Same-Sex Romantic Attraction and Experiences of Violence in Adolescence

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ABSTRACT

Objectives. Recent national attention to hate crimes committed against lesbian, gay, and bisexual youths has highlighted the need to understand this group's experiences of violence. Using nationally representative data, we examine the associations between romantic attraction and experiences of violence, as well as the risk of witnessing violence and perpetrating violence against others.

Methods. Data from the National Longitudinal Study of Adolescent Health were examined. Youths reporting same-sex and both-sex romantic attractions were compared with those reporting other-sex attractions. Survey logistic regression was used to control for sample design effects.

Results. Youths who report same-sex or both-sex romantic attraction are more likely to experience extreme forms of violence than youths who report other-sex attraction. Youths reporting same-sex and both-sex romantic attractions are also more likely to witness violence. The higher incidence of violence perpetrated by youths attracted to the same sex is explained by their experiences of violence.

Conclusions. These findings provide strong evidence that youths reporting same-sex or both-sex romantic attraction are at greater risk for experiencing, witnessing, and perpetrating violence. (*Am J Public Health.* 2001;91:903–906)

In recent years, public attention has been drawn to violence experienced by lesbian, gay, and bisexual (LGB) youths. However, little research has documented the degree to which LGB youths are at risk of being victims of violence. Most past research has been based on nonrepresentative, community-based samples of youths that self-identify as LGB. One study of 165 lesbian and gay youths reported that 80% had experienced verbal abuse in their lifetime and that 44% had been threatened with violence.[1] A study of 500 gay and lesbian youths found that 41% had experienced violence, and 46% of that violence was reported to be related to being gay.[2]

Several recent studies have used state-level representative data to examine associations between adolescent sexual self-identity or same-sex sexual behavior and experiences of violence. Data from the 1995 Vermont Youth Risk Behavior Survey (YRBS) indicate that among sexually active young men, having multiple male sexual partners was associated with more frequent reports of threats of physical violence, threats or injuries with a weapon at school, and fights that resulted in a need for medical attention. In addition, young men reporting same-sex sexual partners were more likely than their heterosexual peers to carry a weapon.[3] Similarly, a study of the 1993 Massachusetts YRBS found that among sexually active youths, those who had engaged in same-sex sexual behavior were more likely to have been threatened or injured with a weapon at school and to have been in 10 or more physical fights.[4] Students in the 1995 Massachusetts YRBS who identified themselves as LGB reported higher frequencies of having been threatened with a weapon at school, fighting, and injuries from fighting that required medical attention; they also were more likely to report weapon and gun carrying.[5]

In sum, past studies indicate that same-sex sexual behavior and identity are associated with greater risk for experiencing or being threatened with violence and with carrying weapons. Representative studies based on the YRBS greatly improve on the body of research based on convenience samples of lesbian and gay youths; however, they are limited to 2 states and do not account for differences based on family background or neighborhood context. Using data from the first wave of the National Longitudinal Study of Adolescent Health (Add Health Study), we sought to determine whether youths who report same-sex romantic attraction are (a) at higher risk for *experiencing violence*, (b) more likely to *witness violence*, or (c) more likely to *perpetrate violence* than their peers. We also examined the relationships between experiencing and witnessing violence and the perpetration of violence for this group of youths.

Methods

We used data from the main in-home sample of the first wave of the Add Health Study. The sampling frame included all high schools in the United States as well as their largest feeder schools. More than 12000 adolescents in grades 7 to 12 were participants in the representative core of the in-home survey; additional youths were included as participants in oversamples of specific minority groups,[6] but they are not included in our analyses. Respondents with missing data on measures of ro-

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mantic attraction or violence (described below) are excluded from analyses (12.5% of the sample), as are respondents younger than 13 and older than 18 years (5% of the sample). Portions of the interview, including information on romantic attractions and violence, were collected by having the respondents listen to questions through earphones while recording their responses on a laptop computer (audio computer-aided self-interview). This method reduces the potential for interviewer or parental influence on the responses of adolescents, and it strengthens the validity of the sensitive data considered in the analyses.[7,8]

