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Defining virginity and abstinence: Adolescents' interpretations of sexual behaviors

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Abstract

Purpose—The current study examined adolescent conceptualizations of virginity and abstinence and whether differences in adolescent definitions of these terms differed by age, gender, ethnicity, and sexual experience.

Methods—A series of logistic regressions were conducted to examine whether gender, age, ethnicity and sexual experience predicted whether adolescents believed that an individual was still a virgin or abstinent after engaging in genital touching, oral sex, vaginal intercourse, or anal sex.

Results—Findings indicated that loss of virginity was linked primarily with vaginal and anal intercourse. While greater proportion of adolescents attributed a loss of abstinence to lower genital touching and oral sex behaviors as well, significant variability emerged in how abstinent behavior was defined. Sexual experience was the strongest predictor of how adolescents defined virginity and abstinence.

Conclusions—Significant differences exist in youths' definitions of abstinence and virginity. This suggests that additional attention is needed to ensure a common understanding of these terms in order to achieve successful sexual education and prevention programs.

Keywords

Adolescence; virginity; abstinence

In light of the increased attention given to virginity pledges and abstinence programs aimed at delaying adolescent vaginal intercourse, understanding adolescents' conceptualizations of sexual behavior has become increasingly important. Do adolescents who pledge to remain a virgin believe that behaviors other than vaginal intercourse are acceptable and outside the scope of their pledges? Does abstinence include touching a partner's genitals and/or participating in oral sex? It is unknown whether adolescents may be engaging in non-coital sexual behaviors such as oral sex more frequently than vaginal intercourse because they believe they will remain

virgins, or alternatively, because they believe they are engaging in abstinent behavior. The current study is a first step at understanding adolescent sexual behavior by assessing how adolescents define a range of sexual behaviors in terms of virginity and abstinence.

Previous studies addressing conceptualizations of virginity and abstinence have been conducted primarily among young adults.^{1,2} For example, one study asked college students to indicate whether each of 11 different sexual behaviors would be considered “having sex” if it was the most intimate behavior one engaged in with a partner. The items included deep kissing, oral (mouth) contact with breasts or nipples, and penile-anal intercourse. The results indicate that few college students considered deep kissing as sex (2%) whereas almost all considered penile-vaginal intercourse as having sex (99.5%). Interestingly, 60% did not think that oral-genital contact constitutes having sex whereas 81% believed that penile-anal intercourse does count as having sex.¹ Males were more likely than females to indicate that less risky sexual behaviors (e.g., genital touching) counted as having sex, although there were few affirmative answers to these items. In general, college students’ assessments of whether various behaviors constituted having sex did not differ by sexual experience.

A second study asked college students to assess whether two hypothetical characters, Jim and Susie, would consider certain sexual behaviors as sex.² More than 90% of respondents indicated that both Jim and Susie would consider both anal sex and vaginal intercourse as “sex.” However, less than 50% of respondents believed that Jim or Susie would consider oral sex “sex.” Additional analyses found that respondents believed that Susie would be more likely to think that oral sex was “sex” than Jim, and that recipients of oral sex were more likely to think oral sex was “sex” than those who performed the behavior.

Similar discrepancies have emerged when adolescents and young adults define abstinence. Among 1,101 college students, 24% indicated that anal intercourse was abstinent behavior, 37% did so regarding oral intercourse, and 10% did so regarding vaginal intercourse. A greater number indicated that participating in wet kissing (75%) and manual stimulation of another person to orgasm (61%) was abstinent behavior.³ The authors also found that sexually active students had a definition of abstinence knowledge that was more consistent with the Center for Disease Control’s definition than students who were not sexually active. A qualitative study assessing 14 Black adolescents’ definitions of abstinence found that, in general, youth believed that one was no longer abstinent if he or she engaged in penile-vaginal intercourse. However, adolescents considered couples that engaged in kissing and holding hands, genital touching, oral sex, and anal sex to be abstinent.⁴

The current study builds upon previous research examining how adolescents characterize sexual behavior. This study goes beyond previous studies in that it is one of the first studies to examine conceptions of both virginity and abstinence. Previous research that uses the terminology “having sex” confounds the concepts of virginity and abstinence. In addition, this is one of the first large scale studies to assess conceptualizations of virginity and abstinence among adolescents, as opposed to young adults, and to assess differences by age, gender, and sexual experience. Based on extant research, we hypothesize that adolescents will indicate that youth are neither abstinent or virgins if they participate in either vaginal or anal sex.

