



University of North Dakota
UND Scholarly Commons

Psychology Faculty Publications

Department of Psychology

2018

The Psychometric Properties of the Sexual Experiences Survey – Short Form Victimization (SES-SFV) and Characteristics of Sexual Victimization Experiences in College Men

RaeAnn E. Anderson
University of North Dakota, raeann.anderson@UND.edu

Shawn P. Cahill

Douglas L. Delahanty

Follow this and additional works at: <https://commons.und.edu/psych-fac>

 Part of the [Psychology Commons](#)

Recommended Citation

Anderson, RaeAnn E.; Cahill, Shawn P.; and Delahanty, Douglas L., "The Psychometric Properties of the Sexual Experiences Survey – Short Form Victimization (SES-SFV) and Characteristics of Sexual Victimization Experiences in College Men" (2018). *Psychology Faculty Publications*. 26.
<https://commons.und.edu/psych-fac/26>

This Article is brought to you for free and open access by the Department of Psychology at UND Scholarly Commons. It has been accepted for inclusion in Psychology Faculty Publications by an authorized administrator of UND Scholarly Commons. For more information, please contact zeineb.yousif@library.und.edu.

The Psychometric Properties of the Sexual Experiences Survey – Short Form Victimization
(SES-SFV) and Characteristics of Sexual Victimization Experiences in College Men

August 2nd, 2016

Abstract

Estimates of the rate of sexual victimization in college men vary wildly - likely due to the lack of validated measures. This study provides psychometric data on the Sexual Experiences Survey - Short Form Victimization (SES-SFV) and basic descriptive characteristics of sexual victimization of college men via the SES-SFV. Participants ($n = 405$) completed a web survey containing the study measures; a subset of 69 participants completed the SES-SFV again 1-3 weeks later. Convergent validity correlations were consistent but modest in size. Two-week test retest reliability estimates varied widely by the type of sexual victimization assessed and scoring format used; dichotomous scores were the most reliable and category scores the worst. Over one in four participants (28%) reported experiencing sexual victimization at Time 1; most reported victimization frequencies greater than one (22.8% of sample). Using behaviorally specific items, one in seven reported experiencing rape (14.1%). The most common type of sexual victimization experienced was unwanted sexual contact. Rape acknowledgement among men who experienced rape (12.2%) was much lower than has been observed in women. Our results indicate mixed evidence for the reliability and validity of the SES-SFV in college men, highlight important characteristics of sexual victimization in college men, and demonstrate the need for further research on the best strategies for the assessment of sexual victimization in college men.

Keywords: psychometric, sexual victimization, rape, college students, men

The Psychometric Properties of the Sexual Experiences Survey – Short Form Victimization (SES-SFV) and Characteristics of Sexual Victimization Experiences in College Men

Although rates of sexual victimization against college women are clearly established (Carey, Durney, Shepardson, & Carey, 2015), much less research has examined the sexual victimization experiences of college men. Perhaps due to risk factors shared with college women (Abbey, Zawacki, Buck, Clinton, & McAuslan, 2001), college men also appear to be at elevated risk for victimization, with estimates of the rate of sexual assault in college men ranging as high as 73% depending on the definition of sexual assault and the measure used to assess victimization experiences (Peterson, Voller, Polusny, & Murdoch, 2010). In this paper “sexual victimization” is defined as the experience of being sexually harmed, as opposed to sexual perpetration which is defined as the experience of sexually harming another person.

A major limitation to our understanding and intervening with sexual victimization is a lack of standardized measurement tools; it is impossible to ascertain the scope or characteristics of the problem without an assessment of how often it occurs. The development of checklists and behaviorally-specific items has greatly improved the measurement of violence and other stigmatized behavior (Cook, Gidycz, Koss, & Murphy, 2011); however, measures of sexual victimization in men have largely been adapted from measures with women without testing the psychometric properties of these adaptations (Aosved et al., 2011; Conway et al., 2004). For instance, a review of the literature found that none of the 79 prevalence studies of sexual victimization in men used a standardized measure to assess sexual victimization (Peterson et al., 2011). The purpose of the present study was to examine the phenomena of male sexual victimization by providing psychometric data on a commonly used measure of sexual

victimization (the revised Sexual Experiences Survey – Short Form Victimization (SES-SFV): Koss et al., 2007) and descriptive data in a relevant but understudied sample - college men.

Overview

To date, little research has examined sexual victimization in men, and research on the psychometric properties of the most popular measure, the Sexual Experiences Survey (SES) and related versions, has been limited. The present paper begins with a review of prior research on the SES and on the revised versions of the SES. We next review the nomological network of sexual victimization, characteristics of sexual victimization important for basic assessment, and finally, our aims and hypotheses. The purpose of this study was to examine evidence for the reliability and validity of the SES-SFV in assessing college men's sexual victimization.

Research on the Psychometric Properties of the original SES

The SES is a commonly used measure of sexual victimization and is often considered the gold standard for measuring sexual victimization given its behaviorally specific descriptions and correspondence to legal codes (Koss & Gidycz, 1985). The SES has moderately strong correlations between self-report and interview responses ($r = .61-.74$) and high one-week test-retest agreement (93%) for self-report (Koss & Gidycz, 1985). In contrast, moderate one-week test-retest agreement has been found when the SES was scored dichotomously (69.1%: Krahe, Reimer, Scheinberger-Olwig, & Fritsche, 1999).

More recent research using categorical scoring of the SES has produced variable reliability estimates. For categorical scoring, the SES responses are divided into scores corresponding to differing categories of victimization (i.e., unwanted contact, sexual coercion, attempted rape, and completed rape), coding the most severe category reported if multiple categories are indicated. Agreement between self-report SES scores and SES scores assigned by

independent coders based on interview transcripts (collected at the same session) varied by category. Agreement was low for unwanted sexual contact (56.7%) and attempted rape (40.4%) but high for sexual coercion and completed rape (85%: Testa, VanZile-Tamsen, Livingston & Koss, 2004). In addition, when participants were given the SES and asked "...tell me what you thought the item was actually asking you. I'm only interested in your own interpretation..." many participants interpreted the items incorrectly, sometimes in the opposite manner than intended by the researchers (Ross & Allgeier, 1996).

In addition to questions regarding evidence of reliability/validity of the SES, research has also identified concerns with the structure of the instrument. Understanding the structure of a measure is important for understanding the nature of the construct, especially when using the measure in a new population. Rasch analysis of the SES has suggested that the questionnaire has a hierarchical or cumulative structure, in other words, items presented later reflect a more severe behavior than those represented earlier (Karabatsos, 1997). This suggests that participants endorsing severe items may also endorse all other less severe items. Following, researchers have suggested using Guttman scaling analysis in order to further test whether the SES has a strict cumulative structure (Karabatsos, 1997). In Guttman scaling analysis (or scalogram analysis), response rates for each level of severity (type of behavior) are calculated and compared; if response rates continually decrease as severity increases, Guttman scaling is indicated.

