Longitudinal Predictors of Child Sexual Abuse in a Large Community-Based Sample of South African Youth

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Abstract

Sexual abuse has severe negative impacts on children's lives, but little is known about risk factors for sexual abuse victimization in sub-Saharan Africa. This study examined prospective predictors of contact sexual abuse in a random community-based sample of children aged 10 to 17 years (N = 3,515, 56.6% female) in South Africa. Self-report questionnaires using validated scales were completed at baseline and at 1-year follow-up (96.8% retention rate). Cross-sectional and longitudinal associations between hypothesized factors and sexual abuse were examined. For girls, previous sexual abuse (odds ratio [OR] = 3.44, 95% confidence interval [CI] = [2.03, 5.60]), baseline school dropout (OR = 2.76, 95% CI = [1.00, 6.19]), and physical assault in the community (OR = 2.17, 95% CI = [1.29, 3.48]) predicted sexual abuse at follow-up. Peer social support (OR = 0.84, 95% CI = [0.74, 0.98]) acted as a protective factor. Previous contact sexual abuse was the strongest predictor of subsequent sexual abuse victimization. In addition, peer support moderated the relationship between baseline assault and subsequent sexual

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abuse. For boys, no longitudinal predictors for sexual abuse victimization were identified. These results indicate that the most vulnerable girls—those not in school and with a history of victimization—are at higher risk for sexual abuse victimization. High levels of peer support reduced the risk of sexual abuse victimization and acted as a moderator for those who had experienced physical assault within the community. Interventions to reduce school drop-out rates and revictimization may help prevent contact sexual abuse of girls in South Africa.

Background

Child sexual abuse is a global problem. It is estimated that up to 9% of girls and 3% of boys worldwide experience sexual abuse before the age of 18 (Barth, Bermetz, Heim, Trelle, & Tonia, 2013). Extensive evidence shows that sexual child abuse victimization is associated with a variety of negative outcomes. These include an increased risk for revictimization (Jewkes, Levin, Mbananga, & Bradshaw, 2002), bullying victimization (Bowes et al., 2009), mental health distress in child- and adulthood (D. Brown et al., 2009; Collings, 1995; Fincham, Altes, Stein, & Seedat, 2009), substance abuse (Morojele & Brook, 2006), unintended pregnancy (Reza et al., 2009), and increased risk of sexual abuse perpetration (Jewkes et al., 2006). In addition, child sexual abuse victimization carries an increased risk for HIV infection, particularly in areas with high HIV prevalence (Jewkes, Dunkle, Nduna, Jama, & Puren, 2010). It is therefore a major public health concern for policy makers and programmers.

Children in low-income areas of South Africa have high rates of exposure to adverse events such as community violence (Leoschut & Burton, 2006), severe poverty (Rose & Charlton, 2002), and illnesses for example HIV/ AIDS (Pillay-van Wyk et al., 2013). They are also at high risk of sexual abuse victimization (World Health Organization, 2010). In fact, a recent systematic review of child sexual abuse victimization across the world found the highest rates of victimization in South African studies (Stoltenborgh, van IJzendoorn, Euser, & Bakermans-Kranenburg, 2011). Measured prevalence rates for contact sexual abuse (unwanted kissing, intimate touching) and rape have been as high as 44% in males (Anderson & Ho-Foster, 2008) and 53% in females

(Madu & Peltzer, 2000). Prevalence rates are comparable with those measured in the Violence Against Children Studies in Malawi (The Ministry of Gender Children Disability and Social Welfare, Center for Social Research at the University of Malawi, UNICEF, & Centers for Disease Control and Prevention, 2015), Zimbabwe (Rumble et al., 2015), and Swaziland (Reza et al., 2009), and they are slightly higher than those measured in a 10-country school-based survey that only investigated coerced and forced sex (Andersson et al., 2012). These prevalence rates are higher than those measured for females in high-income countries such as the United States with a prevalence of 26.6% (Finkelhor, Shattuck, Turner, & Hamby, 2014), the United Kingdom with 18.6% (Radford, Corral, Bradley, & Fisher, 2013), and Australia with 20% (J. M. Fleming, 1997).

Emerging research suggests that a general culture of violence nurtured in the historical context of apartheid as well as substantial gender and power inequalities are two of the underlying causes for these high prevalence rates in South Africa (Jewkes & Abrahams, 2002). Although there has been extensive discussion of child sexual abuse by the media and in public debate, research on predictors of child sexual abuse in South Africa and surrounding countries has been limited. To date, studies have included cross-sectional samples of high school and university students (Anderson & Ho-Foster, 2008; Collings, 1991, 1997; King et al., 2004; Levett, 1989; Madu, 2003; Madu, Idemudia, & Jegede, 2002; Madu & Peltzer, 2000), cross-sectional, nationally representative samples of females (Breiding et al., 2011; Jewkes, Levin, et al., 2002), or case reports of children already in contact with social or health care services (Berard & Boermeester, 1999; Carey, Walker, Roussow, Seedat, & Stein, 2008; Collings, 1993, 2005). Cross-sectional studies, however, do not allow for information regarding the direction of the correlation as both risk factors and victimization are measured at the same point in time. It is therefore impossible to examine whether a factor precedes or succeeds another (Murray, Farrington, & Eisner, 2009). Studies of high school and university students may also be subject to selection bias considering that the most vulnerable youth may not attend school or qualify for university. Studies recruiting only one gender are limited in distinguishing potential gender differences in risk factors. However, all of these studies have made important contributions to creating an evidence base to aid understanding of child sexual abuse in South Africa.

A recent systematic review (Meinck, Cluver, Boyes, & Mhlongo, 2015) investigated risk factors for child abuse victimization in Africa. Household-level factors associated with sexual abuse victimization were emotional abuse and physical victimization, living in a large household, living in a non-nuclear family, and receiving a disability grant (i.e., having someone in the

household with a disability). Caregiver-level factors associated with sexual abuse victimization were domestic violence, living with a step-parent, living with a single parent, parents not living together, parental rejection, substance abuse, mental health problems, punitiveness, older parents, and low maternal education. Child-level correlates were school non-enrollment, child disability, child illness, externalizing and internalizing behaviors, knowledge of peers who had been abused, and knowledge of someone having sex with a teacher. In studies that compare genders, girls were at much higher risk for sexual abuse victimization. One study investigated and found differences in correlates between the genders. For boys, living with both a biological parent and a step-parent was associated with contact sexual abuse, whereas for girls, living arrangements were not associated with risk for sexual abuse victimization (King et al., 2004). Conflicting evidence was found regarding orphanhood status and ethnicity (Meinck, Cluver, Boyes, & Mhlongo, 2015).

