

Sexual Violence Risk and Protective Factors: A Systematic Review of the Literature

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Table of contents

Introduction	3
Methods	4
Summary of risk and protective factors and potential corresponding indicators	6
<i>Table 1: Summary of risk factors</i>	6
<i>Table 2: Summary of protective factors</i>	7
Risk factors	7
Child maltreatment	7
Exposure to parental intimate partner violence (IPV) in childhood	9
Prior aggression, delinquent behavior in adolescence, or exposure to “delinquent” peers	11
Endorsement of traditional, rigid gender roles, “hostile masculinity”	12
An “impersonal” or scoring approach to sex and sexual risk-taking	14
Attitudes or beliefs that excuse sexual aggression, blame victims, or support aggressive behavior	16
Internalized stigma / minority stress	17
Acculturation	19
Alcohol use	20
Perceived peer approval for sexual aggression / membership in all-male social networks	22
Summary of protective factors	23
Protective factors	24
Empathy	24
Social support and connectedness	25
School connectedness / academic achievement	26
<i>Table 3: Sexual violence risk factors: identifying shared factors across forms of aggression</i>	27
<i>Table 4: Sexual violence protective factors: identifying shared factors across forms of aggression</i>	28
Conclusions and themes	28
References	31

Introduction

The Centers for Disease Control and Prevention (CDC) provides funding to state and territorial health departments to implement the Rape Prevention and Education (RPE) program. Washington has selected seven grantees through a competitive process to implement comprehensive prevention strategies in local communities. Each grantee provides primary prevention activities to specific population(s). Grantees vary widely geographically, and in the populations they serve.

In 2016 Washington received a program evaluation supplement from CDC. The purpose of the RPE Program Evaluation Supplement to The Rape Prevention & Education Program (RPE) is to expand existing evaluation capacity and increase monitoring of state-level indicators of sexual violence outcomes in selected states funded under FOA CDC-RFA-CE14-1401. With supplemental funding, the WA RPE program will build upon its current capacity building evaluation framework to include state-level outcome(s) and strengthen RPE program evaluation methods to better capture the complexity of the state structure, i.e. multiple RPE-funded local programs prioritizing different high risk populations. In addition, the program will increase its ability to identify and monitor state-level indicators for sexual violence.

As part of the Washington CDC supplemental work, a comprehensive literature review was conducted to update knowledge from the emerging scientific literature about predictors of sexual violence and to identify additional predictors of sexual violence. This literature review includes empirical research, sexual violence outcomes, identified risk and protective factors and explores additional indicators that may serve as proxies for sexual violence. In addition, given that Washington's RPE program approach purposely includes programs focused on specific priority populations, this literature review paid special attention to how risk and protective factors differ across populations. Information gained from this literature review is intended to further strengthen a comprehensive approach to building an evidence base.

Methods

This review leveraged existing systematic reviews of empirical literature regarding risk and protective factors for sexual violence perpetration, and is intended to extend rather than replicate those reviews. In particular, this review builds on a comprehensive, exhaustive review of risk factors for sexual assault *perpetration* against adolescents and adults conducted by researchers at the Centers for Disease Control and Prevention (CDC), and published in *Trauma, Violence, and Abuse* in 2012 (hereafter referred to as the 2012 CDC review; Tharp et al., 2012). Because 2012 CDC review did not assess risk factors for sexual offending against children, we used the 2008 review of the etiology of sexual offending (Whitaker et al., 2008) as a baseline document for identifying predictors specific to child sexual abuse perpetration. It should be noted that most research included in the review of risk factors for offending against children reflect comparisons between adjudicated sex offenders and incarcerated or adjudicated individuals who do not commit sexual crimes.

Literature included in this review was identified through searches of google scholar, and the Psychinfo and Pubmed databases using combinations of the terms “predictors,” “risk factors,” “protective factors,” and “sexual assault/rape/sexual violence perpetration,” and “sexual offending.” Because empirical studies published prior to 2008 are included in the aforementioned existing reviews, only studies published in 2009 or later were included in this review. The first 10 pages of results for each search were examined for relevant articles, and forward reference searching on review articles (articles citing the review) were examined. Only empirical articles that included sexual aggression as an outcome, or review articles that summarized findings from exclusively empirical articles were included in this review.

A goal of this review was also to identify community-specific risk and protective factors in three culturally-specific communities, as well as to assess the relevance of the risk factors identified in the 2012 CDC review to these communities. Specifically, we searched for literature specific to Latinx, Asian / Asian American / Pacific Islander (API), and Lesbian, Gay, Bisexual, and Transgender (LGBT) communities – three of the culturally-specific communities currently engaged in sexual violence prevention efforts in Washington State. Because of the relative scarceness of research specific to these communities, we widened our search frame to include literature published prior to 2008, and to literature inclusive of risk factors for victimization, and for intimate partner violence (IPV), as long as the IPV measurement included assessments of sexual abuse. To accomplish this, we added “Latino/a,” “Asian” “Asian American” “API” and “Lesbian/Gay/Bisexual/Transgender” to our searches.

In total, we identified 58 articles that met above criteria. This is not meant to represent an exhaustive review of every empirical study published since 2008 – there may be articles and empirically supported risk factors that the search did not detect. All articles were examined for both significant and non-significant findings regarding risk and protective factors. Because of the complexity of sexually aggressive behavior, and the number of risk factors identified across literature, we narrowed the factors addressed in this report. Starting with the 35 risk factors that were supported in the 2012 CDC review, we prioritized those with the most empirical support, and those which seem most accessible to and modifiable by primary prevention programming. Prioritizing these risk factors was accomplished through consultation with the Washington State Department of Health, and with the Washington State Prevention Steering Committee. In total, the below review addresses 25 of the 35 risk factors found to be significant in the 2012 CDC review. Some of these risk factors are collapsed into broader categories below (e.g. Number of sexual partners, STI diagnosis, sexual risk taking, and attitudes toward casual sex are all discussed in the “impersonal sex” section, below). We also identified 2 risk factors and 3 protective factors not addressed in the 2012 CDC review.

Finally, given increasing interest in understanding the ways in which risk and protective factors are common across forms of violence, we leveraged recent literature reviews to examine the extent to which the below factors are relevant to multiple forms of aggression, including teen dating violence, intimate partner violence, youth violence, bullying, and suicide and self-harm. This element of the review, in particular, is not exhaustive and represents a preliminary glance at the degree to which addressing the following risk and protective factors holds promise for impacting and reducing more than one negative outcome. In particular, we build on the 2014 review of shared risk factors published by the Centers for Disease Control and Prevention (Wilkins et al., 2014). These findings are summarized in Tables 3 and 4.