Finally, existing reliability estimates generally reflect gender-stereotypic applications, measuring victimization in women and perpetration in men. This gender stereotypical approach undercuts confidence in the sexual victimization literature and is inconsistent with the goal of developing strong, standardized measurement tools (Follingstad & Bush, 2014).

Revisions of the SES and the Presumed Measurement Model

Given concerns regarding the inconsistent reliability/validity of the SES, it was revised into two separate questionnaires (each with a short and long form) that assessed victimization, or the experience of being harmed sexually (SES – Short Form Victimization, SES – Long Form Victimization) and perpetration, or the experience of harming another person sexually (SES – Short Form Perpetration, SES – Long Form Perpetration), respectively (Koss et al., 2007, 2008).

These revisions were worded in a mostly gender neutral manner, with greater description of the tactics of coercion (i.e., the verbal and physical behaviors used as a means to coerce), while retaining the behaviorally specific language of the original. The addition of tactics forced a reorganization of the SES; rather than 12 yes or no questions the revised SES-SFV has 25 items for men (35 for women) in which a stem item describing a sexual outcome is followed by five tactics. For example, item 2 is: “Someone had oral sex with me or made me have oral sex with them without my consent by: a. telling lies..., b. criticizing my sexuality..., c. taking advantage of me when I was too drunk..., d. threatening to physically harm me..., e. using force...”

Psychometric Properties of the Revised SES Versions

Despite the frequency with which the revised SES versions have been used in research, the assessment of the reliability and validity of these versions has been limited (Davis et al., 2014; Testa, Hoffman, Lucke, & Pagnan, 2015). The SES revisions were conceptualized using an induced (formative) measurement model rather than a latent model. In other words, it was theorized that SES victimization items represent examples of a larger category rather than aspects of an underlying trait (Koss et al., 2007). Following, internal consistency would not be a relevant dimension of reliability. However, test-retest reliability data are crucial, perhaps even more so given that the reconceptualization of the revised SES largely precludes comparisons to

past data. Despite this, we were unable to locate any test-retest reliability data on the revised versions of the SES.

In contrast, there have been some investigations of the validity of the revised SES versions. For instance, Buday & Peterson (2015) found limited convergent evidence of validity between self-reports on the SES-SFP and another measure of sexual perpetration ($r \approx .50$), although they also raised the issue of false positives when using this instrument with women.

The Nomological Network of Sexual Victimization

An additional concern with existent research on the psychometric properties of the SES is that prior studies have failed to construct a nomological network to inform a broader research agenda. A nomological network is a set of observed theoretical constructs and laws or predictions about how these constructs relate to one another (Cronbach & Meehl, 1955). With respect to the present paper, the nomological network consists of concepts that are believed to be related to sexual victimization and the strength and direction of those relationships.

We constructed a nomological network situating key constructs in relation to sexual victimization as assessed by the SES-SFV, particularly focusing on positive relationships with other forms of violent victimization. We chose to examine all three ways of scoring the SES-SFV (dichotomous, category, continuous) given that relationships should be similar across scoring approaches. Further justification for examining the different scoring approaches is that they represent different ways to evaluate the severity of sexual victimization and that all three types of scores are frequently used in the literature (Davis et al., 2014).

Different forms of victimization (physical assault, sexual assault, childhood maltreatment, witnessing violence, property crime) are strongly related to one another; thus, any one form of violence victimization increases the risk for another (Hamby & Grych, 2013). For

example, in one epidemiological study the risk for sexual victimization was much higher (OR = 6.2) among youth who had already experienced physical assault (Finkelhor, Turner, Ormrod & Hamby, 2009). Similarly, research in community samples with high representation of female participants has reported correlations between .20-.40 for sexual assault and physical partner violence (Davis et al., 2014; Testa, Vanzile-Tamsen & Livingston, 2007). Given our focus on college men, we conservatively hypothesized a positive correlation of at least $r = .20$ between SES-SFV scores and a measure of sexual violence from a partner, the Revised Conflict Tactics Scales (CTS2; Straus, Hamby, Boney-McCoy, & Sugarman, 1996).

Childhood sexual abuse (CSA) has also been highlighted as a powerful risk factor for adolescent/adult sexual victimization although the mechanism of risk is unclear (Messman-Morre & Long, 2003). In a meta-analysis, correlations ranged between .03 to .47; however, none of the studies included men (Roodman & Clum, 2001). More recently, research has reported a link between CSA and adolescent/adult sexual victimization in men, but the rates of CSA in this study were low (4.6%: Aosved, Voller, & Long, 2011 as compared with rates ranging from 13.1-53.9% in the Roodman & Clum meta-analysis). Given differences in the rates of CSA between men and women, we conservatively hypothesized a positive correlation between .2 and .4 to provide convergent evidence of validity for the SES-SFV via association with the Childhood Trauma Questionnaire – CSA Scale (CTQ-CSA). Although these correlations appear small given the common method variance (self-report online questionnaire) of the present study, differences in the way items are presented have led us to our hypothesized .2-.4 estimate. Some research indicates that measures which present the tactic of coercion first (such as the CTS2) result in a greater number of cases detected whereas measures that present the type of sexual

behavior prior to presenting tactics (the SES-SFV) may result in lower estimates. In contrast, the CTQ-CSA does not describe the tactic and the sexual behavior in the same item.

We also examined convergent evidence of validity of SES-SFV scores by investigating the degree and strength of associations between SES-SFV scores and the construct of rape empathy, or feeling empathy for those who experience rape. The experience of trauma alters attitudes and beliefs (Resick, Monson, & Rizvi, 2008), and rape empathy represents both a set of attitudes that may discourage violent behavior and a set of attitudes that may be changed by the experience of sexual victimization (Osman, 2011). Prior researchers have highlighted this construct as a critical aspect of the sexual victimization nomological network (Koss et al., 2007). Following, we expected that men who had experienced sexual victimization would have higher rape empathy scores than those who did not. To demonstrate convergent evidence of validity, we expected positive correlations between .36-.55 between SES-SFV and rape empathy scores following previous literature (Smith & Frieze, 2003).

Characteristics of Sexual Victimization in Men

The overwhelming majority of women sexually assaulted in college will be sexually assaulted by men known to them (Tjaden & Thoennes, 2000). However, conflicting data have been reported for men regarding the gender of assailants. One study found a relatively even split between women and men as the aggressors (Turchik, 2012), yet others have found that the overwhelmingly majority of individuals sexually assaulting males were women (French, Tilghman, & Malebranche, 2014; Osman, 2011). Men also appear to have much lower rates of rape acknowledgment, or labeling rape experiences as rape rather than a less serious term like “miscommunication”. Thus, many characteristics of victimization experiences may differ

between men and women. Therefore, we also report basic descriptive information on sexual victimization in college men.