All of these studies have been limited by their cross-sectional designs, however, which preclude any conclusions regarding the directionality of associations (Cook & Ware, 1983). While the systematic review (Meinck, Cluver, Boyes, & Mhlongo, 2015) did not identify poverty as a risk factor for sexual abuse victimization in children, South African research with adult populations has identified a clear link between poverty and sexual violence (Jewkes, Sen, & Garcia-Moreno, 2002). In addition, there was no conclusive evidence regarding potential protective or buffering factors for children at highest risk (Meinck, Cluver, Boyes, & Mhlongo, 2015), although having a number of older siblings, type of parental employment, and living with at least one biological parent respectively showed protective effects in one study. There is also emerging evidence from high-income countries that social support may be protective of revictimization and may act as a moderating factor (Bender, Cook, & Kaslow, 2003; Collins, 1998; Mason, Ullman, Long, Long, & Starzynski, 2009). Therefore there is an urgent need to understand longitudinal risk factors for sexual child abuse victimization of boys and girls. In addition, it is important to investigate protective factors that may buffer those risks.

The current study had four aims. First, we investigated associations between possible risk factors and sexual abuse in the cross-sectional follow-up data. Follow-up data were used for cross-sectional analysis because the sexual abuse measures allowed determination of past-year abuse. Key risk factors were identified on the basis of a systematic review (Meinck, Cluver, Boyes, & Mhlongo, 2015). Second, we investigated associations between baseline risk factors and sexual abuse a year later in a longitudinal sample of South African adolescents. Third, we aimed to establish whether these identified risk factors would also predict contact sexual abuse at follow-up if we

controlled for the potential confounders: age, province, and urban/rural location. Unlike many studies of physical and emotional abuse that control for baseline abuse, we aimed to investigate whether baseline contact sexual abuse was a predictor for contact sexual abuse at follow-up. Fourth, we examined whether protective factors found in this study would buffer the relationships between the predictors and contact sexual abuse. Based on previous findings that social support may protect against revictimization (Bender et al., 2003), we hypothesized that social support would moderate the relationship between baseline risk factors and contact sexual abuse at follow-up.

Method

Participants and Procedures

Participants. In total, 3,515 children aged 10 to 17 years (*M* age = 13.5 years, 56.7% female, 50.6% urban location) were originally recruited using door-to-door sampling between January 2010 and June 2011 in rural and urban areas with HIV prevalence higher than 30% in Mpumalanga and the Western Cape provinces, as part of a national survey on child health. Stratified random sampling of census enumeration areas was used within four health districts. Households were included in the study if a child aged between 10 and 17 years was resident. One child in each household was interviewed. When there were multiple children, one child was chosen at random. Between January 2011 and June 2012, a total of 3,401 participants (96.8% retention rate) were traced and reinterviewed.

Procedure. With the help of interviewers, children completed an anonymous, guided, 60-minute self-report questionnaire that was translated into Xhosa, Swati, Tsonga, Sepedi, and Zulu and then checked by back-translation. Participants were interviewed in a place of their choosing, that is, empty classrooms in schools or under a secluded tree to ensure privacy and confidentiality. All participants received a certificate and refreshments. Interviewers received intensive training on working with vulnerable children and administering standardized questionnaires. Confidentiality was maintained throughout the study unless participants were considered to be at risk of significant harm or if they requested help. Where this was the case, the project manager and interviewer discussed referral options with the child. Immediate referrals to local child protection or health services were made for children experiencing severe ongoing physical, sexual, or emotional abuse. Where children had experienced abuse in the past, referrals to counseling centers and HIV-testing services were made when appropriate. In total, 664 referrals were made

(Cluver et al., 2015). Participation was voluntary, and informed consent was sought from participants and caregivers in their native language. Due to low literacy levels in the sampled population group, information and consent sheets were read aloud to children and caregivers, and clarification questions were answered until participants were satisfied. All survey items were pre-piloted with vulnerable youth to investigate age-appropriateness and cultural sensitivity. Ethical approval was granted by the University of Oxford, the University of Cape Town, Provincial Departments of Health and Education, and the National Department of Social Development.

Outcome Measures

Child contact sexual abuse victimization at baseline was measured using two items created by social workers in South Africa and one item from the National Survey of HIV and Risk Behavior Amongst Young South Africans (Reproductive Health Research Unit, 2005). Local items were developed because there were no measures that had been validated in South Africa, and piloting with social workers found existing measures to be culturally inadequate. The response possibilities for all items were *binary* (0 = *no*, 1 = *yes*). *Contact sexual abuse victimization at follow-up* was measured using three items based on the Juvenile Victimization Questionnaire (Finkelhor, Hamby, Ormrod, & Turner, 2005), which were added to the baseline questions. All items were modified to fit the cultural context with help from experienced social workers and child protection non-governmental organizations (NGOs) as well as vulnerable children in South Africa (Table 1).

The items showed acceptable reliability of α = .61. However, alpha may be underestimated when there are only few items (Tavakol & Dennick, 2011). Item-rest correlations were therefore carried out. All item-rest correlations were substantially above the *r* = .30 threshold recommended (Field, 2009) and ranged between *r* = .39 and *r* = .49. "Contact sexual abuse" was defined as any unwanted touching or kissing, touching of private parts, and/or forced intercourse experienced by the child. "Lifetime contact sexual abuse" included any sexual abuse over the course of the child's lifetime and was measured at both baseline and follow-up. "Last year contact sexual abuse" included only incidents that happened in the past year and was available only at follow-up. A dichotomous variable was created for both (0 = *no sexual abuse*, 1 = *sexual abuse*).

Hypothesized Predictors of Sexual Abuse

Child physical and emotional abuse victimization was measured using five items from the UNICEF National-level Monitoring of Orphans and

Table 1. Questionnaire Items for Child Sexual Abuse Victimization.

Source	Question
Baseline	
National Survey of HIV and risk behavior	"Have you ever had sex with someone when you didn't want to because they hurt you, or you were afraid that they were going to hurt you if you didn't?"
Local social workers	Has anyone ever . . .
	1. Touched you in a way that made you feel uncomfortable?
	2. Made you do something with your private parts or their private parts that you did not want to?
Follow-up	
Juvenile Victimization Questionnaire	How often in the past year did someone . . .
	1. Touch or kiss you in a way that made you feel uncomfortable?
	2. Touch your private parts or asked you to touch their private parts even though you did not want this to happen?
	3. Force you to have sex with them in any way when you did not want to?