Summary of risk and protective factors for perpetration and potential corresponding indicators

Table 1. Summary of risk factors

Note – conclusions in this table for Latinx, API, and GLBTQ communities are based on very limited literature and should be considered extremely tentative and subject to future research

DATA SOURCE						
Risk/Protective Factor	2012 review (adol/adult perp)	2012-2017 general adult/adol perp literature	CSA perpetration literature	Literature on Latinx communities	Literature on API communities	Literature on LGBTQ communities
RISK FACTORS						
Childhood maltreatment	Sig	Sig	Sig	Sig for victimization	Sig	Sig for victimization
Exposure to parental IPV	Sig	Mixed	Mixed	Sig	N/A	N/A
Rape-supportive or victim-blaming attitudes	Sig	Sig	Sig	N/A	Sig	N/A
Rigid gender roles, hypermasculinity	Sig	Sig	N/A	Mixed	Sig	N/A
Impersonal sex	Sig	Sig/mixed	Sig	Sig	Sig	Mixed – sig for victimization
Prior aggression / delinquency	Sig	Sig	Sig	Sig for victimization	Sig	N/A
Alcohol use	Sig	Sig	Sig	Sig	Sig	Sig for victimization of lesbian women
Acculturation	N/A	N/A	N/A	Sig	Mixed	N/A
Minority stress / stigma	N/A	N/A	N/A	N/A	Protective against perp	Sig for vict and perp.
Perceived peer support for sexual aggression	Sig	Sig	N/A	N/A	N/A	N/A
Membership in all-male groups	Sig	Mixed	N/A	N/A	N/A	N/A

Sig = significantly related to SA perpetration in preponderance of literature; Mixed = mixed or inconclusive evidence across literature; N/A = not addressed in available literature; Sig for Victimization = significantly related to SA victimization but no literature found on perpetration

Table 2. Summary of protective factors

Note – conclusions in this table for Latinx, API, and GLBTQ communities are based on very limited literature and should be considered extremely tentative and subject to future research

DATA SOURCE						
Risk/Protective Factor	2012 review (adol/adult perp)	2012-2017 general adult/adol perp literature	CSA perpetration literature	Literature on Latinx communities	Literature on API communities	Literature on LGBTQ communities
PROTECTIVE FACTORS						
Factor	2012 review (adol/adult perp)	2012-2017 general adult/adol perp literature	CSA perpetration literature	Literature on Latinx communities	Literature on API communities	Literature on LGBTQ communities
Empathy	Sig	Mixed	Sig	N/A	N/A	N/A
Social support / connectedness	N/A	Sig	Sig for social skills deficits	Sig	Sig for “loss of face”	Sig
School connectedness / academic achievement	N/A	Sig	N/A	N/A	N/A	N/A

Sig = significantly related to SA perpetration in preponderance of literature

Mixed = mixed or inconclusive evidence across literature

N/A = not addressed in available literature

Risk Factor: Childhood Maltreatment

Definition: Childhood Maltreatment can include physical abuse, sexual abuse (CSA), emotional abuse, and neglect prior to the age of 18. Some studies examine polytrauma, or experiencing multiple forms of childhood abuse over time, as a risk factor for sexually aggressive behavior – studies that examine multiple forms of childhood maltreatment sometimes also include childhood exposure to parental intimate partner violence.

Summary of evidence: The 2012 CDC review of risk factors concluded that all forms of childhood maltreatment except for neglect were, on balance, related to increased risk for future sexual aggression. In the CDC review, early emotional abuse was the most consistently significant risk for later aggression, with physical abuse (significant in 15 or 21 studies)

and childhood sexual abuse (significant in 20 of 34 studies) evidencing slightly less consistent relationships with later sexual aggression. It should also be noted that most youth who experience abuse do not develop aggressive behavior as adults, and that most sexually aggressive adults do not report a history of childhood abuse, however (Whitaker et al., 2008).

This suggests that it is critically important to identify risk and protective factors that may exacerbate or buffer the impact of early maltreatment on the development of aggressive behavior.

Research emerging since the CDC review more consistently establishes a relationship between early maltreatment and sexual aggression. This is particularly true for child sexual abuse and for poly-trauma. Specifically, experiencing sexual abuse as a minor was a significant predictor of sexual aggression in adolescence or adulthood in all five studies located for this review that included measures of childhood sexual abuse (Basile et al., 2013; Casey et al., 2009; Casey et al., 2017; Jespersen et al., 2009; Parkhill & Pickett, 2016). Similarly, four studies used combined measures inclusive of multiple forms of maltreatment (polytrauma) and all found these to be significantly predictive of later sexual aggression (Abbey et al., 2011; Abbey et al., 2012; Sutton et al., 2015; Thompson et al., 2011). It may be that experiencing sexual abuse increases risk for perpetration, but that polytrauma especially exacerbates this risk. For example, in a sample of 18-25 year-old men, Casey et al. (2017) found that 4% of men with no history of childhood maltreatment had committed rape, 8.9% of men with a history of childhood sexual abuse had committed rape, but 36.8% of men with a history of childhood polytrauma (physical and sexual abuse and exposure to IPV) had committed rape.

Childhood maltreatment, and especially CSA, is also a consistently documented risk factor for sexual offending against children for both male offenders (Calkins et al., 2015; Jespersen et al., 2009; Maniglio, 2011; Miller, 2010; Whittacker, 2008) and female offenders (Strickland, 2008). In a comparison of rates of Adverse Childhood Experiences between a large sample of sex offenders (approximately half of whom offended against children) and the general population, Levenson et al. (2016) concluded that sex offenders experienced adverse childhood experiences including sexual, physical, and verbal abuse at 2-13 times the rate of the general population.

Community-specific findings: Only one study was located that examined childhood maltreatment as a risk factor among Asian American men. Hall et al. (2005) found that experiencing sexual abuse in childhood was a significant predictor of sexually aggressive behavior among Asian American, Hawaiian Asian, and White college-enrolled men. Similarly, only

one review article addressed this risk factor for Latinx communities and concluded that childhood physical and sexual abuse were significant predictors of both IPV perpetration and victimization (inclusive of sexual abuse) for Latinx men and women (Cummings et al., 2015). While no studies including GLBTQ communities examined childhood maltreatment as a risk factor for perpetration, three studies documented a link between child sexual abuse in particular, and risk for sexual victimization among gay and bisexual men (Han et al., 2013; Hequemberg et al., 2015) and among gay, lesbian and bisexual homeless young adults (Tyler et al., 2008).

Given the strong evidence over time of the role of child maltreatment in generating risk for sexual aggression across communities, reducing child maltreatment would have a significant impact on also reducing rates of sexual assault perpetration by adolescents and adults. Because tackling child maltreatment is a complex and on-going endeavor, intervening with maltreated youth in trauma-informed ways also carries enormous potential to both support those young people's healthy development, and to reduce overall rates of sexual violence. These findings also support prioritizing maltreated youth as recipients of prevention services.

Possible indicators and measurement approaches:

- Rates of referrals to Child Protective Services
- Rates of substantiated Child Welfare abuse and neglect cases
- Rates of uptake of trauma-informed programming in schools, other youth-serving organizations, and sexual assault prevention programming (e.g. use of the "Compassionate Schools" model).
- Adverse Childhood Experiences Scale (Felitti et al., 1998)

Risk Factor: Exposure to parental intimate partner violence (IPV) in childhood

Definition: Witnessing physical abuse or significant family conflict between parents or guardians during childhood.