Aims & Hypotheses

The primary goal of this study was to assess the test-retest evidence of reliability and convergent evidence of validity of the SES-SFV in a sample of college men. We administered the SES-SFV as described by the creators (Koss et al., 2007) using a two-week test-retest interval. We chose this interval to be consistent with other trauma measures (including the CTQ: DiLillo et al., 2010) and to use a time period short enough that it would be unlikely that new behavior would occur. Convergent validity measures were selected with the following principles in mind: a) they measured domains that are relevant to research on sexual victimization but were independent constructs and b) they have been used with college populations.

The first aim of this study was to assess the evidence of reliability of the SES-SFV. To assess evidence of temporal discretion (temporal discretion refers to whether participants were able to differentiate the two time periods used by the SES-SFV), and test-retest reliability (temporal stability), we: a. compared endorsement rates of sexual victimization events reported in the past year to endorsement rates reported since age 14 but not including the past year; if endorsement rates were identical, evidence that participants correctly understood the nature of these non-overlapping intervals (temporal discretion) would be poor; b. calculated rank correlations between Time 1 and Time 2 scores; if correlations were of moderate strength or greater ($r \geq .20$), evidence for temporal stability would be indicated (Koss & Gidycz, 1985); and c. calculated percent agreement between category scores at Time 1 and Time 2; percent agreement below 80% would indicate poor evidence of reliability (McHugh, 2012).

Second, we sought to assess convergent evidence of the validity of the SES-SFV and to examine the structure of the SES-SFV. We hypothesized that the SES-SFV would be modestly but positively correlated with convergent measures (CTS2, CTQ-CSA, Rape Empathy Scale: RES) indicating convergent evidence of validity (Davis et al., 2014; Roodman & Clum, 2001; Osman, 2011). Next, to test whether the structure of the SES-SFV was cumulative, we used Guttman scaling analyses. Given the lack of research examining sexual victimization in college men, the Guttman scaling analyses were considered exploratory.

The third aim was to provide basic descriptive data on the characteristics of sexual victimization in college men via the SES-SFV. To do so we focused on characterizing the frequency of victimization, the gender of assailants, and levels of rape acknowledgment. We hypothesized that, of those participants who experienced sexual victimization, most would experience sexual victimization more than once (Testa, VanZile-Tamsen, Livingston & Koss, 2004), that most men would report being victimized by women (French, Tilghman, & Malebranche, 2014), and that most participants would not label their experience as rape (Arttime, McCallum & Peterson, 2014).

Methods

Participants

Participants were 405 college men aged 18 years and older who provided data on the SES-SFV for course credit at a large, urban, Midwestern University. The sample ranged in age from 18-53 ($M = 21.9$, $SD = 4.9$, mode = 19). Participants mostly identified as heterosexual ($n = 358$, 88.4%) and Caucasian ($n = 313$, 77.3%); 7.2% identified their race as African American, 6.9% as Asian/Asian American, 1.7% as Native American/AmerIndian, and 6.9% as Hispanic or Latino. The mean number of college years completed was 2.1 ($SD = 2.0$), and one quarter of the

sample ($n = 107$) indicated that their major was Psychology. Given the nature of the study, we began data collection as a cross-sectional assessment. When it became apparent that online data collection was feasible, we designed methods to allow for anonymous completion of a second time point (i.e., self-generated subject numbers that were not linked to participant identifiers). From the point at which we opened the Time 2 assessment, all participants who completed Time 1 ($n = 326$) were invited to complete Time 2. A total of 154 individuals provided adequate SES-SFV data at Time 2; 69 of these participants provided a matching ID and participated within the required 7 – 21 day window after Time 1 (see Procedures for further detail).

To determine whether participants who completed the SES-SFV at Time 2 differed from those who did not, logistic regression was performed in which demographic variables, sexual victimization category (none, unwanted contact, coercion, rape; dummy coded), sexual victimization frequency score (continuous), and sexual victimization history status (yes/no), were entered as predictors of providing Time 2 data in the required time frame. No significant predictors were identified.

Materials

Questionnaires were administered in a randomized order through an anonymous web survey hosted by Qualtrics.

SES-SFV. The SES-SFV for men consists of eight items; five compound, behaviorally specific items, one item on aggressor gender, a demographic item, and the acknowledgment item. The first five compound items describe a sexual act followed by five possible tactics used by another person to coerce the respondent to engage in that act (verbal pressure, verbal criticism, incapacitation, physical threats, physical force). Given the nature of the five compound items which cross each sexual act with each possible tactic, the five behaviorally specific items

become 25 items for the purposes of categorical and continuous scoring. For dichotomous scores, an affirmative response (≥ 1) to any item qualifies the participant for victimized status. Participants endorsed how often each behaviorally specific item occurred (0, 1, 2, 3+ times) for two different time frames for each tactic within each compound item for a total of 50 ratings. The two time frames are: “one year ago going back from today” and “starting at your fourteenth birthday and ending one year ago today”. These two time-frames are hereafter referred to as the “past year” and “prior years’ assessments”, respectively. “Lifetime” refers to estimates that combine the past year and prior years’ time frames. Age 14 was selected by the original authors to differentiate from childhood sexual abuse.

The remaining two items assess the aggressor’s gender and assess acknowledgment using the item, “Have you ever been raped?” In this study, the demographic item was omitted for redundancy. For continuous scores, the responses from the five compound items are summed. Notably, the acknowledgment item is not used to assess victimization history given the lack of behaviorally specificity of this item. Using lifetime continuous scores, the mean SES-SFV score for the sample was 2.94 ($SD = 9.67$) with a range from 0 – 94.0. Notably, continuous scores represent estimates of the number of incidents as it is possible that a person may experience multiple sexual acts or types of coercion from the same attacker in a single incident.

The SES-SFV assesses four different categories of sexual victimization described in ascending order of severity: no victimization, unwanted sexual contact, sexual coercion, and attempted rape/rape. Unwanted sexual contact was defined as being touched in the private areas or having one’s clothes removed without consent (but no other sexual contact). Sexual coercion was defined as experiencing oral sex, anal sex or sexual intercourse due to verbal coercion (tactics a: verbal pressure or tactic b: verbal criticism) in the absence of consent. Rape and

attempted rape were defined as attempting or having oral sex, anal sex or sexual intercourse via altered consciousness (tactic c), threats of physical harm (tactic d), or physical force (tactic e) in the absence of consent. These categories are the basis of the categorical scoring system for the SES-SFV; in the categorical scoring system the most severe experience of sexual victimization is coded. For example, if a person indicates a response of 1 to item 1a (unwanted sexual contact via verbal pressure) and to item 4c (completed anal rape via incapacitation), their continuous score would be 2, their category score would be attempted rape/rape, and their dichotomous score would be 1: victimization present. *Convergent validity.* In order to test convergent validity, the Sexual Coercion subscale of the Revised Conflict Tactics Scales (CTS2) was used to assess intimate partner victimization in the past year (Straus et al., 1996). Previous research found that CTS2-SC scores were positively related to psychiatric symptoms in men and a history of physical assault victimization (Hines & Douglas, 2016). The CTS2 contains 14 paired items assessing victimization and perpetration for the same behavior. For the present analyses, CTS2 variables were coded dichotomously to be consistent with the dichotomous and categorical scoring scheme used with the SES-SFV. In the present sample, 146 participants (36.0%) reported experiencing sexual victimization from an intimate partner in the past year.