Vulnerable Children Measures (Snider & Dawes, 2006) based on the Parent–Child Conflict Tactics Scales (CTSPC; Straus, Hamby, Finkelhor, Moore, & Runyan, 1998). It measures hitting, spanking, invoking ghosts, insulting the child, and threatening abandonment. This measure has not been validated in South Africa generally but was used successfully in another study in the Western Cape with good reliability ($\alpha = .70$; Meinck, Cluver, Boyes, & Ndhlovu, 2015). The CTSPC has been used in multiple other countries (Leung, Wong, Chen, & Tang, 2008; UNICEF, 2010). It showed acceptable reliability in this current study ($\alpha = .69$). The frequency of abuse was measured on a 4-point scale (0 = *never*, 1 = *has happened but not in the past year*, 2 = *at least once this year*, 3 = *monthly*, 4 = *weekly*). Physical and emotional abuse items were summed, respectively, to create two total scale scores.

Physical assault in the community was measured using an item from the Child Exposure to Community Violence Checklist (Richters & Martinez, 1993). This asked children whether they had ever been attacked or hit while they were in the community (0 = *no assault*, 1 = *assault*).

School dropout and school non-attendance were measured using items devised with South African NGOs. This determined school dropout and failure to attend school for at least a week at a time. Dichotomous variables were created for school dropout (0 = *child is enrolled in school*, 1 = *child is not enrolled in school*) and school non-attendance (0 = *child is attending school regularly*, 1 = *child has missed a week or more of schooling this year*).

Domestic arguments and domestic violence were measured using two items from the UNICEF Measures for National-Level Monitoring of Orphans and Vulnerable Children (Snider & Dawes, 2006). The questions used measured incidents of domestic violence or arguments within the past week such as, "How many days in the past week were there adults hitting each other in your home?"

Positive parenting, consistent discipline, and parental monitoring were measured using relevant sub-scales from the Alabama Parenting Questionnaire–Short Form (Elgar, Waschbusch, Dadds, & Sigvaldason, 2007). Items measured parent–child interactions such as "Your carer says you have done something well." Frequency was measured using a 5-point scale (0 = *never*, 1 = *almost never*, 2 = *sometimes*, 3 = *often*, 4 = *always*). Consistent discipline and parental monitoring showed poor (α = .48-.49) internal reliability. Positive parenting showed good reliability (α = .82). Items within each sub-scale were summed to create a total sub-scale score.

Social support was measured using the standardized Social Support Scale that measured the existence of social support in each micro-system of family, church, school, and peers (0 = *no*, 1 = *yes*; Seidman et al., 1995). The quality of this relationship—using items such as, "This person is helpful when I have a personal problem"—was measured on a 3-point scale (0 = *not at all*, 1 = *sort of*, 2 = *very*). The scale was adapted to replace "father" and "mother" with "caregiver" and to include support from religious leaders. It showed good reliability in this study (α = .76). Items within each sub-scale were summed to create individual sub-scale scores for each micro-system.

Child Chronic Illness was measured using items from the Health Systems Trust South African Health Review to identify common chronic childhood diseases including epilepsy, asthma, and tuberculosis (Ijumba, Padarath, & Trust, 2006). Tuberculosis was measured using an eight-item symptom checklist derived from the World Health Organization's Practical Approach to Lung Health (Ottomani, 2005) and the South African Department of Health (Department of Health, 2007). Children with severe pulmonary tuberculosis had to have four or more of the following symptoms: fever, fatigue, weight loss, discolored sputum, and night sweats, in addition to at least two of the following symptoms: chest pains, cough, and coughing blood (Cluver, Orkin, Moshabela, Kuo, & Boyes, 2013). A dichotomous variable was coded with a child being classified as chronically ill if he or she responded yes to any of

the health questions or had severe pulmonary tuberculosis (0 = *not sick*, 1 = *sick*).

Parental mortality and orphan status were measured using a Verbal Autopsy Questionnaire (Lopman et al., 2006) as death certificates in South Africa are unreliable sources with regard to HIV/AIDS. This has been validated in South Africa against hospital records (Hosegood, Vanneste, & Timaeus, 2004). Determination of AIDS-related death required identification of three or more AIDS-defining illnesses (e.g., HIV-wasting syndrome, Kaposi's sarcoma, or oral candidiasis). Orphanhood was defined using the UN definition as loss of one or both parents (UNAIDS, 2004). Dichotomous variables were created for AIDS-orphanhood (0 = *no AIDS-orphanhood*, 1 = *yes AIDS-orphanhood*) and general orphanhood (0 = *not orphaned*, 1 = *orphaned*).

Caregiver relationship to child between the primary caregiver and child was measured using items from the National Survey of HIV and Risk Behavior Amongst Young South Africans (Reproductive Health Research Unit, 2005). The primary caregiver was defined as the person who "stays and takes care of you at home." Relationships between caregiver and child were categorized (0 = *biological father, biological mother*; 1 = *biological grandmother, biological grandfather*; 2 = *distant relatives, that is, aunts or cousins and non-biological carers*). In addition, a dichotomous variable was created for children living with least one biological caregiver (0 = *not living with biological parent*, 1 = *living with at least one biological parent*).

Household employment and household size were measured through a household map. Children drew their house, the people staying in each room, and identified any person who was in regular, part-time, or seasonal employment. Household size was measured as the total number of people living in a household. A dichotomous variable was created for employment (0 = *no household employment*, 1 = *any household employment*).

Poverty was measured using an index of access to the eight highest socially perceived necessities for children in South Africa (H. Barnes & Wright, 2012), such as soap to wash every day, which showed good reliability of α = .80 in this sample. Items were reverse scored (0 = *has access to item*, 1 = *does not have access to item*) and summed to give a total poverty score (i.e., total number of necessities lacking). An additional item from the South African National Food Consumption Survey that identified days per week without sufficient food in the household (Labadarios et al., 2003) was used as a proxy for severe poverty.

Demographic covariates like age, gender, province, rural/urban location, and receipt of a *disability grant* were measured using items modeled on the South African Census (Statistics South Africa, 2001).

Analyses

Analyses were conducted in four stages, using Stata 13. First, differences in children lost to follow-up were investigated (Table 2). Given evidence demonstrating higher and different risks for contact sexual abuse in girls (Edinburgh, Saewyc, & Levitt, 2006), all further analyses were conducted separately for boys and girls. Second, descriptive statistics were used to investigate sociodemographic characteristics of the sample and any gender differences in these characteristics (Table 3). Third, partial correlations investigating potential predictors of contact sexual abuse were conducted, adjusting for age, urban/rural location, and province. These aimed to establish whether factors associated with sexual abuse in previous research were cross-sectionally (Table 4) and prospectively (Table 5) associated with sexual abuse in this sample. Fourth, factors that were shown to be correlated with contact sexual abuse at follow-up were then entered into multivariate regressions (Table 6).

