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The Warner School of Education at the University of Rochester

Bullying in School: Prevalence, Contributing Factors, and Interventions

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Summary of Findings

On Prevalence:

- 20-29% of students are involved in bullying (either as a bully, victim, or bully-victim) at least once per year.
- Bullying has been on the decline in U.S. public schools for the past two decades.
- Bullying occurs throughout the grades, peaking during adolescent middle school years.
- Forms of bullying include traditional (physical, verbal, relational) and cyber.
- Cyberbullying occurs far less frequently than traditional bullying.
- There are no measurable differences in bullying prevalence between suburban, urban, and rural schools.
- When considering race as a predictor of bullying and victimization, context must be taken into account, for race alone is not helpful in understanding bullying's prevalence.
- At-risk student populations for increased bullying and victimization include students with disabilities and students who identify as LGBTQ.
- Peer norms play a significant role in bullying prevalence.

Contributing Factors:

- Bystanders can have a powerful effect on either stopping or encouraging bullying, depending on the peer group norm they ascribe to.
- Teachers can either intensify, encourage, or limit bullying depending on their approach.
- Bullying perpetrators and victims share many of the same risk factors (e.g., negative perceptions of school).
- Youth who perceive parental support are less likely to bully.
- A shared belief that normalizes and approves of bullying is a strong predictor of bullying.
- Schools that are perceived as unpleasant, unfair, and unwelcoming increase the likelihood of bullying.
- Positive school climates characterized by: a perception of school as a 'good place to be,' trust among students and teachers, and a sense of fairness, belongingness, and safety is negatively associated with bullying and victimization.

Contributing Factors (continued):

- School climate has a moderating effect on the likelihood that students with high self-esteem will bully. In schools with positive climates, students with high self-esteem are less likely to bully. In schools with negative climate, they are more likely to bully.
- Bully-victims, who represent the smallest percentage of students involved in bullying, have the greatest number of risk factors and suffer both internal and external struggles.

Recommendations for Bullying Interventions:

- School-based anti-bullying programs have a 0%-23% effectiveness rate.
- An approach to creating a positive school climate shows the most promise in preventing and remediating bullying.
- Peer norms must first be modified before any real change in bullying behaviors can take place.
- Successful interventions promote pro-social behavior and align with research.
- Successful interventions are implemented across nested, broader communities of support (school, community, neighborhood, family).
- Directing efforts on counteracting the more prevalent category of traditional bullying will in turn lower incidences of cyberbullying.

Bullying in School: Prevalence, Students Involved, and Consequences

Although the bully-victim conflict is an age-old scenario, researchers only began studying it in school settings 45 years ago. The most agreed upon definition of bullying includes three criteria: 1) intentionality (desire or goal of inflicting harm, intimidation, and/or humiliation), 2) some repetitiveness, and most importantly, 3) a power imbalance between the socially or physically more prominent bully and the more vulnerable victim (Olweus, 1993; 2013). The power differential can manifest among a variety of factors, such as physical dominance, self-confidence, peer group status, etc. Conversely, “conflict between equals” (Elliot et al., 2010, p. 534) is not considered bullying, but rather, general aggression. Another, more recent concept that has emerged in the field of bullying research is the category of “bully-victims,” a smaller subset of youth who both perpetrate and experience bullying (Menesini & Salmivalli, 2017). The forms bullying can take include: direct aggression (e.g., name calling, hitting, belittling someone in front of others) or indirect, relational aggression (e.g., spreading rumors, exclusion from the group, hurting another’s reputation) (Juvonen & Graham, 2014). Often occurring in school contexts, which has expanded in recent years to include cyberbullying in the virtual worlds of digital and social media, bullying takes place throughout the school years, from elementary to high school and has likewise been studied across the grades. And since bullying is a familiar, if not intimate, school experience for most people, it is sometimes easy or tempting to accept it as a rite of passage or a typical childhood experience, rather than a problem that needs to be addressed. As Olweus (2013) explains, “being bullied by peers represents a serious violation of the fundamental rights of the child or youth exposed” (p. 770). It is with this understanding of bullying – as a violation of basic human rights – that this two-part brief explores the phenomenon (history, prevalence, risk factors, and consequences) in Part I and reviews research-based interventions in Part II.

Part I: A Review of Bullying’s History, Prevalence, and Consequences in School Settings

History

As is often the case with social phenomena, a convergence of influences – media coverage, societal concern, policy changes, and research attention began to focus on bullying in the U.S. in the 1990’s when it emerged as a problem for school-age children and youth. Concurrently, the World Health Assembly recognized bullying as an international public health concern in 1996 (Menesini & Salmivalli, 2017). The 1999 Columbine High School shootings in Colorado – when two victims of bullying killed 13 fellow students and one teacher, injuring 21 others on school grounds – brought bullying more fully into the public consciousness (Allen, 2010). It was also during the 90’s that research into bullying began in the United States, decades after it had started in Sweden and other parts of Europe and Australia. Prior to that time, American researchers focused rather on perpetrators’ individual factors of aggression, like peer status and likeability, a view that differs from the Scandinavian one that had focused on the effects of aggressive behaviors on victims and the peer dynamics (originally called “mobbing”) (Olweus, 1978; 2013). More recently, higher incidences of teen suicide and steady increases in school shootings have sharpened public concern on bullying and bullying prevention in schools (Hatzenbuehler, Schwab-Reese, Ranapurwala, Hertz, & Ramirez, 2015; Juvonen & Graham, 2014), resulting in an “explosion” (Olweus, 2013, p. 774) of research and “proliferation” (Hatzenbuehler et al., 2015, p. 2) of legislation; 120 bills passed and became anti-bullying legislation in 49 states

between 1999 and 2010. The U.S. Department of Education has established and disseminated a framework for states to implement anti-bullying laws in their schools, issuing a report in 2011 that analyzed the extent to which states' laws followed this framework. Alongside the increased societal and research attention to bullying, a related and subsequent phenomenon of cyberbullying has emerged, thus stimulating and refocusing public attention and also eliciting a heightened sense of fear and powerlessness among parents and educators. **This brief's analysis of empirical research aims to provide a balanced and accurate depiction of bullying prevalence in all of its forms.**

Prevalence: Some Statistics

Since 2001, there have been numerous large-scale analyses of student-reported data on bullying. These studies have established bullying's prevalence among school-aged youth, leading researchers to assert that **bullying is a significant public health concern** (Hatzenbuehler, et al., 2015; Menesini & Salmivalli, 2017; Olweus, 1993; 2013).