Methods

Procedures

This study uses data from the third wave of an NICHD-funded study on media exposure and adolescent sexual behavior. A list-assisted sample of households from 10 California counties was used to recruit study participants aged 12 to 16 at Wave 1. A total of 1,105 youth completed the first survey for a response rate of 75%. Wave 3 comprised 932 (84%) participants of which

925 provided data for the current study (7 participants who did not complete 9 or more of the items were dropped). Data were collected using in-home computer-assisted self interviews (CASIs) that averaged between 25 and 35 minutes in length. The CASIs were administered to the adolescents in a private setting. Written parental consent was obtained for all respondents as per the approved IRB protocol.

In order to preserve the length of the questionnaire, half of the participants were randomly selected to answer a series of questions relating to virginity while the remaining respondents were asked a parallel series of questions about abstinence. Preliminary analyses suggest group equivalency. That is, adolescents who responded to the abstinence questions did not differ significantly from the adolescents who responded to the virginity items in terms of gender, ethnicity (White, non-white), age, or oral sex, genital touching or anal intercourse experience. However, a greater proportion of adolescents who were assigned to the virginity items had engaged in vaginal intercourse (35.1%) than those who were assigned to the abstinence items (27.1%), $\chi^2(2, N=933) = 7, p < .01$.

Participants

The average age of the participants at Wave 3 was 16.3 ($SD = 1.4$, range = 14–19), with 51.3% ($n = 478$) males and 48.7% ($n = 454$) females. The sample comprised 84 Latinos (9.1%), 53 African Americans (5.7%), 48 Asian Americans (5.2%), 635 European Americans (68.6%), and 105 individuals of other ethnicities (11.4%).

Measures

Virginity and abstinence definitions—Respondents from the first subsample were asked a series of questions about how to define virginity. They were asked, “Is a boy still a virgin if he has: (a) touched someone’s genitals for a long time, (b) given oral sex to someone, (c) gotten oral sex from someone, (d) had sexual intercourse, (e) given anal intercourse to someone, and (f) gotten anal intercourse from someone.”

Respondents were also asked a similar set of questions with “girl” being the subject of the item. Respondents from the second subsample were asked to define abstinence. They were given the same set of questions as those in the virginity sample. However, they were asked “Is a boy (or girl) still abstinent if he has: (a) touched someone’s genitals for a long time, (b) given oral sex to someone, (c) gotten oral sex from someone, (d) had sexual intercourse, (e) given anal intercourse to someone, and (f) gotten anal intercourse from someone.” A total of 18 participants skipped one or more of the virginity items and 15 participants skipped one or more of the abstinence items. Individuals with missing data for the dependent variable were dropped from the analyses.

Sexual activity—Adolescent sexual activity was measured through a series of four dichotomous (yes/no) items and one continuous variable. Genital touching was assessed by combining the responses to the items: “Has a girl/boy ever touched your genitals?” and “Have you ever touched a girl’s/boy’s genitals?” Oral sex was measured by asking respondents, “Have you ever had oral sex with a girl/boy (When a girl/boy puts her/his mouth or tongue on your genitals or you put your mouth or tongue on a girl’s/boy’s genitals)?” Vaginal intercourse was measured by asking participants, “Have you ever had sexual intercourse? By sexual intercourse, we mean when a boy puts his penis into a girl’s vagina.” Anal intercourse was measured by asking participants, “How many times have you had anal intercourse with a girl? (By anal intercourse we mean when a boy puts his penis into another person’s anus, rectum, or butt.)” This item was recoded into a dichotomous item.

