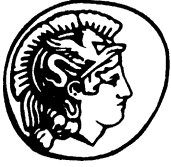

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Children with reported histories of sexual abuse: utilizing multiple perspectives to understand clinical and psychosocial profiles☆

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Abstract

Objective: The current study examines multiple empirically based perspectives (i.e., child, caregiver, and clinician) of behavior and functioning as they contribute to the clinical and psychosocial profile of children (aged 5 to 17.5 years) with reported histories of sexual abuse.
Method: A large, multi-site data set of children referred into Comprehensive Community Mental Health Services both with and without reported histories of sexual abuse, was examined. Seven hundred and fifty-nine children with a reported history of sexual abuse were compared to 2722 without such a history on caregiver and child reported behavior, clinician rated functioning, diagnosis, demographic variables, and life challenges.
Results: The multiple perspectives contributed unique and specific information to regression models: caregiver-reported behavior contributed information about externalizing behavior while child-reported behavior added information about internalizing behavior and clinician ratings about self-harmful behavior. Children with reported histories of sexual abuse were also more likely to be female, Caucasian,

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and have reported histories of life challenges (e.g., physical abuse, substance use, running away). Child sexual abuse was associated with higher rates of depression and anxiety diagnoses, and lower rates of substance abuse, conduct, and attention deficit disorder diagnoses.
Conclusions: The findings indicate that the profile of children entering into Comprehensive Community Mental Health Services with reported histories of sexual abuse, as compared to those without such histories, is complex and best understood via multiple perspectives. Caregiver, child and clinician rated information, when taken together, provide a comprehensive clinical and psychosocial profile around which to plan and implement individualized service plans.
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Introduction

Child sexual abuse is a prevalent and debilitating event. Recent state statistics indicate a 1999 prevalence of 1.3/1000 for children 18 years and younger (Department of Health and Human Services [DHHS], 1999). Females are more than two times more likely to have reported sexual abuse than males (DHHS, 1999), and a review of epidemiologic studies estimated the lifetime prevalence of child sexual abuse for males to be 16% and for females, 27% (Finkelhor, 1994). The current study compares multiple perspectives on the behavior and functioning of self-reported sexually abused children against children without reported abuse in a large, multi-site clinically referred sample of children and youth.

Greater rates of mental health referral and utilization have been reported for sexually abused as compared to non-abused children (Frothingham, Hobbs, Wynne, Yee, Goyal, & Wadsworth, 2000). Though not all children display emotional disturbance as the result of sexual abuse (Calam, Horne, Glasgow, & Cox, 1998), the experience of sexual abuse has been linked to a variety of specific clinical problems for the affected child (for a review of the literature and meta-analysis see Kendall-Tackett, Meyer-Williams, & Finkelhor, 1993; Rind, Bauserman, & Tromovitch, 1997, respectively).

While it is not surprising that the experience of child sexual abuse is associated with higher rates of mental health and behavioral problems, how the characteristics of these abused children compare to children without a history of sexual abuse in a clinical population may be of particular interest for service providers. If clinicians are to plan, case-manage and provide effective services for children with sexual abuse histories, identifying the comprehensive psychosocial profiles of these children is crucial. Consistent with the multiaxial empirically-based orientation to assessment (Achenbach, 1992; Achenbach & Edelbrock, 1984), these profiles must integrate information (e.g., demographic, diagnostic and psychosocial) from various informants collected via interview and standardized assessment. Given that sensitivity, confidentiality, and willingness-to-disclose are exceptional concerns for children and families with histories of child sexual abuse, considering multiple perspectives (i.e., caregiver, child and clinician) is fundamental in situations of child sexual abuse where the various reporting parties may uniquely contribute to the overall assessment of the child's needs.

