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Predicting adolescent boys' and young men's perpetration of youth violence in Colombia

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Abstract

Youth violence poses a substantive public health burden in Latin America, particularly among adolescent boys. Understanding predictors of youth violence perpetration among boys and young men is critical to more effectively target and tailor prevention programs, especially in Colombia, which has endured decades-long internal armed conflict. This study uses Colombia's nationally representative 2018 Violence Against Children and Youth Survey data to examine risk and protective factors associated with violence perpetration among 13–24-year-old males. Amongst adolescent boys and young men in Colombia, the prevalence of ever perpetrating violence against someone other than an intimate partner was approximately 23%. Multivariable logistic regression models revealed that physical violence victimization by peers, emotional violence victimization by caregivers, having lost or been separated from a mother during childhood, and witnessing community violence were all associated with lifetime perpetration of youth violence. Programs targeting reduction of youth violence among boys might consider addressing the previously identified predictors earlier in the life course and at the individual, family and community levels.

Keywords

Youth violence; Violence perpetration; Colombia; Adolescents; Young adults

Introduction

Youth violence is a serious and pervasive global health issue (Abrahams et al., 2014; Atienzo, Baxter, & Kaltenthaler, 2017; World Health Organization, 2015). This is particularly true given that adolescents (people between the ages of 10–19-years-old) (World Health Organization, 2021) are both the primary perpetrators and victims of all violence across the globe (Kar, 2019; Swahn et al., 2012). Youth violence is also reported as the second leading cause of death for adolescents and young men and homicide and suicide

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reported as among the top five (Atienzo et al., 2017; Fagan & Catalano, 2013; Kar, 2019). Among adolescents and young adults, non-fatal rates of physical violence are greater than mortality rates due to the same cause ("Youth Violence Is a Global Public Health Problem," 2015) and the impacts of violence are well documented. Those who experience or witness violence often suffer from increased incidence of mental health disorders, such as depression, anxiety, post-traumatic stress disorder (PTSD), and suicide ideation, as well as increased risks for physical health issues such as cardiovascular disease and premature mortality (Kar, 2019; Rivara et al., 2019). While the impacts on those who commit violent acts are far less studied, Stark et al (2020) found that youth violence perpetration was also associated with increased mental health issues for perpetrators, and increased substance abuse and feelings of worthlessness in male perpetrators specifically (Stark et al., 2020).

Adolescent boys and young men in particular are more likely to engage in physical violence than girls (Golshiri, Farajzadegan, Tavakoli, & Heidari, 2018; McAra & McVie, 2016; Shiva Kumar et al., 2017). A WHO report (2015) utilizing data from 20 low- and middleincome countries (LMICs) reported that half of adolescent males were involved in physical fighting in the past year (Golshiri et al., 2018; World Health Organization, 2015). Other studies have found that men who have perpetrated rape often do so for the first time during adolescence (Guedes, Bott, Garcia-Moreno, & Colombini, 2016). There is a need to understand the factors associated with violence perpetration among male adolescents and young men in order to better inform prevention efforts pertinent to this critical stage of life. Adolescents and young men are a particularly important group to consider, as experiences that occur during this formative period can have significant consequences on outcomes later in life, such as continued violence perpetration, mental health, substance use, and overall wellbeing (Stark et al., 2020). Many patterns of violence perpetration begin in adolescence and are associated with longer and more serious violent behaviors over the life course, including intimate partner violence (IPV) and non-partner violence (Fagan & Catalano, 2013). Adolescence is a highly impressionable period in which boys are influenced by peers, and there is a need for violence prevention efforts to focus on this stage to curb these behaviors at younger ages and hence mitigate potential violence later in life.

While youth violence is a global issue, most studies focusing on violence perpetration rely on data collected from high-income nations (Bushman et al., 2016). This body of research identifies common predictors of general violence perpetration to include previous experiences of sexual violence and/or assault (Burnette et al., 2008; Kar, 2019), witnessing violence between one's parents, holding negative attitudes toward women, and having past experience with depression, binge drinking, or fighting (Fleming et al., 2015; Lösel & Farrington, 2012; McAra & McVie, 2016). Though the majority of childhood victims of violence do not go on to perpetrate violence themselves, youth perpetrators of violence often have a history of childhood abuse. One study found that the majority of juvenile offenders reported a history of childhood trauma, and almost one third meeting criteria for PTSD (Kar, 2019). Additional risk factors include weapon carrying, academic problems, substance abuse, and untreated mental health symptoms (Resnick, Ireland, & Borowsky, 2004). Risk factors at the family level include limited connectedness with parents and lack of parental supervision (Farrington, 1998; Resnick et al., 2004). Further, both familial and neighborhood poverty are significant risk factors for youth violence (Golshiri et al., 2018;

