

**Table 1.** Metzger and Plankey (2012), *GUJHS* 6(1), 4-6.

<u>STUDY</u>	<u>Population</u>	<u>Assesment method and type of data</u>	<u>Predictive Variable(s) - Definition of development related victimization</u>	<u>Dependent Variable</u>	<u>Prevalence of CSA</u>	<u>Significant Results</u>
<b>Friedman et al. (2008)</b>	MSM (18-40); N=1,383; Urban Men's Health Study (UMHS)	Telephone interviews; retrospective/ self-reported	Age of gay-related development (GRD)	Poor adult health outcomes: forced sex, sexual risk behavior, partner abuse, adult victimization, HIV serostatus	Did not measure directly	Adolescent Victimization and Adult Health Outcomes - 189% more likely to experience gay-related victimization if experienced gay-related harassment before the age of 17; parental physical abuse led to increased likelihood of depression, partner abuse (57%), gay-related victimization (47%), attempted suicide as adult (90%); Forced sex before age of 18 associated with greater odds of depression (103%), partner abuse (107%), engaging in unprotected receptive anal intercourse (45%), being HIV seropositive as adults (45%).
<b>Kalichman et al. (2004)</b>	MSM; N=60; attending a gay pride festival in Atlanta, GA	Self-administered survey at site of recruitment: gay-pride festival; retrospective/ self-reported	CSA: at age 16 or younger forced or pressured to have sex by another man at least 5 years older	1) HIV status; 2) sexual risk behavior (unprotected anal intercourse); 3) treatment for STD; 4) payment for sex	15%	1. CSA endorsed more symptoms of borderline personality disorder; 2. CSA positively associated with greater risk of being HIV+; 3. CSA associated with having undergone treatment for substance abuse; 4. CSA associated with unprotected anal intercourse with two or more partners in previous 6 months
<b>Chuang et al. (2006)</b>	HIV+ men & women with history of alcohol problems; N=348 (79% men); HIV-Alcohol Longitudinal Cohort	In-person interview; retrospective/ self-reported	1. Violence history; 2. alcohol and drug consumption (past 30 days); 3. depressive symptoms (past week, Depression Scale); 4. Sexual risk behaviors (past 6 months, Risk Assessment Battery); 5. Physical violence; 6. Sexual violence	Condom use (inconsistent or consistent): not using condoms at all sexual encounters in the past 6 months vs. using condoms at all sexual encounters	26% of whole cohort, 39% in women, 22% in men	1. MSM and heterosexual men equally likely to report lifetime violence (82% vs. 77%); 2. MSM more likely to experienced sexual violence (57% vs. 24%) and CSA than heterosexual men (34% vs. 18%); 3. CSA positively associated with inconsistent condom use (OR 2.25).
<b>O'Leary et al. (2003)</b>	HIV+ MSM, N=456; Seropositive Urban Men's Study (SUMS)	In-person interview, paper and pencil questionnaire; retrospective/ self-reported	CSA: pressured, forced, or intimidated into doing something sexual; under age of 16;	HIV transmission risk behavior (90 days prior): UAS* with any partner of HIV- or unknown status	14.90%	Addition of mediators to model associating CSA and receptive anal sex reduced beta from 0.72 to 0.57. A beta of 0.57 was statistically significant.
<b>Wilson et al. (2008)</b>	Substantiated cases of childhood abuse and neglect; matched; N=1575 (total start), N=603 with HIV test	Not Given	CSA/neglect confirmed by official records processed in 1967-1971	HIV status - self reports and tested ELISA and Western blot	47%	1. CSA/Childhood neglect positively associated with prostitution (abuse/neglect OR 2.35, neglect OR 2.45, physical abuse OR 2.45, sexual abuse 2.38); 2. no significant CSA-HIV+ association; 3. no sexual behaviors associated with being HIV positive; 3. Constructed structural equation models linking CSA to early sexual contact to prostitution to HIV+, each connection is significant except any the path to HIV+ status not significant; 4. CSA/Childhood neglect positively associated with early sexual contact (abuse/neglect 1.75, neglect OR 1.76, physical abuse OR 2.06, sexual abuse 2.17).