Most of these studies use survey data from students in grades 5 through 12, thus emphasizing middle and high school settings; although several studies focus on elementary grades (e.g., Glew Fan, Katon, Rivara, & Kernic, 2005).

GENERAL FINDINGS:

- **20-29% of students are involved in bullying** (either as a bully, victim, or bully-victim) at least once per year. It should be noted, that many analyses rely on World Health Organization survey data which is administered every four years, yet a lag can exist between data collection and published findings (Barboza et al., 2009 [1997-98 data]; Nansel et al., 2001 [1997-98 data]), Spriggs et al., 2007 [2001-2002 data]. One article in particular that was published in JAMA in 2001 (Nansel et al.) relies on data from 1998 and is cited most often in subsequent publications and analyses up through 2014, indicating contemporary citations from a body of work predicated on data that is over 15 years old.
- More recently, however, the U.S. Department of Education (DOE) (NCES, 2017) has reported on data collected in 2015 and has found a 21% prevalence rate of bullying, which marks a decline from Nansel and colleagues' 29% figure, as well as the U.S. DOE's own figure of 28% from 2005. **Accordingly, we can deduct that bullying, while it still involves roughly one out of five students, has been in decline in the U.S. for the past two decades.** Further, and according to the U.S. DOE (2017), the majority (66%) of students who experienced being bullied reported that it happened once or twice during the school year, followed by 19.3% who were bullied monthly, 9.6% weekly, and 4.2% who were bullied daily (See Figure 1).

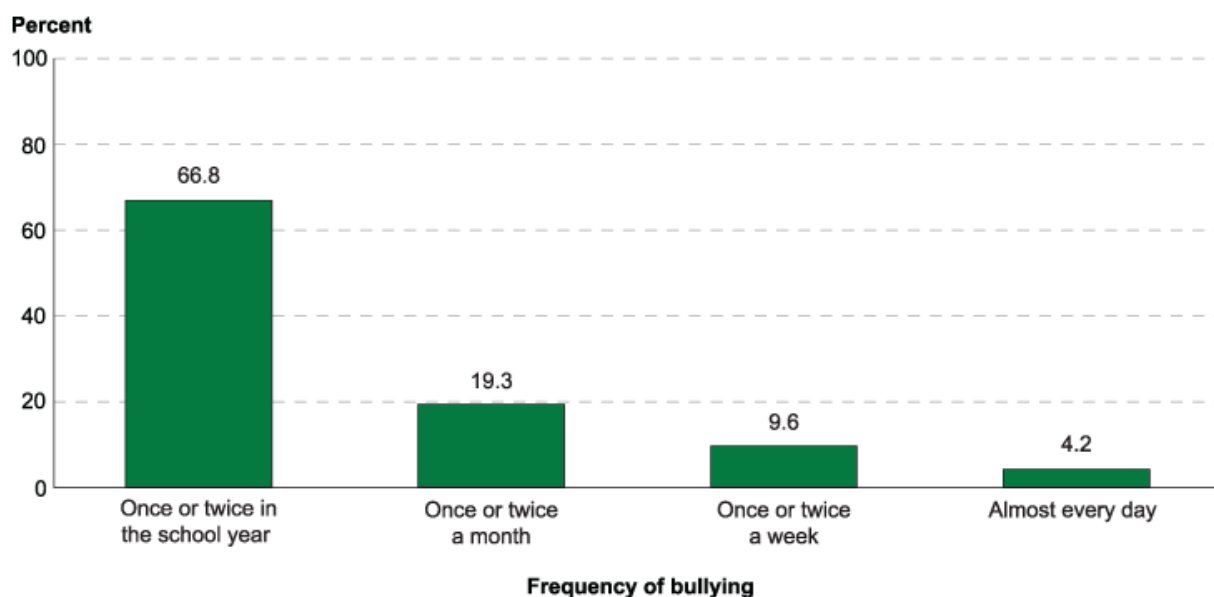


Figure 1: Frequency of bullying during school year among students ages 12-18 who reported being bullied at school (school building, school property, school bus, and traveling to and from school). SOURCE: U.S. Department of Justice, Bureau of Justice Statistics, School Crime Supplement (SCS) to the National Crime Victimization Survey, 2015.

Bullying tends to increase throughout the elementary years, peak during early adolescent middle school years, and decline somewhat during later adolescent high school years, indicating that **middle school is the setting with the highest prevalence** (Barboza, 2009; Espelage, Green, & Polanin, 2012; Gendron, Williams, & Guerra, 2011; Guerra, Williams, & Sadek, 2011; Menesini & Salmivalli, 2017; Nansel, 2001; NCES, 2017; Williams & Guerra, 2007).

The next several sections provide more detail on prevalence from different aspects of bullying, including forms, school type, gender, race, and at-risk student groups.

Forms of bullying: physical, verbal, relational, and cyber. Research has explored the prevalence of **traditional bullying**, which encompasses both **physical, verbal, and relational** aggression that occurs during the day, usually in or near school (e.g., bus), where perpetrators and victims are known to each other in the physical world. Examples of physical bullying include such actions as: pushing, tripping, spitting on, and threatening with harm. Verbal and relational or “indirect victimizations” (Napolitano, Espelage, Vaillancourt, & Hymel, 2010, p.40) include: social exclusion, spreading rumors, name calling, and insulting. Cyberbullying occurs in online contexts such as social media and cell or smart phone communication, where a cover of perceived anonymity is available to perpetrators. Most studies find that verbal and relational bullying occurs most often, followed by physical, then cyber (Kowalski, Morgan, & Limber, 2012; Olweus, 2013; Salmivalli et al., 2013; U.S. Department of Education, 2018). The results of two meta-analyses concur that **cyberbullying is “considerably less prevalent” (Modecki, Minchin, Harbaugh, Guerra, & Runions, 2014, p. 602) than the other forms**, finding that traditional bullying was actually twice as common as cyberbullying (Williams & Guerra, 2007). The relatively low incidence of cyberbullying compared to more traditional forms leads some researchers to point out that the presence of cyberbullying in youths’ lives has been “greatly

exaggerated” in popular media and in society’s perceptions (Olweus, 2013; Williams & Guerra, 2007).

Nevertheless, the phenomenon of cyberbullying and its harmful effects are still taken seriously among research, policy, and school communities. Research shows a high correlation between cyber and traditional bullying, suggesting that the two are different methods of enacting similar behavior (Modecki et al., 2014). Olweus (2013) found that 88% of students who had been exposed to cyberbullying had also experienced at least one form of traditional bullying.