McAra & McVie, 2016). Research on protective factors finds that the risk of violence among adolescents may be reduced through feelings of connectedness to adult family members, frequent involvement in positive shared activities with parents, positive engagement with teachers in supportive school environments, popularity, religious affiliation, and involvement in social activities (Lösel & Farrington, 2012; World Health Organization, 2020).

Despite this substantive body of research from high-income countries, the evidence around predictors of adolescent boys' and young men's violence perpetration in low- and middle-income nations is more limited. This limited evidence is problematic given that the majority of youth homicides occur in LMIC countries, with mostly male perpetrators (Golshiri et al., 2018; World Health Organization, 2020). In the Latin American and Caribbean (LAC) region in particular, the murder rate among adolescents is four times higher than the global average. Other forms of youth violence are increasing in the region as well, with recent rises in school-based violence and bullying (Atienzo et al., 2017). Additionally, adolescent populations are predicted to grow by 7% by 2030 (United Nations, 2015), suggesting that youth violence will only escalate without targeted prevention.

For youth in the LAC region specifically, social and environmental conditions are among the highest risk factors for violence perpetration, including poverty and inequality, lack of access to quality education or economic opportunities, and traditional norms around gender (Atienzo et al., 2017). Almost one quarter (22.4%) of the population in LAC live with less than \$5.50 a day (the 2011 PPP poverty line), and the richest 3% receive one fifth (21.3%) of the total income of the region (World Bank Group, 2021). In addition, the youth unemployment rate for 2020 reached 18% (which is 3 times the rate for adults), and labor informality rate was 62.4 % for young people (approximately 1.2 higher than that of adults, see (Sundkvist, 2020). Other studies examine risk factors for general violence perpetration, and find that childhood experiences of abuse and neglect, particularly sexual abuse, can be associated with violence perpetration in adolescence and later adulthood (Guedes et al., 2016; Swahn et al., 2012).

The burden of youth violence perpetration in Colombia is especially pronounced given the decades-long internal armed conflict in the country. Although research has identified predictors of youth homicide and youth violence within a couple Colombian cities specifically (Guerrero & Concha-Eastman, 2013; Guerrero Velasco, 2015; Gutierrez-Martinez, Valencia, & Santaella-Tenorio, 2020), a stronger evidence base on the predictors of youth violence perpetration among adolescent boys and young men is needed at the national level in order to more effectively target and tailor prevention programs and policies in Colombia and the broader LAC region. Recognizing the particularly high prevalence of violence perpetrated by males, specifically, this paper uses the nationally representative 2018 Violence Against Children and Youth Survey data from Colombia to examine the risk and protective factors associated with youth violence perpetration among 13–24-year-old males.

Materials and methods

Data

The data for this analysis come from the 2018 Colombia Violence Against Children and Youth Survey (VACS). The VACS are led by the US Centers for Disease Control and Prevention (CDC) as part of the Together for Girls partnership, and have been implemented in nearly 20 countries to date. The 2018 Colombia VACS was conducted under the leadership of the government of Colombia, with assistance from CDC and other partners. VACS collect data on experiences of physical, emotional, and sexual violence among 13–24-year old females and males, as well as information on demographics, mental health, attitudes, and witnessing violence (Government of Colombia & Ministry of Health and Social Protection, 2019). The 2018 Colombia VACS is the first nationally representative survey to estimate violence against children and youth in the country.

The 2018 Colombia VACS used a nationally representative three-stage sampling approach. In the first stage, 619 enumeration areas (EAs) were selected from a national frame (Nguyen, Kress, Villaveces, & Massetti, 2019). All VACS employ a split-sampling approach, whereby 296 and 323 EAs were designated for female respondents and male respondents, respectively. This approach is used to protect confidentiality and safety of respondents whose perpetrators may live in the same EA. In the second stage, 24 households were selected from each EA. In the final stage, one eligible participant aged 13–24 years was randomly selected from each household. Approximately 6,900 female and 7,540 male households were screened for eligibility. The final sample included 1,406 females and 1,299 males, though this analysis utilizes the male sample only. Written consent from caregivers and informed assent were obtained for all participants under age 18; respondents ages 18 and older provided consent directly. Surveys were implemented in private spaces. All study protocols for the Colombia VACS were approved by The Ethics and Research Methods Committee of the National Institute of Health of Colombia and the CDC's Institutional Review Board (Government of Colombia & Ministry of Health and Social Protection, 2019).