Summary of evidence: Childhood exposure to IPV was found to be a consistent and significant risk factor for later sexual aggression in the 2012 CDC review by Tharp et al. Since that review, fewer studies have included IPV as a *separate* potential risk factor outside of a general measure of childhood maltreatment (see experiencing maltreatment in childhood, above). Those studies that examine IPV exposure separately have produced mixed findings. In a college

student sample, Sutton et al. (2015) found that exposure to physically or emotionally abusive behavior between parents was associated with attachment difficulties and a non-intimacy based approach to sexual relationships, which in turn was associated with risk for perpetrating sexual aggression. In contrast, other recent studies have not found significant relationships between witnessing IPV and sexual aggression among adolescents (Reyes & Foshee, 2013) or in a college student sample (Thompson et al., 2011), when other risk factors are accounted for. This suggests that exposure to IPV may exacerbate other risk factors, or be an element of experiencing polytrauma, but may not, on its own, be a strong predictor of later, peer to peer sexual aggression. Little information is available about the role of witnessing IPV in creating risk for sexual offending against children; a 2008 review of risk factors for sex offending concluded that sex offenders against children reported “generally worse family functioning” than non-offenders across studies (Whitaker, 2008).

Community-specific findings: Two articles reviewing risk factors for intimate partner violence (inclusive of sexual aggression) among Latino men concluded that childhood exposure to IPV is significantly associated with IPV perpetration in adulthood (Cummings et al., 2015; Mancera et al., 2015). Neither review isolated the impact of witnessing IPV on sexual aggression specifically, however. No literature was located that examined relationships between exposure to parental IPV and later sexual aggression among Asian American or BLGTQ individuals.

Given somewhat mixed findings, exposure to parental IPV may not be a priority risk factor to address in primary prevention programming, beyond the trauma-focused approaches that might ameliorate this, and other adverse childhood experiences.

Possible indicators:

- Rates of uptake of trauma-informed programming in schools, other youth-serving organizations, and sexual assault prevention programming (e.g. use of the “Compassionate Schools” model).
- Adverse Childhood Experiences Scale (Felitti et al., 1998)

Risk Factor: Prior aggression, delinquent behavior in adolescence, or exposure to “delinquent” peers

Definition: Engaging in non-sexual rule-breaking or offending behavior in adolescence, including aggression against peers, fighting, stealing, property damage, etc. Involvement in rule-breaking peer groups and engaging in aggressive behavior as an adolescent is sometimes conceptualized as an intervening link between early experiences of maltreatment and later risk for sexually aggressive behavior. Specifically, it may be that some maltreated youth have a more difficult time with peer relationships and are more likely to attach to peer groups in which rule breaking (and, later, sexual aggression or disrespect for intimate partners) is normalized.

Summary of evidence: The 2012 CDC review concluded that there was mixed evidence for the role of adolescent delinquency in risk for sexual aggression. Specifically, involvement with delinquent peers was inconsistently associated with risk for later sexual assault perpetration, although gang membership was related to sexual aggression in the two studies in the review that examined this. Prior delinquency was significantly related to sexual aggression in 16 of the 24 studies examined. Since the review, research has reinforced the link between delinquent behavior in adolescence and sexual assault perpetration in both adult (Abbey et al, 2011) and adolescent (Basile et al., 2013) samples. Similarly, non-sexual kinds of aggression and violent behavior are more common among individuals who sexually offend against children than among non-offenders (Reckdenwald et al, 2013; Whitaker, 2008).

Community-specific findings: Very little research addresses the role of delinquency as a risk factor for sexual aggression for specific racial or ethnic groups; only two studies were located that at least partially examined this. Hall and colleagues (2005) found that Asian American and Hawaiian Asian college-enrolled men who reported delinquent behavior as adolescents were more likely to have higher numbers of sexual partners, which was in turn related to risk for sexual aggression. Only one study examined this link with Latina youth, and concluded that membership in “delinquent” peer groups was a risk factor for sexual assault victimization (East & Hokoda, 2015).

While delinquent behavior, on its own, may be a challenging and somewhat inaccessible risk factor for programs implementing primary sexual violence prevention programming, the above evidence suggests that system-involved youth, or those who have engaged in non-sexual aggression, might be important priority populations for inclusion in prevention programming.

Possible indicators:

- Youth risk behavior survey – items on fighting and weapon-carrying
- Early Adolescent Delinquency Scale (Malamuth et al., 1995).

Risk Factor: Endorsement of traditional, rigid gender roles, “hostile masculinity”

Definition: Rigid endorsement of traditional gender roles is conceptualized as adhering or aspiring to traits traditionally and historically conceptualized as “masculine,” such as projecting strength and toughness, being in control, the rejection of femininity and anything perceived to be feminine, homophobia, emotional stoicism, autonomy and independence, risk taking, and commanding respect. A related, but somewhat distinct idea is “hostile masculinity,” which is typically defined as a combination of rigid adherence to a dominance-based masculinity and a hostility toward and suspicion of women (Malamuth et al., 1995). Hostile masculinity is a central construct in the Confluence Model of Sexual Assault, and is often conceptualized as an intervening link between early childhood maltreatment and later risk for sexual assault perpetration (see for example, Abbey et al., 2011).

Summary of evidence: The 2012 CDC review of risk factors identifies adherence to traditional gender roles and hostile masculinity as consistently related to sexual assault perpetration risk among men. This is particularly true for adherence to traditional gender roles as 19 of 21 studies included in the review that examined the link between gender roles and perpetration showed a significant relationship. More recent studies reinforce these findings. For example, Reidy and colleagues (2015) found that adolescent boys who felt “gender role stress” or a challenge to fully embodying masculine traits, were more likely to report sexual aggression than boys not reporting gender role stress. Similarly, adhering to a dominance-based masculinity, and perceiving threats to that masculinity were associated with sexually coercive behavior in a sample of 18-35 year-old young men (Smith et al., 2015). Only one study located for this review found no relationship between gender role adherence and sexual aggression in a sample of college-enrolled men (Franklin et al., 2012). No studies were located that specifically examined links between sexual offending against children and endorsing rigid gender roles.

Similarly, hostile masculinity has continued to demonstrate a significant relationship with risk for perpetration in several recent studies (e.g., Abbey et al., 2011; Casey et al., 2017; Thompson et al., 2013). Of particular note: Thompson and colleagues (2013) found that hostile masculinity was uniquely associated with sustained or increasing perpetrating

behavior over time, **suggesting it may be a particularly important risk factor to prioritize in prevention efforts.** Hostile masculinity was also the strongest correlate of sexual aggression in the 2017 study by Casey and colleagues.

