The Sexual and Gender Minority Adverse Childhood Experiences Scale

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Introduction: Sexual and gender minority (SGM) adverse childhood experiences (ACEs) are identity-based forms of early life adversity. Exposure to SGM ACEs is associated with increased odds of depression, anxiety, and post-traumatic stress disorder in SGM adults. The purpose of this study was to further test a revised version of the measure in a U.S. sample with more robust and clinically relevant mental health outcomes.

Methods: In May and June 2022, a national sample of SGM adults (N=4,445) was recruited from a Qualtrics Panel to complete a 20-minute online survey that included questions regarding ACEs, SGM ACEs, depression, anxiety, and post-traumatic stress disorder. Exploratory factor analysis and confirmatory factor analysis were used to examine factor structure. Multivariable regression was used to assess criterion validity, and a sensitivity analysis was conducted. Data were analyzed in February 2023.

Results: Respondents indicate that vicarious trauma (81%) and school bullying (67%) were the most common experiences and that all SGM ACEs were frequently occurring before adulthood. Confirmatory factor analysis determined a 1-factor solution. Participants with more SGM adverse childhood experiences exposure had worse anxiety, depression, and post-traumatic stress disorder symptoms (β=0.16, β=0.18, β=0.26, respectively, p<0.0001) after controlling for ACEs exposure and demographic factors. A sensitivity analysis indicated that estimates were similar in terms of magnitude and direction.

Conclusions: SGM ACEs commonly and frequently occur before adulthood and impact adult SGM mental health. Overall, the measure had good-to-excellent psychometric properties. Future research should consider integrating SGM ACEs and Minority Stress Theory.
Am J Prev Med 2023;65(6):1050−1058. Published by Elsevier Inc. on behalf of American Journal of Preventive Medicine.

INTRODUCTION

Sexual (e.g., lesbian, gay, bisexual, queer) and gender (e.g., nonbinary, transgender) minority (SGM) individuals experience broad mental health disparities.[1] In particular, SGM individuals report higher rates of depression, anxiety,[2] and post-traumatic stress disorder (PTSD)[3,4] than cisgender heterosexual individuals. Adverse childhood experiences (ACEs) are a set of important factors that contribute to mental health disparities in the general population,[5] including SGM adults.[6−9]

ACEs are conceptualized as ongoing stressful experiences before adulthood, such as abuse or neglect, and

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household challenges such as witnessing domestic violence and exposure to problematic substance use at home.[10,11] The ACEs framework is useful for explaining poor adult mental health[12] that results from accumulation of events starting with ACEs exposures. These exposures are linked to altered neurodevelopment[13] that is associated with social, emotional, and psychological challenges in childhood that carries on into adulthood[14,15] and ultimately contribute to worse mental health outcomes.[5,16]

Sexual minority adults report more ACEs exposure than heterosexual adults,[6,8,9] whereas gender minority individuals face greater exposure than sexual minorities[7] and the general population.[17] Prior research has shown that SGM adults often report frequent exposure to emotional and physical abuse and neglect before the age of 18 years, indicating that these are common experiences among SGM individuals.[18] Higher ACEs exposure in SGM populations is likely linked to cisheteronormativity—a pervasive set of societal beliefs that individuals are exposed to beginning in early life, which normalize heterosexuality and cisgender identity (i.e., alignment of sex assigned at birth and gender identity) and promote the belief that cisgender and heterosexual identities are superior.[19−22] Ultimately, these societal beliefs about gender and sexuality lead to cisheterosexism—violence, discrimination, and mistreatment targeting SGM individuals.[23]

Disparities in ACEs exposure have led to calls for intersectional ACEs frameworks and measures that explain these differences and account for the unique experiences of SGM people.[7,24] The SGM-ACEs framework argues that cisheteronormativity increases the risk for general ACEs but that exposure to cisheterosexism should be conceptualized as an ACE.[25] Similar to ACEs, evidence suggests that exposure to cisheterosexism in early life potentially disrupts neurodevelopment as well as leads to biological dysregulation[26] and poor mental health in adulthood.[25]