The hypothesized predictors at baseline were entered in the first step to obtain unadjusted estimates for relationships between factors measured at baseline and contact sexual abuse measured at follow-up (Unadjusted Model, Table 6). Model 1 then adjusted for potential confounders of age, province, and rural/urban location, and Model 2 further adjusted for contact sexual abuse at baseline. These models were run only for girls because of the lack of significant correlates for contact sexual abuse victimization for boys. Finally, mean-centered interaction terms were created and entered into Model 3 to test whether the significant protective factors moderated relationships between the baseline risk factors and contact sexual abuse at follow-up (Table 6).

Results

Children lost at follow-up (n = 114; Table 2) did not differ from children retained at follow-up with regard to gender (χ^2 = 0.071, p = .789), experience of assault in the community (χ^2 = 0.022, p = .881), peer social support (z = −0.917, p = .359), and contact sexual abuse (χ^2 = 0.861; p = .353). Children lost at follow-up were more likely to experience regular emotional abuse (z = 2.672, p = .008), be older (t = 2.539, p = .011), report more household unemployment (χ^2 = 4.216, p = .040), and were able to afford fewer basic necessities (t = 4.339, p < .001). However, they were also less likely to experience physical abuse (z = −7.264, p < .001), lived in smaller households (t = −2.567, p = .010) and received more teacher support (z = 2.659, p = .008). It is therefore impossible to state whether more vulnerable children were lost to follow-up, and findings should be interpreted with this in mind.

Table 2. Differences Between Children Lost and Retained at Follow-Up.

	Children Lost (n = 114) % (Number) or Rank Sum (Number) or M (SD)	Children Retained (n = 3,401) % (Number) or Rank Sum (Number) or M (SD)	Test Statistic
Female	57.89% (66)	56.63% (1,926)	$\chi^2 = 0.071$, ns
School nonattendance	6.09% (7)	4.41% (150)	$\chi^2 = 0.733$, ns
School dropout	3.48% (4)	1.61% (55)	$\chi^2 = 2.335$, ns
Contact sexual abuse	2.61% (3)	4.44% (151)	$\chi^2 = 0.861$, ns
Assault	11.30% (13)	11.76% (400)	$\chi^2 = 0.022$, ns
Household employment	67.83% (78)	76.15% (2,590)	$\chi^2 = 4.216$, $p = .040$
Sickness	11.30% (13)	12.32% (419)	$\chi^2 = 0.107$, ns
Orphan	28.70% (33)	27.34% (930)	$\chi^2 = 0.102$, ns
AIDS-orphanhood	18.26% (21)	12.94% (440)	$\chi^2 = 2.767$, ns
Living with biological caregiver	97.32% (109)	98.17% (3,327)	$\chi^2 = 0.429$, ns
Receipt of disability grant	6.09% (7)	3.79% (129)	$\chi^2 = 1.574$, ns
Age	13.947 (SD = 2.237)	13.428 (SD = 2.145)	$t = 2.539$, $p = .011$
Household size	4.664 (SD = 1.761)	5.175 (SD = 2.092)	$t = -2.567$, $p = .010$
Able to afford necessities	3.635 (SD = 2.352)	2.682 (SD = 2.314)	$t = 4.339$, $p < .001$
Peer social support	28.95% (33)	31.26% (1,063)	$z = -0.917$, ns

(continued)

Table 2. (continued)

	Children Lost (n = 114)	Children Retained (n = 3,401)	Test Statistic
	% (Number) or Rank Sum (Number) or M (SD)	% (Number) or Rank Sum (Number) or M (SD)	
Physical abuse	0% (0)	32.67% (1,111)	$z = -7.264$, $p < .001$
Emotional abuse	44.74% (51)	34.11% (1,160)	$z = 2.672$, $p = .008$
Teacher social support	55.26% (63)	42.23% (1,436)	$z = 2.659$, $p = .008$
Religious leader support	34.21% (39)	29.37% (999)	$z = 0.293$, ns
Family social support	32.46% (37)	41.37% (1,407)	$z = -1.339$, ns
Caregiver age	41.54 years (SD = 12.26)	41.93 years (SD = 11.29)	$t = -0.356$, ns
Positive parenting	36.84% (42)	44.02% (1,497)	$z = -1.522$, ns
Parental monitoring	34.21% (39)	34.93% (1,188)	$z = 0.618$, ns
Consistent discipline	44.74% 3,401 (51)	50.04% (1,702)	$z = 1.754$, ns
Domestic violence	.053 (SD = .261)	.104 (SD = .495)	$t = -1.09$, ns
Domestic arguments	.522 (SD = .985)	.643 (SD = 1.077)	$t = -1.20$, ns

Note. t tests (*t*), χ^2 tests (χ^2), and Wilcoxon–Mann–Whitney test (*z*).

Table 3. Sociodemographic Characteristics and Sexual Abuse Prevalence and Incidence.

	Baseline		Follow-Up	
	Boys	Girls	Boys	Girls
Gender	43.37% (1,475)	56.63% (1,926)	—	—
M age	13.41 years (SD = 2.10)	13.44 years (SD = 2.18)	14.63 years (SD = 2.18)	14.70 years (SD = 2.25)
Rural area	42.36% (712)	57.64% (969)	—	—
Province Mpumalanga	45.27% (746)	54.73% (902)	—	—
Orphan	41.88% (338)	58.12% (469)	40.78% (365)	59.22% (530)
AIDS-orphan	41.14% (181)	58.86% (259)	42.80% (217)	57.20% (290)
Caregiver age	42.22 years (SD = 11.46)	41.70 years (SD = 11.14)	42.84 years (SD = 10.70)	42.68 years (SD = 10.70)
Main caregiver				
Parent	44.54% (1,098)	55.46% (1,367)	44.15% (1,132)	55.85% (1,432)
Grandparent	42.24% (166)	57.75% (227)	42.94% (149)	57.06% (198)
Other	39.03% (210)	60.97% (328)	40.55% (191)	59.45% (280)
Positive parenting	11.69 (SD = 3.67)	11.64 (SD = 3.78)	11.78 (SD = 4.01)	11.88 (SD = 3.95)
Consistent discipline	4.64 (SD = 1.65)	4.92 (SD = 2.74)	5.19 (SD = 3.22)	5.21 (SD = 3.43)
Parental monitoring	2.39 (SD = 2.40)	2.09 (SD = 2.36)	2.66 (SD = 2.56)	2.28 (SD = 2.40)
Domestic Arguments	0.638 (SD = 1.05)	0.64 (SD = 1.10)	0.23 (SD = 0.77)	0.31 (SD = 0.88)
Domestic violence	0.09 (SD = 0.45)	0.11 (SD = 0.51)	0.07 (SD = 0.05)	0.11 (SD = 0.56)
Assault experience	53.25% (213)	46.75% (187)	52.39% (208)	47.61% (189)
Physical abuse	0.73 (SD = 1.16)	0.80 (SD = 1.29)	0.59 (SD = 1.00)	0.59 (SD = 1.06)
Emotional abuse	0.75 (SD = 1.42)	0.89 (SD = 1.56)	0.21 (SD = 0.77)	0.23 (SD = 0.80)
Contact sexual abuse ever	25.17% (38)	74.83% (113)	33.01% (101)	66.99% (205)