Background variables—Respondents were asked to indicate their current age, gender, and ethnicity. They were allowed to select from among eight racial/ethnic categories and more than one category could be selected. However, due to the small numbers of different ethnic minorities in the sample, the current analyses dummy coded ethnicity into a single variable categorizing ethnicity into either White non-Hispanic or non-white.

Analyses

A set of logistic regressions were conducted to assess the unique contribution of gender, age, and prior experience with the target sexual behavior in predicting adolescents' characterization of virginity and abstinence for males and females. On the basis of age, gender, and zip code, sample weights were calculated using recent census data and then applied to the sample to adjust for ethnic distributions in Los Angeles and San Francisco Bay Areas. Note that the regressions that focus on predictors of virginity are based on a sub-sample of $n = 453$ adolescents while the regressions that focus on predictors of abstinence are based on a different subsample ($n = 480$).

Results

A total of 83.5% of adolescents reported that an adolescent was still a virgin if he or she participated in genital touching, and 70.6% of adolescent believed that girls and boys retain their virginity if they participate in oral sex. Alternatively, 16.1% believed that an adolescent was still a virgin if he or she engaged in anal sex. A very small percentage (5.8%) of adolescents indicated that one was still a virgin if he or she engaged in vaginal intercourse. This pattern was consistent across gender, age group, ethnicity, and sexual behavior experience. We found a somewhat different pattern with respect to abstinence. Significant disagreement occurred regarding the target's status for all sexual behaviors except vaginal intercourse. The characterization of an individual as being abstinent was endorsed by 44.2% of respondents in reference to genital touching, 33.4% in reference to oral sex, 14.3% in reference to anal sex, and 11.9% in reference to vaginal intercourse.

Logistic Regressions, Defining Abstinence and Virginity

Table 1 presents the results from the logistic regressions predicting definitions of male and female virginity, with gender and sexual experience emerging as significant correlates. Females were more likely than males to view individuals of either sex as virgins if they had participated in genital touching or had performed oral sex on another person. Females were less likely than males to view males and females who engaged in vaginal intercourse as virgins. Older adolescents were more likely than younger adolescents to view females as virgins if they had engaged in genital touching. However, age did not emerge as a significant predictor for any other definition of virginity. Prior sexual experience predicted virginity definitions for males and females for all of the sexual behaviors except vaginal intercourse. Adolescents who reported having prior sexual experience with the index behavior (e.g. genital touching, oral sex) were between 3 to 8 times as likely as those without prior experience with the index behavior to agree that males and females engaging in these behaviors were virgins.

Unlike definitions of virginity, predictors of male and female abstinence formed a varied and more complex pattern (see Table 2). Female respondents were more likely to view females who engaged in genital touching as abstinent. Older adolescents were less likely than younger adolescents to define males and females who engaged in vaginal intercourse or anal intercourse as abstinent. Ethnicity also predicted abstinence definitions for males and females who engaged in vaginal sex and for males who performed anal intercourse. Specifically, white adolescents were less likely than non-whites to view those who engaged in these behaviors as abstinent.

Those with prior genital touching or prior oral sex experience were more likely to say that males and females who engaged in these behaviors were abstinent.

Discussion

Consistent with other studies that have examined the meanings of sexual behavior terminology, when we looked at conceptions of virginity we found greater consensus among young people's reports regarding sexual activities such as genital touching and vaginal intercourse, but more variability around oral and anal sex. This pattern of findings mirrors those of Sanders and Reinisch (1999)¹ who found that although only 1–2% of college students considered deep kissing or contact with breasts/nipples to be sex and 99.7% considered penile-vaginal intercourse to be sex, the sample was split 40% vs.60% in assessing whether oral-genital contact was sex.

