Published in final edited form as:

Child Abuse Negl. 2018 October; 84: 45–52. doi:10.1016/j.chiabu.2018.07.010.

Cycle of violence among young Kenyan women: The link between childhood violence and adult physical intimate partner violence in a population-based survey

Laura Chiang a,* , Ashleigh Howard b , Jessie Gleckel c , Caren Ogoti d , Jonna Karlsson e , Michelle Hynes f , and Mary Mwangi g

^aCenters for Disease Control and Prevention, 1600 Clifton Road Northeast, Atlanta, GA, 30333, USA

bQED Group LLC, 1820 Fort Myer Drive, Suite 700, Arlington, VA 22209, USA

^cPartners for a Healthier Community, Inc., The Public Health Institute of Western Massachusetts, P.O. Box 4895, Springfield, MA 01101, USA

^dKenya Ministry of East African Community Labour and Social Protection, P.0 Box 14356 - 00100, Nairobi, Kenya

^eUNICEF East and Southern Africa Regional Office, P.O. Box 44145-00100, Nairobi, Kenya

^fCenters for Disease Control and Prevention, 1600 Clifton Road Northeast, Atlanta, GA, 30333, USA

⁹Division of Global HIV/AIDS & Tuberculosis, U.S. Centers for Disease Control and Prevention, PO Box 606-00621 Nairobi, Kenya

Abstract

The aim of the current analysis is to elucidate the link between childhood experiences of violence and physical intimate partner violence in young adulthood in a national survey of young Kenyan women. In 2010, we conducted the Violence against Children Survey in Kenya, collecting retrospective reports from 13 to 24 year old males and females (N = 2928). The analysis presented here focused on females aged 18–24 who ever had an intimate partner (n = 566). Young Kenyan women had statistically higher odds of experiencing physical intimate partner violence (IPV) in young adulthood if they had experienced any childhood violence (including sexual, emotional, or physical) [adjusted odds ratio (AOR) = 3.1 CI: 1.2–7.9, p = 0.02)], any childhood sexual violence (AOR = 2.5, CI 1.3–4.9, p = 0.006), or unwanted completed sex (including pressured or forced sex prior to age 18) (AOR = 4.3, CI: 2.3–8.3, p < 0.0001). Exposure to two (AOR = 3.9, CI: 1.2–12.2, p = 0.02) or three (AOR = 5.0, CI: 1.4–18.1, p = 0.01) types of violence in childhood was also associated with a significantly higher odds of experiencing adult physical IPV. Childhood violence

^{*}Corresponding author: LChiang@CDC.gov (L. Chiang).

^{6.} Disclaime

The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention

The authors declare that they have no conflict of interest.

is associated with increased odds of adult physical IPV among young women; efforts to prevent violence against children and provide appropriate care and support to adult survivors are critical to interrupt this cycle of violence

Keywords

Violence against children; Intimate partner violence; Revictimization; Sexual violence; Kenya

1. Introduction

Violence against children (VAC) is a public health and human rights crisis throughout the world. A UN study on VAC estimates that 133 to 275 million children are exposed to violence in the home each year (UNICEF, 2006). Scientists from the US Centers for Disease Control and Prevention (CDC) recently estimated that 1 billion children experience violence annually (Hillis, Mercy, Amobi, & Kress, 2016). VAC has been associated with a host of short- and long-term negative outcomes related to mental health, sexual health and chronic health issues across various studies and contexts (Beitchman, Zucker, Hood & daCosta, 1992; Coles, Lee, Taft, Mazza & Loxton, 2015; Felitti et al., 1998; Hillis, Anda, Felitti, Nordenberg, & Marchbanks, 2000).

Researchers have become increasingly interested in the links between VAC and adult violence victimization, especially by an intimate partner (Arias, 2004; Barnes, Noll, Putnam, & Trickett, 2009; Capaldi, Knoble, Shortt, & Hyoun, 2012; Coid, Petruckevitch, Feder, Chung, Richardson & Moorey, 2001; Daigneault, Hebert, & McDuff, 2009; Ports, Ford, & Merrick, 2016; Whitfield, Anda, Dube, & Felitti, 2003). Global rates of intimate partner violence (IPV) against women vary widely. In a multi-country study on IPV, the prevalence of physical or sexual violence for women of reproductive age ranged from 15 to 71% across country sites, with only two countries reporting less than 25% (Garcia-Moreno, Jansen, Ellsberg, Heise, & Watts, 2006).