Finally, a few studies single out “hostility toward women” (anger toward and suspicion of women) in examining predictors of sexual assault perpetration. While many studies include this as part of the way that “hostile masculinity” is measured, studies that examine hostility toward women as a separate predictor consistently find that it is related to sexual aggression (DeGue et al., 2010; Greene & Davis, 2011; Seabrook et al., 2011). In one study of college-enrolled men (Thompson et al., 2015), levels of hostility toward women was significantly different between sexually aggressive men who persisted in their behavior over time, and those that stopped their assaultive behavior.

This suggests that, like hostile masculinity more generally, hostility toward women is an important risk factor to prioritize in intervention.

Community-specific findings: Two studies examined gender roles as a risk factor among Latino men, with mixed results. Santana and colleagues (2006) found that endorsing traditional gender roles was associated with forcing sex in a predominantly Latino sample of men attending an urban health clinic. On the other hand, in a review of risk factors for IPV perpetration (inclusive of sexual aggression), Cummings (2015) concluded that endorsing “Machismo” was inconsistently related to aggression among Latino men, serving as a risk factor when paired with domineering attitudes toward women, but as a protective factor when combined with other cultural values related to valuing family. Only one study examined gender role beliefs among Asian American men, and concluded that misogynistic beliefs were associated with rape – supportive attitudes (Koo et al., 2014).

Possible indicators: Several existing scales are available to assess gender role ideology and hostile masculinity, and may be applicable or adaptable to evaluations at the program level. Examples include:

- Adolescent Masculinity Ideology in Relationships Scale (AMIRS; Chu, Porche, & Tolman, 2005),
- Conformity to Masculine Norms Inventory (Mahalik et al., 2003)
- The Hostility to Women Scale (Lonsway & Fitzgerald, 1995).

Risk Factor: An “impersonal” or scoring approach to sex and sexual risk-taking

Definition: An “impersonal” approach to sexual activity is typically conceptualized as a casual, non-intimacy based approach to sexual relationships. It is often measured in research as comfort with and approval of casual sexual relationships and one-time sexual encounters, and higher numbers of sexual partners. Impersonal sex is a construct in the Confluence Model of sexual aggression, and like hostile masculinity, is conceptualized as a main pathway through which early risk factors for sexual aggression (such as child maltreatment) are channeled into increased risk for sexual aggression. Scholars typically think of an impersonal approach to sex interacting with traditional or domineering ideas about masculinity (hostile masculinity) in particularly generating propensity for perpetrating sexual assault.

Summary of evidence: The 2012 CDC review of risk factors concluded that the cluster of attitudes and behaviors associated with an impersonal approach to sex were consistently related to sexually aggressive behavior across most studies included in the review. For example, higher numbers of sexual partners was associated with sexual aggression in 21 out of 25 studies, a composite “impersonal sex” measure (inclusive of approval of casual sex, and sexual behavior) was significant in 12 of 13 studies, and sexual risk taking was related to aggression in 4 out of 5 studies. Since that time, the preponderance of available literature has reinforced the role of an impersonal approach to sex in creating risk for sexual aggression. Recent studies have found that approval of casual sex is related to sexual aggression among college students and young adult male populations (Abbey et al., 2011; Abbey et al., 2012; Moiliso & Calhoun, 2012), and that endorsement of and participation in a “hook-up culture” is associated with risk for sexual aggression among college-enrolled young people (Sutton et al., 2015). Similarly, higher numbers of sexual partners has been associated with sexual assault perpetration in four recent studies (Abbey et al., 2011; Abbey et al., 2012; Degue et al, 2010; Thompson et al., 2015), and distinguished between persistent sexual aggressors, and those who stopped using sexual aggression in one study (Abbey et al., 2012). In contrast, two recent studies found that impersonal sex was either not a strong predictor of sexual aggression (Greene & Davis, 2011), or was not significantly related to sexual aggression once other risk factors were taken into account (Casey et al., 2017). Similarly, in one of the few studies to examine which risk factors for sexual aggression are most associated with persistent or increasing offending over time, Thompson et al., (2013) found that reductions in the number of sexual partners was not associated with reductions in peer to peer sexual aggression among college-aged men.

Evidence shows that sexual offenders against children also have sex-related risk factors, although they are somewhat different than those identified among perpetrators of adolescent or adult sexual assault. Across studies, adjudicated offenders who abuse children have higher levels of use sex as a coping mechanism, report a higher sex drive and preoccupation with sex, and report more “deviant” sexual interests than individuals who are incarcerated for non-sex offenses (Whitaker et al., 2008).

Community-specific findings: In a review of risk factors for intimate partner violence (inclusive of sexual aggression) in Latinx communities, Cummings et al., (2015) concluded that sexual risk behaviors such as inconsistent condom use and higher numbers of sexual partners was associated with risk for both IPV perpetration and victimization. An impersonal approach to sex was also associated with sexual assault perpetration in one sample of Asian American college men (Hall et al., 2005). Finally, in a 2012 review of risk factors for sexual victimization within intimate partnerships among men who have sex with men, Fineran & Stephenson found some mixed evidence for sexual health behaviors such as higher numbers of sexual partners and unprotected sex as risk factors for victimization (studies included in the review were fairly evenly split between significant and non-significant findings for these variables). Fineran & Stephenson (2012) also note that there is an absence of literature regarding risk factors of any kind and violence perpetration among men who have sex with men (MSM) and gay men.

While the evidence is somewhat limited, it suggests that addressing an impersonal approach to sex, by itself, may not be a “powerful” risk factor in terms of preventing sexually aggressive behavior, and that many people may engage in casual sex in appropriate, respectful, non-coercive ways. However, the domineering sexual attitudes and behaviors associated with hostile masculinity may be particularly important to address in prevention, and it is the combination of hostile masculinity, and a “scoring” approach to sexual activity that creates particular risk for perpetration. At the same time, significant evidence suggests that sexual assault perpetration and victimization places individuals at risk for exposure to HIV and other STIs, as well as unwanted pregnancies (McFarlane et al., 2005; Peterson et al., 2010), suggesting that incorporating sexual health and safety content into sexual assault prevention programming remains important.

Possible indicators / approaches to measurement:

- Rates of STIs

- Sexual risk behaviors reported on Youth Risk Behavior Survey (number of sexual partners, condom use, etc.)

Risk Factor: Attitudes or beliefs that excuse sexual aggression, blame victims, or support aggressive behavior

Definition: Attitudes and beliefs consistent with sexual aggression have been measured in a number of ways across research examining sexual assault perpetration. Generally, these are beliefs that justify or minimize the impact of sexually aggressive behavior, blame victims for their own assault or justify sexual aggression based on victim behavior (e.g. based on clothing, or earlier participation in sexual activity), or simply minimize the extent to which sexual assault happens. These are most commonly measured as the degree to which people believe or accept “rape myths,” or beliefs about situations in which rape is justified or not a serious issue.