The childhood sexual abuse subscale of the Childhood Trauma Questionnaire Short Form (CTQ-CSA) (Bernstein et al., 2003) was administered to assess childhood sexual victimization. Previous research found CTQ-CSA scores were positively related to therapist's ratings of abuse (Bernstein et al., 2003). The CTQ-CSA contains five items such as, "I was touched sexually" that are rated on the following five point scale: never (1) to very often true (5). Cronbach's alpha for the CSA subscale was .93; 7.4% of participants endorsed experiencing CSA.

The Rape Empathy Scale (RES; Deitz, Blackwell, Daley, & Bentley, 1982) consists of 19 paired items in which each item represents either a target or aggressor sympathetic statement; “I can understand why a man would use force to obtain.../I cannot understand why a man would use force to obtain...” Participants select an item from the pair that is then rated from 1 (not at all preferred) to 7 (completely preferred). In prior research, RES scores were positively related to perceptions of punishment for rape (Deitz et al., 1982). The mean score for the sample was 101.5 (SD = 19.3, range 24 – 133), Cronbach’s alpha = 0.91.

Social desirability. The Marlow Crowne Social Desirability Scale (SDS) has been widely used in the area of sexual violence to control for social desirability (Crowne & Marlowe, 1960; Gidycz et al., 2007). The SDS consists of 33 true/false items that are unlikely to be universally true, such as, “I don’t find it particularly difficult to get along with loud-mouthed, obnoxious people”. SDS scores have been positively associated with Minnesota Multiphasic Personality Inventory response bias scores in prior research (Crowne & Marlowe, 1960). The mean SDS score for the sample was 8.4 (SD = 2.7, range = 0 – 21); Cronbach’s alpha for our sample was 0.77.

Procedures

The following procedures were approved by the first author’s University IRB. Data collection occurred between September 2012 and December 2013, covering three semesters. Recruitment flyers invited viewers to participate in a study titled “Men’s Behavior in Relationships”. Participants from semesters 1 and 2 ($n = 326$) were invited to participate in Time 2. A two-week time period was selected as the target timespan between Time 1 and Time 2 in order to allow for a window long enough that practice effects would be minimized. This is a common test-retest interval in the field of trauma psychology (for example, DiLillo et al., 2004).

At Time 1, participants completed all study questionnaires in a randomized order. Eleven days later, participants were e-mailed the directions and a signup code, and were encouraged to access the SONA website for the Time 2 survey. The Time 2 assessment consisted of the SES-SFV without the other questionnaires. Reminders to complete time 2 were sent on days 13 and 15. In order to maintain anonymity, the researchers were unaware of which participants completed the study at which times and thus, were unable to target specific participants with reminders for completing Time 2. The number of days between Time 1 and Time 2 varied from 0 to 105; mean = 17.0 (SD = 14.7). Participants completing Time 2 outside the 7 – 21 day window ($n = 82$) were excluded from analyses.

Results

Data Cleaning

There were minimal missing data on the study measures. For the SES-SFV, CTS2, and CTQ-CSA, three participants did not provide any data. For continuous measures (SDS, RES) three and seven participants, respectively, did not provide any or inadequate data. Given the non-normal distribution of many study variables (see next paragraph), we utilized listwise deletion in the following analyses (Schlomer, Bauman & Card, 2010).

Skewness and kurtosis were assessed next; SDS, RES, and CTS2 scores were within acceptable limits (-2 to 2). SES-SFV and CTQ-CSA scores were highly skewed (>3) and with excess kurtosis (>30). Following statistical standards, Spearman's rank correlations (r_s) were used to account for this (Tabachnick & Fidell, 2007) and were interpreted using the following guidelines: values of .1-.3 were considered small, .3-.5 moderate, and greater than .5 large (Cohen, Cohen, West, & Aiken, 2003).

Following Tracey (2015), regressions were computed with and without controlling for social desirability to test whether there was an effect of social desirability on key variables. The strength and significance of analyses differed very little with and without controlling for social desirability. For example, the standardized β value for SES-SFV frequency scores predicting RES scores were nearly identical analyses, $\beta = -.181$ and $-.180$, respectively and each model accounted for the same amount of variance, $R^2 = .03$. We also repeated this approach using the dichotomous SES-SFV score as the dependent variable and rape empathy scores as the independent variable; in both analyses the Exp(B) value was nearly identical (.894 and .890, respectively). Thus, social desirability was not controlled in analyses.

Reliability

Temporal discretion. The number of positive responses for the same item in the two different time frames was compared to assess temporal discretion. The number of positive responses was dissimilar for every item, indicating participants likely distinguished between the two time frames in their responses, see Table 1.

Two-week test-retest reliability. Rank correlations comparing SES-SFV scores at Times 1 and 2 were calculated using participants that correctly completed the Time 2 assessment within the 7-21 day window ($n = 67$: see Table 2). Using past year continuous scores, Time 1 and 2 scores were significantly correlated ($r_s = .41$), but prior years' continuous scores were not ($r_s = .04$). Lifetime category scores were significantly correlated ($r_s = .53$) as were lifetime dichotomous scores ($r_s = .49$).

Two-week percent agreement. Next, we investigated percent agreement in the lifetime SES-SFV category scores across the two assessments in order to evaluate patterns of concordance and discordance (see Table 3). Overall, there was agreement in 48 of 66 cases

(72.7%); agreement was highest for identifying victimization/no victimization (90.0%) and lowest for coercion (0%). Of note, eleven participants who endorsed no sexual victimization at Time 1 endorsed some kind of sexual victimization at Time 2. Given the anonymous self-report nature of the study, it is unclear whether these represented new events that occurred during the time between Time 1 and 2 or whether these were events that had previously happened but were not endorsed at Time 1. Seven participants did not endorse victimization at Time 2 but did at Time 1; it is also unclear why participants would “retract” reports and whether this reflects a purposeful underreporting or a measurement error.

Validity

Validity analyses used the entire sample of complete data, $n = 396$.