Previous studies have used data from multiple respondents to illuminate behavioral challenges specific to children with histories of sexual abuse. Comparisons of children from clinical samples of sexually abused children with children from non-clinical samples indicate elevated behavior problems reported by the caregiver and child reported, notably externalizing behavior problems as reported by the caregiver and internalizing behavior problems as reported by the child (Cosentino, Meyer-Bahlburg, Alpert, Weinberg, & Gaines, 1995; Dubowitz, Black, Harrington, & Verschoore, 1993; Hibbard & Hartman, 1992), while comparisons with children from non-abused clinical samples (i.e., children referred for mental health service for reasons other than sexual abuse) have yielded more equivocal results (Cohen & Mannarino, 1988; Cosentino et al., 1995; Friedrich, Beilke, & Urquiza, 1988; Mannarino, Cohen, & Gregor, 1989). The equivocal findings may be due to small samples of children with sexual abuse histories or the different sample sources used in the different studies (e.g., abuse specialty clinics, institutionalized populations, and children seen in outpatient service settings). While the relationships between standardized caregiver, child and clinician-reported behavior in sexually abused populations have been previously investigated for their association with child abuse severity ratings (McGee, Wolfe, Yuen, Wilson, & Carnochan, 1995), these relationships have yet to be explored simultaneously, as they have in other populations (e.g., emotionally and behaviorally disturbed and learning disabled, McConaughy & Achenbach, 1996), to identify their unique contributions to the clinical and psychosocial profile of children with reported histories of sexual abuse as compared to those without.

The current study uses data from the national evaluation of the Comprehensive Community Mental Health Services for Children and Their Families Program, funded through the Child, Adolescent and Family Branch of the Center for Mental Health Services (CMHS) of the federal Substance Abuse and Mental Health Services Administration. CMHS has awarded 67 competitive 5-year grants across the country to develop multi-agency, family driven, community-based mental health service systems that provide least restrictive, accessible, individualized, and culturally appropriate services to children with serious emotional disturbance and their families (Center for Mental Health Services, 1997, 1998, 1999, 2000). Since a substantial percentage of these children have reported sexual abuse histories, we sought to expand the child sexual abuse literature using data from the national evaluation. This provides an opportunity to understand, in a large national multi-site clinical sample, the specific challenges and characteristics of children who have reported sexual abuse histories as compared to those who have not. This investigation replicates and expands upon earlier research, with its primary purpose to investigate reports by multiple respondents, of behavior and functioning, in an attempt to identify their unique contributions to the clinical profile of children who report histories of sexual abuse.

Methods

Data source

To date over 50,000 children and their families have received services through the Comprehensive Community Mental Health Services for Children and Their Families Program. The

congressionally mandated national evaluation began in 1994 to gather descriptive and longitudinal outcome data on children served by these Comprehensive Community Mental Health Service Programs, investigate the experience of children and families with the care received, and assess the development of the systems-of-care over time. The current study uses information collected during the baseline assessment for children and their families who participated in the outcome study. These data were collected between 1994 and 1999 from 28 communities in 22 sites funded in 1993 and 1994.

A detailed description of the national evaluation protocol and data collection procedures is described elsewhere (Center for Mental Health Services, 1997, 1998; Holden, Friedman, & Santiago, 2001). In brief, children and families participating in the national evaluation were recruited from geographically diverse settings funded across the United States. Enrollment and data collection procedures were established nationally; however, due to the uniqueness of each funded community, aspects of the evaluation were customized to meet site-specific needs (e.g., data collection strategies, the administration of additional site-level measures).

Sample selection

Study participants were selected from children and families participating in the longitudinal outcome study component of the national evaluation. Outcome study criteria included that the child was between 5 and 17.5 years of age at the time of referral to service and had no siblings enrolled in the evaluation, and that the caregivers had consented to their own and child's participation in the study. Additional criteria for inclusion in the current study sample included complete data on all variables of interest: (1) gender; (2) age; (3) race/ethnicity; (4) primary diagnosis; (5) a history indicating whether or not the child had been sexually abused; (6) challenging individual life experiences (e.g., psychiatric hospitalization, running away, reported history of drug/alcohol abuse); and (7) scores on the Child and Adolescent Functional Assessment Scale (CAFAS) (Hodges, 1994), the Child Behavior Checklist (CBCL) (Achenbach, 1991a), and for youth 11 years or older, on the Youth Self Report (YSR) (Achenbach, 1991b).