A different pattern emerged with respect to abstinence. The only behavior where adolescents tended to indicate any agreement was in defining vaginal intercourse, with 89% of adolescents indicating that one was not abstinent if they had vaginal intercourse. Shared meaning for vaginal intercourse may exist as a result of vaginal intercourse often being target behavioral outcome, be it initiation, age of initiation, frequency, number of partners, or condom use, for many pregnancy and sexually transmitted infection (STI) education programs, and therefore the focus behavior of most prevention efforts. Alternatively, the fact that adolescents are less likely to agree on whether other sexual behaviors impact their virginity or abstinence status may reflect the lack of consensus in our own society about what constitutes “sex” as demonstrated by President Clinton's infamous line, “I did not have sex” in reference to oral sex.⁵ From an application standpoint, these findings point to the need for educational programs to discuss a wide range of sexual behaviors, including genital touching, oral and anal sex, and their potential psychological and physical risks, especially given recent findings suggesting that some adolescents estimate little chance of contracting STIs from oral sex.⁶

In logistic regressions conducted to predict virginity definitions for the various sexual behaviors, there was only one significant difference associated with age and none related to ethnicity. Nearly all significant differences found were related to respondents' prior sexual experience and their gender. Females were more likely than males to say that an individual who had participated in genital touching or oral sex was still a virgin; however, males were more likely than females to report that those who had engaged in vaginal intercourse were still virgins. Note that this represents a small minority of adolescents as 94% of adolescents indicated that youth who had engaged in vaginal intercourse were no longer virgins. Yet about 10% of males believed a male or female was a virgin after engaging in vaginal intercourse versus 2% of females. Nonetheless, this finding may be indicative of an underlying gender difference in how males and females define virginity. Further research is warranted to assess how variables such as partner intimacy, religious beliefs, gender roles, or sexual knowledge may moderate this relationship.

Across behaviors, sexually-experienced youth were more likely to report that an individual who engaged in the behavior was still a virgin compared to those who were sexually-inexperienced with respect to that behavior. This may be a result of adolescents' rationalizing their own behavior and trying to maintain their virginity status. Surprisingly, we also found that sexually experienced youth are more likely to think a female who has had vaginal intercourse is still a virgin after having vaginal intercourse but a male is not. However, a closer examination of the results reveal that sexually experienced youth believe that virginity status among males and females does not differ significantly as the odds ratio for defining male status was in the expected direction (OR = 1.70), and there was a significant overlap in confidence intervals. Nonetheless, this was an unanticipated finding that deserves future investigation. A

myriad explanation exists for this finding. However, one possible explanation may be tied to a variable that we did not measure - orgasm. An earlier study asked college students to assess whether two hypothetical characters, Jim and Susie, would consider certain sexual behaviors that included/excluded orgasm.² The authors found that the respondents believed that both Jim and Susie were more likely to think that oral sex was “sex” if the recipient had achieved orgasm than if he or she had not. It may be that sexually active adolescents are more likely to think a female who has had vaginal intercourse is still a virgin after having vaginal intercourse but a male is not given previous research indicating that males are more likely to achieve orgasm at first intercourse than females.^{7,8}

In terms of abstinence, the results from logistic regressions indicated that most of the significant differences occurred with respect to respondents’ sexual experience and age. As with virginity, sexually-experienced youth were more likely to say that an individual was still abstinent; however, these differences were confined to genital touching and oral sex, whereas they extended to vaginal intercourse and anal intercourse when assessing virginity. Younger adolescents were more likely to say that individuals who had vaginal intercourse and anal intercourse were still abstinent; the only age finding for virginity was that older adolescents were more likely to report that a girl who engaged in genital touching was still a virgin. The ethnicity differences on abstinence indicated that non-whites were more likely to report that those who engaged in vaginal intercourse were still abstinent compared to White adolescents.

Considered collectively, the pattern of responses to the items presented in the current study indicates that, for a majority of adolescents, virginity status is tied more exclusively to vaginal intercourse than is abstinence. Abstinence appears to be a broader concept relating to participation in a variety of sexual acts, as evidenced by the fact that 55.8% of adolescents reported that a person who engaged in genital touching was not abstinent versus 83.5% that indicate one is still a virgin. Youth may perceive abstinence to be a condition that is based on time (i.e., how recently an individual last engaged in sex) and thus one which individuals can move in and out of, whereas virginity is a more fixed status based on whether one has *ever* engaged in vaginal or anal intercourse. Therefore, once a person has engaged in intercourse, he or she may thereafter be considered a non-virgin, but depending on how recently sex has occurred, he or she may be considered to be currently abstinent.