Previous research on exposure to cisheterosexism in early life has largely focused on issues related to mistreatment and rejection by family members, as have associated measures. Ryan and colleagues tested a measure of family rejection in SGM young adults and demonstrated that greater family rejection resulted in increased odds of poor mental health.[27] Other scholars have found family rejection to be a predictor of poor mental health in SGM adults as well.[28] However, most research on family rejection focuses on youth and young adult outcomes. In addition, the literature points to unique social and structural adversities faced by SGM individuals beyond the family, related to vicarious trauma,[29] religious discrimination,[30] school bullying,[31]

homelessness,[32] and anti-SGM legislation,[33] which aligns with the work of Ellis and Watson and others regarding adverse community environments faced by marginalized young people.[34,35] Measures are needed that encompass the full range of cisheterosexism exposure beyond the family.

A measure of SGM-ACEs was developed as part of Strengthening Colors of Pride, a community-based participatory research project in which 82 SGM adults in South Texas were interviewed. This led to the emergence of 10 SGM-specific themes related to childhood adversity from which measurement scale items were created.[25] The resulting 7-item scale showed good-to-excellent psychometric properties.[25] The measure is promising, yet it came from a regional sample, and the mental health outcomes used to assess criterion validity (e.g., depression, anxiety, and PTSD) were self-reported diagnoses by a healthcare provider: "has a healthcare provider ever told you that you have...," with response options *yes* and *no*. This study aimed to test the SGM-ACEs measure in a national sample of SGM adults, include an additional item about being kicked out or running away from home for being SGM, and assess the criteria with more robust clinically relevant outcome measures.

METHODS

Study Sample

Recruitment took place in May and June 2022 using a national Qualtrics research panel. Data were analyzed in February 2023. Potential respondents were sent an e-mail invitation from Qualtrics informing them that the survey is for research purposes only, how long the survey is expected to take, and what incentives are available. To avoid self-selection bias, survey invitations did not include specific details about the contents of the survey and were instead kept very general. Data were checked to ensure the quality of responses by both Qualtrics staff and the research team. All study procedures were approved by The University of Texas at Austin IRB.

Measures

SGM-ACEs is an 8-item scale that assesses the frequency of exposure to cisheterosexist experiences before the age of 18 years[25] and was used as a predictor variable. Participants are prompted with the question, *how often did any of the following happen to you before the age of 18*? with response options for items such as "you heard about or saw LGBTQ+ people being physically harmed" including *never* (0) to *always* (4) and response options for items such as "you were kicked out or ran away from

home because you were LGBTQ+" including *none of life before the age of 18* (0) to *almost all of my life before the age of 18* (4). An average score from 0 to 4 was used.

The Patient Health Questionnaire−4[36] is a 4-item measure that screens for the severity of depression (Patient Health Questionnaire − 2) and anxiety (General Anxiety Disorder−2) symptoms during the past two weeks, which were the two outcomes of interest in this study. Respondents are prompted with the question, *over the past two weeks how often have been bothered by,* followed by two items assessing depressive symptoms and two items assessing anxiety symptoms. Response options included *not at all* (0) to *nearly every day* (3). Depression and anxiety were assessed separately using a total score ranging from 0 to 6 for each subscale, and both had good internal consistency alpha (α) of 0.90 and α of 0.86, respectively.

The Primary Care PTSD Screen for DSM-5[37] assesses PTSD symptoms, which was the third outcome of interest in this study. The screener includes two questions. First, respondents were prompted with, *Sometimes things happen to people that are unusually or especially frightening, horrible, or traumatic. For example: a serious accident, a physical or sexual assault, and earthquake or flood, a war, seeing someone be killed or seriously injured, having a loved one die through homicide or suicide.* Then, the respondents were asked, *have you ever experienced this kind of event?* Those responding *yes* were then prompted with, *in the past month have you...* and responded to 5 items assessing PTSD symptoms with response options including *yes*=1 and *no*=0 in Part 2 of the measure. Past research has shown that Primary Care PTSD Screen for DSM-5 had excellent diagnostic accuracy in civilian (area under the curve=0.93, 95% CI=0.91, 0.97) populations in primary care settings.[38] In this study, the items had adequate internal consistency (α=0.77).