Two questions regarding romantic attractions were included on the in-home survey: "Have you ever had a romantic attraction to a female?" and "Have you ever had a romantic attraction to a male?" This measure allows for the study of youths defined by their romantic attractions to the same sex, to both sexes, and to neither sex, with romantic attractions only to the other sex as the reference category. Data on violence include information about fighting, being a victim of violence, witnessing violence, and perpetrating violence; all refer to the past 12 months. Measures of fighting include "You got into a physical fight" (*fighting*; 1=yes, 0=no) and "How many times were you in a physical fight in which you were injured and had to be treated by a doctor or nurse?" (*medical treatment needed*; dichotomous, 1=1 or more times, 0=none). Measures of victimization include "Someone pulled a knife or gun on you" (*threat of violence*; 1=yes, 0=no), "You were jumped" (*jumped*; 1=yes, 0=no), and "Someone shot you" or "Someone cut or stabbed you" (combined as *violent attack*; 1=yes to either or both, 0=no to both). *Witnessing violence* is measured with 1 item: "You saw someone shoot or stab another person" (1=yes, 0=no). Finally, *perpetrating violence* includes "You pulled a gun or knife on someone" and "You shot or stabbed someone" (1=yes to either or both, 0=no to both).

The Add Health Study allows for the use of multiple control variables to adjust for the greater risk for experiencing violence among adolescents from families with limited economic resources or who grow up in impoverished environments. We included measures of race and ethnicity (dichotomous variables for Black, Asian, Hispanic, and other, with non-Hispanic Whites as the reference group), parental education (years of education of the more educated parent), poverty status (dichotomous variable; 1=current welfare dependency, 0=no current welfare dependency), and intact family status (dichotomous variable; 1=married parents, 0=other family form). We also controlled for the respondent's age and urban or rural context (2 dichotomous variables, rural and urban, with suburban as the reference category). For a measure of the potential for violence and crime in a youth's neighborhood, we include a question asked of parents: "In this neighborhood, how big a problem are drug dealers and drug users?" (1=no problem at all; 3=a big problem). Parent surveys were missing for more than 2000 subjects; because this is a critical indicator of the potential for violence in adolescents' neighborhood environments, we coded missing cases to the mean to maximize the analytic sample size. The final sample for multivariate analyses included 10 587 youths.

Stata's survey logistic regression procedure (Stata Corp, College Station, Tex) was used to model the odds of experiencing, witnessing, and perpetrating violence; odds ratios and 95% confidence intervals are reported. Survey logistic regression using sample weights and strata enabled us to adjust for the clustered sample design of the Add Health Study.[9] For analyses of experiencing and witnessing violence, romantic attraction and all control variables were entered into the model simultaneously. Two-step hierarchical models were used in the analysis of violence perpetration; romantic attraction and all controls were entered first, followed by the addition of experiencing and witnessing violence.

Results

Six percent of the Add Health Study participants reported same-sex romantic attraction. One percent of the total sample reported same-sex romantic attraction only, whereas 5% reported attraction to both sexes. The remaining youths reported attractions to the other sex (82.6%) and to neither sex (11.4%). Fighting was reported by nearly a third of the respondents (31.2%); 8.7% of these fights were severe enough to require medical treatment. Victimization was less common than fighting; 12.3% reported threats, 10.9% being jumped, and 5.4% a violent attack. Witnessing violence was reported by 11.7% of the youths. Finally, 4.8% of the youths perpetrated violence against others. Because young women in the study consistently reported less frequent experiences with violence, we tested all further analyses for interactions between romantic attractions and sex (results available upon request). No differences were found; all analyses presented in this report are based on a sample that combines males and females.

When family background and neighborhood character are held constant for all respondents, romantic attraction does not predict physical fighting (Table 1). However, youths attracted to the same sex and to both sexes were more likely than youths attracted to the other sex to have been in a fight that resulted in the need for medical treatment. Those romantically attracted to both sexes were more likely to have been jumped and violently attacked. Finally, youths attracted to the same or to both sexes were more likely to have witnessed violence.