The national evaluation baseline dataset includes 43,346 children who were served by the communities funded in 1993 and 1994. Of these children, 25,007 participated only in the descriptive study while 14,860 participated in the outcome study (which incorporated and expanded upon variables collected in the descriptive study). Using the sample selection criteria listed above, 3479 children, aged 5 to 17.5 years. Children are referred into Comprehensive Community Mental Health Services from multiple public and private sources. In the current study sample children were referred from mental health professionals (23.8%), educational professionals (19.6%), a family member (17.2%), child welfare professionals (15.2%), juvenile justice professionals (10.9%) and other sources (13.2%). The study sample ($N = 3479$) was slightly younger on average ($M = 11.60$, $SD = 3.4$) and contained a larger percentage of Caucasians, African Americans, and males than both the descriptive and outcome study samples (see Table 1). Diagnoses for the three groups were similar, with the most notable difference being that a larger percentage of the children in the study sample had diagnoses of conduct-related, attention deficit, learning and developmental disorders and a smaller percentage had a deferred diagnosis. While these minor discrepancies in age, race and diagnoses

Table 1
Current study sample versus remaining outcome sample and descriptive study sample

	Current study sample ($N = 3479$)	Outcome study sample (but NOT in current study sample) ($N = 14,860$)	Cross sectional descriptive study sample ($N = 25,007$)
Demographic characteristics			
Age at referral	$M = 11.60$ ($SD = 3.40$)	$M = 11.97$ ($SD = 3.92$)	$M = 12.35$ ($SD = 4.19$)
Missing	0%	15.8%	7.1%
Gender			
Male	65.6%	54.8%	55.6%
Missing	0%	15.8%	6.7%
Race/ethnicity			
Caucasian	64.1%	43.3%	46.7%
Hispanic	10.1%	17.4%	25.1%
African American	16.9%	14.1%	11.0%
Other	7.8%	5.4%	4.4%
Missing	0%	19.9%	12.9%
Psychosocial characteristics			
Functioning and behavior			
CAFAS: total score	$M = 61.03$ ($SD = 26.28$)	$M = 65.34$ ($SD = 28.74$)	NA
Missing	0%	11.2%	
CBCL: total problems	$M = 68.17$ ($SD = 10.33$)	$M = 67.11$ ($SD = 11.43$)	NA
Missing	0%	40.9%	
YSR: total problems	$M = 58.98$ ($SD = 11.85$)	$M = 58.88$ ($SD = 11.80$)	NA
Missing	0%	62.2%	
Primary diagnosis			
Conduct-related	33.3%	22.4%	22.4%
Depression	18.7%	17.2%	23.2%
ADHD	24.6%	11.4%	8.2%
Anxiety	8.4%	6.7%	5.7%
Adjustment	5.9%	3.0%	6.2%
Substance use	1.6%	1.2%	1.7%
Psychosis	1.5%	1.2%	1.7%
Personality disorder	.6%	.2%	.3%
Developmental	2.0%	1.4%	.9%
Learning disability	1.0%	.6%	.5%
Abuse/neglect	.6%	.3%	.2%
Other	1.6%	.9%	1.0%
Diagnosis deferred	.4%	1.6%	11.5%
Missing	.0%	32.0%	16.6%

may in some way be related to a reported history of sexual abuse, it is not likely. Given that there were no differences between the study sample and the remaining outcome sample on the primary measures of interest (i.e., caregiver, child and clinician reports of behavior and functioning) the missing data are more likely related to site-specific data collection protocol than to history of sexual abuse.

Measures and indicators

Reported history of sexual abuse. Reported lifetime history of child sexual abuse was identified at baseline. The child or caregiver provided information in response to a dichotomous question (yes/no) about past sexual abuse. No information was available as to whether it was the child or the caregiver that provided the information, whether there was disagreement between the two, or if the report of sexual abuse was substantiated. In an attempt to provide evidence of validity for the reported history of sexual abuse categories reason for referral into service was investigated. As expected, a higher percentage of the children with a reported of history of sexual abuse were referred to services primarily for reasons of sexual assault or sexually acting out (e.g., behaviors potentially associated with a history of sexual abuse) when compared to youth without reported histories (11% vs. 1%, respectively).

Demographic information. Information on age, race/ethnicity and gender were collected either directly from the caregiver during an intake assessment or through clinical record. For the purpose of this study, age and gender were collapsed into a single four-category variable (females under 11 years, females 11 years and older, males under 11 years, and males 11 years or older). Age was included in the model as continuous, as well as categorical. Treating the variable as continuous did not offer a qualitatively different impression of risk trends, so age was dichotomized to improve cell stability. Eleven years of age was selected as the cut-off based on the age range of appropriate responders for the Youth Self Report (YSR). By doing so, statistical comparisons with and without YSR scores are of comparable samples.