The Common 10-item Adverse Childhood Experiences[11] measure was used as a covariate. Developed by Felitti and colleagues, the measure assessed childhood abuse (3 items), childhood neglect (2 items), and household challenges (5 items). Similar to previous research, response options were modified to include a 5-point scale to account for frequency of exposure from never (0) to always (4),[18] and the items were then dichotomized so that any exposure was denoted as 1, and no exposure was denoted as 0.[25] A total score ranging from 1 to 10 was used (α=0.82).

The authors include several demographic variables as covariates. Sex assigned at birth was assessed as a 2-part question, *what sex were you assigned at birth, on your original birth certificate?* with response options of male or female. Respondents were then asked whether they identified as intersex (yes=1, no=0). The variable sex was then created, which included male, female, and intersex. To assess gender identity, the survey asked, *If you had to choose only one of the following terms, which best describes your current gender identity?* Response options were recoded to cisgender (male/man/boy, female/woman/girl) and gender minority (transgender, genderqueer, agender, nonbinary, gender nonconforming, other). Instances where there was no alignment between sex assigned at birth and current gender identity (i.e., reported assigned male at birth, but current gender identity female/woman/girl) were recoded to be gender minority. Respondents were asked, *which of the following best describes your sexual orientation?* Responses were then recoded to be monosexual (lesbian, gay), pleural (bisexual, queer, pansexual), and another (asexual, demisexual) identity. Other responses were individually recoded for all variables on the basis of written responses. Similarly, respondents were asked, *which of the following best describes your race/ethnicity? Please mark all that apply.* Responses were recoded to White; non-Hispanic/Latine; Hispanic/Latine of any race; and person of color, non-Hispanic/Latine. The survey also used continuous variables to capture age, annual personal income before taxes, and population density of the city or town where respondents lived most of their lives before the age of 18 years.

Statistical Analysis

Data screening found no influential data points or nonnormal distributions. There were 10% missing data on covariates. Authors conducted analyses between those missing and those not and found that the direction and magnitude of estimates were similar, and the inference did not change; therefore, a complete case analysis was conducted. Frequencies and summary statistics were calculated to describe the participant characteristics. Full information maximum likelihood was used for missing data.[39]

To establish the factor structure of the scale, exploratory factor analyses were conducted to determine the underlying structure of the ACE items. The Kaiser-Meyer-Olkin measure indicated an adequate analysis for confirmatory factor analysis (Kaiser-Meyer-Olkin=0.87), and Bartlett's test of sphericity was significant at 0.0001. Confirmatory factor analyses with Promax rotation were then used to determine model adequacy and fit.[40] The following fit criteria were used to examine model adequacy: RMSEA <0.10; SRMR <0.06; CFI <0.90, TLI <0.90.[41,42]: root mean square error of approximation (RMSEA)<0.10,[40] standardized root mean square residual (SRMR)<0.06,[41] comparative fit index (CFI)<0.90, and Tucker−Lewis Index (TLI)<0.90.[4,41] Modification

indices were also assessed to improve the model fit, which is the discrepancy between the proposed model and the actual data, and overall chi-square.[43,44] After the factor structure was obtained and reliability was reported, predictive validity was assessed using multivariable regression analyses. To establish convergent validity, correlation analyses between all items were conducted. All analyses were conducted in R 4.0.1[45] and Stata (version 17.0).[46] In addition, given that past research shows that gender minority individuals report greater ACEs exposure[7,17] and that sexual and gender minority individuals are exposed to unique factors and experiences that contribute to poor mental health, a sensitivity analysis was conducted to evaluate how these results would change between cisgender and gender minority groups to assess unmeasured confounders and measurement consistency.[47]

RESULTS

Respondents (N=6,153) first reviewed an online study information sheet, and those who provided consent (N=5,754) completed an online survey as part of the National Project HEALS. In total, 13 cases were removed because of quality concerns. The final sample included 4,445 respondents who responded to all outcome variables and at least one predictor variable. The PTSD sample size is restricted to respondents who reported *yes* to Criterion A in the PTSD screener (*n*=2,744).