(continued)

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Table 3. (continued)

	Baseline		Follow-Up	
	Boys	Girls	Boys	Girls
Contact sexual abuse past year	—	—	30.35% (61)	69.65% (140)
School dropout	31.03% (18)	68.97% (40)	36.73% (54)	63.27% (93)
School nonattendance	45.86% (72)	54.14% (85)	46.00% (92)	54.00% (108)
Child is ill	11.66% (172)	12.82% (247)	6.95% (103)	8.18% (157)
Family support	4.87 (SD = 1.10)	4.93 (SD = 1.10)	5.18 (SD = 1.00)	5.18 (SD = 1.00)
Teacher support	4.87 (SD = 3.15)	5.29 (SD = 3.09)	5.36 (SD = 3.17)	5.41 (SD = 3.10)
Religious support	2.33 (SD = 2.49)	2.89 (SD = 2.46)	4.24 (SD = 3.84)	4.71 (SD = 3.76)
Peer support	4.03 (SD = 1.30)	4.02 (SD = 1.33)	4.44 (SD = 1.35)	4.34 (SD = 1.34)
Household employment	43.86% (1,136)	56.14% (1,454)	44.25% (1,155)	55.75% (1,455)
Disability grant	51.16% (66)	48.84% (63)	40% (24)	60% (36)
Food insecurity	0.80 (SD = 1.51)	0.89 (SD = 1.53)	0.75 (SD = 1.42)	0.94 (SD = 1.58)
Poverty	2.66 (SD = 2.31)	2.76 (SD = 2.33)	2.60 (SD = 2.29)	2.74 (SD = 2.33)
Household size	5.05 people (SD = 1.99)	5.27 people (SD = 2.16)	4.95 people (SD = 1.97)	5.15 people (SD = 2.24)

Table 4. Cross-Sectional Individual Partial Correlations Between Hypothesized Risk Factors and Contact Sexual Abuse All at Follow-Up.

	Boys		Girls	
	Partial Correlations	p value	Partial Correlations	p value
Orphanhood	−.024	.361	.037	.104
AIDS-orphanhood	−.040	.120	.065*	.004
Disability grant	−031	.235	−.009	.692
Prior assault in community	.074*	.005	.071*	.002
School dropout	−.008	.764	.030	.184
School nonattendance	−.017	.530	.019	.409
Caregiver age	−.017	.552	.022	.375
Physical abuse	.080*	.002	.13*	.001
Emotional abuse	.074*	.005	.184*	.001
Domestic arguments	.004	.089	.099*	.001
Domestic violence	.006	.832	.037	.110
Child chronic illness	.023	.250	.080*	.001
Positive parenting	−.067*	.010	−.079	.001
Consistent discipline	.063*	.017	.024	.294
Parental monitoring	.052*	.050	.054*	.018
Caregiver is biological parent or stepparent	−.005	.836	.007	.775
Family support	−.072*	.006	−.059*	.01
Peer support	−.063*	.015	−.064*	.005
Teacher support	−.076*	.003	−.029	.202
Religious leader support	−.087*	.001	−.020	.384
Household employment	−.010	.710	.012	.587
Poverty	−.029	.267	.018	.428
Food Insecurity	.062*	.017	.083*	.001
Household size	−.052*	.046	.080*	.001

*Statistically significant at $p < .05$ adjusting for age, urban/rural, province.

Sociodemographic Characteristics of the Sample

A total of 3,401 children were interviewed at both baseline and follow-up (56.6% female) and analyses are limited to this group. Mean age of children was 13.4 years at baseline and 14.7 years at follow-up; 49.4% of these children came from rural areas (Table 3). Baseline lifetime sexual abuse prevalence was 4.4% ($n = 151$). At follow-up, lifetime prevalence rate of contact sexual abuse was 9% ($n = 306$), and 5.9% of children ($n = 201$) reported past-year victimization. About 67% of sexual abuse victims were female.

Table 5. Individual Partial Correlations Between Hypothesized Risk Factors at Baseline and Child Contact Sexual Abuse at Follow-Up.

	Boys		Girls	
	Partial Correlations	*p* value	Partial Correlations	*p* value
Orphanhood	−.024	.360	.008	.733
AIDS-orphanhood	−.022	.390	.047*	.040
Caregiver age	−.045	.085	.054*	.019
Caregiver is biological parent or stepparent	−.012	.645	.008	.740
Positive parenting	−.013	.608	−.052*	.023
Consistent discipline	−.033	.209	−.008	.714
Parental monitoring	−.029	.263	.029	.210
Domestic arguments	−.017	.520	−.002	.918
Domestic violence	.018	.492	.018	.443
Assault victimization	.017	.509	.075*	.001
Sexual abuse victimization	.001	.978	.154*	.001
Physical abuse	−.004	.878	.020	.389
Emotional abuse	.001	.723	.022	.330
School dropout	.011	.661	.057*	.021
School nonattendance	−.038	.142	.039	.090
Child chronic illness	.045	.074	−.010	.670
Family support	.018	.482	−.012	.636
Peer support	−.017	.521	−.060*	.008
Teacher support	.014	.587	−.038	.097
Religious leader support	.003	.916	.018	.426
Household employment	.022	.392	−.020	.374
Disability grant	−.035	.182	−.019	.415
Poverty	−.014	.60	.040	.078
Food insecurity	.034	.191	.054*	.018
Household size	−.049	.060	.027	.244

*Statistically significant at *p* < .05 adjusting for age, urban/rural, province.

