emphasizing memory's fallibility have warned that such reports may be inaccurate (e.g., Schacter, 1999). False memories of CSA need not be "implanted" by well-meaning but misguided therapists; people may become convinced they were

abused after having read self-help books or having watched television shows concerning repressed and recovered memories of CSA (Heaton & Wilson, 1998). Finally, to make sense of chronic personal distress, some individuals may come to believe that their problems originate from repressed memories of CSA they have yet to recover.

Because data regarding the personality traits and clinical characteristics of people reporting repressed and recovered memories of CSA are scarce, we conducted a descriptive psychometric study on four groups of participants that may help to illuminate this controversy. The groups were (a) women who believed they had been sexually abused as children, but who had no explicit autobiographical memory of the relevant abuse events (i.e., repressed memory group); (b) women who reported having recovered memories of CSA after periods of being unable to remember their abuse (i.e., recovered memory group); (c) women reporting histories of CSA that they had always remembered (i.e., continuous memory group); and (d) women reporting no history of CSA (i.e., comparison group). Our use of the terms *repressed* and *recovered* reflects the reported experience of our participants and implies neither belief nor disbelief in the veracity of their reports.

Participants completed Tellegen's (1982) Multidimensional Personality Questionnaire (MPQ), which includes an Absorption scale related to hypnotic susceptibility and fantasy proneness (Tellegen & Atkinson, 1974), and measures of dissociation (Dissociative Experiences Scale [DES]; Bernstein & Putnam, 1986), pathological dissociation, posttraumatic stress, and depression.

We were especially interested in the Absorption scale of the MPQ and the DES. According to the false memory perspective, people reporting recovered (and presumably false) memories of CSA should be more hypnotizable and fantasy-prone than are people reporting continuous (and presumably true) memories of CSA. Therefore, the former group should score higher on a measure of absorption than should the latter group. The recovered memory perspective makes no clear prediction about absorption

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because it presumes that most recovered abuse memories are accurate.

The recovered memory perspective, however, predicts that severity of repression should be correlated with measures of dissociation. Therefore, repressed memory participants should score higher on the DES than should recovered memory participants who, in turn, should score higher than continuous memory participants who, in turn, should score higher than comparison participants. That is, because repressed memory participants still do not have conscious access to their presumably dissociated memories of CSA, they should score higher on the DES than should participants who had originally repressed, but then recovered, their memories of CSA. Moreover, because CSA is supposedly linked to dissociative coping mechanisms (e.g., Terr, 1991), even continuous memory participants should score higher than comparison participants on the DES, but not as high as recovered memory participants.

Consistent with experiments on nonclinical participants showing that elevated DES scores predict memory distortion (e.g., Heaps & Nash, 1999), the false memory perspective predicts that recovered memory participants should score higher on the DES than should either continuous memory or comparison participants, who should not differ on measures of dissociation. The false memory perspective, however, makes no clear prediction about repressed memory participants. On the one hand, it seemingly implies that these individuals are poised to recover "false" memories of abuse, and thus they should score high on the DES. On the other hand, they have not (yet, perhaps) recovered these allegedly false memories, and thus their DES scores may not be elevated.

Thus, in addition to characterizing the personality profiles of women reporting repressed, recovered, and continuous memories of CSA, we tested the aforementioned predictions about absorption and dissociation derived from the recovered memory and false memory perspectives.

Method

Participants

Individuals reporting continuous memories of CSA were recruited from among volunteers who had participated in previous studies done by our group (e.g., Orr et al., 1998; Shin et al., 1999). Individuals qualifying for the other groups had responded to newspaper notices that requested

adult, female volunteers who either 1) feel they may have been sexually abused as children, but are not sure, or 2) have recovered memories of having been sexually abused as children, or 3) have no history of sexual abuse as children, to participate in a study on memory.

The second author confirmed individuals' group assignments on the basis of their responses during an interview that yielded details about either the basis for the participant's suspicion that she had been abused or about the circumstances surrounding recovery of the memory.

If a participant reported recovering CSA memories, she was assigned to the recovered memory group regardless of whether she believed she harbored additional repressed memories or whether she reported other CSA events that she had never forgotten. If a participant reported believing that she harbored repressed memories of CSA, she was assigned to the repressed memory group regardless of whether she reported other CSA memories she had always remembered. If a participant reported only continuous memories of CSA, she was assigned to the continuous memory

group. Therefore, reports of recovered memories trumped repressed memories, and reports of repressed memories trumped continuous memories.

After we completely described the study to the participants, we obtained written informed consent. They were paid for their participation.