While there are large bodies of research on VAC and on IPV, the available evidence on the association between the two is varied and difficult to compare given the complexity of pathways, different types of child violence studied separately, and a focus on high income settings (Guedes, Bott, Garcia-Moreno, & Colombini, 2016). In this high income context, studies have found links between physical and sexual VAC and experiencing adult IPV, however these findings are not consistent. One study found that US women who had experienced childhood violence or witnessed inter-parental violence in childhood had six times increased odds of experiencing physical IPV as adults (Bensley, Van Eenwyk, Wynkoop & Simmons, 2003). Coid et al. (2001) found that among UK women unwanted childhood sex and severe physical punishment by a parent were each independently associated with nearly four times increased odds of experiencing IPV in adulthood. Another study in the US used a prospective cohort design to study the relationship between VAC and adult revictimization and found that children experiencing physical and sexual violence as well as neglect were significantly more likely to experience IPV in adulthood compared to the control group. This study also found significant differences when disaggregating results

by sex and ethnicity (Widom, Czaja, & Dutton, 2008). Conversely, Jennings, Richards, Tomsich, Gover, and Powers, (2013) found differences between victims and non-victims of VAC in a study of US college students were rendered nonsignificant when they used a methodology to statistically match across a host of confounders, suggesting that the issue is highly complex. In one of the few studies to look at emotional VAC and IPV, Richards, Tillyer, and Wright, (2017) found that among a US national sample, IPV was associated with physical and emotional VAC for females and with physical, emotional and sexual VAC for males.

There are fewer studies examining linkages between childhood VAC and IPV in low and middle income settings, and often these are looking at perpetration rather than revictimization and are not comparable across settings (Abramsky, Watts, & Garcia-Moreno, 2011; Child Protection Monitoring & Evaluation Reference Group, 2014). There is some evidence from Latin America that physical VAC is linked with later experience of IPV (Bott, Guedes, Goodwin, & Mendoza, 2012.) A study of Ecuadorian women found emotional and physical VAC to be highly predictive of adult IPV victimization (Gomez & Speizer, 2009; Speizer, Goodwin, Whittle, Clyde, & Rogers, 2008). Using DHS data for Colombia, Friedmann-Sanchez and Lovaton (2012) found that a history of VAC was associated with increased risk of both emotional IPV and physical IPV in adulthood for women. A multicountry study in Asia and the Pacific found an association between all forms of VAC (emotional, physical, sexual) and experiencing physical or physical and sexual IPV (Fulu et al., 2017). A study in Vietnam found that VAC was a risk factor for adult IPV for young women (Hong, Tran, Nguyen & Fisher, 2014). In a global review examining the intersection of VAC and IPV in low and middle income countries, the authors found that both types of violence share many common risk factors and that consequences of such violence are 'common and compounding' and urge better coordination among programs and research (Guedes et al., 2016).

There are several theories to explain the relationship between VAC and IPV in adulthood. Risser, Hetzel-Riggin, Thomsen, and McCanne, (2006) found that posttraumatic stress disorder (PTSD) and specifically hyper-arousal symptoms may be the primary causal factor in the relationship between sexual VAC and adult sexual IPV, positing that an adult woman with PTSD related to VAC may have an impaired ability to detect and respond to danger. Messman and Long (1996) have theorized that children who are sexually abused may have diminished self-efficacy and learned helplessness. In contrast, Bensley, Van Eenwyk, and Wynkoop Simmons, (2003) argue that since VAC affects self-esteem and relationships, then the direct link to IPV is obscured. Namy et al. (2017) have applied a feminist analysis to understanding the link and concluded that gender norms and power dynamics coalesce to perpetuate a cycle of violence, particularly within traditional patriarchal contexts.

Both VAC and IPV against women are significant public health issues in Kenya. The Kenya VACS showed that boys and girls experience violence at high rates. The prevalence of childhood physical violence among boys was 73.1% and among girls was 66.0%; the prevalence of childhood emotional violence among boys was 31.9% and among girls was 25.8%; and the prevalence of childhood sexual violence among boys was 17.5% and among girls was 31.9% (UNICEF, Centers for Disease Control and Prevention and Kenya National

Bureau of Statistics, 2012). The 2014 Kenya Demographic and Health Survey (DHS) found 15–49 year old women in the Kenya experienced high rates of physical violence (37%), emotional violence (32%) and sexual violence (13%) by an intimate partner. Further, DHS measures negative gender norms by asking if men are justified in beating their wives in any of four situations. Forty-one percent of women and 36.2% of men agree that husbands are justified in beating their wives in one or more scenarios (Kenya National Bureau of Statistics, 2015). An extensive body of literature has demonstrated that gender norms are a root cause of gender inequities in a host of public health issues, including experiences of violence (Chandra-Mouli et al., 2017).

In this paper we examine the association between emotional, physical and sexual VAC (violence occurring prior to age 18 years) with physical IPV in young adulthood (18–24 years) in Kenya using the 2010 VACS data. We focused on females because of the global epidemiologic pattern that females experience IPV differently than males and most often at higher levels and with greater negative consequences across the social ecology (Fang & Corso, 2007).