Convergent validity. All correlations were modest in magnitude (values between .12 - .22), with similar values in the two time frames and between scoring approaches, see Table 4. Briefly, SES-SFV scores were positively correlated ($r_s \approx .2$) with CTS2-SC scores; this relationship was affected very little by the type of SES-SFV score. SES-SFV scores were also positively correlated with CTQ-CSA scores, $r_s = .20-.26$. The strength of these relationships was consistent with the predicted range (see nomological network section). Finally, SES-SFV scores were negatively correlated with RES scores, $r_s = -.12$ to $-.23$. The strength of these relationships was generally weaker for past year SES-SFV scores than prior years’ SES-SFV scores. The strength of the relationship with RES scores was lower than predicted and in the opposite direction.

Structure

Guttman scaling. The eight possible patterns of endorsement of the four SES-SFV category scores were computed and are displayed in Table 5. The most common patterns of

sexual victimization were the same for all time periods with unwanted sexual contact being the most common followed by experiencing all types, followed by contact + attempted rape/rape. This finding does not support strict Guttman scaling as endorsement of severe sexual victimization did not imply endorsement of all types of less severe victimization as well.

Characteristics of Sexual Victimization via the SES-SFV

Estimated frequency of sexual victimization. In general, 28.0% of participants ($n = 111$) reported experiencing some type of sexual victimization during their lifetime on the SES-SFV, with most victimized participants ($n = 90$, 81.1%) reporting a score greater than one. When including sexual victimization reported across either the CTQ, SES-SFV, or the CTS2, the number of participants that reported any kind of sexual victimization increased to $n = 211$ or 53.3%. This included 4.8% of participants who reported experiencing sexual victimization both in childhood and in adolescence/adulthood. Over the lifetime, unwanted sexual contact was the type of sexual victimization reported most frequently by participants ($n = 93$), followed by attempted rape/rape ($n = 56$), and sexual coercion ($n = 45$).

Gender of the aggressor. Of victimized respondents ($n = 111$), most respondents reported being harmed by women (62.2 %, $n = 69$), with a small group reporting being harmed by men (16.2%, $n = 18$), and a few endorsing “both females and males” (7.2%, $n = 8$).

Acknowledgment. When asked “have you ever been raped?” only $n = 11$ (2.7% of sample) responded “yes”. Of these eleven participants, two did not endorse any sexual victimization on the SES-SFV, two endorsed sexual coercion, and seven endorsed rape. Overall, 56 participants in the sample endorsed behaviorally specific descriptions of rape. Thus, our rate of acknowledgment (the number of people who answered the acknowledgment item affirmatively and endorsed behaviorally specific items on rape) was 7/56 or 12.2%.

Discussion

The goals of this study were to evaluate the psychometric properties of the SES-SFV in a sample of college men in order to facilitate research on, identification of, and intervention with, men who have experienced sexual victimization. We examined the reliability and validity of a revised version of the most widely used measure of sexual victimization, the Sexual Experience Survey – Short Form Victimization (SES-SFV) and also provided initial descriptive data on sexual victimization in college men as assessed via the SES-SFV.

Contrary to hypotheses, we found poor evidence for the reliability of the SES-SFV in measuring sexual victimization in college men with the exception of adequate temporal discretion. Test-retest estimates were limited by the small sample size (and corresponding base rates) but indicated the best evidence of reliability for the category of no victimization (90% agreement) and no agreement for coercion (0%). Using dichotomous scores, 10% of cases would potentially be erroneous which is within accepted standards (McHugh, 2012). However, the poor agreement for some category scores, such as 0% agreement for sexual coercion indicates that the category scoring system is unreliable. This is consistent with Testa et al., (2004) who also found poor support for the reliability of category scores. Test-retest scores were significantly correlated, but at a degree lower than expected ($r_s = .41-.53$).

It is unclear why test-retest reliability was poor; disagreement in the data could be due to new incidents of sexual victimization, a sensitization to the issue from repeated exposure, misreports at Time 1, limited variance in this sample, or something else. Comparison of reliability estimates to other measures of abuse history indicates that the SES-SFV fared poorly. Specifically, studies of the CTQ have documented test-retest correlations ranging from .66 -.94 in a sample of undergraduates, while in this study, the SES-SFV test-retest scores ranged from

.41-.53 (using Spearman's rank) (Paivio & Kramer, 2004). Using the CTQ, Cammack et al. (2015) found that participants generally reported slightly higher (but not statistically significant) CTQ-CSA scores upon being assessed a second time. Thus, repeated assessment may create a small sensitization effect but this seems unlikely to account entirely for the low correlations found in this study. Despite the poor reliability for differing scoring systems, test-retest scores for dichotomous scores were good and dichotomous scores are the predominant scoring system used in the literature. Thus, if the SES-SFV is used in the future, it should be scored using dichotomous scores until further reliability research is conducted.

We found adequate convergent evidence of validity for the SES-SFV. Consistent with hypotheses and prior research (Davis et al., 2014), we found modest relationships between our measures of partner violence (CTS2) and childhood sexual abuse (CTQ-CSA), in the predicted direction. There was modest correspondence with a measure of partner violence; strangely, the CTS2 identified more cases of sexual violence than the SES-SFV.

It is unclear why the present results and those of Davis et al. (2014) found low correspondence between measures of partner violence and sexual perpetration. We hypothesize that, because the SES-SFV does not instruct respondents to consider their relationship to the aggressors, participants have no specific cue to access those memories and therefore report fewer cases of violence with partners; prior research has demonstrated that carefully worded cues are extremely important for these types of assessments (Fisher, 2009). This may also explain why the CTS2 identified more cases of sexual victimization – participants were provided with cues for the coercive behavior, the sexual behavior, and the relationship to the target. However, these findings are comparable to existent research; convergent validity correlations for behaviorally specific checklists are often modest (Shackelford & Goetz, 2004). Future research should

investigate whether the use of cues for different types of relationships affects reporting rates and how changes in the wording and order of questions may affect reporting rates.

SES-SFV scores were also correlated with a measure of rape empathy, although in the opposite direction than predicted. Men who experienced sexual victimization were actually less empathetic. Prior research on rape empathy has been largely conducted with women rather than young men but consistently show effects for gender and sexual victimization history (Osman, 2011); this finding highlights the need for further research in this area to understand the complex interaction of gender identity and sexual victimization history for men.

We did not find support for strict Guttman scaling, indicating that the SES-SFV does not have a cumulative structure. This is in contrast to previous research using the original SES to assess women's sexual victimization although this may be related to the different methodology (Karabatsos, 1997). The present findings suggest that when a man reports rape one cannot assume they also experienced less severe forms of sexual victimization. Extrapolating from this finding, it is possible that different types of sexual victimization may have different etiologies. Alternatively, this finding may reflect an inherent bias in the SES-SFV; this instrument was originally designed to assess women's experiences of sexual victimization and therefore may not capture men's experiences accurately.