The average age of the sample was 33.3 (SD=13.27) years. More than half of the sample were assigned female at birth; identified as pleural sexual (54.2%); and identified as White, not Latine (54.6%). One in four (25.4%) respondents reported growing up in a small town, followed by growing up in a large city (19%), and one in eight reported growing up in a mid-sized to large city (12.5%) or rural community (12.5%). The average ACEs score was 19.8 (SD=8.54), and the average SGM-ACEs score was 2.27 (SD=3.02) (See Table 1).

The most reported ACEs were emotional abuse (79%), emotional neglect (76%), and physical abuse (63%). Nearly half (49%) of the respondents reported any physical neglect. The most commonly reported SGM-ACEs were vicarious trauma (81%), school bullying (67%), and cisheterosexist family environments (64%). These also occurred with some frequency, with 40%, 26%, and 26% reporting that these experiences occurred often or always before the age of 18 years. Table 2 presents findings on the prevalence of ACEs and SGM-ACEs.

A 1-factor solution fit the data the best (χ^2[19]=352.3; *p*<0.0001; RMSEA=0.06; Akaike Information Criterion=101,709.9; CFI=0.97; TLI=0.95; SRMR=0.03). Each item had a factor loading ranging from 0.4 (1 item) to 0.8. A 2-factor model was also compared (χ^2 [19]=191.6; *p*<0.0001; RMSEA=0.07; Akaike Information Criterion=98,764.3; CFI=0.94; TLI=0.93; SRMR=0.04), but 2 of the items (i.e., "you were in foster care, juvenile detention" or a "mental hospital and you were kicked out of your home or ran away because you were LGBTQ+") solely loaded on 1 factor, with 1 item falling below 0.4. Therefore, a 1-factor solution was implemented as items with a loading below 0.4, and factors with <3 items are not psychometrically desirable (See Table 3).[47]

The internal consistency of the SGM-ACE measure was calculated to be 0.82 (95% CI=0.80, 0.82; SD=0.92). Correlation analyses between SGM indicators were conducted to determine convergent validity. All measures were correlated with each other (*p*<0.0001), establishing convergent validity. SGM-ACEs exposure predicted worse anxiety (β=0.16, *p*<0.001), depression (β=0.18, *p*<0.001), and PTSD (β=0.26, *p*<0.001) symptoms, after controlling for ACEs and other covariates (Table 4). The models were run with the whole sample and without cisgender sexual minorities and for both groups. The estimates were similar in terms of magnitude and direction.

DISCUSSION

Similar to past research with SGM populations,[6−9] participants in this study reported a high number of ACEs and frequent exposure before the age of 18 years, specifically, childhood abuse and neglect. This aligns with the premise that cisheteronormativity is associated with higher ACEs exposure in SGM individuals. Similar to previous studies,[18−25] this study demonstrated that ACEs and SGM-ACEs were common and frequent. The revised SGM-ACEs measure showed good to excellent psychometric properties. There was strong criterion validity showing that SGM-ACEs exposure is associated with worse depression, worse anxiety, and worse PTSD symptoms in patients with a positive Criterion A screen. However, there are 3 primary points to be resolved with SGM-ACEs.

First, further theoretical integration is warranted. Minority Stress Theory (MST)[48] is the prevailing theory in the field of SGM health disparities research. Integration of SGM-ACEs with MST offers extensions and advances that address several long-standing critiques of MST about direction of effect regarding exposure to minority stress processes and adult mental health[49,50] as well as whether it is exposure to discrimination and lack of social safety that contributed to these disparities.[51] Integrating SGM-ACEs into MST addresses the direction of effect issue because SGM-ACEs occur before the

Table 1. Sample Characteristics for the Full Sample and Restricted to Those With Positive Criterion A for PTSD Screening