Youths reporting attraction to both sexes were no more likely than youths attracted to the other sex to perpetrate violence against others. However, youths attracted to the same

TABLE 1—Odds of Fighting, Victimization, and Witnessing Violence by Romantic Attraction: National Longitudinal Study of Adolescent Health

Experience of Violence	n	OR[a]	95% CI
Physical fight (total n=10 582)			
Romantic attraction to same sex	108	0.88	0.52, 1.48
Romantic attraction to both sexes	524	1.11	0.90, 1.38
Medical treatment needed (total n=10 582)			
Romantic attraction to same sex	108	1.93	1.13, 3.29
Romantic attraction to both sexes	524	1.57	1.16, 2.12
Threat of violence (total n=10 584)			
Romantic attraction to same sex	108	1.17	0.63, 2.18
Romantic attraction to both sexes	523	1.08	0.77, 1.51
Jumped (total n=10 582)			
Romantic attraction to same sex	108	1.14	0.60, 2.16
Romantic attraction to both sexes	524	1.37	1.01, 1.84
Violent attack (total n=10 587)			
Romantic attraction to same sex	108	1.86	0.86, 4.01
Romantic attraction to both sexes	524	1.43	1.01, 2.01
Witnessing violence (total n=10 579)			
Romantic attraction to same sex	108	1.89	1.09, 3.28
Romantic attraction to both sexes	523	1.48	1.06, 2.06

Note. OR=odds ratio; CI=confidence interval.
[a]Adjusted for race/ethnicity, parental education, poverty status, intact family status, age, urban/rural context, and neighborhood drug problems.

TABLE 2—Odds of Perpetrating Violence, by Romantic Attraction: National Longitudinal Study of Adolescent Health

Youths Perpetrating Violence (Total n = 10 573)	n	Model 1		Model 2	
		OR[a]	95% CI	OR[a]	95% CI
Romantic attraction to same sex	108	2.35	1.18, 4.69	1.68	0.77, 3.66
Romantic attraction to both sexes	523	1.19	0.80, 1.77	1.00	0.70, 1.44
Medical treatment needed				2.42	1.86, 3.16
Witnessing violence				9.57	7.40, 12.37

Note. OR = odds ratio; CI = confidence interval.
[a]Adjusted for race/ethnicity, parental education, poverty status, intact family status, age, urban/rural context, and neighborhood drug problems.

sex were more than twice as likely to perpetrate violence (Model 1, Table 2). Because youths attracted to the same sex were at greater risk for both being in fights that required medical attention and witnessing violence, we tested whether the perpetration of violence among youths attracted to the same sex was influenced by their victimization experiences. We did this by including *medical treatment needed* and *witnessing violence* in the model predicting perpetration of violence. The results (Model 2, Table 2) indicate that once these experiences of violence are taken into account, same-sex attraction loses its strong effect on perpetration. Thus, although youths reporting same-sex romantic attractions were more likely than their peers to perpetrate violence against others, this difference can be accounted for by their experiences of violence.

Discussion

Consistent with past research on LGB youths and youths with same-sex sexual partners, our study indicates that youths who report same- or both-sex romantic attractions are at risk for experiencing violence. We present the first national-level examination of same-sex sexuality and violence among adolescents. As in past studies, we draw our data from a school-based sample. Because LGB youths may be more likely to be out of school owing to problems at school or home,[10,11] including violence, our findings are most likely underestimates of the degree to which these youths experience violence.

We found that compared with their peers with heterosexual romantic attractions, only youths attracted to both sexes are at higher risk for being jumped or attacked; they and youths attracted to the same sex are at higher risk for being in physically dangerous fights. In past studies, self-identifying bisexual youths or those who reported sexual behavior with both sexes were included in one "non-heterosexual" category. Little is known about adolescent bisexuality; our work suggests that future studies of adolescent sexual orientation should include attention to variability within same-sex orientation groups.

We found that youths attracted to the same sex and youths attracted to both sexes are more likely to report witnessing violence than are their peers. One of the challenges faced by LGB youths is the lack of safe places to meet one another to socialize and experience the normal developmental processes of learning about and experimenting with friendship and intimacy. As a result, gay bars and nightclubs are often important destinations for gay and lesbian youths.[12] Bars and nightclubs are often located in less desirable, if not dangerous, areas in cities, and they are intended to be adult spaces. It is likely that in seeking LGB communities, LGB youths put themselves in settings where they are more likely to witness violence. We are unable to directly address these questions with the Add Health Study data; future in-depth studies of gay and lesbian youths and the unique challenges that they face are critical for understanding ways to prevent adolescent exposure to violence.