Measures of interest

Our analysis assessed one primary outcome of interest: non-partner violence perpetration. This dichotomous outcome was constructed from answers to the question, "Have you ever done any of the following to someone who is not your current or previous girlfriend, romantic partner, or wife?" Types of violence listed included: "slapping, pushing, shoving, shaking, or intentionally throwing something; punching, kicking, whipping or beating with an object; choking, smothering, trying to drown, or intentional burning; and threatening with a knife, gun, or other weapon". Respondents who answered 'yes' to any of these forms of violence perpetration received a '1' and a '0' otherwise.

Although all predictors of interest included in this analysis were collected at the individual level, they were organized across three levels of the social ecology: the individual, household, and community levels. Covariates capturing individual characteristics included age, completion of primary school, whether the respondent had ever been married or lived with a partner as if married, and whether the respondent had reported substance or alcohol

abuse in the last 30 days. A dichotomous measure signaling the respondent's agreement with at least one of five statements endorsing gender inequity was also included. Finally, five dichotomous covariates were created, each representing lifetime victimization for physical violence perpetrated by a caregiver, physical violence perpetrated by a peer, physical violence perpetrated by an authority figure, sexual violence, and emotional violence. Predictors of interest capturing household experiences and characteristics comprised two dichotomous variables indicating whether the respondent's mother or father had died or lived apart from the respondent during childhood. A dichotomous measure of whether the respondent witnessed IPV within the household as a child was also included.

Lastly, a dichotomous measure was constructed to signal respondents who lived in a household that was listed on the national Victim's Unique Registry (*Registro Único de Víctimas* or RUV in Spanish) (Government of Colombia, 2021). This registry is a database of self-enrolled victims of the Colombian armed conflict, applicable for events occurring since January 1, 1985, and who are classified under a typology of 13 types of events that led to their or their family's victimization. Victims under this registry receive humanitarian aid and longer-term reparation benefits. Lastly, two variables measured at the individual level were included to proxy for violence at the community level. The first variable indicated whether a respondent answered once or more to the question, "Outside of your home and family environment, how many times did you see anyone get attacked;" the second signaled whether a respondent answered once or more to the question, "In a situation of combat within the internal conflict, how many times did you see anyone get attacked?" All variables were self-reported.

Analysis

We first estimated descriptive statistics for all variables included in our model. We then used logistic regressions to estimate the relationships between the covariates representing each of the three spheres of the ecology, separately, and considering covariates from all three spheres simultaneously. Missing data were present for seven of the covariates included in the analysis, resulting in exclusion of 30% of the sample for analysis. As such, regression analysis was conducted on imputed data to ensure key findings were not impacted by potential bias in missingness for these three variables. Assuming the data were missing at random, a multiple imputation approach was employed using a selection framework and fully conditional specification with 'mi impute' in Stata, where ten imputations were created for each observation with a missing value. Reported estimates of imputed values represent the average weighted estimation of the ten imputations on a logarithmic scale. Further, as certain covariates may vary by age range (adolescent boys as compared to young men), models were estimated for two strata: 13–17-year-olds and 18–24-year-olds. All observations were weighted to be representative of males ages 13–24 and standard errors were adjusted for the complex sampling design. All analyses were conducted in Stata14 (Stata Corporation, 2015).

Results

The prevalence of violence perpetration against someone other than an intimate partner among males ages 13–24-years-old was 23% (see Table 1). The prevalence of lifetime physical violence victimization ranged from 10% for physical violence perpetrated by an authority figure to 37% for physical violence perpetrated by a peer. Nearly 1 in 5 (18%) of 13–24-year-old males lived in a household on the national victim registry. Finally, more than half of adolescent boys and young men witnessed community violence, and 17% have witnessed violent events related to the internal armed conflict, specifically, in their communities.