Behavior and functioning. Behavior was assessed using the Child Behavior Checklist (CBCL) and the Youth Self-Report (YSR) (Achenbach, 1991a, 1991b). The CBCL and YSR are two of the most recognized instruments used to assess problem behavior from the caregiver and child perspective, respectively. The YSR is appropriate for children aged 11 years and older. The reliability and validity of the CBCL and YSR have been adequately demonstrated (Achenbach, 1991a), and both yield Competency scale scores, Total Problem Behavior scores, nine syndrome scales (Withdrawn, Somatic Complaints, Anxious/Depressed, Social Problems, Thought Problems, Attention Problems, Delinquent Behavior, Aggressive Behavior, and Sex Problems) and subscale scores for Externalizing and Internalizing problems (Achenbach, 1991a, 1991b). CBCL and YSR truncated *T*-scores range from 50 to 100, with higher scores indicating increased behavior problems. Achenbach (1991a, 1991b) uses a *T*-score of 63 to demarcate the clinical cut-off for the CBCL and YSR Total, Internalizing and Externalizing problem scores, and a *T*-score of 70 to demarcate the clinical cut-off for syndrome scale scores. Because of the multiple variables included in the models, CBCL and YSR scores were categorized according to the developing author's guidelines to ensure stability. Variables were first regressed as categorical and then as dichotomous. As the multiple category definitions did not add additional information about associations with the report of sexual abuse, dichotomous variables were chosen for parsimony. Dichotomous (clinical/non-clinical range) variables were created for eight of the nine syndrome scales, the Total Problem score and Internalizing/Externalizing subscale scores on the CBCL and YSR. The Sex Problems syndrome scale is only assessed via the CBCL for children 11 years and younger and does not lend itself

to the scoring protocol used for the other eight syndrome, and therefore was excluded from the analyses.

Functioning was assessed using the Child and Adolescent Functional Assessment Scale (CAFAS). The CAFAS is a scale used by a clinician to rate level of functional impairment across five life domains: role performance (home, community, and school), behavior towards others, mood and emotions (moods and self-harmful behavior), substance use or abuse, and thinking (Hodges, 1994). Acceptable reliability and validity of this scale have been documented (Hodges, Doucette-Gates, & Kim, 2000; Hodges & Wong, 1996, 1997). The CAFAS was completed either by trained clinicians or independent interviewers who had undergone the structured training recommended by the developing author (Hodges, 1997). Each life domain was scored as 0 (minimal impairment), 10 (mild impairment), 20 (moderate impairment) or 30 (severe impairment) (Hodges, 1997). The five-category total score ranges from 0 to 150, with a higher score indicating greater impairment. Interpretation guidelines for the total score suggest mild impairment for total scores up to and including 30; moderate impairment for scores 40–60; marked impairment for scores 70–80 and severe impairment for total scores of 90 and higher (Hodges, 1997). As with the CBCL and YSR, CAFAS scores were categorized to ensure cell stability. Scores were operationalized both categorically (per the developing author's guidelines) and as a dichotomous variable. Because the four-category definition did not add additional information to the model, the simpler dichotomous variable was chosen. Dichotomous (high impairment/low impairment) variables were created for each of the eight subscales (scores of 20 or higher) and the five category total score (scores of 40 and above).

Primary diagnoses. Primary diagnoses were assessed according to the *Diagnostic and Statistical Manual of Mental Disorders*, Fourth Edition (American Psychiatric Association, 1994). Diagnoses were made by clinical personnel in the referring agency or within the Comprehensive Community Mental Health Service system and were obtained from either management information systems or chart review. For the purpose of this study, primary diagnoses were recoded into twelve dichotomous (yes/no) variables, one for each of twelve diagnostic categories: personality, learning disability, abuse/neglect, anxiety, substance abuse, adjustment, conduct, attention deficit (ADHD), developmental, psychosis, depression, other, or diagnosis deferred.

Life challenging experiences. Life challenging experiences are historical factors that may be independent from serious emotional disturbance or may be related to serious emotional disturbance. These experiences included reported history of physical abuse, substance abuse, psychiatric hospitalization, running away, suicide, sexually abusing another individual, and having a sibling in foster care placement. The child or caregiver, as a function of who was present at the intake interview, provided this information in response to dichotomous (yes/no) questions for each item.