Conversely, approximately 10% of students had experienced cyberbullying only. Similarly, Kowalski and colleagues’ (2012) findings indicate that “we would expect youth who are very frequently bullied through traditional means to also become targets for cyberbullying” (p. 515). In addition, there exists a correlation *within* individuals who are involved in bullying – that is, frequent perpetrators of traditional bullying are likely to begin bullying online as well as more likely to become *victims* of cyberbullying, as their online bullying increases (Kowalski et al., 2012). Therefore, **it is helpful and empirically accurate to understand cyberbullying within the context and as a subset of traditional bullying.**

Figure 2, based on data from the U.S. Department of Education (2018), shows where bullying occurs in its physical, verbal, and cyber forms.

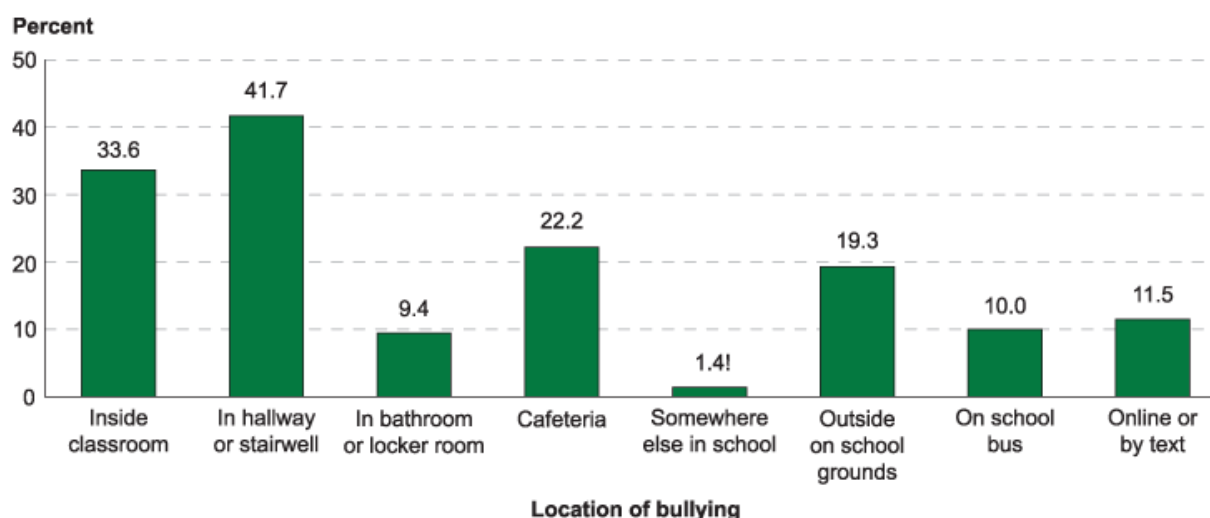


Figure 2: Percentage of students ages 12-18 who reported being bullied in various locations during the school year. SOURCE: U.S. of Justice, Bureau of Justice Statistics, School Crime Supplement (SCS) to the National Crime Victimization Survey, 2015.

School type and duration. According to the DOE (2018), there are **no measurable differences in bullying prevalence between students at suburban, urban, and rural schools** (Figure 3), although, notably the three types of schools have experienced varying rates of bullying decline since 2005, a trend that is not reflected in popular media and public perception. To explain this disconnect, Olweus (2013) cites an increased interest in bullying that began in the U.S. research community in the late 1980’s, which led to a subsequent surge in interest in mass media – **suggesting a lag in public awareness.**

In addition,

the quick rise in popularity of bullying prevention as a topic in school-based programing, legislation, and public concern both reflects and gives rise to a general perception that bullying is ubiquitous in school. However, empirical investigations of prevalence actually reveal considerable variability (Guerra et al., 2011, p. 296).

In fact, according to Olweus (2013), “basically no systematic change in prevalence occurred” (p. 766) for either traditional, verbal or cyber bullying from studies reviewed between 2007-10. **So instead of an increase in prevalence, more likely there has been an increase in awareness about bullying that has arisen as bullying prevention measures have impacted and reduced prevalence.**

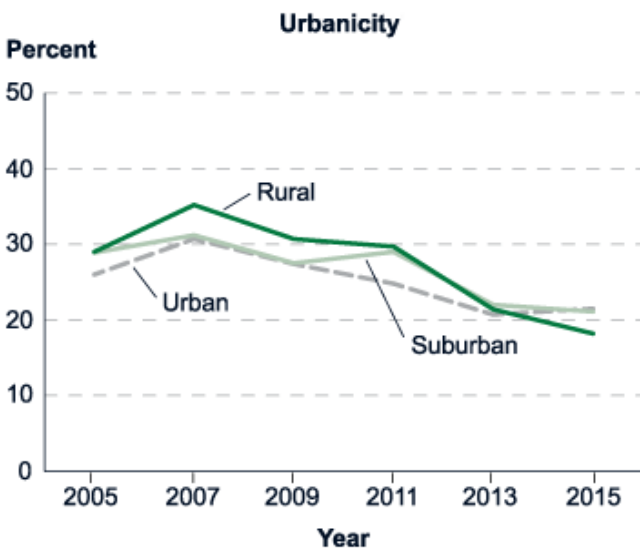


Figure 3. Percentage of students ages 12–18 who reported being bullied at school during the school year, by selected school characteristics: Selected years, 2005 through 2015. SOURCE: U.S. Department of Education, National Center for Education Statistics (2018).

Gender. Most research reports that males consistently exhibit higher levels of bullying and victimization compared to females (Barboza et al., 2009; Gendron, Williams, & Guerra, 2011; Nansel et al., 2001; Napolitano et al., 2010); however, upon closer examination, the gender difference is more complex. One study found that boys are twice as likely to be classified as bullies compared to girls (Juvonen, Graham, & Schuster, 2003). Yet, findings depend on the form of bullying being studied (see Figure 4). Boys, for example, are involved (as both perpetrator and victim) in more physical forms of bullying and start at an earlier age than girls (Guerra et al., 2007; Napolitano et al., 2010; Olweus, 1993;), while girls experience and perpetrate more relational and verbal bullying (Menesini & Salmivalli, 2017; Napolitano et al., 2010; DOE, 2018). In terms of victimization, more females (23%) than males (19%) report being bullied in middle and high school (DOE, 2018). Thus, **there is a discrepancy among research conclusions about gender with regard to bullying prevalence.**