<b>Raymond et al. (2009)</b>	Men who identified as gay, bisexual, or had male partner in last 12 months; N=521; National HIV Behavior Surveillance (NHBS)	Time location sampling, on-site in-person interview; retrospective/self-reported	Harassment, discrimination, connectedness to community, comfort with sexuality at ages 12-14, 15-18, 19-24, and 25 and up	HIV status - tested via blood sample, ELISA and Western blot	Did not measure	1. HIV- vs HIV+ reported significantly lower discrimination (12-18 yrs) (WRS 6703.5), lower discomfort with sexuality (WRS 6886.5); 2. Black men significantly more likely than white men to be HIV+ rate; 3. Black HIV+ experience less: discrimination (WRS 200), harassment (WRS 205), discomfort with sexuality (WRS 204.5).
<b>Lenderking et al. (1997)</b>	MSM; N=327	Interview during cohort study visit; retrospective/self-reported	CSA: sexual experience with person at least 5, or 10, years older for children >13 and 13-16 respectively	1. HIV status; 2. Risky sexual behavior; 3. Behavioral intentions (behavior used in order to have sex); 4. Substance abuse	35.50%	1. CSA positively associated with unprotected receptive anal intercourse (OR 1.53), more than 50 lifetime partners (OR 1.81), lying to have sex (2.08); 2. CSA was only predictor of receptive anal intercourse (OR 2.00); 3. HIV status did not predict unprotected anal intercourse.
<b>Paul et al. (2001)</b>	MSM; N=2881; Urban Men's Health Study (UMHS)	Telephone interviews (live person & automated); retrospective/self-reported	CSA: self-reported coercive sexual episodes; by age 17; also reported coercive sexual episodes after 17	Sexual risk behavior: sexual acts with non-primary and serodiscordant partners	20.60%	Serodiscordant sexual risk: adverse familial experiences (two vs zero) (OR 2.97), CSA severity (6+ times) (OR 3.17), One-night stands (OR 7.18), abusive relationship in past 5 years (OR 1.95), Anal sex under the influence of drugs (OR 1.97), HIV status (OR 3.5) all were associated with serodiscordant sexual risk; Associations with non-primary partner sexual risk: adverse familial experiences (1vs0 OR 1.55; 2vs0 OR 2.01; 3vs0 2.24); CSA severity (6+ times vs never OR 2.87); One-night stand (yes vs no OR 11.28); Anal sex under influence of drugs (OR 2.56); HIV+ (OR 2.26); Interaction between adverse familial experiences and CSA on non-primary partner sexual risk: no adverse familial experiences - any CSA significantly contributes to risk (OR 1.76); two experiences, CSA severity must increase to affect (6+ times vs never or 1-5 times OR 5.54 and 7.11).
<b>Brennan et al. (2007)</b>	Homosexual and bisexual men; N=862; Twin Cities' Men's Health and Sexuality Study	Self-administered survey at site of recruitment: gay-pride festival; retrospective/self-reported	CSA: forced to have unwanted sexual activity "as a child or adolescent", frequency reported	1. HIV status; 2. Sexual risk behavior: exchanged sex for payment, current use of sex-related drugs, ever had an STI, unsafe sex	15.50%	CSA frequency (once, sometimes, regularly) positively associated with: 1. exchanging sex for payment (regularly OR 6.98 & once 3.93); 2. use of sex-related drugs (regularly OR 6.37); 3. HIV+, ever had an STI, unsafe sex no association with CSA at any frequency.
<b>Welles et al. (2009)</b>	HIV+ MSM; N=593 (Seattle, Washington DC, Boston, New York, Los Angeles, Houston)	Group setting; self-reported on paper questionnaires	CSA: self-reported forced sexual activity with older person as a child or adolescent (dichotomous, Y/N); frequency	Sexual risk behavior: SDUAS** and sex without a condom	47%	Frequency of abuse (Often, Sometimes, Once/Rarely) positively associated with total sexual contact (RR 1.28, 1.25, 1.23 respectively), total acts of anal intercourse (often RR 1.36 & once/rarely RR 1.19), total acts of unsafe anal intercourse (RR 1.49 & 1.97 often and sometimes respectively); Frequency of abuse (Often, Sometime, Once/Rarely) negatively associated with total acts of anal intercourse (Sometimes RR 0.9), total acts of unsafe anal intercourse (Once/rarely RR 0.74).
<b>Mimiaga et al. (2009)</b>	MSM; N=4295; EXPLORE study	ACASI; retrospective/self-reported	CSA: sexual experience with person at least 5, or 10, years older for children >13 and 13-17 respectively	1. HIV serostatus; 2. Sexual risk behavior: UAS* and SDUAS**	39.70%	1. CSA positively associated with depression (OR 1.38-1.60 depression score 26%-100%), heavy alcohol use (OR 1.26), crack use (OR 2.47), amphetamine use (OR 1.23), low self-efficacy (OR 1.45), poorer communication skills around safe sex (OR 1.55), and lower safe sex norms (OR 1.55); 2. CSA associated with HIV seroconversion (Hazard ratio 1.3); 3. CSA positively associated with sexual risk behaviors: UA (OR 1.24) and SDUA sex (OR 1.3).