Data analysis

After preliminary descriptive analyses, two backward step-wise multiple logistic regressions were performed to identify behavior and functioning correlates of reported child sexual abuse,

controlling for demographic and life challenges. A report of sexual abuse history (yes/no) was the dependent variable, with demographic characteristics (i.e., gender/age, race) controlled. The first regression included all subjects and entered all CAFAS and CBCL subscales as well as life challenge variables. The second regression included all factors entered in the first regression with an additional inclusion of YSR subscale measurements for children 11 years and older (based upon age requirements for completion of the YSR). Multicollinearity between included variables was tested using variance inflation factors (VIFs), based on a cut-off of 10 for high collinearity (StataCorp, 1999). Due to high collinearity between some diagnostic categories (e.g., ADHD and conduct disorder), psychological diagnoses were excluded from logistic regression analyses. Variables retained in each final multiple logistic model were based upon *Z* tests with a $p = .05$ cut-off point.

Results

Descriptive analyses

Twenty-two percent ($n = 759$) of the children in the current study sample reported a lifetime history of child sexual abuse. Descriptive statistics and bivariate odds ratios were performed for all variables by reported history of sexual abuse with the exception three diagnostic categories (substance abuse, abuse/neglect, diagnosis deferred). These diagnostic categories had unstable cell sizes (i.e., $n < 5$) and were therefore not included in the analyses (see Table 2).

As indicated, children with reported histories of sexual abuse were significantly more likely to be females and of Hispanic, Caucasian, or other race/ethnic origin. In addition, they were significantly more likely to report lifetime challenges (e.g., physical abuse, runaway attempts, suicide attempts, drug and alcohol use) and were significantly less likely to have a diagnosis of conduct disorder or ADHD and more likely to have a diagnosis of depression or anxiety. These children were more likely to be rated by clinicians as moderately/severely impaired on the CAFAS in areas of home and community role performance, behavior toward others, moods and emotions, self-harmful behavior and thinking, and less likely to be rated as moderately/severely impaired on the school role performance domain. Caregivers were significantly more likely to rate the behavior of children with reported sexual abuse histories in the clinical range on CBCL variables, while children with such reported histories were more likely to rate themselves in the clinical range on the anxious, aggressive, internalizing, externalizing and total problem scales.

Logistic regression

Logistic regressions were performed to understand the unique contribution of multiple rating perspectives to the profile of children with reported histories of sexual abuse. The first backward stepwise logistic regression ($n = 3370$) included the clinicians' reports of functioning (all subscales of the CAFAS) and the caregivers' reports of behavior (syndrome scales of the CBCL). Statistically significant variables were retained (see Table 3 for Odds Ratios). Lifetime challenges, age, race, and gender were forced into the model (Pseudo $R^2 = .25$;

Table 2
Demographic and psychosocial characteristics of children by reported sexual abuse history ($N = 3479$)

	Reported history of sexual abuse, % ($N = 759$)	No reported history of sexual abuse, % ($N = 2720$)	Odds Ratios for reported history of sexual abuse OR (*SE*)
Demographic characteristics			
Gender/age			
Males 11 years and older	24.2	41.5	Reference
Females 11 years and older	40.4	19.7	3.50 (.37)***
Male under 11 years	21.1	29.7	1.21 (.14)
Females under 11 years	14.2	9.0	2.69 (.38)***
Race/ethnicity			
African American	9.4	19.0	Reference
Caucasian	73.6	61.4	2.43 (.33)***
Hispanic	7.9	10.7	1.50 (.28)**
Other	9.1	8.9	2.07 (.39)***
Psychosocial characteristics			
Primary diagnosis			
Conduct-related	27.0	35.0	.69 (.06)***
Depression	22.9	17.5	1.41 (.14)***
ADHD	17.4	26.7	.58 (.06)**
Anxiety	17.7	5.8	3.50 (.44)***
Adjustment	6.2	5.8	1.08 (.18)
Substance use	.4	1.9	Not calculated[a]
Psychosis	1.7	1.5	1.17 (.38)
Personality disorder	.8	.5	1.54 (.75)
Developmental	1.7	2.1	.80 (.25)
Learning disability	.7	1.1	.62 (.30)
Abuse/neglect	1.7	.1	Not calculated[a]
Other	1.7	1.6	1.06 (.34)
Diagnosis deferred	.1	.5	Not calculated[a]
Life challenges			
Hx of psych hospitalization	36.0	21.0	2.12 (.19)***
Hx of physically abused	61.0	20.3	6.16 (.54)***
Previous runaway attempts	34.4	19.0	2.23 (.20)***
Hx suicide attempts	24.9	12.0	2.43 (.25)***
Hx of drug/alcohol use	26.9	17.1	1.78 (.17)***
Hx of sexual abusiveness	19.0	2.8	8.04 (1.19)***
Sibling in foster care	29.0	13.8	2.54 (.25)***
Functional impairment[b]			
School/work	58.1	64.60	.77 (.07)**
Home	62.7	55.00	1.38 (.12)***
Community	29.5	24.20	1.31 (.12)**
Behavior toward others	65.7	56.60	1.47 (.13)***
Moods/emotions	58.5	46.50	1.63 (.14)***
Self-harmful behavior	28.1	16.30	2.01 (.19)***
Substance abuse	11.1	9.60	1.17 (.16)
Thinking	15.3	12.00	1.33 (.16)*
Overall impairment (total score)	87.1	82.50	1.43 (.17)**