2. Methods

2.1. Study procedures

The 2010 Kenya VACS was a cross-sectional household survey of 13–24 year old females and males designed to produce national estimates of physical, emotional and sexual VAC as well as risk and protective factors, health outcomes and service knowledge and uptake. The Kenya National Bureau of Statistics' (KNBS) household survey sampling frame, the National Sample Survey and Evaluation Programme (NASSEP IV), is based on the 1999 population and housing census and represented the most reliable and recent population sampling frame at the time of the study. Of the 1800 enumeration areas (EAs) in the NASSEP IV, 238 were randomly selected using population proportional to size and then randomly assigned as either female (n = 104) or male (n = 134) EAs. The survey was administered in thirteen commonly spoken languages used in national surveys and the Census in Kenya: Borana, English, Kalenjin, Kamba, Kikuyu, Kisii, Luo, Luhya, Maasai, Meru, Mijikenda, Swahili and Somali.

In total, a nationally-representative sample of 2683 interviews were completed, with 1227 completed female interviews and 1456 completed male interviews. The overall response rate for females was 84.8% and the individual response rate was 94.0%. The overall response rate for males was 80.4% and the individual response rate for males was 89.8%. In this analysis, we focused on females aged 18-24 who reported ever having an intimate partner (n = 566).

The study was reviewed and approved by the Ethical Review Committee of the Kenya Medical Research Institute (KEMRI) and by the CDC Institutional Review Board. Prior to the administration of the national household survey, a pilot study was conducted. Findings from the pilot study were used to refine the survey instrument and protocols. The study followed documented ethical and safety procedures to ensure the rights and safety of each respondent. KNBS recruited interviewers from their pool of experienced survey researchers.

A preference was given towards those with prior engagement on surveys with sensitive subject matter, such as the DHS. Applicants were also screened to ensure appropriate recruitment by language skills and cultural context based on the sampled areas. CDC, UNICEF and KNBS led a thirteen-day training that covered methods, ethics, study procedures and considerable time to practice the questionnaires and the study protocols.

Every respondent provided verbal assent/consent. Parental consent was waived for the Kenya VACS due to safety concerns for the child respondents in the case that parents were the perpetrators or knew the perpetrators. Instead, we sought permission from parents or guardians for 13–17 year olds to speak with their child about the study and gain the child's assent for participation. In order to protect the confidentiality and safety of respondents, the study was described to other household members (including parents/ guardians) as a general health and education survey for Kenyan youth. This study procedure was adapted from the recommended protections outlined in the World Health Organization's (2001) Putting Women First: Ethical and Safety Recommendations for Research on Domestic Violence against Women. In addition, all interviews were conducted in private spaces in the respondent's language of choice to ensure confidentiality and increase the likelihood of disclosure. Finally, any respondent who wanted help for past experiences of violence or who experienced any negative emotional impact from answering the survey questions was offered a direct referral with a trained counselor.

2.2. Measures/Variables

Childhood Violence. *Any childhood violence* was defined as any experience of physical, emotional and/or sexual violence that occurred prior to 18 years of age. *Childhood physical violence* includes any experiences of being hit with a fist, kicked, beaten with an object, or threatened with or attacked with a knife or other weapon, prior to age 18 years. *Childhood emotional violence* includes any experiences of an adult making a child feel unwanted or humiliated or threatening abandonment, prior to 18 years. *Childhood sexual violence* includes any unwanted sexual touching, unwanted attempted sex, physically-forced sex, or pressured sex, prior to age 18. To examine the impact of non-consensual penetrative sex, we combined pressured sex and physically-forced sex for a measure of *overall 'unwanted sex'*. *Adult physical IPV* is defined as being slapped, pushed, hit with a fist, kicked, beaten with an object, or threatened with or attacked with a knife or other weapon, at or after the age of 18 by a romantic partner or husband.

Covariates. Socioeconomic status (SES) was estimated using a method developed for the DHS (Rutstein & Johnson, 2004). Using SES variables from the household questionnaire, we conducted a primary components analysis to create an SES variable that informed categorization of the sample into wealth quintiles, with quintile one the least wealthy and quintile five the wealthiest. Orphanhood was defined as having lost one or both biological parents prior to turning 18 years old (Joint United Nations Programme on HIV/AIDS (UNAIDS) (2004)) and ever married included ever married or lived with someone as if married.

Intimate Partner Violence in Young Adulthood. The analyses used data from 18 to 24 year olds to assess the association between exposure to violence in childhood and later risk for

intimate partner violence in young adulthood. Females younger than 18 were excluded in order to temporally separate measures of IPV in young adulthood (aged 18 to 24) from violence experienced in childhood (younger than age 18). The questionnaire included two questions related to the age of the respondent at the time of a violent experience: 1) her age at the first experience of sexual, physical or emotional violence, and b) whether she experienced that type of violence in the past 12 months. A variable for adult physical IPV was created based on whether a respondent met one of the following criteria: 1) the respondent was age 18 or older and reported that her first experience of physical violence by an intimate partner occurred at age 18 or after, or 2) the respondent was age 19 or older and reported any physical violence by an intimate partner in the last 12 months, even if the first experience was prior to age 18.