Repressed memory group. The repressed memory group comprised 25 women ranging from 18 to 68 years of age ($M = 39.2$, $SD = 13.1$). Their mean years of education was 14.5 ($SD = 1.8$). As evidence of their repressed memories, participants cited a diversity of symptoms they thought were caused by CSA (e.g., relationship problems, depressed mood, substance abuse, or feeling inexplicably tense in the presence of certain family members). Eight participants had acquired a belief in their repressed memories during the course of psychotherapy, and 3 mentioned other episodes of CSA they had always remembered.

Recovered memory group. The recovered memory group comprised 28 women ranging from 20 to 56 years of age ($M = 41.0$, $SD = 9.8$). Their mean years of education was 14.6 ($SD = 2.1$). Fourteen participants mentioned that they had recovered their CSA memories during psychotherapy, but only 1 participant recovered her memory in session. One participant thought she harbored additional, repressed memories of CSA, and another participant mentioned other CSA events she had always remembered.

Continuous memory group. The continuous memory group comprised 15 women ranging from 32 to 72 years of age ($M = 49.4$, $SD = 14.8$). Their mean years of education was 14.1 ($SD = 2.2$). These participants had always remembered their CSA, and 12 had consented to having their memories corroborated by an informant.

Comparison group. The comparison group comprised 24 women ranging from 23 to 62 years of age ($M = 38.4$, $SD = 10.3$). Their mean years of education was 15.3 ($SD = 2.0$). These participants denied having been exposed to CSA.

According to analyses of variance (ANOVAs), the groups differed in age, $F(3, 88) = 3.11$, $p < .03$, but not in years of education, $F(3, 88) = 1.19$, $p = .32$. Post hoc contrasts (least-significant differences method) indicated that the comparison group was younger than the continuous memory group ($p < .05$).

Questionnaires

Participants completed the MPQ (Tellegen, 1982), a psychometrically sound instrument for assessing normal personality variation. It yields measures of three higher order personality traits (Negative Affectivity, Positive Affectivity, and Constraint) and 11 primary personality dimensions that constitute facets of the higher order constructs (Well-being, Social Potency, Achievement, Social Closeness, Stress Reaction, Alienation, Aggression, Control, Harmavoidance, Traditionalism, and Absorption).

Participants also completed the civilian version (Vreven, Gudanowski, King, & King, 1995) of the Mississippi Scale for Combat-Related Post-traumatic Stress Disorder (Keane, Caddell, & Taylor, 1988), the Beck Depression Inventory (BDI; Beck & Steer, 1987), and the DES (Bernstein & Putnam, 1986), including the pathological taxon subset of items, that are rarely endorsed except by respondents with dissociative disorders (DES-Pathological Taxon; Waller, Putnam, & Carlson, 1996).

Results

For most analyses, we used one-way ANOVAs and post hoc contrasts (least-significant difference method) to explore significant ($p < .05$) effects. For tests of specific predictions, we used one-tailed contrasts and computed effect size r for each. Degrees of freedom vary because of missing data.

Personality Scales

Mean scores for the primary personality dimensions of the MPQ are shown in Table 1. Several points warrant emphasis.

Table 1
Means and Standard Deviations for Primary Personality Dimensions of the Multidimensional Personality Questionnaire by Group

| Scale | Comparison | | Continuous | | Recovered | | Repressed | | F(3, 74) | p |
|------------------|---------------------|-----|---------------------|-----|---------------------|-----|---------------------|-----|----------|-----|
| | M | SD | M | SD | M | SD | M | SD | | |
| Wellbeing | 15.7 _a | 7.9 | 18.4 _a | 5.7 | 13.7 _{a,b} | 7.7 | 8.5 _b | 7.7 | 5.74 | .00 |
| Social Potency | 11.0 _a | 6.3 | 12.1 _a | 6.4 | 9.3 _a | 4.9 | 11.3 _a | 7.4 | 0.74 | .53 |
| Achievement | 10.1 _a | 4.2 | 12.3 _a | 3.3 | 12.2 _a | 5.0 | 11.9 _a | 4.8 | 0.96 | .42 |
| Social Closeness | 13.7 _{a,b} | 6.4 | 14.8 _a | 3.8 | 11.8 _{a,b} | 5.6 | 9.8 _b | 4.4 | 3.22 | .03 |
| Stress Reaction | 10.6 _a | 7.6 | 11.7 _a | 6.3 | 14.6 _{a,b} | 6.8 | 19.9 _b | 6.4 | 7.13 | .00 |
| Alienation | 3.1 _a | 4.4 | 2.0 _a | 3.5 | 6.0 _{a,b} | 4.7 | 7.6 _b | 5.6 | 5.38 | .00 |
| Aggression | 7.0 _a | 8.2 | 2.6 _a | 2.2 | 4.3 _a | 3.7 | 4.5 _a | 3.5 | 2.19 | .10 |
| Control | 16.5 _{a,b} | 6.3 | 18.1 _a | 3.4 | 12.4 _b | 5.9 | 14.1 _{a,b} | 5.6 | 4.06 | .00 |
| Harmavoidance | 20.4 _{a,b} | 7.6 | 21.9 _a | 4.0 | 20.5 _{a,b} | 6.5 | 16.0 _b | 6.0 | 3.11 | .03 |
| Traditionalism | 14.1 _a | 4.0 | 15.8 _a | 7.0 | 12.4 _a | 7.3 | 11.7 _a | 4.7 | 1.62 | .19 |
| Absorption | 14.1 _a | 5.4 | 14.7 _{a,b} | 7.3 | 20.4 _{b,c} | 8.5 | 22.7 _c | 4.1 | 7.71 | .00 |