Table 2 (*Continued*)

	Reported history of sexual abuse, % ($N = 759$)	No reported history of sexual abuse, % ($N = 2720$)	Odds Ratios for reported history of sexual abuse OR (*SE*)
Caregiver rating of behavior problems[c]			
Withdrawn	33.1	26.6	1.36 (.12)***
Somatic	24.1	19.5	1.31 (.13)**
Anxious/depressed	36.5	29.7	1.36 (.12)***
Social problems	35.2	29.0	1.33 (.12)***
Thought problems	38.9	30.1	1.47 (.13)***
Attention problems	42.6	37.8	1.22 (.10)*
Delinquency	55.3	41.6	1.74 (.14)***
Aggression problems	48.1	42.6	1.25 (.10)**
Internalizing subscale	59.6	52.2	1.34 (.11)***
Externalizing subscale	73.5	66.3	1.41 (.13)***
Overall impairment (total problems)	58.9	48.6	1.40 (.13)***
Child rating of behavior problems[c]			
Withdrawn	3.6	3.8	.91 (.20)
Somatic	7.5	5.4	1.38 (.24)
Anxious/depressed	9.7	5.5	1.91 (.30)***
Social problems	9.1	7.3	1.27 (.20)
Thought problems	5.5	5.0	1.16 (.22)
Attention problems	10.0	8.4	1.19 (.18)
Delinquency	12.6	10.3	1.25 (.17)
Aggression problems	14.2	9.0	1.70 (.23)***
Internalizing subscale	18.7	12.5	1.71 (.21)***
Externalizing subscale	25.7	20.2	1.40 (.16)**
Overall impairment (total problems)	25.8	17.3	1.87 (.22)***

[a] Bivariate odds ratios not calculated due to cell sizes <5.

[b] Results show percentages of children rated as 20 or higher on the subscales and 40 or higher on the total score of the CAFAS.

[c] Results show percentages of children in the clinical range on the CBCL and YSR.

* $p < .05$ for individual coefficients based on Z tests.

** $p < .01$ for individual coefficients based on Z tests.

*** $p < .001$ for individual coefficients based on Z tests.

log likelihood = −1318.53; Hosmer-Lemeshow goodness-of-fit $\chi^2 = 4.47$; mean VIF = 1.33). Using males 11 years of age and older as a reference, females were more than 4 times as likely to have a reported history of sexual abuse and males under the age of 11 were 70% more likely to have a reported history of sexual abuse. Additional differences in demographics and life challenges are listed in Table 3. Three CAFAS scales and one CBCL syndrome scale were retained. Children who reported being sexually abused were 33% more likely to be rated as moderately/severely impaired on the self-harm scale, 31% more likely on the behavior toward others scale, and less likely to have functional impairment on the school role performance scale, while children with sexual abuse reported histories were more likely to have clinically significant social problems from caregiver ratings on the CBCL.