Summary of evidence: Rape myth acceptance was one of the risk factors most consistently related to sexual assault perpetration in the 2012 CDC review of risk factors (significant in 31 of 36 studies). Similarly, the 2012 review found that endorsing victim blaming attitudes was predictive of sexual aggression in all four studies that examined a link between victim blaming and perpetration. Finally, of the 13 studies included in the 2012 review that examined a general “acceptance of interpersonal violence,” 9 documented a significant relationship with perpetration. More recent research continues to reinforce these findings. Recent studies that use the Illinois Rape Myth Acceptance scale to measure rape-supportive beliefs, have found a positive correlation between scores on this scale and sexually aggressive behavior among young adult men (Abbey et al., 2012), college-enrolled men (Thompson et al., 2011; Thompson et al., 2015; Widman & Olson, 2013) and high school aged youth (Reyes & Foshee 2013). Widman and Olson (2013) also examined rape-supportive beliefs through an implicit association test, and found that more “automatic” rape-supportive associations were also associated with sexually aggressive behavior among both college-enrolled men and community members. Finally, youth who hold attitudes that excuse dating violence are more likely to report sexually aggressive behavior (Basile et al., 2013).

Significant evidence also suggests that beliefs about victim culpability or that excuse sexual offending behavior are a risk for sexual offending against children. Two recent reviews of available research (Miller; 2010; Whitacker, 2008) conclude that cognitive distortions (such as viewing children as sexual objects, minimizing the harm of sexual abuse, or minimizing perpetrator culpability) are a central component in both the development and maintenance of sexually aggressive behavior against children. Most research documenting a link between cognitions and sexual offending against children is

geared toward predicting recidivism. For example, a recent meta-analysis across 46 samples of sex offenders found that cognitions supportive of offending consistently predicted recidivism, although the magnitude of the relationship between cognitions and recidivism was somewhat small (Helmus et al., 2013).

Research that examines the relative importance of rape-supportive attitudes compared to other risk factors is somewhat sparse. Thompson and colleagues (2015), however, found that decreases in rape supportive attitudes were more common in college-enrolled men who desisted or reduced their sexually aggressive behavior, compared to men who maintained or increased sexually aggressive behavior over time.

Given this, and the consistency with which rape-related attitudes and beliefs are associated with risk for sexual aggression, challenging rape-supportive (or perpetrator-excusing) beliefs likely remains an important feature of prevention. Additionally, given evidence summarized below that perceptions of peer support for sexual aggression are also strongly related to sexual assault perpetration, it is likely important to both challenge rape-supportive beliefs, and to challenge perceptions that such beliefs are normative or widely accepted within social networks and communities.

Community-specific findings: Very little research has addressed the role of rape-supportive attitudes among API men, and no research was found for this review that addressed this risk factor among Latino or GLBTQ individuals. Hall et al. (2005) found that a composite measure of acceptance of violence (inclusive of rape-supportive attitudes) predicted sexual aggression among both Hawaiian Asian and Mainland Asian American college-enrolled men. Similarly, in another study, rape myth acceptance was associated with endorsing hostile masculinity, which, in turn, was associated with sexual aggression among Asian American men (Hall et al., 2000).

Possible indicators/approaches to measurement:

- Updated Illinois Rape Myth Acceptance Scale (McMahon & Farmer, 2011)

Risk Factor: Internalized stigma / minority stress

Definition: Internalized stigma and minority stress are a category of negative experiences associated with belonging to a minority, stigmatized, or marginalized group in the U.S. This includes internalized stigma, or negative self-perceptions that are reflections of broader experiences of discrimination and societal marginalization, and stress related to belonging

to a minoritized and oppressed group. Sexual violence research regarding minority stress has mostly focused on LGBTQ communities, and primarily on risk for victimization (in contrast to most other factors reviewed here, which relate to risk for perpetration).

Summary of evidence: Minority stress as a risk factor for violence was not included in the 2012 CDC review. In general, findings across studies show that lesbian, gay, and bisexual individuals are at greater risk of sexual assault victimization (Rothman et al., 2011), and for more severe types of sexual assault victimization (Anderson et al., 2016) than heterosexual individuals and the general population. Three studies have examined the role of minority stress and internalized stigma variables in sexual or intimate partner violence for LGBTQ individuals. Internalized homophobia (negative attitudes towards one's own sexual identity) is significantly related to sexual assault victimization among LGBT college students (Murchison et al., 2016) and with intimate partner violence victimization, including sexual abuse, among Lesbian adults (Balsam & Szymanski, 2005). However, feeling connected to the LGBTQ community buffered the risk in at least one study (Murchison et al., 2016). In one of the only studies to examine the role of minority stress in perpetration, Edwards & Sylaska (2013) found that internalized homophobia was associated with sexual abuse of intimate partners among LGBTQ college students.

Only one study was located for this review that specifically examined minority stress as a risk for sexual aggression or victimization in API communities. Hall et al., (2005) found that perceived minority status (an awareness of stereotypes about one's cultural community) was mildly associated with reduced risk for sexual assault perpetration, although the relationship between these variables was very minimal in this study.

Although research regarding the role of minority stress as a risk factor for aggression or victimization is sparse, findings do suggest that the stress of experiencing discrimination and stigma, particularly among LGBTQ individuals, exacerbates vulnerability. This implies that the effectiveness of culturally tailored prevention and intervention programming may be enhanced by explicit attention to addressing and educating about internalized stigma among participants. The finding that connectedness to LGBTQ communities is protective suggests that enhancing support through involvement in emotionally supportive community groups may buffer the effects of societally-imposed discrimination.

Possible indicators / approaches to measurement:

- Indicators from Youth Risk Behavioral Survey (such as safety at school)
- Internalized homonegativity scale (Mohr & Fassinger, 2000).

Risk Factor: Acculturation

Definition: Acculturation is a process in which two or more cultures interact, and members of each culture must contend with the degree to which they retain their own cultural practices and/or adopt aspects of other cultural beliefs and practices. Often navigated particularly by immigrants, acculturation is also associated with acculturative stress, which is tension created by the degree to which immigrants adopt language and cultural practices from their new country, and contend with different ideas about culture held by their second-generation children or other family members who have lived in the new country for a greater proportion of their lives, or who are born in the new country.

Summary of evidence: Acculturation was not a risk factor surfaced in the 2012 CDC review, but has been examined in the context of understanding sexual assault and IPV victimization and perpetration in Latinx and API communities. Recent reviews of risk factors for IPV perpetration and victimization (inclusive of sexual abuse) in Latinx communities concluded that greater acculturation to U.S. Anglo culture and being born in the U.S. create greater exposure to victimization and risk for perpetration (Cummings et al., 2013; Mancera, 2015). Similarly, Sabina and colleagues (2013; 2015) found that lower levels of acculturation, a higher degree of identification with Latino culture, and being an immigrant as opposed to U.S. –born, were **protective** against exposure to IPV victimization among Latina women. The authors concluded, “The findings point to the risk associated with being a U.S. minority, the protective value of Latino cultural maintenance, and the need for services to reach out to Anglo acculturated Latino women” (Sabina et al., 2013, p.13). One review of risk factors also concluded that different levels of acculturation between partners is associated with risk for IPV in Latinx families (Mancera, 2015).