Sample characteristic	Total sample (N=4,445) Mean (SD)/%	PTSD sample[a] (n=2,774) Mean (SD)/%
Anxiety	3.06 (2.07)	3.40 (2.00)
Depression	2.90 (2.03)	3.21 (1.98)
PTSD symptoms	—	3.63 (1.59)
SGM-ACEs[b]	2.27 (0.87)	2.39 (0.85)
ACEs[c]	5.74 (3.02)	6.11 (2.73)
Age (years)	33.03 (13.27)	32.66 (12.66)
Annual household income[d]	6 (2.76)	6 (2.72)
Sex assigned at birth		
Female	61.7	65.3
Male	29.5	25.8
Intersex	8.7	8.9
Gender diverse identity	21.8	22.6
Sexual identity		
Pleural sexual	54.2	56.0
Monosexual	30.4	27.0
Another sexual identity	15.5	17.0
Race/ethnicity		
White, Not Latine	54.6	54.5
Person of color, not Latine	28.0	27.4
Latine, any race	17.4	18.1
Childhood urbanicity (residents)		
Large city (≥1,000,00)	19.0	17.2
Mid to large city (500,000−999,999)	12.5	12.1
Mid-sized city (150,000−499,999)	15.6	15.8
Small-sized city (100,000−149,999)	15.0	15.4
Small town (5,000−99,999)	25.4	26.2
Rural community (<5,000)	12.5	13.3
Unknown	1.87	0

ACE, adverse childhood experience; PTSD, post-traumatic stress disorder; SGM-ACE, sexual and gender minority adverse childhood experience.
[a]Post-Traumatic Stress Disorder. Subsample includes only those individuals reporting yes to Criterion A in the PC-PTSD-5 screener.
[b]Sexual and Gender Minority Adverse Childhood Experiences.
[c]Adverse Childhood Experiences.
[d]Annual household income was treated as a continous variable. An income value of 6 represents an income of "$36,000 to $47,999".

measurement of adult mental health. In addition, exposure to early childhood adversity primes the brain to perceive the world as more threatening and more attuned to potential threats in the environment[13,52] In fact, recent research has demonstrated a relationship between ACEs exposure and perceived discrimination in adulthood.[53,54] It follows that SGM-ACEs likely increase both perceptions and awareness of exposure to distal minority stress process in adulthood (e.g., cisheterosexism) and increase proximal minority stress process (e.g., fear of rejection, concealment of identity). SGM young people exposed to a combination of ACEs and SGM-ACEs are likely more aware of potential threats in the environment because of the neurodevelopmental shifts related to trauma exposure,[13] specifically regarding their SGM identity, reducing perceptions of social safety.[51] Future research should consider examining the relationships between SGM-ACEs and minority stress process in adulthood as well as exploring the potential relationships between ACEs and SGM-ACEs.

Second, although the findings of this study further confirm the validity of the SGM-ACEs measure, the original measure was developed on the basis of a regional sample, leaving open the possibility that the measure does not fully encompass how cisheterosexism in early life is experienced in diverse populations and settings. Although it may not be possible to define and measure the totality of cisheterosexist experiences in early life, further development is needed to identify additional SGM-ACE items such as forced attempts at identity change[55] or anti-SGM legislation.[56] Furthermore, attention to developmental stages could improve measurement. The developmental timing of ACEs exposure may influence health outcomes, implicating age of

Table 2. ACEs and SGM-ACEs Exposure in a National Sample of Sexual Minority Adults (N=4,445)