Table 3
Predictive factors for reported history of sexual abuse child reports of behavior and functioning

	Analysis 1: ($N = 3370$) Odds Ratios (*SE*)	Analysis 2: ($N = 1733$) Odds Ratios (*SE*)
Demographic characteristics		
Gender/age		
Females under 11 years	4.54 (.80)***	Not included
Females 11 years and older	4.52 (.60)***	4.46 (.69)***
Males under 11 years	1.70 (.25)***	Not included
Males 11 years and older	Reference	Reference
Race/ethnicity		
Caucasian	2.28 (.37)***	1.76 (.38)**
Other	1.93 (.43)**	1.25 (.40)
Hispanic	1.26 (.29)	1.09 (.32)
African American	Reference	Reference
Pychosocial characteristics		
Life challenges		
Hx of sexually abusiveness	7.33 (1.32)***	6.64 (1.69)***
Hx of physically abused	5.29 (.54)***	5.26 (.76)***
Sibling in foster care	1.52 (.19)***	1.53 (.26)*
Hx of Psych hospitalization	1.47 (.18)***	1.52 (.25)**
Previous runaway attempts	1.29 (.16)*	1.32 (.21)
Hx of drug/alcohol use	1.23 (.17)	1.24 (.21)
Hx of suicide attempts	1.13 (.17)	1.07 (.20)
Functional impairment[a]		
Self Harmful behavior	1.33 (.17)*	1.44 (.25)*
Behavior towards others	1.31 (.14)*	Not retained
School/work	.72 (.08)**	.72 (.11)*
Caregiver rating of behavior[b]		
Social problems	1.25 (.14)*	1.63 (.28)**
Delinquency	Not retained	1.41 (.23)*
Aggression problems	Not retained	.72 (.12)*
Child rating of behavior[b]		
Somatic		1.60 (.37)*
Aggression problems		1.51 (.29)*
Delinquency		.68 (.13)*
Withdraw		.56 (.16)*

[a] Results show percentages of children rated as 20 or higher on the subscales and 40 or higher on the total score.
[b] Results show percentages of children in the clinical range.
* $p < .05$ for individual coefficients based on *Z* tests.
** $p < .01$ for individual coefficients based on *Z* tests.
*** $p < .001$ for individual coefficients based on *Z* tests.

The second stepwise logistic analysis included children 11 years and older ($n = 1733$) and entered clinician's reports of functioning (CAFAS subscales), caregiver's reports of behavior (CBCL syndrome scales), and children's reports of behavior (YSR syndrome scales). Only those variables that were statistically significant were retained (see Table 3 for Odds Ratios). (Pseudo $R^2 = .27$; log likelihood $= -669.32$; Hosmer-Lemeshow goodness-of-fit $\chi^2 = 5.12$;

mean VIF = 1.31.) Race, gender, and life challenges were forced into the model. Once again, females were significantly more likely to report abuse than males.

Table 3 includes additional differences in demographic characteristics and life challenges. Several subscales and syndrome scores from each of the three assessment tools were retained in the final model. Based on clinician CAFAS ratings, sexually abused children were 44% more likely to be self-harmful and less likely to have school role performance challenges when compared to children without reported abuse. Caregivers of sexually abused children were more likely to rate their children with delinquency problems and social problems, but less so with aggression. Children with reported sexual abuse, on the other hand, were less likely to rate themselves as delinquent or withdrawn when compared to children without reported abuse. They were significantly more likely, however, to indicate clinical levels of aggression and somatic problems.

Discussion

The current study is based upon a clinical sample of children referred for Comprehensive Community Mental Health Services, avoiding the potential selection bias of relying upon cases identified from specialized diagnostic or treatment clinics for sexually abused children (Beitchman, Zucker, Hood, DaCosta, & Akman, 1991; McGee et al., 1995).

The critical findings from this study indicate unique contributions of the caregiver, child, and clinician in the compilation of a comprehensive psychosocial profile at intake into services of children with reported histories of sexual abuse and therefore argue for multiaxial empirically based assessment of children with reported histories of sexual abuse. Additional findings in this large multi-site sample, replicate findings of previous research. For example, prepubescent boys were significantly more likely to report abuse than their older male peers (Holmes & Slap, 1998); and children with a reported history of sexual abuse were more likely to receive a diagnosis of anxiety or depression (Briere & Elliott, 1994; Kolko, Moser, & Weldy, 1988).