If we could not determine that a respondent was age 18 at the time of an experience of physical IPV (because she had a first experience of physical abuse prior to age 18 and it is unclear whether she was age 17 or 18 at the time of a subsequent experience of abuse in the past 12 months) then the respondent was excluded from the analysis (n = 11).

2.3. Statistical analysis

We used SAS version 9.3 to analyze the survey data, accounting for the assigned weights. Weights were created using a 3-stage process and applied to each individual record to adjust for the probability of selection, non-response and calibration.

We conducted bivariate analyses to test whether experiences of childhood violence were associated with physical violence by an intimate partner in adulthood. We then performed multivariate logistic regression to control for potential confounding variables including ever married, ever pregnant, SES, and orphan status.

3. Results

The demographics of the survey sample analyzed for the research discussed in this study are reported in Table 1. Approximately 61% of ever partnered 18–24 year old females had ever been married, and nearly one in four were orphaned. Overall, 78% of ever partnered 18–24 year olds experienced any type of violence in childhood (Table 2).

Bivariate logistic regression analyses demonstrated that sexual VAC, unwanted penetrative sex in childhood, emotional VAC, the composite indicator of any VAC (emotional, sexual, or physical), and the experience of multiple types (no violence, one type of violence, two types of violence or three types of violence) of VAC were each associated with physical IPV after the age of 18. Ever married and ever pregnant were also significant predictors of physical IPV. Young women who were ever married had a 4.6 times increased odds of reporting experiences of adult physical IPV (95% Confidence Interval [CI]: 2.0–10.7; p = 0.0003). Those who were ever pregnant had a 4.7 times increased odds of experiencing adult physical IPV (95% CI: 2.4–9.1; p < 0.0001). Orphan status was not a significant predictor of adult physical IPV. SES quintile one (least wealthy), two, and four were also significantly associated with adult physical IPV when compared with quintile five (most wealthy).

We conducted multivariate logistic regression to assess the association between sexual, physical, and emotional VAC and adult physical IPV, controlling for potential confounding variables including ever married, ever pregnant, SES, and orphan status. Ever married and ever pregnant were significant while SES and orphan status were not significant in the models. Given that different types of VAC often co-occur, we included all types of VAC in the model when evaluating the association with adult physical IPV (Table 3).

The association between any sexual VAC and adult physical IPV was significant, as were the associations between childhood unwanted penetrative sex and adult physical IPV and between any VAC and adult physical IPV. Respondents who experienced any sexual VAC had 2.5 times [adjusted odds ratio (AOR)] increased odds of reporting experiences of adult physical IPV (p = 0.006). Women who experienced unwanted penetrative sex (physically forced and/or pressured sex) during childhood had 4.3 times (AOR) increased odds of experiencing adult physical IPV (p < 0.0001). Those who experienced any childhood violence also had 3.1 times (AOR) greater odds of experiencing adult physical IPV (p = 0.02). In addition, experiencing multiple forms of VAC was also significant. The odds of experiencing adult physical IPV were 2.3 (AOR) times higher for those exposed to one type of VAC compared to none (p = 0.07), 3.9 (AOR) times higher for those exposed to three types of VAC compared to none (p = 0.02) and 5.0 (AOR) times higher for those exposed to three types of VAC compared to none (p = 0.02) and 5.0 (AOR) times higher for those exposed to three

4. Discussion

In this paper, we examined the relationship between experiences of VAC and later experiences of physical IPV among young Kenyan women who had ever had a partner. Prior research has demonstrated a link between child victimization and risk for later victimization in adulthood (Desai, Arias, Thompson, & Basile, 2002). However, the majority of these studies have been conducted in high-income settings (Coid, Petruckevitch, Feder, Chung, Richardson & Moorey, 2001; Maker, Kemmelmeir, & Peterson, 2001; Widom et al., 2008). We are not aware of any other studies in Kenya that have looked at the association between VAC and adult IPV. The results discussed in this study expand our understanding of the cyclic nature of violence victimization, demonstrating links between different types of VAC and adult IPV as well as the compounded impact of experiencing multiple types of VAC and adult physical IPV victimization. Results show that young Kenyan women are more likely to experience physical IPV if they experienced any VAC, particularly sexual VAC. This paper also demonstrates that the relationship between childhood victimization and adult victimization is nuanced and must be interpreted carefully. While any sexual VAC including unwanted sexual touching, attempted forced sex, forced sex, and pressured sex was associated with a 2.5 times increased odds of physical IPV, unwanted penetrative sex including forced sex and pressured sex—was associated with a 4.3 times increased odds of physical IPV. This finding builds on prior research such as a study by Fleming, Mullen, Sibthorpe, and Bammer, (1999) that found child sexual abuse involving penetrative sex tripled the risk of sexual violence victimization in adulthood. Exposure to two (AOR: 3.9) or three (AOR: 5.0) types of violence in childhood was also associated with a significant increased odds of adult physical IPV, providing further evidence of linkages between VAC, including a possible dosage relationship, and violence later in the lifespan.