Childhood adversity	Never	Rarely	Sometimes	Often	Always	Any
ACE						
Did a parent or other adult in the household swear at you insult you, put you down, or humiliate you?	21%	15%	30%	21%	12%	79%
Did a parent or other adult in the household often push, grab, or throw something at you?	37%	20%	23%	12%	8%	63%
Did an adult or person at least 5 years older than you ever touch or fondle you or have you touch their body in a sexual way?	56%	12%	18%	9%	4%	44%
Did you often feel that no one in your family loved you or thought you were important or special?	24%	16%	26%	19%	15%	76%
Did you often feel you didn't have enough to eat, had to wear dirty clothes, and had no one to protect you?	51%	18%	17%	8%	6%	49%
Was your mother or stepmother physically assaulted (e.g., pushed, grabbed, hit)?	54%	13%	17%	10%	6%	46%
Did you live with anyone who was a problem drinker or alcoholic or who used illegal drugs?	45%	9%	16%	13%	17%	55%
Was a household member depressed or mentally ill or did a household member attempt suicide?	41%	13%	21%	14%	12%	59%
Were your parents separated or divorced?	42%	10%	11%	18%	19%	58%
Was a household member in prison?	73%	10%	9%	5%	3%	27%
SGM-ACE experiences						
You were bullied in school by other children, teachers, staff, or school administrators (i.e., principal) because of your sexuality or gender identity. (School bullying)	33%	15%	25%	15%	11%	67%
You were in foster care, juvenile detention, or a mental hospital. (Institutionalization)	72%	9%	9%	6%	4%	28%
Family members said transphobic, homophobic, or biphobic things about you or other people on a regular basis in person or on social media. (Cisheterosexist family environment)	36%	14%	24%	15%	11%	64%
Religious leaders at your church or other faith community said homophobic and transphobic things, such as teaching that the Bible or other texts condemn homosexuality or transgenderism. (Religious trauma)	40%	10%	17%	16%	17%	60%
You were punished, shamed, or yelled at by family members for not conforming to gender expectations (being too much or not manly enough, being too feminine or not feminine enough). (Punishment for gender nonconformity)	43%	16%	20%	12%	9%	57%
You felt pressure to have sex or relationships that you did not want to protect your family from discovering your gender or sexuality. (Cisheteronormative relationships)	49%	13%	19%	11%	9%	51%
You saw/heard of other LGBTQ+ people being physically harmed. (Vicarious trauma)	19%	13%	28%	23%	17%	81%
You were kicked out of your home or ran away because you were LGBTQ. (Kicked out/ran away)	79%	11%	7%	2%	1%	21%

ACE, adverse childhood experience; LGBTQ, lesbian, gay, bisexual, transgender, questioning; SGM-ACE, sexual and gender minority adverse childhood experience.

exposure as an important contextual factor.[57] In addition, types of ACEs exposure are also related to adult mental health outcomes.[58,59] Research on SGM-ACEs should consider the impact of both timing and type of exposure on adult SGM health outcomes. Finally, purposeful inclusion of pleural sexual (e.g., bisexual, pansexual) and nonbinary identities in the next iteration of SGM-ACEs may improve validity for SGM individuals with less common SGM identities.

Third, an assessment of measurement equivalence is needed to assess whether SGM-ACEs perform equally well with cisgender monosexual populations, gender minority populations (e.g., transgender, nonbinary), and pleural sexual populations. Data on sexual minority and gender minority individuals are often analyzed together; however, these populations experience unique stressors and experience minority stress in different ways. A test of measurement equivalence is needed to assess performance across intersectional SGM groups as well as assessment across other demographic characteristics. In addition, because both studies on SGM-ACEs were cross-sectional surveys, a test−retest assessment is needed to examine the temporal stability of the measure.

Table 3. Zero Order Correlations of SGM-ACEs Indicators

SGM-ACEs indicator	1	2	3	4	5	6	7	8
(1) School bullying	—							
(2) Institutionalization	**0.32**	—						
(3) Cisheterosexist family environment	**0.41**	**0.28**	—					
(4) Religious trauma	**0.33**	**0.22**	**0.55**	—				
(5) Punishment for gender nonconformity	**0.43**	**0.32**	**0.62**	**0.48**	—			
(6) Cisheteronormative relationships	**0.36**	**0.29**	**0.47**	**0.41**	**0.53**	—		
(7) Vicarious trauma	**0.32**	**0.17**	**0.47**	**0.40**	**0.41**	**0.40**	—	
(8) Kicked out/ran away	**0.29**	**0.36**	**0.32**	**0.26**	**0.39**	**0.34**	**0.19**	—

Note: Boldface indicates statistical significance (p<0.001)
SGM, sexual and gender minority; ACE, adverse childhood experience.
1=school bullying, 2=institutionalization, 3=cisheterosexist family environment, 4=religious trauma, 5=punishment for gender nonconformity, 6=cisheteronormative relationships, 7=vicarious trauma, and 8=kicked out/ran away.