This study is the first to indicate that youths reporting same-sex romantic attraction are more likely than their peers to perpetrate extreme forms of violence against others (pulling a gun or knife on someone, shooting or stabbing someone). Although the prevalence of extreme violent crime is very low among US teenagers and thus violence committed by youths attracted to the same sex is rare, this finding is disturbing. On the one hand, this finding suggests that these youths actually use the weapons that, as reported in past studies, LGB youths[5] and boys engaging in same-sex sexual behavior[3] are disproportionately likely to carry. Yet, because experiences of violence account for their higher rates of perpetration, our analyses also indicate that the perpetration of violence by youths attracted to the same sex may be generated by feelings of fear and the need for self-defense.

Experiences of violence during adolescence play a role not only in violence perpetration but also in compromised mental health.[13] Because the subject of suicide was one of the first areas of attention in the research literature on adolescent sexual orientation, multiple studies have examined the link between victimization and mental health or suicidality among LGB adolescents. One study documented the strong link between victimization and compromised mental health among LGB youths, although no direct link between victimization and suicidality was found.[1] A study of the 1995 Massachusetts YRBS indicated that along with drug use, experiences of violence mediate the association between sexual orientation (measured as LGB and "not sure") and suicide attempts, but only for girls.[14] A recent study that used the Add Health sample reported that victimization, along with hopelessness, depression, alcohol abuse, and the suicide attempt of a family member or friend, partially explains the association between same-sex romantic attraction or relationships and suicidal thoughts and attempts for both boys and girls.[15] While these past studies relied on different measures of same-sex sexuality (identity or attraction) and had results that differ on the basis of sex and the mental health outcomes, together they strongly suggest that the violence disproportionately experienced by LGB or same-sex-attracted youths affects their emotional health.

The lack of adequate social science focused on LGB people continues to prevent more complete understanding of their lives. We believe that our measure of romantic attraction taps an important dimension of sexual orientation and provides information that is lost in measures of self-acknowledged sexual identity alone. However, we are unable to directly compare our findings with past research on self-identified LGB adolescents or with past studies that asked adolescents questions regarding their lifetime sexual partners. This limitation has particular relevance for our study. Bias-motivated violence experienced by LGB youths is dependent on others' knowing, suspecting, or assuming that a student is lesbian, gay, or bisexual. Thus, experiences of violence may be more common among self-identified LGB youths, or youths who have "come out" to family and friends. On the other hand, youths may be more likely to be "out" in diverse and

accepting communities where the risk for homophobic violence may be lower. This study is limited by the lack of information on sexual identities (including lesbian, gay, bisexual, and transgender), how these identities are expressed (whether youths were "out"), and lifetime sexual behaviors.

As may be typical in research of understudied populations, we are left with more questions than answers. Past research on self-identified LGB youths suggests that the violence they experience is "gay-related,"[2] or due to their sexual orientation.[16] Further research is needed to document the relationship between bias motivations and experiences of violence. Also, past population-based studies provide growing evidence that LGB and same-sex sexually active youths are at risk for multiple health problems, including violence, and that these problems are strongly associated with one another.[3–5] Future research is needed to examine the processes by which these critical health risks interact and adversely affect young lives. Finally, community-based support for LGB youths has grown in recent years through the establishment of hotlines and youth clubs or organizations designed for LGB youths. A growing body of literature suggests that supportive spaces are important for positive youth development[17]; however, little is known about the important role that these supportive environments surely play in the lives of many lesbian, gay, bisexual, transgender, and questioning youths. Further research is needed to understand not only why many same-sex-attracted, sexually active, or self-identified LGB youths are at risk for violence and other risk outcomes but also why most negotiate adolescence without experiencing these outcomes. □

Contributors

S. T. Russell and B. T. Franz jointly conceptualized the study. S. T. Russell conducted the analyses and wrote the first draft of the paper (except for the references section). B. T. Franz wrote the first draft of the references section. A. K. Driscoll collaborated on the revision of the analyses. All authors jointly revised the manuscript.

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