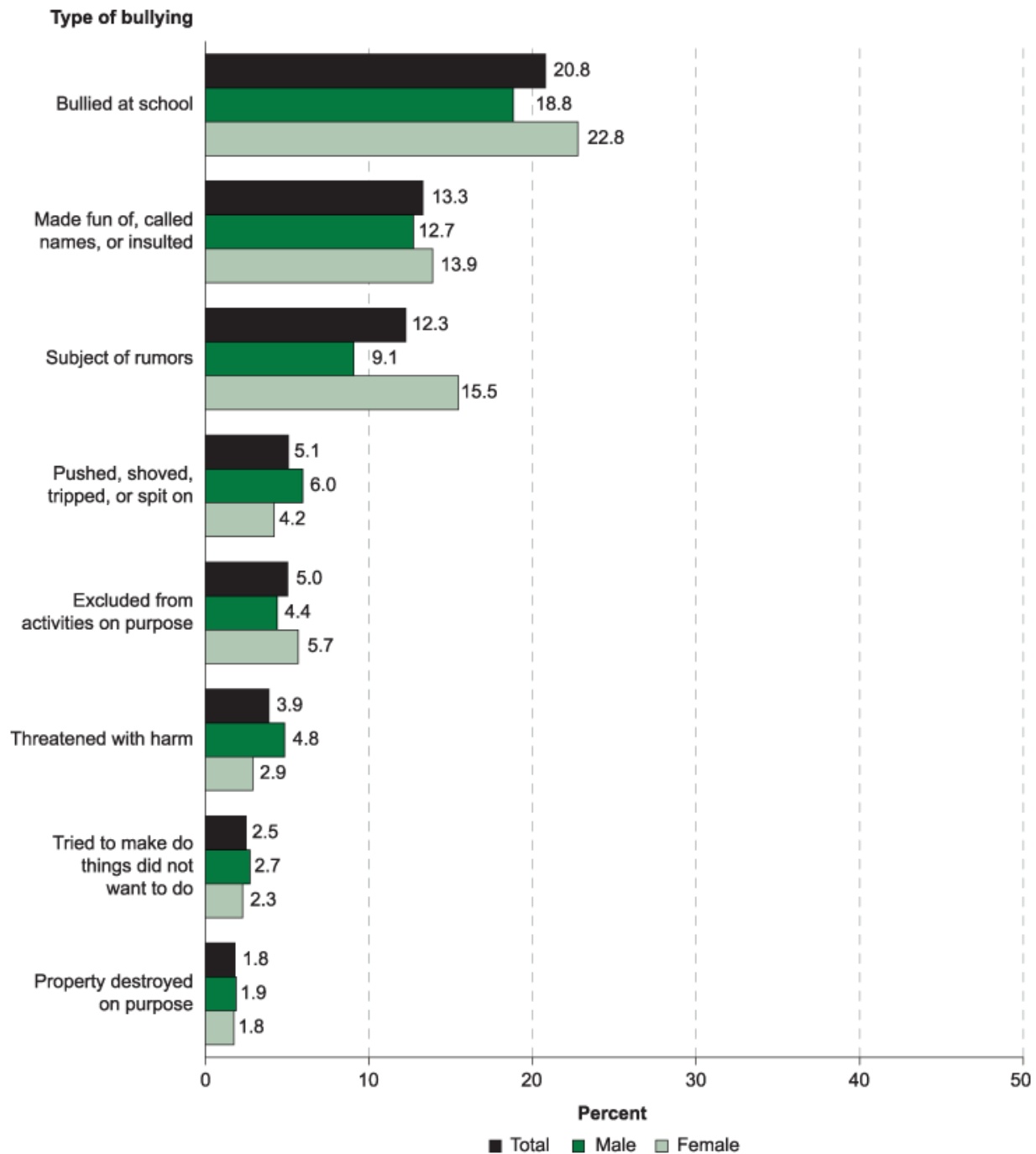


Figure 4. Percentage of students ages 12-18 who reported being bullied at school during the school year, by type of bullying and sex. Selected years, 2005 through 2015. SOURCE: U.S. Department of Education, National Center for Education Statistics (2018).

Race. The category of bullying in which research findings show the most inconsistency is with regard to race. Some studies say that Black students are more likely to be categorized as bullies (Barboza et al., 2009; Juvonen et al., 2003) and less likely to be categorized as victims compared to White, Hispanic, or Asian students (Nansel et al., 2001; Spriggs, Ianotti, Nansel, &

Haynie, 2007; Napolitano et al., 2010). Other studies claim that it is Hispanic students who least often are victims (Juvonen et al., 2003). And others claim that White males are more likely to bully than are males or females of any other race (Barboza et al., 2009). Asian students have been found to be least likely to perpetrate bullying (Juvonen et al., 2003; Barboza et al., 2009), and Black students are most likely to be classified as bully-victims (Juvonen et al., 2003).

However, more recently, the U.S. DOE (2018) reports that more Black (25%) students actually have been bullied compared to White (22%) or Hispanic (17%) students. Black students experience more verbal aggression (being called names, insulted, made fun of) and physical aggression compared to White and Hispanic students, and Black students more often experience being the subject of rumors compared to White, Hispanic, or Asian students.

What are we to make of these contradictory data? Even analyses that rely on the same dataset sometimes come to different conclusions about how race factors into bullying and victimization. For an answer, we can turn to experts in the field who have criticized bullying research for a lack of consensus on how bullying is defined and measured, which has created inconsistent conclusions – a situation that makes comparisons by race difficult (Low & Espelage, 2013; Napolitano et al., 2010; Olweus, 2013). We can also turn to scholars who insist that **race alone is not helpful in understanding bullying's prevalence. Instead, context must be taken into consideration for findings to have any meaning.** For example, in schools with greater ethnic diversity, race was less of a factor for ethnic minority students in terms of feeling vulnerable to bullying (Juvonen et al., 2003; Menesini & Salmivalli 2017; Vitoroulis & Vaillancourt, 2015). Further, Spriggs and colleagues (2007) found that bullying and victimization were similarly associated across race and ethnicity for students who experience poor classmate relations and social isolation. Thus, when addressing race and bullying, schools must understand that “although ethnic minority status poses a risk for victimization, its effect seems to depend on context” (Menesini & Salmivalli, 2007, p. 243).

At-risk student groups. Two student groups that have shown higher prevalence of bullying involvement are students with disabilities and students who identify as LGBTQ.

Students with disabilities. Students with disabilities are overrepresented in bullying prevalence – both perpetration and victimization, perhaps twice as often compared to their peers (McLaughlin, Byers, & Vaughn, 2010; Rose, Espelage, Aragon, & Elliott, 2011; Rose, Monda-Amaya, & Espelage, 2011; Napolitano et al., 2010), due to social and communication skills challenges. These students are likely to experience peer rejection and struggle with social problem solving and competence. Students with disabilities are bullied at a rate of 24.5% prevalence in elementary school, 34.1% in middle school, and 26.6% in high school (Espelage et al., 2015).