Cross-Sectional Associations

In accordance with the literature, cross-sectional partial correlations of the follow-up data, adjusting for sociodemographics, were conducted although they are not the focus of this article (Table 4). For boys, factors that positively correlated with sexual abuse were assault in the community, physical abuse, emotional abuse, food insecurity, and household size. Possible

Table 6. Multivariate Logistic Regressions of Hypothesized Risk Factors Predicting Contact Sexual Abuse in Girls ($n = 1,926$).

	Unadjusted		Model 1		Model 2		Model 3	
	OR, p value	95% CI	OR, p value	95% CI	OR, p value	95% CI	OR, p value	95% CI
AIDS-orphanhood	1.68*, p = .020	[1.09, 2.61]	1.38, p = .157	[0.88, 2.17]	1.33, p = .225	[0.84, 2.10]	1.35, p = .197	[0.85, 2.14]
Caregiver age	1.02*, p = .003	[1.01, 1.04]	1.01, p = .064	[0.99, 1.03]	1.02, p = .051	[0.99, 1.03]	1.01, p = .058	[1.00, 1.03]
Assault victimization	1.93*, p = .008	[1.19, 3.13]	2.12*, p = .003	[1.29, 3.48]	1.79*, p = .026	[1.07, 3.00]	1.70*, p = .046	[1.01, 2.87]
School dropout	2.87*, p = .018	[1.20, 6.87]	2.49*, p = .049	[1.00, 6.19]	2.16, p = .106	[0.85, 5.48]	2.05, p = .140	[0.79, 5.32]
Food insecurity	1.11*, p = .048	[1.00, 1.22]	1.09, p = .100	[0.98, 1.20]	1.07, p = .225	[0.96, 1.18]	1.06, p = .263	[0.96, 1.18]
Positive parenting	0.97, p = .346	[0.94, 1.02]	0.98, p = .282	[0.93, 1.02]	0.97, p = .229	[0.93, 1.02]	0.97, p = .258	[0.93, 1.02]
Peer support	0.85*, p = .015	[0.74, 0.96]	0.85*, p = .026	[0.74, 0.98]	0.86*, p = .039	[0.75, 0.99]	0.87, p = .056	[0.76, 1.00]
Age			1.17*, p < .001	[1.07, 1.28]	1.14*, p = .005	[1.04, 1.24]	1.14*, p = .005	[1.04, 1.24]
Province			2.24*, p < .001	[1.52, 3.30]	2.15*, p < .001	[1.45, 3.19]	2.29*, p < .001	[1.53, 3.42]
Urban/rural			1.26, p = .213	[0.88, 1.82]	1.25, p = .233	[0.87, 1.81]	1.26, p = .228	[0.87, 1.82]
Baseline contact sexual abuse					3.37*, p < .001	[2.03, 5.60]	3.43*, p < .001	[2.06, 5.71]
Peer support × Assault							0.46*, p = .009	[0.25, 0.82]
R²	.04*, p < .001		.08*, p < .001		.09*, p < .001		.10*, p = .01	
Δ in χ²			33.81		19.30		6.32	
−2 × LL	−472.87		−455.97		−446.32		−443.16	

Note. OR = odds ratio; CI = confidence interval; LL = log likelihood.
*Statistically significant at p < .05.

protective correlates were positive parenting, consistent discipline, parental monitoring, peer support, teacher support, family support, and religious leader support. For girls, factors positively associated with sexual abuse were AIDS-orphanhood, assault in the community, physical abuse, emotional abuse, domestic arguments, food insecurity, and household size. Possible protective correlates were parental monitoring, family support, and peer support.

Prospective Associations

Using partial correlations adjusted for sociodemographics, none of the hypothesized factors at baseline were significantly correlated with contact sexual abuse at follow-up for boys (Table 5), and therefore boys were excluded from further analysis. For girls, baseline AIDS-orphanhood, caregiver age, prior physical assault, prior contact sexual abuse victimization in the community, school dropout, and food insecurity were positively associated with contact sexual abuse victimization at follow-up. Positive parenting and peer support were protective factors (Table 5).

Logistic regression models were then used to test predictors before adjusting for sociodemographic variables among girls. In the unadjusted model (Table 6, Unadjusted Model), predictors of sexual abuse victimization at follow-up were baseline AIDS-orphanhood (OR = 1.68, p = .020), caregiver age (OR = 1.02, p = .003), previous assault in the community (OR = 1.93, p = .008), school dropout (OR = 2.82, p = .019), and food insecurity (OR = 1.11, p = .048). Peer support (OR = 0.85, p = .017) acted as a protective factor and positive parenting was no longer significant (OR = 0.97, p = .346). After adjusting for baseline age, province, and urban/rural location (Table 6, Model 1), predictors of sexual abuse victimization at follow-up were baseline physical assault in the community (OR = 2.12, p = .003) and school dropout (OR = 2.49, p = .049). Peer support (OR = 0.85, p = .026) continued to be a protective factor. A significant improvement in model fit was observed from the unadjusted model to Model 1, R^2 = .08, $\chi^2(3)$ = 33.81(10), p < .001.

Baseline contact sexual abuse was a strong risk factor for sexual abuse at follow-up (OR = 3.37, p < .001). When this was added to the model, physical assault in the community (OR = 1.79, p = .026) remained significantly associated with contact sexual abuse at follow-up (Table 6, Model 2). School dropout, however, was no longer a significant predictor of sexual abuse. Peer support (OR = 0.86, p = .039) also remained a protective factor. A significant improvement in model fit was observed from Model 1 to Model 2, R^2 = .09, $\chi^2(1)$ = 19.30(11), p < .001.
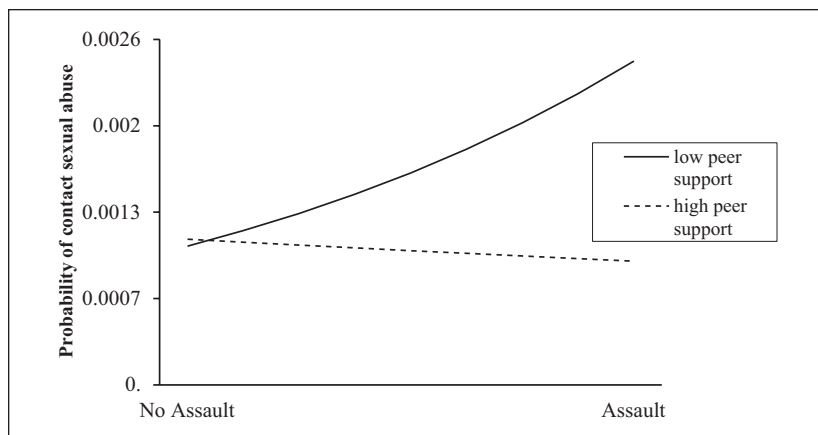
Figure 1. Two-way interaction between prior assault experience and peer support in relation to contact sexual abuse at follow-up (adapted from http://www. jeremydawson.co.uk/slopes.htm).