Table 2 presents results from the regression analyses using multiple imputation. When controlling for covariates at the individual level only (see column i), findings reveal that those who have ever been married or lived with someone as if married exhibit 3.8 times greater odds [95% CI=1.27,11.38] of perpetrating violence. Violence victimization is associated with perpetration for males, with physical violence from peers and emotional violence from caregivers exhibiting the strongest associations [aOR=5.78; 95% CI=2.86,11.68 and aOR=4.37; 95% CI=1.26,15.13], respectively. With respect to household exposures, we found that those whose mothers lived apart or died during childhood had significantly greater odds [aOR=3.49; 95% CI=1.83,6.66] of perpetrating violence; those who witnessed IPV as a child also exhibited an increased likelihood of perpetrating violence [aOR=3.36; 95% CI=1.43,7.94]. Finally, witnessing community violence [aOR=3.30; 95% CI=1.28,8.53] and internal conflict [aOR=2.64; 95% CI=1.26,5.52] within the community were both correlated with violence perpetration.

We observed a few key differences when controlling for covariates across multiple levels of the ecology. Specifically, the associations for experiencing physical violence from peers, experiencing emotional violence, experiencing the absence of a mother, and witnessing community violence, all remained highly significant. All other variables in column iv (Table 2) were not statistically significant.

Finally, Tables 3 and 4 present regression results for 13–17-year-olds and 18–24-year-olds, separately, in order to ascertain the extent to which certain correlates of violence perpetration are more relevant for certain age groups. When controlling for all covariates, findings show that violence perpetration among 13–17-year-old males is associated with physical violence victimization by peers [aOR=4.32; 95% CI= 1.66, 11.26], emotional violence victimization by caregivers [aOR=4.30; 95% CI= 1.49, 12.41], and having lost or lived apart from one's mother for at least six months [aOR=3.30; 95% CI= 1.24, 8.83]. A different set of correlates emerge for young men ages 18–24 years old. Specifically, the analysis finds that physical violence victimization from caregivers [aOR=3.64; 95% CI= 1.54, 8.57], physical violence victimization by peers [aOR=8.12; 95% CI= 3.02, 21.84], and having witnessed internal conflict within the community [aOR=3.25; 95% CI= 1.15, 9.16] are all associated with perpetrating violence. Additionally, having completed primary school [aOR=0.07; 85% CI=0.01,0.59] and having a father who passed away or lived apart from the respondent during the respondent's childhood 9aOR=0.37; 95% CI=0.16,0.88] were protective of violence perpetration for this age group.

Discussion

The present analysis examines the risk and protective factors for youth violence perpetration among males in Colombia. Key findings for the full 13–24-year-old sample reveal strong associations between physical violence victimization by peers, emotional violence victimization, having lost or been separated from a mother during childhood, and witnessing community violence, with violence perpetration for male youth. While most socioecological models examine risk factors for violence victimization (Yakubovich et al., 2018), our present analysis critically examines risk factors associated with violence perpetration. Findings from this study, alongside previous research on intimate partner violence, highlight the overlap in some individual-level risk factors for youth and intimate partner violence perpetration among young men; in particular, experiencing violence during childhood is strongly correlated with both forms of perpetration in adolescence (Fleming et al., 2015; Guedes et al., 2016; Swahn et al., 2012). Programs that seek to prevent violence against children or mitigate the harmful impacts of such childhood exposures through mental health and psychosocial support, may have dual benefits for both partner and non-partner violence.

Our findings also emphasize the notable influence of factors at others levels of the ecology, such as witnessing community violence. There are a couple pathways through which witnessing community violence may increase an adolescent boy's inclination to perpetrate violence. First, young men who witness community violence are also more likely to live in violent communities where they may feel compelled to perpetrate violence as a means of protecting themselves and their loved ones (Browne et al., 2021; O'Dea, Chalman, Castro Bueno, & Saucier, 2018). Second, adolescence is a period of critical identity formation, whereby prevalent behaviors in the adolescent's environment may be processed, internalized, and adopted in the short- and long-term (Steinberg, 2005; Waterman, 1982). In communities where adolescent boys are likely to witness their male peers engaging in violent behavior, they are also more likely to perceive these behaviors as normative and perhaps even a necessary condition of masculinity (John et al., 2017). Programs targeting reduction of youth violence may consider including individuals of other ages to act as an alternative reference group to promote non-violent social norms and effectively reduce violence in the community more broadly.