That physical VAC on its own was not associated with adult physical IPV may be an indication of the normalization and cultural acceptance of physical violence against children in the population. As previously discussed, the Kenya VACS found a high prevalence of childhood physical violence (66.0%), indicating a normative experience (UNICEF, 2012).

Although it was not the aim of this paper, it is also important to acknowledge that in addition to VAC exposures, the analyses highlighted ever being married or pregnant as significant predictors of physical IPV. Causal pathways towards and risk factors for IPV are highly complex and the field would benefit from further research to better understand nuances across contexts.

The data presented here underscore the link between VAC and the risk of IPV in young adulthood. While further research needs to be done to understand the mechanisms that underlie the association between VAC and young adult IPV, these data increase the understanding of violence in childhood as a risk factor for future experiences of violence. Additionally, the association between the recurrence of violence and the number and severity of negative outcomes (Felitti et al., 1998) is a critical consideration for focused on preventing childhood violence. Due to the high burden and impact of violence against children, key global partners developed the INSPIRE technical package of evidence-based interventions for preventing and responding to violence against children (World Health Organization, 2016). The INSPIRE strategies and approaches include implementation and enforcement of laws, norms and values, safe environments, parent and caregiver support, income and economic strengthening, response and support services, and education and life skills. Critical stakeholders in Kenya can consider this package for adaptation, evaluation and scale up. In terms of applying the research discussed in this paper and related research to public health prevention and clinical response services, it is vital for specialists and practitioners to understand the inter-connectedness of violence experiences across the lifespan. It is important for intervention programming in Kenya for child violence victims to take into account future vulnerability to victimization, and for programming for adult survivors to take into account past experiences to better understand and mitigate the impact of recent/current violence experiences.

As discussed above, some of the dominant theories explaining the linkage between VAC and IPV argue the physiological impacts of stress from sexual VAC may at least partially explain adult sexual violence victimization. We suggest that these physiological and psychological impacts may be similar for other types of VAC (e.g. emotional and physical VAC) and adult IPV. Moreover, we would further hypothesize that it is possible there may be some persistent environmental factors- such as gender norms- that could place girls and young women at risk for one or more types of violence in childhood and victimization in adulthood. For example, research has shown that women who believe that wife beating is acceptable are also more likely to believe that corporal punishment for children is necessary, and children of these women are in turn more likely to experience childhood violence (Lansford, Deater-Deckard, Bornstein & Putnick, 2014). Harmful gender norms and their impact on cycles of violence likely vary from one cultural context to another. It is also possible that in some circumstances the perpetrator for the childhood and adult victimization are the same,

representing protracted exposure to the same perpetrator rather than childhood violence predisposing victims to other and different types of violence later in life.

Although the Kenya VACS was conducted in 2010, we believe that this analysis is still highly relevant for several reasons. First, we did not find any similar studies in Kenya or in the region, suggesting these data to be a useful contribution to the literature. Second, while the Government of Kenya and stakeholders responded robustly to the VACS data, most of the prevention and intervention programming occurred at the local level rather than the national level and we anticipate that the prevalence of both VAC and adult IPV remain a significant problem in Kenya. Third, the Government of Kenya is in the planning stages to conduct a second VACS and the current study could be relevant to planning efforts in addition to the continued response efforts to the initial VACS.

It is important to acknowledge the limitations of the VACS in Kenya. First, VACS is a cross-sectional survey reliant on retrospective self-reports of violence and therefore causality cannot be inferred from correlational analysis (Briere, 1992). Particularly in the case of violence research and especially when looking at the relationship between past and current violence, it is possible that "current distress or symptomology" may impact the way that earlier experiences are processed and recounted (Cashmore & Shackel, 2013). Therefore, since the findings in this current study are reliant on self-reports, it is *possible* that the more recent adult physical IPV experiences influence the recall of childhood violence experiences. Relatedly, while we used considerable care in selecting and training interviewers to gain trust and maximize rapport with respondents, we acknowledge the potential for social desirability, stigma and recall bias. These biases may introduce some error when data accuracy is reliant on retrospective reports and the willingness of respondents to disclose sensitive information about events that may have taken place several years in the past.

5. Conclusion

While the current analyses identified concerning associations between violence in childhood and young adult experiences of physical IPV, future research should explore the specific pathways through which childhood experiences of violence may shape risk of IPV in Kenya and beyond. Additional research may also look at the impact of exposure to childhood violence beyond young adulthood as well as on other forms of gender-based violence in Kenya. Such research could lead to effective interventions to break the cycle of childhood and young adult violence.