Note. Means sharing a subscript do not significantly differ according to least significance difference tests ($p > .05$). Possible range of scores is as follows: Wellbeing = 0–24, Social Potency = 0–26, Achievement = 0–21, Social Closeness = 0–22, Stress Reaction = 0–26, Alienation = 0–20, Aggression = 0–20, Control = 0–24, Harmavoidance = 0–28, Traditionalism = 0–27, and Absorption = 0–34.

First, the continuous memory group did not differ from the comparison group on any of the 11 scales. There was no evidence of personality deviation in those who had always remembered their CSA.

Second, the repressed and recovered memory groups did not differ on any personality scale.

Third, relative to the comparison group, the repressed memory group attained significantly lower scores on the Wellbeing scale and higher scores on the Stress Reaction, Alienation, and Absorption scales. Moreover, the repressed memory group scored lower than the continuous memory group on the Wellbeing scale and the Social Closeness scale and higher on the Stress Reaction, Alienation, and Absorption scales.

Fourth, the recovered memory group differed from the comparison group on only the Absorption scale. The recovered memory group scored lower than the continuous memory group on the Control and Harmavoidance scales.

Means for the three higher order scales are shown in Table 2. The groups did not differ on either Positive Affectivity or Constraint. The repressed memory group, however, scored higher on Negative Affectivity than both the comparison and continuous

memory groups, but not significantly higher than the recovered memory group.

Clinical Scales

Means for the clinical scales are shown in Table 3. The continuous memory group did not differ from the comparison group on any measure, whereas the repressed memory group scored higher than both of these groups on symptoms of PTSD, dissociation, pathological dissociation, and depression. The repressed memory group reported more PTSD and depressive symptoms than the recovered memory group did. The recovered memory group reported more symptoms of PTSD, dissociation, and pathological dissociation than the comparison group did, but the recovered memory participants did not differ from the continuous group on any clinical scale.

Absorption and Dissociation

According to the false memory perspective, individuals reporting recovered memories of CSA should score higher on measures

Table 2
Means for Higher Order Personality Traits of the Multidimensional Personality Questionnaire by Group

| Scale | Comparison | | Continuous | | Recovered | | Repressed | | F(3, 74) | p |
|----------------------|--------------------|------|--------------------|------|----------------------|------|--------------------|------|----------|-----|
| | M | SD | M | SD | M | SD | M | SD | | |
| Negative Affectivity | 129.2 _a | 20.7 | 124.6 _a | 14.7 | 138.5 _{a,b} | 15.5 | 147.6 _b | 16.0 | 6.59 | .00 |
| Positive Affectivity | 145.5 _a | 12.5 | 150.6 _a | 10.2 | 145.6 _a | 16.1 | 142.8 _a | 12.3 | 0.95 | .42 |
| Constraint | 160.6 _a | 16.4 | 168.4 _a | 11.2 | 158.6 _a | 18.2 | 157.3 _a | 14.5 | 1.58 | .20 |

Note. Means sharing a subscript do not significantly differ according to least significant difference tests ($p > .05$). Possible range of scores is as follows: Negative Affectivity = 0–194, Positive Affectivity = 0–193, and Constraint = 0–203.

Table 3
Means for Clinical Scales by Group

| Scale | Comparison | | Continuous | | Recovered | | Repressed | | $F(3, 80)^a$ | p |
|-------|-------------------|------|---------------------|------|---------------------|------|--------------------|------|--------------|-----|
| | M | SD | M | SD | M | SD | M | SD | | |
| CMISS | 74.2 _a | 12.1 | 81.9 _{a,b} | 19.6 | 95.9 _b | 17.8 | 112.0 _c | 23.8 | 16.85 | .00 |
| DES | 4.6 _a | 3.9 | 7.8 _{a,b} | 10.6 | 14.7 _{b,c} | 8.2 | 19.8 _c | 16.1 | 8.94 | .00 |
| DES-T | 1.8 _a | 2.2 | 3.8 _{a,b} | 7.2 | 9.7 _{b,c} | 7.9 | 13.7 _c | 12.6 | 8.75 | .00 |
| BDI | 6.9 _a | 7.2 | 5.0 _a | 5.6 | 12.0 _a | 7.3 | 21.1 _b | 10.9 | 14.74 | .00 |

Note. Means sharing a subscript do not significantly differ according to least-significant difference tests ($p > .05$). Possible range of scores is as follows: CMISS (Civilian Mississippi Scale for Posttraumatic Stress Disorder) = 35–175, DES (Dissociative Experiences Scale) = 0–100, DES-T (Dissociative Experiences Scale—Pathological Taxon) = 0–100, BDI (Beck Depression Inventory) = 0–64.