The significance of the maternal presence variable indicates that mothers may critically influence behavioral health outcomes of their adolescent son(s). Yet there is a notable gap of supportive literature explicitly examining maternal influence on outcomes among children and youth; instead, research examining parental absence tends to focus on the normative parental unit (i.e., father and mother) or solely on the father. Tangential literature has identified that adolescent females and males with an absent mother have greater odds of involvement in violence perpetration and victimization in South Africa (Sui, Massar, Ruiter, & Reddy, 2020). In theorizing about this association, the absence or death of a mother may motivate boys to seek belonging elsewhere; previous research finds that boys without a traditional nuclear family are more susceptible to joining gangs in their search for a replacement "family" (Cruz, Rosen, Amaya, & Vorobyeva, 2017). However, as only the absence of the mother – and not the father – was found to be associated with increased likelihood of perpetration for adolescent males, additional pathways may contribute to this

risk. Much as our findings indicate that physical violence victimization from peers and witnessing community-level violence are significantly associated with violence perpetration and may signal that males are conditioned to express their emotions in outward, aggressive ways, the absence of a mother may stymie opportunities for adolescent males to learn other ways to express their emotions.

The finding that nearly one-quarter of 13–24-year-old males reported perpetrating youth violence reiterates similar findings of early violence perpetration from elsewhere in Latin America (Cruz et al., 2017), and emphasizes the importance of policies and programs to work with boys earlier in the life course to successfully target upstream prevention. Stakeholders working toward the prevention of violence against children increasingly recognize the value in implementing primary and secondary prevention programs earlier on in childhood to achieve maximal impact (Stark et al., 2019). However, these programs often focus on children as victims of violence and seek to affect change through parenting interventions, livelihoods programs for families or caregivers, and promotion of schooling, among others (World Health Organization, 2018).

Findings from this study should be considered alongside a few limitations. First, the VACS data are cross-sectional, limiting our ability to assert temporality for the associations observed. Second, all data are self-reported and subject to recall and other reporting biases. The extent to which males underreport perpetration because of social desirability or other concerns is unknown. Finally, although the stratified analyses revealed differences in correlates of violence perpetration by age group, the outcome of interest and the majority of covariates included in the model are measured as lifetime exposure (or exposure before age 18). As such, although these differences may suggest that emotional violence victimization before age 18, for example, has a lesser impact on violence perpetration than victimization from 18–24 years old, these nuances cannot be explored with the data employed. Nonetheless, this study provides unique, nationally representative insights into the predictors of youth violence perpetration among boys in Colombia, pointing to several opportunities for effective programming and policy.

Results from this study imply upstream approaches may also prove effective in reducing the likelihood of boys' perpetration of violence later in adolescence.

Programs that promote healthy mechanisms for conflict resolution and less aggressive conceptualizations of masculinity at younger ages may reduce aggressive behavior later in adolescence. Such longer-term benefits should be assessed for relevant programs targeting younger children in Colombia, such as Aulas en Paz (Classrooms in Peace). Aulas en Paz is an elementary school-based program for the prevention of aggression and promotion of peaceful relationships developed 15 years ago in Colombia (now also implemented in Mexico, Chile and Peru), that has been proven to be effective in increasing prosocial behavior and assertiveness, and reducing aggressive behavior and verbal victimization among child participants (Chaux, 2007, 2009; Chaux et al., 2017). Future research might usefully explore whether these outcomes are sustained through adolescence.

Such interventions and policies can be integrated into the increasingly robust legislative framework the government of Colombia has adopted to reduce violence against children and youth. Law 1098, enacted in 2006, otherwise known as the "Youth and Adolescent Code", notably recognized youth and young adults as holders of legal rights under Colombian law (Congreso de Colombia, 2006). In 2021, as part of a more comprehensive national strategy to end violence against children, two additional laws were passed; one, eliminating the statutes of limitations for sexual violence committed against minors and another banning corporal punishment against children ("Ley No. 2081," 2021; "Ley No. 2089," 2021). In addition, the evidence presented in this study points to the importance of creating and implementing a violence prevention strategy for young offenders in or at risk for entering the Youth Penal Responsibility System (SRPA - Sistema de Responsabilidad Penal Adolescente) in Colombia. Administrative data from the Colombian Family Welfare Institute (the government agency in charge of the SRPA management) shows that a large proportion of young offenders has been charged with committing violent crimes (Instituto Colombiano de Bienestar Familiar, 2021). Those entering the SRPA often exhibit many of the risk factors associated with violence perpetration identified in this study. For example, a recent study found that in the two largest detention centers for young offenders in Bogotá, Colombia, less than 20% of the young men and women lived with both their parents before they were prosecuted and sent to centers (López, 2020), suggesting that intervention at this point serves as a window of opportunity to interrupt future violence perpetration.