Acknowledgements

We would like to acknowledge UNICEF-Kenya for funding the implementation of the survey in Kenya. We would like to acknowledge the Kenya VACS 2010 Technical Working Group (TWG) for leadership in the planning and implementation of this study.

References

Abramsky T, Watts C, Garcia-Moreno C, et al. (2011). What factors are associated with recent intimate partner violence? Findings from the WHO multi-country study on women's health and domestic violence. BMC Public Health, 11(109).

Arias I (2004). The legacy of child maltreatment: Long-term health consequences for women. Journal of Women's Health, 13, 468–473.

- Barnes J, Noll J, Putnam F, & Trickett P (2009). Sexual and physical revictimization among victims of severe childhood sexual abuse. Child Abuse & Neglect, 33,412–420. [PubMed: 19596434]
- Beitchman J, Zucker K, Hood J, & daCosta G (1992). A review of long term effects of child sexual abuse. Child Abuse & Neglect, 16, 101–118. [PubMed: 1544021]
- Bensley L, Van Eenwyk J, & Wynkoop Simmons K (2003). Childhood family violence history and women's risk for intimate partner violence and poor health. American Journal of Preventive Medicine, 25, 38–44.
- Bott S, Guedes A, Goodwin M, & Mendoza JA (2012). Violence against women in Latin America and the Caribbean: A comparative analysis of population-based data from 12 countries. Washington DC: Pan American Health Organization (PAHO).
- Briere J (1992). Methodological issues in the study of child sexual assault effects. Journal of Consulting and Clinical Psychology, 60, 196–203. [PubMed: 1592948]
- Capaldi D, Knoble N, Shortt J, & Hyoun K (2012). A systematic review of risk factors for intimate partner violence. Partner Abuse, 3, 231–280. [PubMed: 22754606]
- Cashmore J, & Shackel R (2013). The long-term effects of child sexual abuse. Melbourne, Australia: Australian Institute of Family Studies.
- Chandra-Mouli V, Plesons M, Adebayo E, Amin A, Avni M, Kraft JM, et al. (2017). Implications of the global early adolescent study's formative research findings for action and for research. Journal of Adolescent Health, 61, S5–S9. [PubMed: 28915994]
- Child Protection Monitoring and Evaluation Reference Group (2014). Measuring violence against children: Inventory and assessment of quantitative studies, division of data, research and policy. New York: UNICEF.
- Coid J, Petruckevitch A, Feder G, Chung W, Richardson J, & Moorey S (2001). Relation between childhood sexual and physical abuse and risk of revictimization in women: A cross-sectional survey. The Lancet, 358, 450–454.
- Coles J, Lee A, Taft A, Mazza D, & Loxton D (2015). Childhood sexual abuse and its association with adult physical and mental health: Results from a national cohort of young Australian women. Journal of Interpersonal Violence, 30, 929–1944.
- Daigneault I, Hebert M, & McDuff P (2009). Men's and women's childhood sexual abuse and victimization in adult partner relationships: A study of risk factors. Child Abuse & Neglect, 33, 638–647. [PubMed: 19811827]
- Desai S, Arias I, Thompson MP, & Basile KC (2002). Childhood victimization and subsequent adult revictimization assessed in a nationally representative sample of women and men. Violence Victims 7, 639
- Fang X, & Corso P (2007). Child maltreatment, youth violence, and intimate partner violence: Development relationships. American Journal of Preventive Medicine, 3, 281–290.
- Felitti V, Anda R, Nordenberg D, Williamson D, Spitz A, Edwards V, et al. (1998). Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults. American Journal of Preventive Medicine, 14, 245–258. [PubMed: 9635069]
- Fleming J, Mullen PE, Sibthorpe B, & Bammer G (1999). The long-term impact of childhood sexual abuse in Australian women. Child Abuse & Neglect, 23,145–159.
- Friedmann-Sanchez G, & Lovaton R (2012). Intimate partner violence in Colombia: Who is at risk? Social Forces, 91, 663–688.
- Fulu E, Miedema S, Roselli T, McCook S, Chan KL, Haardorfer R, et al. (2017). Pathways between childhood trauma, intimate partner violence and harsh parenting: Findings from the UN multi-country study on men and violence in Asia and the Pacific. The Lancet, 5, e512–e522. [PubMed: 28395846]
- Garcia-Moreno C, Jansen HA, Ellsberg M, Heise L, & Watts CH (2006). World Health Organization. Multi-country study on women's health and domestic violence against women study team. Prevalence of intimate partner violence: Findings from the WHO multi-country study on women's health and domestic violence. The Lancet, 368, 1260–1269.