However, like studies that look at race as a factor in bullying, studies on bullying involving students with disabilities yield “inconsistent” results (Napolitano et al., 2010). Some research has established that students with disabilities experience more victimization than their nondisabled peers, and another set of studies indicates that students with disabilities engage in more bullying and aggressive behaviors than their nondisabled peers. One way to explain this discrepancy is that over time, students with disabilities who have suffered as victims of bullying develop

aggressive behaviors as a way to combat victimization, which places them in the category of bully-victims (Napolitano et al., 2010).

LGBTQ. Students who identify as Lesbian, Gay, Bisexual, Transgender, and Queer experience a higher rate of physical, verbal, and relational victimization at school compared to their heterosexual peers (Napolitano et al., 2010). Some of the aggression includes harassment, social isolation, and stigmatization. According to surveys, much higher percentages of LGBTQ (85%) youth experience some type of bullying while at school, including homophobic name calling and physical assault compared to their peers who identify as heterosexual. Not only do these youth experience peer perpetrated bullying but they also suffer a lack of teacher intervention on their behalves as well as direct insults from school administrators, staff, and teachers, making LGBTQ youth particularly vulnerable in school settings.

Understanding Victimization

Bullying research data has been collected largely on the basis of student perception. The following sections detail the factors that have been studied in victims.

Individual & peer/social factors. Being a victim of bullying is related to social vulnerabilities, such as marginalization, low social status, being avoided by peers, being different, and being perceived as weak – either psychologically or physically, particularly with regard to males (Guerra et al., 2011; Juvonen et al., 2003; Nansel et al., 2001). Self-esteem is the strongest predictor of victimization for youth in grades 5, 8, and 11 during a single school year. Relatedly, an association has been found between seeking out support from a mental health school counselor and victimization (Green, Dunn, Johnson, & Molnar, 2011). Another significant predictor of victimization is an increase in a student's negative perceptions of school. These predictors are consistent across ages (grades 5, 8, and 11) and genders; however, they can be **mediated by peer social support, which has been found to be a significant predictor of decreased bullying.** Yet, some research finds that students who form groups of similarly low-status peers can become members of stigmatized groups who experience bullying perpetration by higher status peers (Barboza et al., 2009).

Already in vulnerable social positions, victims will hide the truth from authorities for fear that bullies might take revenge (Morrison, 2002; Olweus, 1993). However, Williams & Guerra (2007) found that males were more likely to report physical bullying than females.

Notably, **predictors of victimization such as self-esteem and negative perceptions of school, as well as the mediating effects of social support, were also predictors of bullying perpetration** (Guerra et al., 2011; Harel-Fisch et al., 2011; Meyers-Adams & Conner, 2008; Rose, Espelage, Monda-Amaya, Shogren, & Aragon, 2015). For example, both bullies and victims experience rejection from their peers (Barboza et al., 2009). Students' negative perceptions of school environment lead to higher likelihood of aggressive (bullying) (e.g., carrying a weapon) and avoidant (victim) (e.g., skipping school) behaviors. These similarities between victimization and bullying are a theme that is explored more thoroughly in the bully-victim section of this brief.

Family factors. Some of the risk factors for victimization that are associated with family include: overly involved/protective mothers and distant/overly critical fathers (Duncan, 2004;

Olweus, 1993), abusive parents (Barboza et al., 2009), and siblings who bully (Barboza et al., 2009). Yet, some of these family factors – specifically abusive parents and bullying siblings, are also risk factors associated with perpetration (Guerra et al., 2011), as victims of bullying within the home may “strike back and become bullies themselves” (Guerra et al., 2011, p. 307) – another example of the overlapping category of bully-victim.

Understanding Bullying Behaviors

There is much more research focused on what contributes to bullying behaviors than to victimization, as reflected in the more numerous and expansive subsections below.

Individual factors. As delineated in this brief’s introduction, an important criterion that defines bullying is an imbalance of power. As such, perpetrating bullying is related to attaining and maintaining power, often useful to youth for assuaging feelings of low self-esteem and helplessness (Barboza, et al., 2009; Guerra et al., 2011). Focus group findings show that adolescent boys bully to affect dominance and to elevate their status as a mate. Examples include: shows of aggression toward other males or putting down females they desire; whereas adolescent girls’ bullying “was seen as a way to enhance their physical and sexual appeal – by limiting competition through rumors, gossip, and exclusion” (Guerra et al., 2011, p. 307). Such findings position bullies as suffering from some of the same vulnerabilities as victims, again contributing to the notion of bully-victims.

However, **other research positions bullying perpetrators as psychologically and socially stronger than their peers** (Juvonen et al., 2003). In fact, feeling included in school activities has been found to *increase* the likelihood of bullying (Barboza et al., 2009). Students (elementary-high school) describe bullying as “fun and entertaining” and linked to sexuality and popularity (Guerra et al., 2011, p. 307), leading researchers to posit: “although adults who conduct research studies assume that these problems or risk behaviors emerge from individual or contextual shortcomings, youth may understand this behavior from a somewhat different vantage point that highlights the positive consequences of these behaviors” (Guerra et al., 2011, p. 307). Since most bullying research uses a methodology of self-reporting survey data from youth, the somewhat positive take on bullying from their perspective should be taken into account when reviewing findings and designing interventions.

Family. While this brief has already reviewed the link between family risk factors and victimization, an even stronger association has been found between family risk factors and bullying behaviors (Spriggs et al., 2007). Parents of bullies have been found to lack warmth and emotional support, tend not to communicate, and to use an authoritarian, reflexive style (Barboza et al., 2009). Youth whose parents use an overly permissive style as well as those who are uninvolved in school also have an increased likelihood to bully (Barboza et al., 2009). Conversely, **youth who perceive their parents’ support are less likely to bully**. Student-perceived unreasonably high expectations (from teachers and parents) decreases the likelihood of bullying (Barboza et al., 2009).

Peers. A peer group factor that differentiates bullies from victims is **a shared belief that normalizes and approves of bullying; this normative belief has been found to be a strong predictor of bullying** (Gendron et al., 2011; Guerra et al., 2011; Napolitano et al., 2010). Guerra and colleagues (2011) explain, “As children learn that bullying is acceptable and internalize

these standards they are more likely to engage in this behavior” (p. 307). Thus, peer groups provide bullies negative social support. Bullies tend to be friends with other bullies, increasing the likelihood of engaging in bullying behaviors. Larger peer groups seem to increase prevalence of bullying (Barboza, 2009) and membership in these groups can influence adolescent aggression for bullying (Espelage, Holt, & Henkel, 2003). The more friends, the more likely to bully (Barboza et al., 2009). Not surprisingly, bullying has been linked to positive social competencies such as popularity within one’s peer group; however, bullying has also been linked to deficiencies with social problem solving, similar to victims (Napolitano et al., 2010).