In Colombia, addressing risks of violence perpetration among adolescents and young men are key to inform better implementation of emerging interventions aimed at preventing or controlling violent behaviors among adolescents and young men.

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Table 1.

Self-reported individual, household, and community characteristics, 13–24-year-old males, 2018 Colombia Violence Against Children and Youth Survey.

| Individual level | |
|--|--------------------|
| Non-IPV perpetration, ever | 0.23 [0.172,0.284] |
| Basic demographics | |
| Completed primary school | 0.97 [0.951,0.985] |
| Ever married or living with partner as if married | 0.20 [0.144,0.252] |
| Accepting of at least one gender inequitable statement | 0.40 [0.318,0.490] |
| Substance or alcohol use, past 30 days | 0.50 |
| | [0.423,0.568] |
| Violence victimization, ever | |
| Physical violence from a caregiver | 0.22 [0.163,0.272] |
| Physical violence from peers | 0.37 [0.298,0.451] |
| Physical violence from authority figure | 0.10 [0.059,0.136] |
| Emotional violence | 0.16 [0.117,0.201] |
| Sexual violence | 0.13 [0.087,0.167] |
| Household | |
| Member of national victim registry | 0.18 [0.125,0.233] |
| Mother died or lived apart during childhood | 0.17 [0.125,0.217] |
| Father died or lived apart during childhood | 0.40 [0.344,0.462] |
| Witnessed IPV as a child | 0.16 [0.122,0.204] |
| Community | |
| Witnessed community violence outside the home | 0.55 [0.483,0.611] |
| Witnessed internal conflict in the community | 0.17 [0.118,0.215] |

Note: All observations are weighted to be representative of 13–24-year-old males in Colombia. 95% Confidence Intervals are adjusted for the complex sampling design. 'Accepting of at least one gender inequitable statement' reflects those who agreed with at least one of five statements supporting gender inequitable roles; 'substance or alcohol use, past 30 days' is defined as having at least one day in the last 30 days in which the respondent consumed at least four alcoholic drinks and/or used drugs; members of the national victim registry reflect households who have suffered a human rights violation; mother or father 'died or lived apart during childhood' is defined as when the parent passed away before the respondent turned 18 or lived apart from the respondent for at least 6 months before the respondent turned 18; 'witnessed IPV as a child' is defined as a respondent reporting witnessing intimate partner violence before age 18; 'witnessed internal conflict in the community' is defined as witnessing a situation of combat within internal conflict before age 18.

Table 2. Regression analysis estimating lifetime perpetration of youth violence using imputed data, males ages 13-24years-old, 2018 Colombia Violence Against Children and Youth Survey.

| | (i) | (i) (ii) | (iii) | (iv) |
|---|---------------------------|--------------------------|-------------------------|-----------------------|
| | Individual | Household | Community | All |
| | aOR [95% CIs]* | aOR [95% CIs] | aOR [95% CIs] | aOR [95% CIs] |
| Individual | | | | |
| Basic demographics | | | | |
| Completed primary school | 0.614 [0.210,1.797] | | | 0.769 [0.251,2.358] |
| Ever married or living with partner as if married | 3.855 ** [1.576,9.430] | | | 2.863 *[1.154,7.107] |
| Age | 0.971 [0.870,1.085] | | | 0.975 [0.872,1.090] |
| Accepting of at least one patriarchal statement | 1.074 [0.488,2.366] | | | 0.822 [0.408,1.656] |
| Substance and alcohol use, past 30 days | 0.493 [0.208,1.165] | | | 0.494 [0.214,1.139] |
| Violence victimization, ever | | | | |
| Physical violence from a caregiver | 1.69 [0.765,3.735] | | | 1.216 [0.518,2.854] |
| Physical violence from peers | 5.442*** [2.755,10.75] | | | 5.313***[2.797,10.09] |
| Physical violence from authority figure | 1.648 [0.764,3.555] | | | 1.561 [0.729,3.343] |
| Emotional violence | 3.688*[1.140,11.92] | | | 3.156*[1.274,7.821] |
| Sexual violence | 1.331 [0.513,3.452] | | | 1.4 [0.592,3.311] |
| Household | | | | |
| Member of national victim registry | | 0.963 [0.428,2.165] | | 1.064 [0.428,2.643] |
| Mother died or lived apart during childhood | | 2.628** [1.289,5.360] | | 3.272**[1.563,6.850] |
| Father died or lived apart during childhood | | 0.78 [0.442,1.375] | | 0.646 [0.340,1.227] |
| Witnessed IPV as a child | | 2.954** [1.488,5.864] | | 1.972 [0.797,4.878] |
| Community | | | | |
| Witnessed community violence outside the home | | | 3.070* [1.271,7.411] | 2.379*[1.094,5.173] |
| Witnessed internal conflict in the community | | | 2.561* [1.202,5.457] | 1.326 [0.523,3.360] |