The few other studies that have been conducted in this area suggest that additional factors may also be important in understanding how young people think about sex. As suggested earlier, Bogart and colleagues (2000)² found that, although both vaginal and anal intercourse were almost always considered sex, oral sex was differentially labeled as sex depending on (among other factors) whether orgasm occurred. Although we found that sexual experience was a significant predictor of how adolescents defined virginity and abstinence, another study found that college student’s definitions of sex did not differ by sexual experience¹ suggesting that developmental status (e.g. maturity, cognitive ability) may impact how young people think about virginity. The complex, multidimensional nature of the construct abstinence also emerged in a recent study of program directors, instructors, and youth participants involved in abstinence-only-until-marriage programs in Texas.⁹ Qualitative analyses of interview and focus group data revealed two distinct orientations toward abstinence: a positive dimension comprised of attributes or behaviors to be incorporated and practiced, such as internal management (e.g. self monitoring, self control), and a negative dimension comprised of behaviors to be avoided. Interestingly, in addition to vaginal intercourse, substantial proportions of program directors (50%) and instructors (42%) cited oral sex as a behavior from which program participants should refrain. However, only 17% of youth program participants mentioned the avoidance of oral sex in focus group discussions. Perhaps most surprising was the fact that one-third of directors and half of instructors and youth participants also defined abstinence as involving the avoidance of *nonsexual* behaviors, such as using drugs and alcohol

or watching explicit forms of media, such as videos or films likely to contain content deemed incongruent with an abstinent lifestyle.

Another factor which has not received attention in the paucity of research in this area is that of intentions. That is, to what extent does “being abstinent” vary depending on whether a lack of sexual activity derives from a strong personal commitment (internally motivated) versus being imposed on an individual by outside circumstances (e.g., no partner, no place to go to have sex)? In a qualitative study of virginity loss,¹⁰ about one-third of respondents indicated that they would not consider rape to result in virginity loss. This suggests that perceptions of sexual activity status are driven not only by specific sexual behaviors, but by contextual issues such as intentions and consent.

Adolescents may be less apprehensive or more likely to engage in certain sexual behaviors if they believe they are being abstinent or will retain their virginity. In addition, the lack of clarity in sexual terminology may result in young people under- or over-estimating their sexual behavior depending on how they define abstinence and virginity. Thus, an adolescent might respond that he or she is not sexually active when asked by a health professional taking a medical history, despite the fact that he or she is engaging in oral sex. Shared meaning and common understanding of sexual behavior terminology are also critical for health education programs to ensure greater consistency between messages delivered by program instructors and youths’ interpretations of them.

Perhaps the overarching message to come from these various studies of the meanings associated with terms such as “have sex,” abstinence, and virginity is the importance of specifically defining sexual behaviors to ensure a common understanding. This behavioral specificity should be undertaken by doctors taking sexual histories, instructors delivering sex education or abstinence programs to youth, and by scientists conducting research. For example, pledges of abstinence often involve vaguely worded statements regarding a commitment to “a lifetime of purity including sexual abstinence prior to marriage.” To the extent that pledge terminology is not further elaborated in program sessions, youth participants and those who develop and deliver such programs may have different interpretations of what the pledge entails.

Although this study provides important findings regarding the differences in meaning of virginity and abstinence among youth, some limitations should be noted. The data come from a larger study of media influences and youth sexuality. Because of their placement in the second half of the survey, terms like sexual intercourse and oral sex were not specifically defined in the virginity and abstinence item sets; however, those terms had been clearly defined in earlier sections of the survey dealing with youths’ self-reports of involvement in sexual activity. Second, no defined time period was associated with the items, which might be particularly important to the construct of abstinence. If abstinence is a time-based concept, it is important to investigate the criteria youth use for determining abstinence. If a foreshortened lens is applied to abstinence, it may be that an individual who had sex last week, but not in the current week, would be considered abstinent. Such perceptions are critical to understanding youth sexual risk taking, and planning appropriate interventions.

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