Limitations

This study has a few limitations. A large sample of SGM individuals that closely resembled samples in other national studies[60−62] enhanced the robustness of the results and conclusions. The use of an existing online research panel may not reflect SGM individuals beyond that population. Data were cross-sectional, limiting its generalizability, and this presents challenges for causal inference. However, given that SGM-ACEs occurred before the age of 18 years and that mental health was assessed in the past two weeks, there is directionality. Moreover, data were self-reported, which may have led to desirability and recall bias.

CONCLUSIONS

This study presents data on a new measure to assess exposure to cisheterosexism in early life, which is a first step toward developing an intersectional ACEs framework for SGM populations. The SGM-ACEs measure is

Table 4. Regression Analyses of SGM-ACEs on Anxiety, Depression, and PTSD Outcomes

Variable	Anxiety (N=4,445)			Depression (N=4,445)			PTSD (*n*=2,774)		
	B	SE	β	B	SE	β	B	SE	β
SGM-ACEs	**0.43*****	0.06	0.16	**0.48*****	0.06	0.18	**0.58*****	0.06	0.26
ACEs	**0.12*****	0.01	0.18	**0.10*****	0.01	0.14	**0.08*****	0.01	0.13
Age (years)	0.04	0.09	0.01	0.10	0.09	0.02	0.00	0.07	0.00
Annual household income	**−0.07*****	0.01	−0.10	**−0.05*****	0.01	−0.07	**−0.04*****	0.01	−0.07
Gender minority	0.07	0.08	0.01	0.11	0.09	0.02	−0.22	0.07	−0.06
Sex (ref=female)									
Male	**−0.28*****	0.08	−0.06	**−0.49*****	0.08	−0.11	**−0.36*****	0.08	−0.10
Intersex	**−0.41*****	0.12	−0.06	**−0.71*****	0.12	−0.10	−0.20	0.11	−0.04
Sexual orientation (ref=pleural sexual)									
Monosexual	**−0.16***	0.07	−0.04	**−0.16***	0.08	−0.04	**−0.29*****	0.07	−0.08
Another identity	0.04	0.09	0.01	**0.27****	0.09	0.05	−0.06	0.07	−0.02
Race/ethnicity (ref=White)									
Latine, any race	−0.16	0.09	−0.04	−0.20*	0.10	−0.04	−0.15	0.08	−0.04
Person of color, not Latine	**−0.02*****	0.00	−0.16	**−0.02*****	0.00	−0.14	**−0.02*****	0.00	−0.17
Childhood Urbanicity (ref=small town 1,000−99,999 residents)									
Large city (≥1,000,00)	−0.17	0.10	−0.03	**−0.33****	0.10	−0.06	0.16	0.09	0.04
Mid to large city (500,000−999,999)	−0.18	0.10	−0.03	−0.21	0.11	−0.03	0.02	0.10	0.00
Mid-sized city (150,000−499,999)	**0.20***	0.10	0.04	0.09	0.10	0.02	−0.04	0.09	−0.01
Small-sized city (100,000−149,999)	0.01	0.10	0.00	−0.06	0.10	−0.01	−0.01	0.09	0.00
Rural community (<5,000)	0.10	0.10	0.02	0.13	0.10	0.02	−0.05	0.09	−0.01

Note: Boldface indicates statistical significance (*p<0.05, **p<0.01, and ***p<0.001).
ACE, adverse childhood experience; PTSD, post-traumatic stress disorder; SGM-ACE, sexual and gender minority adverse childhood experience.

psychometrically sound and worthy of continued development. Future research should consider the development of additional items, test−retest reliability, measurement equivalence assessments, and integration with minority stress processes in adulthood.

ACKNOWLEDGMENTS

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