aOR = Adjusted Odds rations and 95% CIs = 95% Confidence intervals

Note: Adjusted odds ratios are estimated using multivariate logistic regression on imputed data. All observations are weighted to be representative of 13-24-year-old males in Colombia. Confidence intervals are adjusted for the complex sampling design. Odds ratios are statistically significant at

p<0.05,

p<0.01, and

p<0.001. 'Accepting of at least one gender inequitable statement' reflects those who agreed with at least one of five statements supporting gender inequitable roles; 'substance or alcohol use, past 30 days' is defined as having at least one day in the last 30 days in which the respondent

consumed at least four alcoholic drinks and/or used drugs; members of the national victim registry reflect households who have suffered a human rights violation; mother or father 'died or lived apart during childhood' is defined as when the parent passed away before the respondent turned 18 or lived apart from the respondent for at least 6 months before the respondent turned 18; 'witnessed IPV as a child' is defined as a respondent reporting witnessing intimate partner violence before age 18; 'witnessed internal conflict in the community' is defined as witnessing a situation of combat within internal conflict before age 18.

Table 3.

Regression analysis estimating lifetime perpetration of youth violence using imputed data, males ages 13–17-years-old, 2018 Colombia Violence Against Children and Youth Survey.

| | (i) | (ii) | (iii) | (iv) |
|---|------------------------|--------------------------|------------------------|------------------------|
| | Individual | Household | Community | All |
| | aOR [95% CIs]* | aOR [95% CIs] | aOR [95% CIs] | aOR [95% CIs] |
| Individual | | | | |
| Basic demographics | | | | |
| Completed primary school | 0.704 [0.114,4.341] | | | 1.405 [0.339,5.826] |
| Ever married or living with partner as if married | 0.728 [0.162,3.276] | | | 1.167 [0.258,5.271] |
| Age | 1.159 [0.853,1.574] | | | 1.109 [0.815,1.510] |
| Accepting of at least one patriarchal statement | 2.03 [0.666,6.187] | | | 1.198 [0.401,3.578] |
| Substance and alcohol use, past 30 days | 0.179 [0.0280,1.149] | | | 0.225 [0.0395,1.282] |
| Violence victimization, ever | | | | |
| Physical violence from a caregiver | 0.821 [0.223,3.032] | | | 0.724 [0.208,2.521] |
| Physical violence from peers | 3.881 ** [1.570,9.592] | | | 4.320**[1.658,11.26] |
| Physical violence from authority figure | 3.527*[1.035,12.02] | | | 2.867 [0.861,9.546] |
| Emotional violence | 5.655 ** [1.530,20.90] | | | 4.304 ** [1.493,12.41] |
| Sexual violence | 2.487 [0.419,14.74] | | | 3.284 [0.734,14.70] |
| Household | | | | |
| Member of national victim registry | | 0.783 [0.228,2.690] | | 0.839 [0.243,2.894] |
| Mother died or lived apart | | 2.128 [0.754,6.005] | | 3.302*[1.235,8.832] |
| Father died or lived apart | | 1.303 [0.568,2.992] | | 1.246 [0.427,3.640] |
| Witnessed IPV, ever | | 3.223 * [1.190,8.731] | | 2.367 [0.621,9.022] |
| Community | | | | |
| Witnessed community violence outside the home | | | 1.754 [0.542,5.682] | 1.721 [0.505,5.868] |
| Witnessed internal conflict in the community | | | 0.844 [0.289,2.468] | 0.539 [0.0924,3.151] |

aOR = Adjusted Odds rations and 95% CIs = 95% Confidence intervals

Note: Adjusted odds ratios are estimated using multivariate logistic regression on imputed data. All observations are weighted to be representative of 13–24-year-old males in Colombia. Confidence intervals are adjusted for the complex sampling design. Odds ratios are statistically significant at

p<0.05,

p<0.01, and

p<0.001. 'Accepting of at least one gender inequitable statement' reflects those who agreed with at least one of five statements supporting gender inequitable roles; 'substance or alcohol use, past 30 days' is defined as having at least one day in the last 30 days in which the respondent consumed at least four alcoholic drinks and/or used drugs; members of the national victim registry reflect households who have suffered a human rights violation; mother or father 'died or lived apart' is defined as when the parent has passed away or lived apart from the respondent for at least