Gomez AM, & Speizer IS (2009). Intersections between childhood abuse and adult intimate partner violence among Ecuadorian women. Maternal and Child Health Journal, 13, 559–566. [PubMed: 18649129]

- Guedes A, Bott S, Garcia-Moreno C, & Colombini M (2016). Bridging the gaps: A global review of intersections of violence against women and violence against children. Global Health Action, 9(1), 31516. [PubMed: 27329936]
- Hillis SD, Anda RF, Felitti VJ, Nordenberg D, & Marchbanks P (2000). Adverse childhood experiences and sexually transmitted diseases in men and women: A retrospective study. Pediatrics, 106, E11. [PubMed: 10878180]
- Hillis SD, Mercy JM, Amobi A, & Kress H (2016). Global prevalence of past-year violence against children: A systematic review and minimum estimates. Pediatrics, 137, 1–13.
- Hong MT Le, Tran TD, Nguyen HT, & Fisher J (2014). Early marriage and intimate partner violence among adolescents and young adults in Viet Nam. Journal of Interpersonal Violence, 29, 889–910. [PubMed: 24366961]
- Jennings WG, Richards TN, Tomsich EA, Gover AR, & Powers RA (2013). A critical examination of the causal link between child abuse and adult dating violence perpetration and victimization from a propensity score matching approach. Women & Criminal Justice, 23, 167–184.
- Joint United Nations Programme on HIV/AIDS (UNAIDS) (2004). United Nations Children's Fund (UNICEF), & the United States Agency for International D(USAID) Children on the brink 2004: A joint report of New orphans estimates and a framework for action. New York, New York: UNAIDS 2004 Retrieved from: https://www.unicef.org/publications/index_22212.html.
- Kenya National Bureau of Statistics (2015). Ministry of health, national AIDS control council, Kenya medical research institute, national council for population and development, & the demographic health surveys program at ICF International Kenya demographic and health survey 2014. Nairobi, Kenya: Kenya National Bureau of Statistics 2014 Retrieved from: https://dhsprogram.com/pubs/pdf/FR308/FR308.pdf.
- Lansford JE, Deater-Deckard K, Bornstein MH, Putnick DL, & Bradley RH (2014). Attitudes justifying domestic violence predict endorsement of corporal punishment and physical and psychological aggression towards children: A study of 25 low-and middle income countries. Journal of Pediatrics, 164, 1208–1213. [PubMed: 24412139]
- Maker AH, Kemmelmeir M, & Peterson C (2001). Child sexual abuse, peer sexual abuse and sexual assault in adulthood: A multi-risk model of revictimization. Journal of Traumatic Stress, 14, 351–368. [PubMed: 11469162]
- Messman TL, & Long PJ (1996). Child sexual abuse and its relationship to revictimization in adult women: A review. Clinical Psychology Review, 16, 397–420.
- Namy S, Carlson C, O'Hara K, Nakuti J, Bukuluki P, Lwangyaaga J, et al. (2017). Towards a feminist understand of the intersecting violence against women and children in family. Social Science & Medicine, 184, 40–48.
- Ports KA, Ford DC, & Merrick MT (2016). Adverse childhood experiences and sexual victimization in adulthood. Child Abuse and Neglect, 51, 313–322. [PubMed: 26386753]
- Richards TN, Tillyer MS, & Wright EM (2017). Intimate partner violence and the overlap of perpetration and victimization: Considering the influence of physical, sexual, and emotional abuse in childhood. Child Abuse & Neglect, 67, 240–248. [PubMed: 28282597]
- Risser JH, Hetzel-Riggin MD, Thomsen CJ, & McCanne TR (2006). PTSD as a mediator of sexual revictimization: The role of re-experiencing, avoidance, and arousal symptoms. Journal of Traumatic Stress, 19, 687–698. [PubMed: 17075896]
- Rutstein SO, & Johnson K (2004). The DHS wealth index DHS comparative reports No. 6Retrieved from:. Calverton, Maryland: ORC Macro https://www.dhsprogram.com/publications/publicationcr6-comparative-reports.cfm.
- Speizer IS, Goodwin M, Whittle L, Clyde M, & Rogers J (2008). Dimensions of child sexual abuse before age 15 in three Central American countries: Honduras, El Salvador, and Guatemala. Child Abuse & Neglect, 32, 455–462. [PubMed: 18455794]

UNICEF (2006). Behind closed doors: The impact of domestic violence on children. Retrieved from:New York, New York: The United Nations Children's Fund (UNICEF), 2006 https://www.unicef.org/protection/files/BehindClosedDoors.pdf.