In sum, our results indicate generally questionable reliability and modest validity for the SES-SFV at assessing sexual victimization in males but further research with larger more diverse samples, and tests of construct validity are strongly recommended. A prospective test-retest design with shorter intervals may be useful in ascertaining the temporal stability of the SES-SFV. A large number of participants (more than 25%) reported experiencing sexual victimization of some type since age 14, and 14.1% reported experiencing rape/attempted rape. This is more

similar than perhaps expected to prior estimates in college women where one in four college women will experience rape/attempted rape (Koss, Gidycz, & Wisniewski, 1987) and estimates in research with college men (14% reported any type of victimization: Aosved, Long, & Voller, 2011). A smaller number of participants (4.8%) reported experiencing developmental revictimization (i.e., sexual victimization in childhood as well as in adolescence or adulthood). This estimate is larger than that reported in Aosved et al. (2011) – (1.4%) – but much smaller than that reported in college women, 3.8-31.9% (Roodman & Clum, 2001). Consistent with hypotheses, and similar to the experiences of women (Testa et al., 2004), the vast majority of participants (81.1%) who reported sexual victimization provided frequency estimates greater than one, indicating that repeated sexual victimization is common.

Most participants in our study reported being assaulted by women (62.2%), although prior studies of male victimization suggest even higher percentages (French et al. 2014, 74-96%; Turchik, 2011, 95%; Osman, 2011, 90%). In contrast, women are primarily assaulted by men (Fisher, Cullen & Turner, 2000). It is of interest that not all participants with a history of sexual victimization provided data on the gender of the person who harmed them. It is unclear whether failure to provide data on the gender of the assailant is related to difficulties in memory/confusion, an artifact of the way this item is presented, or whether this is related to cognitive distortion/coping. Further research is needed to explicate the mechanisms of these processes including how ideas of gender and masculinity may interfere with emotional processing during recovery.

Finally, as predicted, we found a low number of “acknowledged victims” in our sample (people who endorsed behaviorally specific items on rape and answered the acknowledgement item affirmatively). Only 12.2% of men who experienced rape acknowledged having been raped,

a rate similar to other research with men but much lower than the average rate for women (60%: Wilson & Miller, 2016; Artime, McCallum, & Peterson, 2014). Future research on acknowledgment would be informative for the psychological treatment of men who experience sexual assault; this denial of experience has been related to greater symptoms and poorer coping in women (Littleton et al., 2006) but has been relatively unexamined in men. This phenomenon may also highlight not only how general social stigmatization impacts health but in particular how masculinity/gender norms influence men coping with sexual victimization (Artime et al., 2014).

Limitations

The present study suffered from a number of limitations that suggest interpreting these results with caution. Reliability estimates were limited by low base rates in a small reliability subsample, and the reliability standards for induced (formative) measurement models are unclear. It is also unclear whether the poor test-retest reliability found in this study is unique to the characteristics of this study or to the measure itself. Future research should compare the SES-SFV to other measures of sexual victimization and interviews with participants regarding their experiences to establish construct validity. For instance, the SES-SFV does not measure sexual victimization wherein a man is forced to penetrate a woman's vagina – a notable exception. At this point it is unclear what the best measure to assess sexual victimization in college men is and this research is impeded by lack of evidence for construct validity. Future research should also include other measures of social desirability and rape empathy; recent research has demonstrated the multidimensional nature of these constructs which were not captured by the tools used in this study (Tracey, 2015; Osman, 2011).

Conclusions

The present study found poor test-retest evidence of reliability and modest convergent evidence of validity for the SES-SFV for assessing sexual victimization in college men. These results underscore the need for further psychometric research on the assessment of sexual assaults in general and in particular, the sexual victimization of young men. The SES-SFV at this point appears to have limited utility in assessing sexual victimization in college men but this may be due to the small size of this sample. This study also highlighted a high rate of sexual victimization among college men, with approximately one in four participants reporting some type of sexual victimization, indicating a great need for further research in this area. We also found low rates of rape acknowledgment for men (12.2% of victimized men), lower than has been previously documented with women (60%: Wilson & Miller, 2016). Finally, given the findings on rape empathy and gender of the aggressor, this study suggests that risk reduction strategies for men need to account for how norms regarding gender and masculinity affect sexual victimization in order to be successful.

References

- Abbey, A., Zawacki, T., Buck, P. O., Clinton, A. M., & McAuslan, P. (2001). Alcohol and sexual assault. *Alcohol Research & Health*, 25(1), 43–51.
- Anthony, E. R., & Cook, S. L. (2012). Assessing the impact of gender-neutral language on disclosure of sexual violence. *Psychology of Violence*, 2(3), 297–307.
<http://dx.doi.org/10.1037/a0028562>
- Aosved, A. C., Long, P. J., & Voller, E. K. (2011). Sexual revictimization and adjustment in college men. *Psychology of Men & Masculinity*, 12(3), 285-296. doi: 10.1037/a0020828
- Artime, T. M., McCallum, E. B., and Peterson, Z. D. (2014). Men's acknowledgment of their sexual victimization experiences. *Psychology of Men & Masculinity*, 15(3), 313–323.
doi.org/10.1037/a0033376
- Bernstein, D. P., Stein, J. A., Newcomb, M. D., Walker, E., Pogge, D., Ahluvalia, T., Stokes, J., et al. (2003). Development and validation of a brief screening version of the Childhood Trauma Questionnaire. *Child Abuse & Neglect*, 27, 169-190.
- Buday, S. K., and Peterson, Z. D. (2015). Men's and Women's Interpretation and Endorsement of Items Measuring Self-Reported Heterosexual Aggression. *Journal of Sex Research*, 52(9), 1042–1053. doi: 10.1080/00224499.2014.967373
- Cammack, A. L., Hogue, C. J., Drews-Botsch, C. D., Kramer, M. R., Pearce, B. D., Knight, B., Stowe, Z. N., et al. (2015). Test-retest reliability of retrospective self-reported maternal exposure to childhood abuse and neglect. *Archives of Women's Mental Health*. doi: 10.1007/s00737-015-0536-x