<b>Stall, R. (2003)</b>	MSM; N=2881; Urban Men's Health Study (UMHS)	Telephone interviews (live person & automated); retrospective/self-reported	CSA: at age 16 years forced or frightened to do something sexual by person 10 years older or more	1. HIV serostatus; 2. Sexual risk behavior	Not reported	1. CSA predicts: depression (OR 1.91), partner violence (OR 1.90), CSA (OR 1.9); 2. Depression predicts polydrug use (OR 1.37), partner violence (OR 1.6); 3. Polydrug use predicts partner violence (OR 2.21), depression (OR 1.43); 4. partner violence predicts polydrug use (OR 2.24), depression (OR 1.61), CSA (OR 1.99); 5. high-risk sexual behavior predicts CSA (OR 1.29), polydrug use (OR 1.88), partner violence (1.64); 6. HIV+ status predicts poly drug use (OR 2.05) & partner violence (OR 1.64), NOT depression or CSA; 7. Greater number of health problems significantly and positively associated with HIV infection and current high-risk sexual practices.
<b>Jimich et al. (1998)</b>	MSM; N=1941; Community AIDS Mobilization Project; Portland, OR & Tucson, AZ	Questionnaire by mail; telephone interviews; retrospective/self-reported	CSA: sexual experience with person at least 5, or 10, years older for children >13 and 13-15 respectively; frequency and severity recorded	1.HIV serostatus; 2. Transmission/Sexual risk behavior: UA* and SDUA**, partner type, & frequency	35% self-reported CSA; 28% fit criteria defined by study	1. CSA positively associated with transmission risk behavior (9.5% vs. 5.7%), UA* sex with non-primary partner (21.4% vs. 15%), abused men not in a primary relationship more likely to engage in transmission risk behavior than nonabused (11.2% vs. 5.9%), more likely to report being HIV+ (20.5% vs. 15.9%); 2. Behavior comparison: abused men reported more sexual events (mean = 8.9 vs 7.1), male partners (mean= 2.4 vs. 1.8), sexual encounters with nonprimary male sexual partner (mean = 2.5 vs. 1.7), sexual episodes while feeling the effects of recreational drugs (mean = 0.57 vs. 0.34) in the last 30 days. 3. Level of coercion with CSA positively associated with: UA sex with non primary partner in last 12 months (15% nonabused men vs. 20% no or mild coercion vs. 24% strongly coerced or physically forced); HIV-positive report (16% nonabused vs. 19% no/mild coercion vs. 22% strong coercion/physical force). 4. Increase in severity of CSA associated with depression severity (mean score = 5.3 vs. 5.22 vs. 6.42); 5. CSA correlated with higher distress/guilt following unprotected sex (mean score = 5.67 vs. 4.53).
<b>Sikkema et al. (2009)</b>	HIV+ adults with history of CSA; N=256 (MSM = 124)	Self-administered assisted interview; retrospective/self-reported	CSA: self-reported sexual abuse prior to turning 18 years old	Sexual risk behavior: unprotected sex or serodiscordant sex	N/A; 90% experienced penetrative sexual abuse	1. MSM unprotected sex positively associated with alcohol use (OR 4.11), marijuana use (OR 3.81), cocaine use (OR 2.53) behavioral difficulties (OR 2.44), negatively associated with social support seeking (OR 0.49), spiritual coping (OR 0.31), and avoidant coping (0.48); 2. Men and women serodiscordant sexual behavior positively associated with marijuana use (OR 3.33 & impact of shame on behavior (OR 3.34), negatively associated with active coping (OR 0.38).
<b>Catania et al. (2008)</b>	MSM; N=879; Urban Men's Health Study III; San Francisco	Initial telephone interview followed by mailed, self-administered questionnaire	CSA: any unwanted sexual experience (forced or unforced) before age 18. Definition of sexual abuse borrowed from <i>Paul et al., 2001</i> .	High-risk sex: unprotected serodiscordant sex.	22%	Primary partner model; Pathway: CSA-Motivation-Coping-Risk Appraisal-Risk Behavior. Severity of CSA associated with higher levels of depressive mood; Secondary partner model; Pathways: 1) CSA-Motivation-Scripts-Skills-Risk Behavior; 2) CSA-Motivation-Coping-Risk Appraisal-Risk Behavior. Severity of CSA positively associated with affective distress (depressiveness), greater anger, less "other-directedness," and less frequent use of behavior escape avoidance coping.

\*UAS - unprotected anal sex \*\*SDUAS - Serodiscordant Unprotected Anal Sex