Peer group dynamics involve the role of bystanders. Greater bullying within peer groups in middle school is highly predictive of less bystander willingness to intervene to stop the bullying (Espelage et al., 2012). Bystanders can fuel and reinforce bullying simply through their presence as an audience or in the more active role of joining in on the bullying. **Bystanders can have a powerful effect on either stopping or encouraging bullying, depending on the peer group norm they ascribe to** (Napolitano et al., 2010). Therefore, the role of bystanders has been the focus of several bullying intervention programs (reviewed in Part II of this brief).

Teachers. The adults in the school who have the most frequent and consistent contact with students are teachers; therefore, their role in the bullying dynamic deserves attention. Although there is little research in the area of teacher-student bullying, there is enough to establish that it exists (Allen, 2010). **Teachers can either intensify, encourage, or limit bullying depending on their approach.** In some research, students identify *teachers as the bullies* in behaviors such as deliberate humiliation, excessive punishment, favoritism, scapegoating, sarcasm, and taking anger out on students (Allen, 2010; Bibou-Nakou, Tsiantis, Assimopoulos, Chatzilambou, & Giannakopoulou, 2012). Again, power is inherent to the teacher-student bullying dynamic, where the imbalance is most apparent in the traditional roles of teacher as authority and student as obedient follower. Further, such teacher behavior can model bullying behavior to students, who may feel free to engage in bullying condoned by the teacher. Teacher mistreatment of students can have a ripple effect where “children who feel that they are being treated badly or unfairly by teachers, may in turn treat other children badly, either as a way of relieving their hurt or frustration or as a way of re-taking a sense of control through the construction of a relationship where they have power” (Harel-Fisch et al., 2011, p. 647). Again, the connection between victimization and bullying emerges in classroom environments. Further, students say that classrooms where they have little room to express views or demonstrate autonomy are more conducive to bullying (Bibou-Nakou et al., 2012).

Conversely, teachers whom students perceive as supportive, actively interested in them, and fair, as well as classrooms that allow for alternative forms of self-expression, promote cooperation, and create a learning-centered, equitable environment (Allen, 2010; Barboza et al., 2009) all contribute to environments where bullying – enacted by teachers or students – is less likely. Students who perceive such support are more likely to seek these teachers out for help when they are aware of bullying or are being bullied themselves, if they know of a student bringing a weapon to school, or if another student threatens a peer with violence (Eliot et al., 2010, p. 546). Such supportive, caring classroom environments are part of larger school cultures that foster the safety and consistency associated with positive school climate.

School Climate. Generally students frame the issue of bullying as a school climate issue, especially as they progress through the grades where there is less supervision by adults (Napolitano et al., 2010). Hence, bullying significantly relates to negative school climate (Williams & Guerra, 2007). **Schools that are perceived as unpleasant, unfair, and unwelcoming increase the likelihood of bullying** (Barboza et al., 2009; Gendron et al., 2011; Nansel et al., 2001; Williams & Guerra, 2007). In fact, the more negative perceptions of school a student has, the more likely they are to be a bully, bully-victim, or victim (Harel-Fisch, 2011). Researchers claim that, “it only takes two-three negative perceptions to double the odds of bullying” (p. 648). Competitive, high pressure environments can “cause stress and lead to bullying practices” (Bibou-Nakou et al., 2012, p. 136). Researchers point out that the pressure itself is not necessarily the problem, but rather the mismatch between expectations and resources students can bring to bear in response to these expectations. Both victims and perpetrators experience school negatively, but in different ways. Victims experience relationships with peers negatively (lack of closeness, kindness, acceptance), while perpetrators experience teachers and academic achievement negatively.

Alternatively, **positive school climates characterized by: a perception of school as “a good place to be” (Gendron et al., 2011, p. 162), trust among students and teachers, and a sense of fairness, belongingness, and safety was found to be negatively associated with bullying and victimization** (Guerra et al., 2011; Harel-Fisch et al., 2011). Like positive teacher-student and classroom level environments, supportive school climates encourage student willingness to seek help from adults when bullying occurs (Eliot et al., 2010). A mix of structure (fair rules and consistent enforcement of them) in combination with support (caring adults) is associated with less bullying and victimization (Gregory et al., 2011).

Self-esteem, school climate, and normative beliefs approving of bullying have each been found to be a predictor of bullying behavior. But there is also a significant interaction effect between school climate and self-esteem, leading researchers to conclude that **“youth with high self-esteem participating in schools considered supportive apparently found that context reaffirming and thus were less likely to resort to bullying behavior. However, within schools perceived as non-supportive, higher self-esteem was associated with higher bullying”** (Gendron et al., 2011, p. 160). In other words, school climate has a moderating effect on the likelihood that students with high self-esteem will bully in school.

Understanding Bully-Victims

A smaller subset of youth who both perpetrate and experience bullying are known as bully-victims (Menesini & Salmivalli, 2017). Among the roughly 29% of all students involved in bullying, 13% perpetrate bullying, 10.6% are victims, and 6.3% are bully-victims. There is less research on this smaller group of students; however, what is known raises concern. According to Juvonen and colleagues (2003), **bully-victims are “by far the most socially ostracized by their peers, most likely to display conduct problems, and least engaged in school, and they also report elevated levels of depression and loneliness”** (p. 1233). Bully-victims harbor the greatest number of negative school perceptions in the widest number of categories compared to perpetrators and victims (Harel-Fisch et al., 2011).

Other research concurs that bully-victims experience a particularly devastating combination of social isolation and lack of success in school that makes their experiences particularly difficult

and troubling (Menesini & Salmivalli, 2017; Nansel et al., 2001). They have been called “provocative victims” or “aggressive victims” for their combination of both anxious and aggressive behavior, illustrating both their internal and external struggles. They come from the most neglectful and abusive home environments (Menesini & Salmivalli, 2017). Researchers speculate that they may start as victims who respond to bullying by retaliating and taking on bullying behavior as a defense. This explanation dovetails with data on students with disabilities who are represented highly as both victims and bullies.