Consistent with prior research, children with reported sexual abuse histories were significantly less likely to be rated by their caregiver as aggressive (Friedrich et al., 1988), but more likely to rate themselves as aggressive. While children with reported sexual abuse histories were more likely to be rated by clinicians as self-harmful (Forbey, Ben-Porath, & Davis, 2000), they were less likely to be clinician-rated with high levels of school related functional impairment. Children in the current sample with reported histories of sexual abuse rated themselves more severely on two syndrome scales (i.e., Somatization and Aggression) as compared to children without such histories. In addition, information provided by caregivers uniquely identified differences in social problems, delinquency, and aggression for children with reported histories of sexual abuse. These differences may be a function of the fact that children were better disclosers of internalizing issues (e.g., Somatization, Anxiety, etc.) and caregivers of more overt behavior problems (e.g., Delinquency, Social Problems).

Limitations

The current study has a number of limitations. First, it is based on a cross-sectional sample and therefore no implications regarding causality are possible. Second, the child abuse variable

is a dichotomous lifetime history variable based upon a report from either the child or the caregiver, or both. Given that children may not be willing to report sexual abuse experiences and that caregivers may be (un)aware of such experiences, there may be some sexually abused children in the non-abused group, however, the percentage of youth with a reported history of sexual abuse in this sample in comparable to that found in other studies using mental health service samples (Barber, Rosenblatt, Harris, & Attkisson, 1992; Lanktree, Briere, & Zaidi, 1991). Treating child sexual abuse as a dichotomous variable also prevents the analysis of specific abuse characteristics (e.g., recency and frequency of abuse). Third, there may be differences in psychosocial profiles of children referred specifically because of sexual abuse compared to children referred for other problems but for whom sexual abuse is reported during their intake assessment. These differences minimally affect the current results given the comparatively low proportion of children referred for sexual abuse-related problems. Fourth, diagnoses were not determined using standardized instruments but rather were gathered from clinical/administrative records available in the field. Fifth, some may argue that the study sample inclusion criteria (i.e., complete data across of variables of interest) resulted in a biased sample, however, the exclusion criteria employed in this study were justified given the chosen analyses and their interpretation. In addition, these stringent data requirements have been used previously in analysis of the baseline dataset of the national evaluation (Liao, Manteuffel, Paulic, & Sondheimer 2001; Manteuffel, Stephens, & Santiago, 2002; Walrath, dosReis, et al., 2001, Walrath, Mandell, et al., 2001).

Finally, while this sample is clearly representative of children referred and accepted for Comprehensive Community Mental Health Services, the sample may differ in some way from other more traditional mental health service samples.

Clinical and research implications

Despite the limitations, these findings have important clinical implications with regard to the multiaxial, empirically based assessment of children referred to services with reported histories of sexual abuse, as compared to those without such reported histories. Child sexual abuse is one of the most delicate issues faced by service providers. Sensitivity, confidentiality, and willingness to disclose become very real points of consideration. In a child mental health service environment where effective individualized service planning and case management dominate, it is essential that the needs and challenges of referred children are fully understood. The utility of standardized reports from the child, caregiver, and clinician may be questioned in some instances, especially when attempting to alleviate the family burden associated with redundant and extensive intake assessment and paperwork. However, when faced with children who report having experienced sexual abuse, the results of the current study indicate that these three perspectives uniquely contribute to a more comprehensive clinical and psychosocial profile.

While caregivers contribute information about overt behavior problems to the clinical and psychosocial profile of children with reported sexual abuse reported histories, children contribute more internalizing problem behaviors and clinician ratings contribute information regarding self-harmful behavior. While these unique contributions may be explained by differential knowledge of, or experience with, the problem behavior (e.g., caregivers having more

knowledge of, or experience with, a child's overt behaviors and less knowledge of, or experience with, a child's internalizing behaviors) and appropriate disclosure (e.g., self-harmful behavior being more appropriately identified by a service provider), these unique contributions none-the-less provide critical information for providers of services to children who have histories of reported sexual abuse. If service providers are to plan and provide case management services for children with reported sexual abuse histories, multiple perspectives of behavior problems and ratings should be considered a necessity rather than a luxury.

Future studies may consider the qualitative analyses of individualized service plans and case management procedures informed via single versus multiple reporting perspectives; the exploration of differences in the characteristics of children with reported histories of sexual abuse referred specifically for reasons of sexual abuse versus children with histories of sexual abuse referred for other reasons; and multiaxial longitudinal behavior and functional outcomes of children as a function of reported history of sexual abuse.

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