To determine whether peer social support moderated the relationship between baseline contact sexual abuse, physical assault in the community, and school dropout and follow-up contact sexual abuse in girls, three interaction terms were created (Baseline sexual abuse × Peer support, Baseline school dropout × Peers support, and Baseline physical assault × Peer support). These interaction terms were tested in unadjusted logistic regression models including only outcome, interaction and the two main effects of the interaction (not displayed in any of the tables). The only significant effect in the unadjusted model was the Baseline physical assault × Peer support interaction. This interaction was therefore added to the multivariate linear model (Table 6, Model 3). The Baseline physical assault × Peer support interaction term remained a significant predictor of follow-up contact sexual abuse victimization. After including the interaction term in the model, the main effects of the risk factor physical assault in the community ($OR = 1.70$, $p = .046$) continued to be significant, as did the interaction term ($OR = 0.46$, $p = .009$; Table 6). The protective factor peer support ($OR = 0.87$, $p = .056$) was no longer significant. This interaction is illustrated in Figure 1 and shows that physical assault in the community is only predictive of contact sexual abuse when peer support is low. The risk for contact sexual abuse victimization in girls with low peer support is 2.5/1,000, whereas the risk for children with high peer support is 1/1,000 (Figure 1). A significant improvement in model fit was observed from Model 2 to Model 3, $R^2 = .10$, $\chi^2(1) = 6.32(12)$, $p = .01$.

Discussion

This is the first known prospective study investigating risk and protective factors for sexual abuse in South Africa. In addition, it is the first to provide prevalence rates for contact sexual abuse in a large, community-based sample of South African children. Other available studies used samples of either high school and university students or children seeking social or health services. The only two community-based studies in the region exclusively recruited females from a much older age group (Jewkes, Levin, et al., 2002; Reza et al., 2009).

Cross-Sectional Associations

A number of hypothesized factors found to be associated with contact sexual abuse in other cross-sectional studies in Africa were also found to be cross-sectionally associated in this study (Meinck, Cluver, Boyes, & Mhlongo, 2015). For boys, these factors focused on prior or concurrent victimization such as assault in the community, poverty, and physical and emotional child abuse victimization. There were also potential protective factors for boys including parenting style, smaller household size, and social support networks such as peers, religious leaders, teachers, and family.

For girls, cross-sectional associations included general vulnerabilities such as AIDS-orphanhood, poverty, and chronic child illness. Prior or concurrent victimization, such as assault in the community, domestic arguments, and physical and emotional abuse, was also associated. Potential protective factors were parental monitoring and family and peer support. These findings correspond to evidence from a recent systematic review (Meinck, Cluver, Boyes, & Mhlongo, 2015) and add evidence on how gender affects risk factors for sexual abuse victimization. Other factors established by the systematic review such as caregiver age, child illness, orphanhood, receipt of a disability grant (disability within the home), school non-attendance, domestic violence, household employment, and caregiver relationship to child were not cross-sectionally associated in this study.

Longitudinal Associations

Unexpectedly, none of the associated factors previously identified in cross-sectional studies were confirmed in this longitudinal sample with regard to boys. This may be due to the fact that research has consistently found a higher risk for sexual victimization for girls (Pereda, Guilera, Forns, & Gómez-Benito, 2009; Stoltenborgh et al., 2011), and previous results in studies of

mixed gender were carried by the results in the female group. However, it is also possible that the number of boys reporting contact sexual abuse ($n = 64$) was too small to yield statistical power despite the large sample size. Further longitudinal research on contact sexual abuse among boys is needed before any conclusions can be drawn.

With regard to girls, AIDS-orphanhood, caregiver age, previous assault in the community, school dropout, and food insecurity were prospectively associated with contact sexual abuse at follow-up in the unadjusted model. Peer support acted as a protective factor. After adjusting for sociodemographic characteristics, school dropout and physical assault in the community measured at baseline were predictive of contact sexual abuse 1 year later. Peer support acted as a general protective factor, lowering the risk for contact sexual victimization, and it also moderated the relationship between assault and sexual abuse. The strongest predictor of contact sexual abuse at follow-up was contact sexual abuse at baseline. Even then, assault in the community remained a risk factor and peer support remained a protective factor.

These findings extend previous cross-sectional findings from southern Africa (Birdthistle et al., 2011; Breiding et al., 2011; Dunkle et al., 2004) and high-income countries such as the United Kingdom, Germany, Israel (Mansbach-Kleinfeld, Ifrah, Apter, & Farbstein, 2015), the United States (Boney-McCoy & Finkelhor, 1995; Coid et al., 2001; J. Fleming, Mullen, & Bammer, 1997; Krahé, Scheinberger-Olwig, Waizenhöfer, & Kolpin, 1999), Taiwan (Yen et al., 2008), and other low- and middle-income countries such as China (Chen, Dunne, & Han, 2004). They also extend findings from longitudinal studies in the United States and the United Kingdom (J. E. Barnes, Noll, Putnam, & Trickett, 2009; J. Brown, Cohen, Johnson, & Salzinger, 1998; Classen, Palesh, & Aggarwal, 2005). The findings demonstrate that sexual abuse victimization affects the most vulnerable South African girls: those who have already been victimized, either sexually or physically, and those who are not attending school. This study contributes to accumulating evidence that demonstrates important differences in perpetrators and predictors of different types of abuse. While risk factors for physical and emotional abuse are mainly situated within the family and household, the majority of contact sexual abuse in adolescents is perpetrated by intimate partners, peers, and more distant relatives as well as strangers (Reza et al., 2009). The risks of sexual abuse victimization also appear to be closely associated with school-level and community-level disadvantage.

There are a number of possible reasons for why baseline community assault, school dropout, previous sexual abuse victimization, and peer social support seem to be the only robust predictors over time. As in many other studies, one potential explanation is low reporting, resulting in small numbers

of children disclosing contact sexual abuse. In addition, factors that may co-occur might not necessarily retain their correlation across different points in time. This study measured past-year prevalence of sexual abuse at follow-up, and children might have not experienced certain risk factors at baseline, which they then had experienced at follow-up, and vice versa. This phenom-enon could be investigated further using time series analyses for which this study did not have enough data points. Furthermore, age effects may be a reason for why certain factors did not predict sexual abuse over time as dif-ferent age groups have dissimilar risks for child abuse victimization (Cook & Ware, 1983), with older children at higher risk than younger children.