Evidence regarding the role of acculturation is much more limited and somewhat mixed for API communities. One study with college-enrolled Asian American men concluded that greater levels of acculturation were associated with reduced likelihood of endorsing rape-supportive attitudes, concluding that acculturation is a protective factor (Koo et al., 2014). However, a review of research examining the relationship between acculturation and dating and sexual assault

victimization among API youth found no relationship between levels of acculturation and risk for abuse (Smokowski, 2009).

In particular, authors of the above-cited research suggest that close-knit family ties foster protectiveness against violence exposure in Latinx communities.

Given the relatively consistent finding that higher levels of acculturation create risk for exposure to violence in Latinx communities, attention to honoring and bolstering protective factors within Latinx communities and cultures is a critical element of community-specific prevention programming. In particular, authors of the above-cited research suggest that close-knit family ties foster protectiveness against violence exposure in Latinx communities.

Possible indicators / approaches to measurement:

- Prevention program participants' perceptions of cultural relevance of prevention programming

Risk Factor: Alcohol use

Definition: Given this review's primary focus on the prevention of perpetration, we focus on the ways in which alcohol use may exacerbate risk for sexually *aggressive* behavior. Across literature, this has been studied in terms of the degree to which heavy drinking, binge drinking, drinking before sexual encounters, and alcohol abuse by men are related to sexual assault perpetration.

Summary of the evidence: The 2012 CDC review concluded that alcohol use was a consistent risk factor for peer to peer sexual assault perpetration by adults (with mixed findings for sexually aggressive behavior by adolescents). The same review found mixed evidence for the role of the use of other drugs; since almost no literature located for this review measured drug use, we do not address it here. Since the 2012 review, several studies have substantiated that a range of alcohol-related behaviors and beliefs are associated with risk for sexually aggressive behavior. For example, heavier or "excessive" drinking generally was associated with sexual assault perpetration in samples of young adult males (Green & Davis, 2011) and college-age men (Franklin et al., 2012; Gervais et al., 2014). Some studies suggest that heavier alcohol use and drinking on dates is associated with a higher likelihood of sexually objectifying women (Gervais et al., 2014), and

of erroneously assuming that women's social cues indicate sexual interest (Abbey et al., 2011), which in turn is linked to sexually aggressive behavior. A 2008 review of risk factors for sexual aggression against children concluded that offenders who sexually abuse children are more like to have substance abuse and alcohol problems than non-offenders or than non-sexual offenders (Whitacker, 2008).

In a 2014 review of alcohol and sexual assault perpetration research, Abbey and colleagues note that overall, the research consistently demonstrates that men who binge drink, drink more heavily in general, and drink before dates, are at greater risk of sexually aggressive behavior than men who drink less frequently or in smaller quantities. They suggest that there may be many mechanisms at work in the link between alcohol and sexual assault perpetration. Sexual aggression by men who drink is often related to other risk factors, including hostile masculinity and perceived peer approval for sexual aggression, and the link between alcohol use and sexually aggressive behavior sometimes becomes non-significant when other risk factors are accounted for (Abbey, 2014). Alcohol also impacts cognition, and is associated with over-perceiving sexual interest, and a reduced ability to read social cues.

Drawing from findings across the literature, Abbey et al. reinforce the importance of addressing alcohol in concert with other risk factors such as hostile masculinity, and suggests that prevention interventions should also educate participants about the effects of alcohol on cognition, the ability to accurately read social cues, and the ability to appropriately handle frustration or rejection.

Community specific findings: Two reviews of predictors of IPV in Latinx communities concluded that alcohol and other drug use are significantly related to victimization and perpetration (Cummings, 2013; Mancera et al., 2015). Much less research has documented the role of alcohol in risk for victimization or perpetration in API or LGBTQ communities – only two studies were located that address these groups. Alcohol use combined with higher numbers of sexual partners was found to be a risk factor for sexual aggression among Asian American college students in one study (Hall et al., 2000). Second, a study of Lesbian, Gay, and Bisexual college students found that alcohol use was associated with victimization vulnerability among Lesbian women (Han et al., 2013).

Approaches to measurement / Possible indicators:

- Youth Risk Behavior Survey - measures of alcohol use and binge drinking frequency

Risk Factor: Perceived peer approval for sexual aggression / membership in all-male social networks

Definition: This risk factor is defined as belonging to peer groups or social networks in which friends and peers are perceived as engaging in sexual aggression, approving of using coercive tactics to gain sexual access to women, or placing pressure on peers to be highly sexually active.

Summary of evidence: The 2012 CDC review of risk factors found that perceived peer approval for forced sex, peer pressure for sexual activity, and peer sexual aggression were significantly associated with self-reported sexual aggression among men in 13 of 14 studies that included at least one of these three related risks. These findings have been consistently reinforced by more recent studies. Perceiving that peers approve of forced or coerced sex (Kingree & Thompson, 2013; Thompson et al., 2011), feeling pressure to be highly sexually active (Franklin et al., 2012; Jacques-Tiura et al., 2015; Kingree & Thompson, 2013) and believing that peers engage in sexually aggressive behavior (Dardis et al., 2016) have recently been shown to predict sexual aggression among college-enrolled men and community samples of men between the ages of 18-35. Similarly, Jacques-Tiura and colleagues (2015) found that young men who engaged in sexually aggressive behavior were more likely than non-aggressive men to report “comfort” with peer’s sexist conversation or comments, while comfort with friends’ more egalitarian and gender-equitable comments was associated with non-perpetration. Perceived peer pressure to uphold “masculine” gender norms also emerged as a predictor of using deceptive techniques like lying to gain sexual access in a recent college sample (Seabrook et al., 2016).

Perhaps most importantly, very recent studies have found perceived peer support for sexual aggression to be one of the stronger risk factors for aggression. In two studies with college-aged men, Thompson and colleagues found that perceived peer approval of forced sex was more common among men who continued to perpetrate sexual assault over time (Thompson et al., 2011), and that reductions in perceived peer approval was associated with desisting from sexual aggression over time (2015). Additionally, men who are sexually aggressive overestimate the degree of peers’ engagement in sexual aggression (Dardis et al., 2016).

Collectively, this suggests that addressing peer social climates, and the implicit or explicit norms regarding sexual behavior, holds particular promise for reducing sexual assault.

This likely means both helping individuals to accurately assess the true degree of support in their social networks for respectful and non-coercive relationships (such as through social norms campaigns), as well as supporting peer groups to

re-examine and collectively challenge beliefs and attitudes that condone sexual aggression. This is relevant primarily to the prevention of peer to peer sexual aggression, as perceived peer support was not addressed or included in literature examining risk factors for sexual offending against children.