- UNICEF (2012). Centers for Disease Control and Prevention, & Kenya National Bureau of Statistics. Violence against children in Kenya: Findings from a national survey, 2010 Summary report on the prevalence of sexual, physical and emotional violence, context of sexual violence, and health and behavioral consequences of violence experienced in childhood. Nairobi, Kenya: The United Nations Children's Fund (UNICEF) Retrieved from: http://www.unicef.org/esaro/VAC_in_Kenya.pdf.
- Whitfield CL, Anda RF, Dube SR, & Felitti VJ (2003). Violent childhood experiences and the risk of intimate partner violence in adults: Assessment in a large health maintenance organization. Journal of Interpersonal Violence, 18, 166–185.
- Widom CS, Czaja SJ, & Dutton MA (2008). Childhood victimization and lifetime revictimization. Child Abuse & Neglect, 32, 785–796.
- World Health Organization (2016). INSPIRE: Seven strategies for ending violence against children. Retrieved from:Geneva, Switzerland: World Health Organization http://www.who.int/violence_injury_prevention/violence/inspire/en/.
- World Health Organization (2001). Putting women first: Ethical and safety recommendations for research on domestic violence against women. Retrieved from:Geneva, Switzerland: World Health Organization http://www.who.int/gender/violence/womenfirtseng.pdf.

Table 1
Sociodemographic Characteristics of Ever Partnered 18–24 year old females in Kenya, Kenya Violence Against Children Survey, 2010.

	Unweighted Frequency (N = 566)	Weighted % (95% CI)
Age		
18-20 years	219	40.9 [34.8–47.0]
21-22 years	181	32.9 [26.2–39.6]
23-24 years	166	26.2 [20.4–32.0]
Socioeconomic Status		
Quintile 1 (least wealthy)	116	16.9 [10.2–23.6]
Quintile 2	130	20.3 [14.8–25.8]
Quintile 3	123	20.7 [15.9–25.4]
Quintile 4	111	21.4 [15.4–27.4]
Quintile 5 (wealthiest)	86	20.7 [13.3–28.1]
Orphaned	141	23.7 [18.2–29.3]
Ever-Married	385	61.3 [55.3–67.3]
Ever-Pregnant	393	82.5 [78.0–87.0]

 $^{^{*}}$ Orphaned is defined as having lost one or both parents prior to age 18.

^{***} Demographic data may differ from the Kenya VACS final report because our analytic sub-group is ever-partnered 18–24 year olds and thus a different analytic sub-group than the report.

Table 2Experiences of Violence before age 18 and in Young Adulthood among Ever Partnered 18–24 year old females in Kenya, Violence Against Children Survey, 2010.

Exposure	Unweighted Frequency (N = 566)	Weighted % (95% CI)	
Any Violence in Childhood	438	78.4 [73.2–83.6]	
Physical Violence in Childhood	383	67.0 [60.3–73.6]	
Sexual Violence in Childhood	182	33.0 [27.5–38.5]	
Emotional Violence in Childhood	149	26.1 [20.3–32.0]	
One type of childhood violence	234	43.4 [39.3–48.4]	
Two types of childhood violence	132	22.4 [18.2–26.6]	
Three types of childhood violence	72	12.6 [8.9–16.3]	
Intimate Partner Violence in Early Adulthood	132	21.6 [16.8–26.5]	

Table 3

Association between Types of Childhood Violence and Physical Intimate Partner Violence in Adulthood among Ever Partnered 18–24 year old females in Kenya, Violence Against Children Survey, 2010.

	Percentage who experienced Adult Physical IPV among those who did and did not experience childhood violence (N = 566)		Crude Odds Ratio (95%)	p-value	Adjusted Odds Ratio (95% CI)	p-value
	Yes	No				
Childhood Physical Violence	22.8% (n = 385)	19.1% (n = 185)	1.3 [0.6–2.8]	0.6	1.0 [0.5–2.2]	1.0
Childhood Sexual Violence	33.8% (n = 184)	15.5% (n = 380)	2.8 [1.5–5.1]	0.001	2.5 [1.3–4.9]	0.006
Childhood Emotional Violence	31.6% (n = 149)	18.1% (n = 420)	2.1 [1.0–4.3]	0.04	1.7 [0.8–3.7]	0.2
Unwanted Penetrative Sex in Childhood	53.5% (n = 81)	16.7% (n = 483)	5.7 [3.2–10.4]	< 0.0001	4.3 [2.2–8.3]	< 0.0001
Any Childhood Violence (Physical, Sexual or Emotional)	24.4% (n = 440)	11.3% (n = 128)	2.5 [1.0–6.5]	0.06	3.1 [1.2–7.9]	0.02
Number of Types of Violence						
Number of Types 1 vs 0^{I}	11.3% (n = 128)		1.8 [0.8–4.4]	0.2	2.3 [0.9–5.5]	0.07
Number of Types 2 vs 0 ²	19.1% (n = 234)		3.1 [1.0–9.7]	0.06	3.9 [1.2–12.2]	0.02
Number of Types 3 vs 0 ³	36.2% (n = 72)		4.4 [1.3–15.1]	0.02	5.0 [1.4–18.1]	0.01

 $^{^{}I.}$ Percentage of females who experienced adult physical intimate partner violence among those who experienced one type of violence in childhood.

². Percentage of females who experienced adult physical intimate partner violence among those who experienced two types of violence in childhood.

^{3.} Percentage of females who experienced adult physical intimate partner violence among those who experienced three types of violence in childhood.