Bullying’s Effects

The consequences of bullying are extensive and pervasive, not only to the individuals involved in these conflicts, but for society more widely. Table 1 (on page 15) encompasses bullying’s effects on victims, perpetrators, the school community, and society. There is less available data on consequences for bully-victims, yet knowing that they are the highest risk group in bullying, we can assume that they suffer from the greatest number and combination of consequences detailed below.

Table 1: Consequences of Bullying¹

Victims & Bullies	Victim only	Bully only	School Community	Society
<ul style="list-style-type: none"> • Declined self esteem • Social isolation • Self-harm • Substance abuse • Increased negative perceptions of school climate • Depression • Poor academic performance* • Anxiety • Increased suicide ideation and attempts • Physical health problems over time • Poorer emotional and social adjustment over time • Increased anxiety disorders in young adulthood 	<ul style="list-style-type: none"> • School avoidance • Increased fear • Diminished sense of belonging 	<ul style="list-style-type: none"> • Less engaged in school • Greater incidence/risk of criminality and anti-social behavior • Increased normative beliefs that approve of bullying 	<ul style="list-style-type: none"> • Student body less engaged in school activities • Lower overall performance on standardized tests • Lower graduation rate 	<ul style="list-style-type: none"> • Disproportionate need for societal support systems (e.g., extended sick leave, unemployment, uncollected tax revenues; health care costs)

* According to Napolitano et al.'s (2010) research review, "involvement in bullying (victim, bully or bully-victim) does not automatically place a child at risk for poor academic achievement but can be one of a combination of factors that undermine a child's engagement in school, underscoring the need for educators to pay particular attention to children who are victimized" p. 39.

¹ Synthesized research findings from Copeland et al., 2014; Eliot et al., 2010; Espelage et al., 2013; Geel & Taniol, 2014; Gendron et al., 2011; Gregory, et al., 2010; Guerra et al., 2011; Hatzenbuehler et al., 2015; Modecki et al., 2014; Olweus, 1992; 2013; Napolitano et al., 2010.

Part II: Recommendations and Interventions

Recommendations

Given the ample data on bullying's prevalence and harmful effects, researchers believe that "there is now substantial educational and clinical interest in programs that help to mitigate bullying's harmful outcomes" (Modecki et al., 2014 p. 602). However, meta-analyses on school-based intervention programs have found at best **only a 20-23% effectiveness rate at reducing bullying and victimization** (Ttofi & Farrington, 2009), and **for older adolescents, school-based bullying interventions have been found to be completely ineffective** (Yaeger, Fong, Lee, & Espelage, 2018). Researchers recommend that intervention programs promote pro-social behavior and align with research, rather than anecdotal solutions, which are actually more prevalent in school intervention efforts (Napolitano et al., 2010). The following four sections align with some, if not all, of these recommendations as areas of focus for schools interested in decreasing or preventing bullying.

School climate. Research overwhelmingly points to school climate as the factor that most influences whether bullying will thrive, survive, or diminish, suggesting that **improving the experience for students is the most powerful measure a school can take to limit bullying behaviors and their detrimental effects.**

Therefore, anti-bullying programs in schools will be most successful amid environments that foster social supports and peer acceptance, especially for at-risk students (Rose et al., 2015; Napolitano et al., 2010). Teaching prosocial skills, a characteristic of social-emotional learning programs (SEL), in academic classes as well as during advisory periods, is recommended as a way schools can foster the high support indicative of positive school climates. Such schools encourage connectedness among the members of their communities and caring, trusting relationships between teachers and students (Eliot et al., 2009). However, supportive environments must also feature fair, firm, and consistent disciplinary practices, which ensure that school is a safe place for everyone (Gregory et al., 2011; Meyer-Adams & Conner, 2008). Based on findings that students who are different from the majority are frequently targets of bullying, diversity training is recommended (Guerra et al., 2010). Of course, as discussed earlier and also later in this brief, the racial and social context of each individual school community must be assessed and taken into account before applying interventions.

Studies often point to teachers – who can foster positive student relationships as well as model positive behavior by treating all of their students with respect – as instrumental in creating the positive school climate that discourages bullying. In doing so, such teachers attend to their students' emotional well-being in tandem with their academic welfare (Bibou-Nakou, 2012). School social workers and other staff can also collaborate to create a positive psycho-social atmosphere for everyone in the building. However, schools are only one aspect of a social-ecological system that includes a broad base of community members who exist in "nested contextual systems" of schools, neighborhoods and society (Bronfenbrenner, 1979). **It is across these nested, broader communities of support that anti-bullying efforts will be most successful** (Napolitano et al., 2010).

School climate has a ripple effect, influencing other, individual factors, like student self-esteem, that are also involved in bullying. For example, depending on school climate, high self-esteem can manifest differently. **In positive school climates, students with high self-esteem contribute to a decrease in bullying prevalence, whereas in negative school climates, students with high self-esteem contribute to increased bullying** (Gendron et al., 2011).

Furthermore, students who perceive their schools as supportive are more likely to seek help for bullying and threats of violence, thus providing a strategy for involving students in bullying prevention (Eliot et al., 2009). Furthermore, early identification of students who need social-emotional support is a particularly effective way schools can prevent, thus decrease, victimization (Green et al., 2011). Positive school climates characterized by a lower frequency of bullying also predict academic outcomes, like higher graduation rates (Cornell, Gregory, Huang, & Fan, 2013).

A reiterative note of caution when engaging in efforts to promote a positive school climate – research has established that different factors cause negative experiences in different schools. In other words, **anti-bullying efforts that begin with changing school climate must tailor their efforts to the unique needs of their individual school culture.**

Improving school climate notwithstanding, there are several other areas where schools can focus to decrease bullying and victimization: gender and sexuality, peer norms, and the cybersphere. The following sections expand upon these categories.

Gender and sexuality. Studies linking bullying to power and emerging sexuality has led researchers to suggest that prevention programs might consider the roles of identity development and sexuality and how they “can become intertwined with bullying behaviors” (Guerra et al., 2011, p. 309). Youth can conflate bullying with sexual harassment, which indicates a need for programs that educate youth about the difference. Further, schools must enact policies that specifically identify LGBTQ populations and unacceptable behavior toward students that are among these at-risk populations.