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6 months; 'witnessed IPV as a child' is defined as a respondent reporting witnessing intimate partner violence; 'witnessed internal conflict in the

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community' is defined as witnessing a situation of combat within internal conflict.

Table 4.

Regression analysis estimating lifetime perpetration of youth violence using imputed data, males ages 18–24-years-old, 2018 Colombia Violence Against Children and Youth Survey.

| | (i) | (ii) | (iii) | (iv) |
|---|-----------------------|--------------------------|---------------------------|-------------------------|
| | Individual | Household | Community | All |
| | aOR [95% CIs]* | aOR [95% CIs] | aOR [95% CIs] | aOR [95% CIs] |
| Individual | | | | |
| Basic demographics | | | | |
| Completed primary school | 0.128 *[0.0239,0.691] | | | 0.0683 *[0.00791,0.590] |
| Ever married or living with partner as if married | 4.515**[1.589,12.83] | | | 2.658 [0.999,7.071] |
| Age | 0.872 [0.722,1.054] | | | 0.87 [0.714,1.061] |
| Accepting of at least one patriarchal statement | 0.807 [0.337,1.929] | | | 0.618 [0.216,1.770] |
| Substance and alcohol use, past 30 days | 0.865 [0.332,2.252] | | | 0.835 [0.292,2.381] |
| Violence victimization, ever | | | | |
| Physical violence from a caregiver | 3.779**[1.690,8.449] | | | 3.636**[1.543,8.571] |
| Physical violence from peers | 10.74***[3.826,30.12] | | | 8.117 *** [3.017,21.84] |
| Physical violence from authority figure | 1.13 [0.468,2.731] | | | 1.157 [0.463,2.891] |
| Emotional violence | 1.539 [0.610,3.882] | | | 1.389 [0.471,4.096] |
| Sexual violence | 1.007 [0.443,2.289] | | | 0.828 [0.333,2.054] |
| Household | | | | |
| Member of national victim registry | | 1.077 [0.391,2.969] | | 1.033 [0.353,3.020] |
| Mother died or lived apart during childhood | | 3.058* [1.164,8.033] | | 1.564 [0.667,3.665] |
| Father died or lived apart during childhood | | 0.565 [0.272,1.174] | | 0.370*[0.155,0.883] |
| Witnessed IPV as a child | | 3.041** [1.364,6.780] | | 1.328 [0.533,3.309] |
| Community | | | | |
| Witnessed community violence outside the home | | | 5.563** [1.768,17.50] | 3.998 [0.793,20.14] |
| Witnessed internal conflict in the community | | | 4.183 ** [1.562,11.21] | 3.248*[1.152,9.156] |

^{*}aOR = Adjusted Odds rations and 95% CIs = 95% Confidence intervals

Note: Adjusted odds ratios are estimated using multivariate logistic regression on imputed data. All observations are weighted to be representative of 13–24-year-old males in Colombia. Confidence intervals are adjusted for the complex sampling design. Odds ratios are statistically significant at

p<0.001. 'Accepting of at least one gender inequitable statement' reflects those who agreed with at least one of five statements supporting gender inequitable roles; 'substance or alcohol use, past 30 days' is defined as having at least one day in the last 30 days in which the respondent consumed at least four alcoholic drinks and/or used drugs; members of the national victim registry reflect households who have suffered a human

p<0.05,

p<0.01, and

^{***}

rights violation; mother or father 'died or lived apart during childhood' is defined as when the parent passed away before the respondent turned 18 or lived apart from the respondent for at least 6 months before the respondent turned 18; 'witnessed IPV as a child' is defined as a respondent reporting witnessing intimate partner violence before age 18; 'witnessed internal conflict in the community' is defined as witnessing a situation of combat within internal conflict before age 18.