Membership in all-male social networks: A factor related to perceived peer support for sexual aggression is membership in all-male and “hypermasculine” social groups such as fraternities and athletic teams. The 2012 CDC review of risk factors noted that fraternity membership was a significant risk factor for sexual aggression in 8 of 11 studies examining that link, and, similarly, that participation on athletic teams was a significant predictor in 8 of 12 studies. Since the review, three studies with college men have found a statistically significant link between fraternity membership and risk for sexual aggression (Franklin et al., 2012; Kingree & Thompson, 2013; Seabrook et al., 2016), while one study found that neither fraternity nor athletic team membership significantly predicted sexual aggression when other risk factors were accounted for (Thompson et al., 2011). These findings suggest that all-male groups should continue to be prioritized for prevention efforts, as they may support peer climates characterized by tolerance for sexual aggression. However – it is likely the specific climates and social norms within particular groups, as opposed to their status as fraternities or athletic teams per se, that create risk for sexual aggression (Humphry & Kahn, 2000).

Community-specific findings: No literature was located that addressed the role of perceived peer support for sexual aggression in culturally-specific communities.

Approaches to measurement / Possible indicators: Existing items and short scales are available to assess perceived peer attitudes and behaviors, and may be applicable or adaptable to evaluations at the program level. Examples include:

- Peer Approval of Forced Sex (Abbey & McAuslan, 2004)
- Sexual Attitudes Survey (Gerber et al, 2017).

Summary of protective factors

Factors that protect individuals against perpetrating sexual aggression are less studied than factors that increase risk of doing so, and were not all included in the 2012 CDC review. For this reason, we here also broadened our search to include studies that examined protective factors against IPV and dating violence perpetration. A major recent review of empirical work (Vagi, Rothman, Latzman, Tharp, Hall, & Breiding, 2013) on risk and protective factors for youth dating

violence (including emotional, physical, and sexual) identified 3 protective factors: Empathy, social support, and school connectedness/ academic achievement.

Protective Factor: Empathy

Definition: This protective factor is defined as the ability to understand and share the feelings of others or in other words, to place oneself in another's position.

Summary of evidence: The 2012 CDC review noted that deficits in empathy were a significant correlate of sexually aggressive behavior in 13 of 20 studies examining that link. Minimal research has since addressed the role of empathy in protecting against sexual assault perpetration. In a study of incarcerated men, having empathic concern for others was associated with reduced risk for sexually coercive or aggressive behavior, although this relationship became non-significant when other risk factors were accounted for (DeGue et al., 2010). The review of factors related to dating violence mentioned above (Vagi et al., 2013) included one study that identified empathy as a protective factor against perpetration. The study (McCloskey and Lichter, 2003) examined connections between exposure to parental violence and youths' own perpetration of violence, following youth over three time points. Higher empathy at earlier time points decreased the odds of perpetrating aggression toward dating partners later. Finally, sex offenders against children consistently show deficits in both cognitive and affective dimensions of empathy (Whitaker et al., 2008).

Community-specific findings: None found.

This evidence tentative suggests that building empathy could be a promising strategy for preventing dating violence, and by extension, sexual aggression as well.

Possible Indicators / Approaches to measurement

- Parent report of child empathy, possibly adaptable for use by teachers or other adults (McCloskey and Lichter, 2003)
- Self-report of empathy (Davis, 1983)

Protective Factor: Social support and connectedness

Definition: Social support is input from friends, family, and others that helps an individual believe that he or she is valued, loved, and part of a reciprocal network of care, assistance, and responsibility.

Summary of evidence: One study of adolescent relationships found that the more social support young women received from friends, the less likely they were to perpetrate dating violence subsequently (Richards, Branch, & Ray, 2014). This study also examined parental social support, but did not find a significant relationship between it and perpetration. However, earlier work on risk and protective factors for sexual aggression perpetration (Borowsky, 1997) found that young men who had not perpetrated sexual aggression reported higher levels of social support from parents and their communities than those who had. Similarly, a large public school study found that social support was protective against committing sexual aggression toward both dating partners and same-sex peers (Basile, 2013).

While few studies explicitly examine the role of social support in the development of sexual aggression against children, significant evidence suggests that social support is a buffer against recidivism among adjudicated sex offenders (e.g., Mann, Hanson, & Thornton, 2010). From an etiological perspective, sex offenders against children are more likely than non-offenders to have social skills deficits, difficulties in interpersonal relationships, and to lack secure attachments (Whitaker et al., 2008).

Community-specific findings: Among Latinx families, parental monitoring and support, and being able to talk with one's mother or father are associated with decreased risk for IPV and sexual victimization, particularly for girls (East & Hokada, 2015; Kast et al., 2016). Parental investment and support may also buffer the link between acculturation and risk for exposure to violence among Latinx youth (Smokoski et al., 2009). Although no research about social or family support, specifically, was located for API communities, Hall et al. (2005) found that a concern for "loss of face" or concern about a loss of status or failure to uphold responsibilities within one's community reduced risk for sexual aggression among Asian American college men. Finally, among LGBTQ college students, feeling supported by and having a strong sense of the LGBTQ community was associated with reduced internalized homophobia, and in turn, reduced risk for sexual assault victimization in one study (Murchison et al., 2016). (Note: whether respondents identified as transgender was not measured in this study).

Although the evidence regarding the role of social support as a protective factor against sexually aggressive behavior is somewhat limited, social support and connectedness is generally a contributor to resiliency across a range of early childhood experiences and outcomes (e.g. Domhardt et al., 2015; Kleiman & Liu, 2013). The finding that community connectedness is especially important for GLBTQ youth, and potentially for other marginalized communities, renders it an important principle to build into prevention programming across communities.

Approaches to measurement / Possible indicators:

- Vaux 9-item measure of social support from friends, adults at school, and family (cited in Basile et al, 2013)
- Items from the Youth Risk Behavior Survey regarding social support

Protective Factor: School connectedness / academic achievement

Definition: School connectedness is defined as a young person’s level of attachment to his or her school and the quality of this relationship, including such concepts as how close the student feels to the school, how happy at the school, and how much a part of the school. It is often studied along with academic achievement, which is generally defined as “good grades” and measured as Grade Point Average (GPA).

Summary of evidence: A large study that followed adolescent male-female couples over time found that in male youths, higher GPA decreased the likelihood that they would perpetrate dating violence against their female partners (Cleveland, Herrera, and Stuewig, 2003). However, it found no relationship between young men’s school connectedness and perpetration. Higher academic achievement was also found in young men who had not perpetrated sexual violence compared to those who had in an earlier study (Borowsky, 1997).

Community-specific findings: None found.