- Carey, K. B., Durney, S. E., Shepardson, R. L., & Carey, M. P. (2015). Incapacitated and forcible rape of college women: Prevalence across the first year. *Journal of Adolescent Health, 56*(6), 678–680. doi:10.1016/j.jadohealth.2015.02.018
- Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (2003). Applied multiple regression/correlation analysis for the behavioral sciences (3rd ed.). Mahwah, NJ, US: Lawrence Erlbaum Associates Publishers.
- Conway, M., Mendelson, M., Giannopoulos, C., Csank, P. A. R., & Holm, S. L. (2004). Childhood and adult sexual abuse, rumination on sadness, and dysphoria. *Child Abuse & Neglect, 28*(4), 393–410. doi:10.1016/j.chiabu.2003.05.004
- Cook, S. L., Gidycz, C. A., Koss, M. P., & Murphy, M. (2011). Emerging issues in the measurement of rape victimization. *Violence Against Women, 17*(2), 201-218. doi: 10.1177/1077801210397741
- Cronbach, L. J., & Meehl, P. E. (1955). Construct validity in psychological tests. *Psychological Bulletin, 52*(4), 281–302.
- Crowne, D. P., & Marlowe, D. (1960). A new scale of social desirability independent of psychopathology. *Journal of Consulting Psychology, 24*(4), 349-354. doi: 10.1037/h0047358
- Davis, K. C., Gilmore, A. K., Stappenbeck, C. A., Balsan, M. J., George, W. H., & Norris, J. (2014). How to Score the Sexual Experiences Survey? A Comparison of Nine Methods, *Psychology of Violence, 4*(4), 445–461. doi:10.1037/a0037494
- Deitz, S. R., Blackwell, K. T., Daley, P. C., & Bentley, B. J. (1982). Measurement of empathy toward rape victims and rapists. *Journal of Personality and Social Psychology, 43*(2), 372-384. doi: 10.1037/0022-3514.43.2.372

- DiLillo, D., Hayes-Skelton, S. A., Fortier, M. A., Perry, A. R., Evans, S. E., Messman-Moore, T. L., ... Fauchier, A. (2010). Development and initial psychometric properties of the Computer Assisted Maltreatment Inventory (CAMI): A comprehensive self-report measure of child maltreatment history. *Child Abuse and Neglect, 34*(5), 305–317.
- Finkelhor, D., Turner, H., Ormrod, R., & Hamby, S. L. (2009). Violence, abuse, and crime exposure in a national sample of children and youth. *Pediatrics, 124*(5), 1411–1423. <http://doi.org/10.1542/peds.2009-0467>
- Fisher, B. S. (2009). The effects of survey question wording on rape estimates: Evidence from a quasi-experimental design. *Violence Against Women, 15*(2), 133-147. doi: 10.1177/1077801208329391
- Fisher, B. S., Cullen, F. T., & Turner, M. G. (2000). The Sexual Victimization of College Women. NCJ: 182369. National Institute of Justice. Washington, DC, USA.
- French, B. H., Tilghman, J. D., & Malebranche, D. A., (2014). Sexual Coercion Context and Psychosocial Correlates Among Diverse Males. *Psychology of Men & Masculinity*, doi:10.1037/a0035915
- Guttman, L. (1944). A Basis for Scaling Qualitative Data. *American Sociological Review, 9*(2), 139–150. doi:10.2307/2086306
- Follingstad, D. R., and Bush, H. M. (2014). Measurement of intimate partner violence: A model for developing the gold standard. *Psychology of Violence, (4)*,4, 369-383. doi: 10.1037/a0037515
- Hamby, S. L., and Grych, J. H. (2013). Tracing the Threads of the Web: The Epidemiology of Interconnections Among Forms of Violence and Victimization. *Web of Violence* (pp. 8-27). New York, NY, USA: Springer.

- Hines, D. A., & Douglas, E. M. (2016). Sexual aggression experiences among male victims of physical partner violence: Prevalence, severity, and health correlates for male victims and their children. *Archives of Sexual Behavior, 45*, 1133-1151.
- Karabatsos, G. (1997). The Sexual Experiences Survey: interpretation and validity. *Journal of Outcome Measurement, 1*(4), 305–328.
- Koss, M. P., Abbey, A., Campbell, R., Cook, S., Norris, J., Testa, M., . . . White, J. (2007). Revising the SES: A collaborative process to improve assessment of sexual aggression and victimization. *Psychology of Women Quarterly, 31*(4), 357-370. doi: 10.1111/j.1471-6402.2007.00385.x
- Koss, M. P., Abbey, A., Campbell, R., Cook, S., Norris, J., Testa, M., . . . White, J. (2008). 'Revising the SES: A collaborative process to improve assessment of sexual aggression and victimization': Erratum. *Psychology of Women Quarterly, 32*(4). doi: 10.1111/j.1471-6402.2008.00468.x
- Koss, M. P., & Gidycz, C. A. (1985). Sexual Experiences Survey: Reliability and validity. *Journal of Consulting and Clinical Psychology, 53*(3), 422-423. doi: 10.1037/0022-006x.53.3.422
- Koss, M. P., Gidycz, C. A., & Wisniewski, N. (1987). The scope of rape: Incidence and prevalence of sexual aggression and victimization in a national sample of higher education students. *Journal of Consulting and Clinical Psychology, 55*(2), 162–170.
- Koss, M. P., & Oros, C. J. (1982). Sexual Experiences Survey: A research instrument investigating sexual aggression and victimization. *Journal of Consulting and Clinical Psychology, 50*(3), 455–457.

- Littleton, H. L., Axsom, D., Breitkopf, C. R., & Berenson, A. (2006). Rape Acknowledgment and Postassault Experiences: How Acknowledgment Status Relates to Disclosure, Coping, Worldview, and Reactions Received From Others. *Violence and Victims, 21*(6), 761–778. <http://doi.org/10.1891/vv-v21i6a006>
- McHugh, M. L. (2012). Interrater reliability: the kappa statistic. *Biochemia Medica, 22*(3), 276–282.
- Messman-Moore, T. L., & Long, P. J. (2003). The role of childhood sexual abuse sequelae in the sexual revictimization of women: An empirical review and theoretical reformulation. *Clinical Psychology Review, 23*(4), 537–571. [doi.org/10.1016/S0272-7358\(02\)00203-9](http://doi.org/10.1016/S0272-7358(02)00203-9)
- Osman, S. L. (2011). Predicting rape empathy based on victim, perpetrator, and participant gender, and history of sexual aggression. *Sex Roles, 64*(7-8), 506–515. [doi:10.1007/s11199-010-9919-7](http://doi.org/10.1007/s11199-010-9919-7)
- Paivio, S. C., and Cramer, K. M. (2004). Factor structure and reliability of the Childhood Trauma Questionnaire in a Canadian undergraduate student sample. *Child Abuse & Neglect, 28*(8), 889–904. [doi: 10.1016/j.chiabu.2004.01.011](http://doi.org/10.1016/j.chiabu.2004.01.011)
- Peterson, Z. D., Voller, E. K., Polusny, M. A., & Murdoch, M. (2011). Prevalence and consequences of adult sexual assault of men: Review of empirical findings and state of the literature. *Clinical Psychology Review, 31*(1), 1-24. [doi: 10.1016/j.cpr.2010.08.006](http://doi.org/10.1016/j.cpr.2010.08.006)
- Resick, P. A., Monson, C. M., & Rizvi, S. L. (2008). Posttraumatic stress disorder. In D. H. Barlow (Ed.) *Clinical handbook of psychological disorders: A step-by-step treatment manual* (4th ed.). (pp. 65–122). New York, NY, US: Guilford Press.