Consistent with previous research, peer support was protective against revictimization. Moreover, peer support was a significant moderator of the prospective relationship between assault and contact sexual abuse victimiza-tion in girls. Specifically, girls who had experienced baseline physical assault in the community and low peer support were at higher risk for contact sexual abuse victimization at follow-up than those who had experienced physical assault victimization and high peer support. In fact, girls who had been physi-cally assaulted and experienced high levels of peer support at baseline had no increased risk for contact sexual abuse victimization at follow-up. This find-ing suggests that good peer relationships may reduce some of the underlying unknown factors that increase the risk for sexual victimization in female assault victims and may be an area for future research. However, peer support did not buffer the effects of previous sexual abuse victimization and school dropout on the risk for contact sexual abuse at follow-up. It should be noted that research on peer support as a moderator of revictimization in adolescents thus far has focused mostly on peer victimization through bullying and not on contact sexual abuse (Boulton, Trueman, Chau, Whitehand, & Amatya, 1999; Hodges, Boivin, Vitaro, & Bukowski, 1999). Emerging evidence with adult women shows mixed results regarding the buffering effects of social support on risk factors for sexual abuse or domestic violence revictimization (Bender et al., 2003; Bybee & Sullivan, 2005; Mason et al., 2009). Further research is needed to identify and confirm the moderating effects of social support on the relationship between victimization and contact sexual abuse in girls. This is likely relevant for targeting interventions and identifying children most at risk.

While evidence from sub-Saharan Africa suggests high levels of sexual abuse by teachers and fellow learners (Burton & Leoschut, 2013; Human Rights Watch, 2001; Leach, 2002), the results of this study suggest that school enrollment may protect children from sexual abuse victimization. The under-lying mechanism might be that school allows children to build networks with peers and offers a structured and protected environment independent of the

community. In addition, children with strong social support networks show higher levels of self-esteem and self-efficacy and therefore may be less vulnerable targets for perpetrators of sexual abuse than those who experience little social support (Colarossi & Eccles, 2003; Egan & Perry, 1998).

These results suggest that targeting school dropout and revictimization could be important steps toward reducing the risk of contact sexual abuse victimization in girls in South Africa. Research shows that there are a number of effective interventions for keeping girls in school, including cash transfer programs such as the South African child support grant or the old age pension (Baird, Ferreira, Ozler, & Woolcock, 2013; Budlender & Woolard, 2006; Heinrich, Hoddinott, & Samoson, 2012), school feeding schemes (Bundy et al., 2009), support for school fees and materials (Hallfors et al., 2011), support for students with lower attainment, support for adolescent mothers (Panday, Makiwane, Ranchod, & Letsoalo, 2009), and reductions in secondary school fees (Borkum, 2009). In addition, providing support services to victims and their families as well as improving child protection services can prevent further revictimization (Lalor & McElvaney, 2010). There is emerging evidence to show that interventions that provide information about sexual abuse prevention and help survivors to spot and deal with risky situations can be successful at preventing revictimization in adolescents (DePrince, Chu, Labus, Shirk, & Potter, 2013). Future research examining the potential protective role of peer support to inform interventions could help to reduce rates of sexual abuse of girls, especially for girls with histories of victimization. Interventions that promote social support in schools (Durlak, Weissberg, Dymnicki, Taylor, & Schellinger, 2011) could be considered. In addition, after-school activities may widen children's social networks (Durlak, Weissberg, & Pachan, 2010), and helping isolated children to develop social skills can increase their chances of making friends (Oden & Asher, 1977) while keeping them in a safe and structured environment.

Limitations

This study had a number of limitations. Due to low levels of literacy, the study used child self-report in guided interviews and, as a result, some underreporting may have occurred. However, this approach also allowed for development of good interviewer–child relationships, which facilitated follow-up, as demonstrated in the exceptionally high retention rate. These relationships facilitated discussions about referrals following disclosure of abuse victimization. Second, the study was carried out in randomly selected areas with HIV prevalence above 30%. Results, therefore, cannot be generalized across the population of South African children. Although we cannot generalize

about South Africa's child population as a whole, our findings provide a good indication of the risk factors for children in areas with high HIV prevalence and high levels of poverty. Third, questionnaires measuring abuse victimization have not been validated in South Africa. However, all items had been used in a previous study (Meinck, Cluver, Boyes, & Ndhlovu, 2015) and showed good reliability in this sample. Fourth, measures of sexual abuse at baseline and follow-up were adapted slightly to allow for more sensitivity but item content remained unchanged. Despite this, prevalence rates for victimization previous to the past year corresponded to the prevalence rates of sexual abuse victimization at baseline. Fifth, there is a strong likelihood of unmeasured confounding variables in this study. Even though models adjusted for potential confounding variables reported by children, we could not account for caregiver-related confounders such as mental health, adverse childhood-experiences and substance use or household contextual factors applicable to other child residents within the household. Due to the design of using only one child respondent per household, we cannot rule out unmeasured confounding variables. However, the child respondent was selected randomly to eliminate systematic bias in the selection of participants. Future research could investigate risk factors in matched case-control designs of caregivers and multiple children in one household. Sixth, all risk factors were reported by children, and reliability of child report on some of the factors (i.e., caregiver morbidity, household grant receipt) may be questionable. However, a recent study investigated the reliability of child report on adult HIV-associated symptoms using caregiver–child dyads and found 72% concordance between adult–child reporting on caregiver HIV status (Becker, Kuo, Operario, Moshabela, & Cluver, 2015). Finally, hypothesized risk factors were limited to those that could be reported by a child. Future work is needed to examine potential risk factors at the parent/primary caregiver level, such as caregiver substance abuse (Madu, Idemudia, & Jegede, 2003; Vogeltanz et al., 1999), mental health (J. Fleming et al., 1997; Madu et al., 2002), and childhood abuse victimization of caregivers (McCloskey & Bailey, 2000) to allow for a more holistic picture of risks for sexual abuse victimization in South Africa.

Conclusion

The findings of this study demonstrate the magnitude of the problem of sexual abuse victimization and elucidate prospective risk and protective factors associated with sexual abuse. In particular, they highlight a group of particularly vulnerable girls for policy makers and practitioners. Intervention efforts should focus on school enrollment, development of social support networks, and the prevention of school dropout and sexual revictimization.

Acknowledgments

Declaration of Conflicting Interests

Funding

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