^a Because of missing data, $df = 3, 77$ for the BDI.

of absorption (i.e., fantasy proneness or hypnotizability) than either people reporting continuous memories of CSA or those reporting no abuse history. To test this hypothesis, we applied contrast weights of 2, 1, and -1 to the Absorption scale scores of the recovered memory, continuous memory, and comparison groups, respectively. The results were strongly in accord with this hypothesis, $t(54) = 3.08, p = .003$, effect size $r = .39$.

According to the false memory perspective, recovered memory participants should score higher on the DES than should either continuous memory or comparison participants. To test this hypothesis, we applied contrast weights of 2, 1, and -1 to the DES scores of the recovered memory, continuous memory, and comparison groups, respectively. The results were strongly in accord with this hypothesis, $t(59) = 4.26, p = .001$, effect size $r = .49$.

According to the recovered memory perspective, repressed memory participants should score higher on the DES than should recovered memory participants, who, in turn, should score higher than continuous memory participants; continuous memory participants, in turn, should score higher than comparison participants. To test this hypothesis, we applied contrast weights of 3, 1, -1 , and -3 to the DES scores of the repressed memory, recovered memory, continuous memory, and comparison groups, respectively. The results were strongly in accord with this hypothesis, $t(80) = 5.18, p = .001$, effect size $r = .50$.

Discussion

The false memory perspective holds that individuals reporting recovered memories of CSA should score higher on measures of both absorption (i.e., fantasy proneness) and dissociation than should individuals reporting either continuous CSA memories or no CSA. Our data were strongly in accord with both hypotheses.

Although the recovered memory perspective makes no predictions about absorption, it does hold that repressed memory participants should score higher on measures of dissociation than should recovered memory participants who, in turn, should score higher than continuous memory participants who, in turn, should score higher than those reporting no CSA. Our data were just as strongly in accord with this hypothesis as with the hypothesis about dissociation derived from the false memory perspective.

With regard to our other findings, women who have always remembered their CSA did not differ from nonabused comparison participants on any personality or clinical measure. These data are

consistent with reviews showing that CSA does not invariably produce long-term impairment (Rind, Tromovitch, & Bauserman, 1998). Just as not all people exposed to the tubercle bacillus develop tuberculosis (Eisenberg, 1996), not all people exposed to CSA develop psychiatric symptoms.

However, both MPQ personality and clinical scales indicated that the repressed memory group was the most distressed. Especially relative to the comparison and continuous memory groups, they reported few experiences of joy and excitement (low well-being), saw themselves as betrayed and victimized (high alienation), and reported often feeling miserable, nervous, and prone to worry (stress reaction). Their BDI scores suggested depression, and they reported more PTSD symptoms than did the other groups.

One interpretation of these data is based on the effort-after-meaning hypothesis. To make sense of their distress, some individuals may come to believe that repressed memories of CSA are at the root of their difficulties. Yet another interpretation is that their distress is attributable to traumatic events they experienced, but cannot recall. Thus, although people who believe they harbor repressed memories of abuse are more psychologically distressed than people who report always having remembered their abuse, our data are equally consistent with the effort-after-meaning hypothesis and the repression hypothesis.

The recovered memory group tended to fall midway between the continuous memory group and the repressed memory group on most personality and clinical measures. They did not, however, differ significantly from the repressed memory group on any personality scale.

Most participants in the continuous memory group mentioned an informant who could corroborate their abuse history. Unfortunately, this was not the case with the other groups. Thus, we were unable to determine whether the recovered (let alone repressed) memories were false or genuine. The recovered memory group may have included individuals with false as well as genuine CSA memories. Likewise, it was impossible to determine whether members of the repressed memory group were correct in assuming that they had been abused.

Given this limitation, what conclusions can be drawn from this study? First, people reporting continuous, recovered, or repressed memories clearly differ on personality and clinical measures. Those who have never forgotten their abuse were indistinguishable from those who were never abused, whereas those who believe

they harbor repressed memories of CSA were the most distressed of all. Second, the absorption data were consistent with the false memory hypothesis. Third, the dissociation data were equally consistent with both the false memory and recovered memory perspectives. Having a history of CSA, however, is not invariably linked to heightened dissociation, as evinced by the low scores of the continuous memory group.

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