- Roodman, A. A., & Clum, G. A. (2001). Revictimization rates and method variance: A meta-analysis. *Clinical Psychology Review, 21*(2), 183–204. doi:10.1016/S0272-7358(99)00045-8
- Ross, R. R., and Allgeier, E. R. (1996). Behind the pencil/paper measurement of sexual coercion: Interview-based clarification of men's interpretations of Sexual Experiences Survey items. *Journal of Applied Social Psychology, 26*, 1587–1616. doi: 10.1111/j.1559-1816.1996.tb00087.x
- Schlomer, G. L., Bauman, S., & Card, N. A. (2010). Best practices for missing data management in counseling psychology. *Journal of Counseling Psychology, 57*(1), 1-10.
- Shackelford, T. K., and Goetz, A. T. (2004). Men's sexual coercion in intimate relationships: Development and initial validation of the sexual coercion in intimate relationships scale. *Violence and Victims, 19*(5), 541–556. doi: 10.1891/vivi.19.5.541.63681
- Straus, M. A., Hamby, S. L., Boney-McCoy, S., & Sugarman, D. B. (1996). The Revised Conflict Tactics Scales (CTS2): Development and Preliminary Psychometric Data. *Journal of Family Issues, 17*(3), 283–316. doi:10.1177/019251396017003001
- Tabachnick, B. G., & Fidell, L. S. (2007). *Using multivariate statistics* (5th ed.). Boston, MA, USA: Allyn & Bacon/Pearson Education. doi: 10.1037/022267
- Testa, M., Hoffman, J. H., Lucke, J. F., & Pagnan, C. E. (2015). Measuring sexual aggression perpetration in college men: A comparison of two measures. *Psychology of Violence, 5*(3), 285–293. doi:10.1037/a0037584
- Testa, M., VanZile-Tamsen, C., Livingston, J. A., and Koss, M. P. (2004). Assessing women's experiences of sexual aggression using the sexual experiences survey: Evidence for validity and implications for research. *Psychology of Women Quarterly, 28*(3), 256–265.

- Tracey, T. J. G. (2015). A note on socially desirable responding. *Journal of Counseling Psychology*. doi: 10.1037/cou0000135
- Turchik, J. A. (2011). Sexual victimization among male college students: Assault severity, sexual functioning, and health risk behaviors. *Psychology of Men & Masculinity*. doi: 10.1037/a0024605
- Wilson, L. C., & Miller, K. E. (2016). Meta-Analysis of the Prevalence of Unacknowledged Rape. *Trauma, Violence & Abuse, 17*(2), 149–59.

Tables

Table 1
Patterns of SES-SFV Item Endorsement in all Time Periods, n = 396

Item	<u>Past Year</u> <i>n, % endorsed</i>	<u>Prior years'</u> <i>n, (% endorsed)</i>	<u>Lifetime</u> <i>n, % endorsed</i>
1. Someone fondled, kissed, or rubbed private areas	58, (14.6%)	84, (21.2%)	93, (23.5%)
2. Someone had oral sex with me or made me perform oral sex	24, (6.1%)	43, (10.9%)	47, (11.9%)
4. Someone put penis, fingers, or objects in my butt	16, (4.0%)	21, (5.3%)	22, (5.6%)
5. Someone tried to have oral sex or make me perform oral sex	22, (5.6%)	42, (10.6%)	47, (11.9%)
7. Someone tried to put penis, fingers, or objects into my butt	17, (4.3%)	23, (5.8%)	27, (6.8%)
9b. What was the sex of the person or persons who did them to you?			Female, <i>n</i> = 69, 17.4% Male, <i>n</i> = 18, 4.5% Both, <i>n</i> = 8, 2.0% Reported none, <i>n</i> = 300, 75.8%
10. Have you ever been raped?			Yes, <i>n</i> = 11, 2.8%

Note. Items numbered following their order on the SES-SFV. Items 3 and 6 are specific to women. Item 8 assess demographic characteristics and was omitted. Responses to question 9a, “did any of these experiences happen to you 1 or more times” were omitted for redundancy. Prior years’ operationalized as between 14 years of age and the past year. Tactic scores were summed within each sexual act item.

Table 2

SES-SFV Two-Week Test-Retest Reliability Correlations, n = 67

<u>Time 1</u>	<u>Time 2</u>			
	1.	2.	3.	4.
1. past year continuous	<u>.41**</u>	.47***	.44***	.39**
2. prior years' continuous	.04	<u>.04</u>	-.03	.10
3. lifetime category	.27*	.55***	<u>.53***</u>	.48***
4. lifetime dichotomous	.27*	.55***	.54***	<u>.49***</u>

Note. Underlined cells indicate the correlation value of the same score from Time 1 to Time 2.

* $p < .05$; ** $p < .01$; *** $p < .001$.

Table 3

Cross-tabulation of SES-SFV Lifetime Sexual Victimization Severity Categories at Time 1 and Time 2, (n = 66)

Time 1 Category	Time 2 Category				Total
	None <i>n</i> (% of 50)	Sexual Contact <i>n</i> (% of 7)	Sexual Coercion <i>n</i> (% of 4)	Rape <i>n</i> (% of 5)	
None	45 (90.0)	6	0	1	52
Sexual Contact	2	1 (14.3%)	2	1	6
Sexual Coercion	1	0	0 (0.0%)	1	2
Rape/Attempted Rape	2	0	2	2 (40.0%)	6
Total	50	7	4	5	66

Note. Entries appearing in bold indicate the percentage of participants within each Time 1 category who reported the same level of sexual victimization at Time 2; there was 72.7% agreement across categories.

Table 4

Convergent Validity: SES-SFV Rank Correlations (r_s), $n = 396$

	CTS2- Sexual Coercion	Childhood Sexual Abuse (CTQ-CSA)	Rape Empathy Scale (RES)
SES-SFV: Prior years'			
Highest Category	.20	.25	-.22
Continuous	.21	.26	-.22
Dichotomous	.20	.23	-.23
SES-SFV: Past Year			
Highest Category	.23	.20	-.12†
Continuous	.24	.21	-.14††
Dichotomous	.23	.20	-.12†

Note. All correlations significant at $p < .001$ unless otherwise noted, † $p < .05$, †† $p < .01$

Prior years' operationalized as between 14 years of age and the past year.

Table 5
SES-SFV Test of Guttman Scaling, % in Each Category, n = 396

SES-SFV Category	Prior years'	Past Year
None	74.7%	82.6%
Sexual contact only	8.8%	7.3%
Sexual coercion only	1.8%	0.5%
Both contact and coercion	2.8%	0.8%
Rape/attempted rape only	1.5%	1.8%
Both Contact and Rape/attempted rape	4.0%	2.8%
Both Coercion and Rape/attempted rape	0.8%	0.5%
All – Contact, Coercion, and Rape/attempted rape	5.6%	3.8%

Note. Prior years' operationalized as between 14 years of age and the past year