Possible Indicators / Approaches to measurement

- Items from the Youth Risk Behavior Survey regarding bonding to school
- Grade point average from school records or self-report

Table 3. Sexual violence risk factors: identifying shared factors across forms of aggression

Risk/Protective Factor	Aggression type					Reference
	Bullying	Youth violence	Dating violence	Adult IPV	Suicide	
RISK FACTORS						
Childhood maltreatment	x	x	x	x	x	Hong & Espelage, Joliffée et al., 2017; 2012; Vagi et al., 2013; Wilkins et al., 2014,
Exposure to parental IPV	x	x	x	x	x	Capaldi et al., 2012; Hong & Espelage, 2012; Joliffée et al., 2017; Vagi et al. 2013; Wilkins et al., 2014
Rape-supportive or victim-blaming attitudes, acceptance of violence	x		x	x		Foshee et al., 2016; Vagi et al., 2013;
Rigid gender roles, hypermasculinity			x	x		Wilkins et al., 2014
Impersonal sex			x			Vagi et al., 2013
Prior aggression / delinquency		x	x	x		Capaldi et al., 2012; Joliffée et al., 2017; Vagi et al., 2013; Wilkins et al. 2104
Alcohol use	x	x	x	x	x	Resnick et al., 2004; Vagi et al., 2013; Wilkins et al., 2014
Acculturation		x		x		Capaldi et al., 2012; Cummings et al., 2015; Smokowski et al, 2009
Minority stress / stigma						
Perceived peer support for aggression			x			Vagi et al., 2013
Membership in all-male groups / association with delinquent peers	x	x	x	x		Hong & Espelage, 2012; Joliffée et al., 2017; Wilkins et al., 2014

X = recent reviews indicate a significant relationship between the risk factor and the specific form of aggression represented by that column. Blank squares simply indicate an absence of evidence based on the recent reviews accessed for this report, and are not a definitive conclusion about the relevance of the risk or protective factor to each form of aggression.

Table 4. Sexual violence protective factors: identifying shared factors across forms of aggression

Risk/Protective Factor	Aggression type					Reference
	Bullying	Youth violence	Dating violence	Adult IPV	Suicide	
PROTECTIVE FACTORS						
Empathy	x		x			Espelage et al., 2004; 2013; Vagi et al., 2013
Social support / connectedness	x	x	x	x	x	Capaldi et al., 2012; Hong & Espelage; Joliffe et al., 2017; Vagi et al., 2013; Wilkins et al., 2014
School connectedness / academic achievement	x	x	x	x	x	Capaldi et al., 2012; Hong & Espelage, 2012; Joliffe et al., 2017; Vagi et al., 2013; Wilkins et al., 2014

X = recent reviews indicate a significant relationship between the risk factor and the specific form of aggression represented by that column. Blank squares simply indicate an absence of evidence based on the recent reviews accessed for this report, and are not a definitive conclusion about the relevance of the risk or protective factor to each form of aggression.

Conclusions and themes

This literature review reinforces the long-standing notion that sexual aggression is a complex behavior that emerges based on the interplay of multiple risk factors over time. Additionally, there are likely very different pathways to the development of sexually aggressive behavior. For example, some perpetrators experienced adverse childhood experiences while others did not; some perpetrators endorse an “impersonal” approach to sexual relationships while for other people, impersonal sex is not accompanied by aggression, etc. This means that preventing sexual aggression before it begins necessitates prioritizing multiple risk factors, and bolstering multiple protective factors across individuals and communities. Decades of research and practice also highlight the importance of comprehensive programming that incorporates attention to multiple risk factors, through multiple strategies, and at multiple levels of the social ecology (Basile et al., 2016). This review, and the extensive research it relies on, highlight some strategic ways Washington State could prioritize which risk factors may be most important to include in prevention efforts. It could also help to identify individuals at greater risk for engaging in sexually aggressive behavior. To this end, we offer concluding points regarding promising approaches to prioritizing populations for and elements of prevention programming.

1) Prioritize to whom prevention is aimed. Given consistent findings over nearly three decades that adverse childhood experiences can initiate risk for the development of sexual aggression (as well as risk for revictimization), maltreated and vulnerable youth are a priority population for sexual assault prevention programs and trauma-informed care. This is particularly true for youth who have experienced child sexual abuse and polytrauma. In addition to buffering the effects of trauma, and providing youth with needed therapeutic support, trauma-informed prevention programs for youth with adverse experiences hold the promise of significantly reducing rates of sexual assault. To a lesser, but perhaps related extent, youth who have a history of rule-breaking or non-sexually aggressive behavior may also be a priority for prevention programming, and likely overlap significantly with the population of previously maltreated youth. Although this review is focused primarily on the primary prevention of perpetration, it is also important to consider the prioritization of individuals at heightened risk of victimization, including individuals with disabilities, GLBTQ youth, homeless youth, and others.

2) Focus on risk factors that predict persistent aggression. Very recently, research has begun to emerge that distinguishes between the characteristics of sexual assault perpetrators who persist in or increase their use of sexual aggression, and those who desist. *Specifically, endorsing hostile masculinity, perceiving peer approval for sexual aggression, believing in rape-supportive attitudes and myths, and feeling peer pressure to have sex have all been shown to decrease among men who stop using sexually aggressive behavior (Thompson et al., 2013 and 2015).* This suggests that these factors may be more powerful and pliable contributors to sexual aggression and if changed, may hold more promise for actually reducing aggressive behavior than other factors. This research is also relatively young, and more evidence is needed regarding the relative contribution and importance of risk and protective factors to understanding sexual aggression.

3) Support communities in developing and implementing culturally-responsive programming. While culturally-specific research specifically regarding risk and protective factors for sexual aggression is troublingly sparse, the importance of culturally and contextually responsive programming cannot be overstated. Researchers and preventionists have long highlighted the importance of steeping community-specific prevention work in the particular, unique mix of risk and protective factors for sexual violence that exist in every community, and in the culturally familiar means through which community members are engaged (Basile et al., 2016). For example, this review highlights the centrality and protective importance of ethnic identity to Latinx communities, of connectedness to LGBTQ communities and spaces among sexual and gender minority youth, and of incorporating culturally-specific notions of community and “loss of face” in programs for Asian and Asian American young people. This is merely a beginning, and admittedly inadequate list of the myriad ways

that community-specific knowledge and experience must be engaged in efforts to develop appropriate prevention programming.

4) Prioritize “shared” risk factors across culturally-specific communities, and across forms of aggression. Another approach to prioritizing risk and protective factors for inclusion in prevention programming is to select those that appear to be common across communities, or across different forms of aggression. For example, adverse childhood experiences, rape-supportive attitudes, adherence to rigid beliefs about gender, alcohol use, and delinquent behavior are all risk factors relevant to several groups covered in this review. Similarly, many of these same risk factors, along with protective factors such as social support and connectedness, and bonding to school are common to other forms of aggression such as bullying and youth violence. Leveraging these shared factors may allow for synergistic impacts across different kinds of aggressive behavior as well as potential relevance across communities.

5) Prioritize perceived and actual social norms. This review highlights twin findings that perceived peer approval of sexual aggression is a strong predictor of sexual assault perpetration (Thompson et al., 2015) *and* that perpetrators, in particular, over-perceive peer support for their behavior (Dardis et al. 2016). As noted in the review above, this underscores the need to both challenge rape-supportive attitudes within peer networks, but also to surface, highlight, and mobilize the true (and likely high) levels of support for consent and respect within most social networks as well.

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