Peer norms & bystander potential. Just as normative beliefs that approve of bullying tend to promote it, normative beliefs that support the defense of victims lead to students intervening to stop it. Students are more likely to intervene when they believe they have the support of their peers, especially in male peer groups (Espelage et al., 2012). Empathy is also a strong predictor of intervening, especially among girls (Jenkins & Nickerson, 2017). However, both normative beliefs about bullying as well as empathy operate similarly among male and female peer groups, leading to conclusions that both male and female students benefit from anti-bullying programs that address peer norms and build empathy (Guerra et al., 2011; Jenkins & Nickerson, 2017). Although many bullying prevention programs address the role of a bystander, they do so without addressing peer norms, which yields ineffective results. Accordingly, focusing on bystanders without addressing peer norms “is a major oversight” (Napolitano et al., 2010 as cited in Espelage et al., 2012, p. 40). Therefore, **peer norms must first be modified before any real change in bullying behaviors can take place.** At the elementary level especially, bystander programs are deemed most effective when they are focused on direct peer action (intervening, helping victim, talking to adults) (Napolitano et al., 2010).

The cybersphere. Youth who perpetrate or experience bullying in online contexts have initially and more frequently experienced bullying in traditional spaces. And since traditional bullying is far more prevalent than cyberbullying, researchers **recommend that schools direct their efforts on counteracting traditional bullying, which in turn will also lower incidences of cyberbullying** (Olweus, 2013; Williams & Guerra, 2007). This recommendation might come as a welcome relief to school personnel who are concerned about cyberbullying yet feel that it's happening in realms beyond their control. Modecki and colleagues (2014) call the relationship between traditional bullying and cyberbullying an example of “polyaggression” and warn that “interventions that exclusively target cyber contexts are neglecting a highly salient setting for preventing youthful bullying (p. 607) – that is physical school spaces. So, rather than focusing on the setting of bullying, interventions should focus on the behavior more broadly, regardless of where it occurs. In fact, school interventions with “relatively few” cyberbullying-specific measures, still decreased cyberbullying substantially, corresponding to decreases in traditional bullying (Olweus; 2013).

Still, since the risk of being involved in cyberbullying is predicted by frequent involvement in traditional in-school bullying, schools should be on alert that if bullying is occurring in school, it is more likely to happen online and to involve parents in the warning signs. Girls in particular demonstrate a stronger path between victimization in traditional spaces leading to perpetrating bullying in cyberspace, and for boys, perpetrating cyberbullying leads to becoming a victim in cyberspace (Kowalski et al., 2012).

Bullying Interventions: What Works, What Doesn't, and Why

A review of school-based bullying interventions yielded mixed results (Napolitano et al., 2010). Some were successful at reducing bullying, some unsuccessful, and some even increased bullying. This finding led researchers to reflect on why whole-school approaches for reducing bullying are ineffective. They came up with 5 reasons: 1) validity issues with students self-reporting information, 2) studies lacking a guiding theoretical framework, 3) interventions that fail to focus on social ecology of a school that must include peers and families, 4) interventions that fail to account for demographic factors that are contextual to a specific school community (race, sexual orientation, disability), and 5) designing programs to reach the entire student body, when in fact, a relatively small percentage of students are directly involved in bullying perpetration (10-20%). Therefore, school bullying interventions that: are grounded in strong theoretical frameworks and rely on valid data collection are recommended. Further, successful interventions take into account school context, using information about student demographics and bullying prevalence that is school-specific.

The following is a sample of bullying interventions that have been studied and found successful. (For reviews of additional programs, see Resource Guide for Anti-Bullying in Schools.). They share some of the above suggestions, but also correspond with some of this brief's other research findings about bullying's prevalence, perpetrators, victims, and consequences (in Part I).

Restorative practices. An approach to culture change that is centered on building and repairing relationships (Zehr, 2015), restorative practices address school climate and peer norms – both instrumental in preventing bullying. Increasingly used in schools as an alternative disciplinary approach, restorative practices work to repair harm by reintegrating offenders into the school community through a process that encourages communication and accountability. It

often looks like a mediated conversation among all parties involved. This approach differs significantly from the more common and traditional form of punishment that removes the offending student from class, then after a period of time, returns that student without any discussion about the harm that took place.

Restorative practices as a bullying intervention has been studied as a whole school approach and found to be highly effective in decreasing bullying, increasing empathy, and building self-esteem among students (Wong, Cheng, Ngan, & Ma, 2011). For successful implementation, the restorative practices approach requires all eight elements of restorative practice culture change (Marsh, 2017; Figure 5), particularly buy-in from all of the members of the school community, including administration, teachers and staff, students, and parents (Wong et al., 2011). With an emphasis on addressing risk factors for bullying, restorative practices can interrupt the “cycle of revenge” (Wong et al., 2011, p. 856, quotes in the original) that often prevents victims from coming forward and reporting bullying.

Elements of Restorative Practice Culture Change

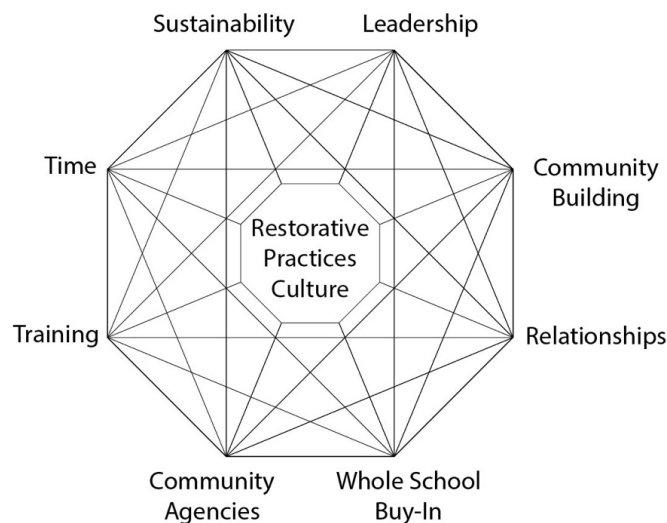


Figure 5: Transitioning to a restorative practices culture involves eight elements (Leadership, Community-Building, Relationships, Whole School Buy-In, Community Agencies, Training, Time, & Sustainability) that each impact culture reform, and also interact with each other to produce change (Marsh, 2017).

Addressing peer norms – print media posters (Perkins, Craig, & Perkins, 2011).

This program is an intervention grounded in theory and research about the powerful role peer norms play in bullying perpetration and bystander intervention, as well as recommendations that schools address peer norms as the key element to any intervention program. It has been implemented and studied at the middle school level, which research indicates is the most potent time to intervene. The program begins with a survey administered to students about their personal beliefs as well as their perceptions of their peers' beliefs about bullying at their school.

Results of these surveys showed that students believed that bullying perpetration, victimization, and pro-bullying attitudes were far more frequent than was the case, revealing student perception of bullying as accepted and normed by other students in their school. Additionally, survey responses indicated widespread personal disapproval of bullying behavior. These results were then communicated to the student body through large posters that displayed accurate information about beliefs and prevalence (Figure 6).

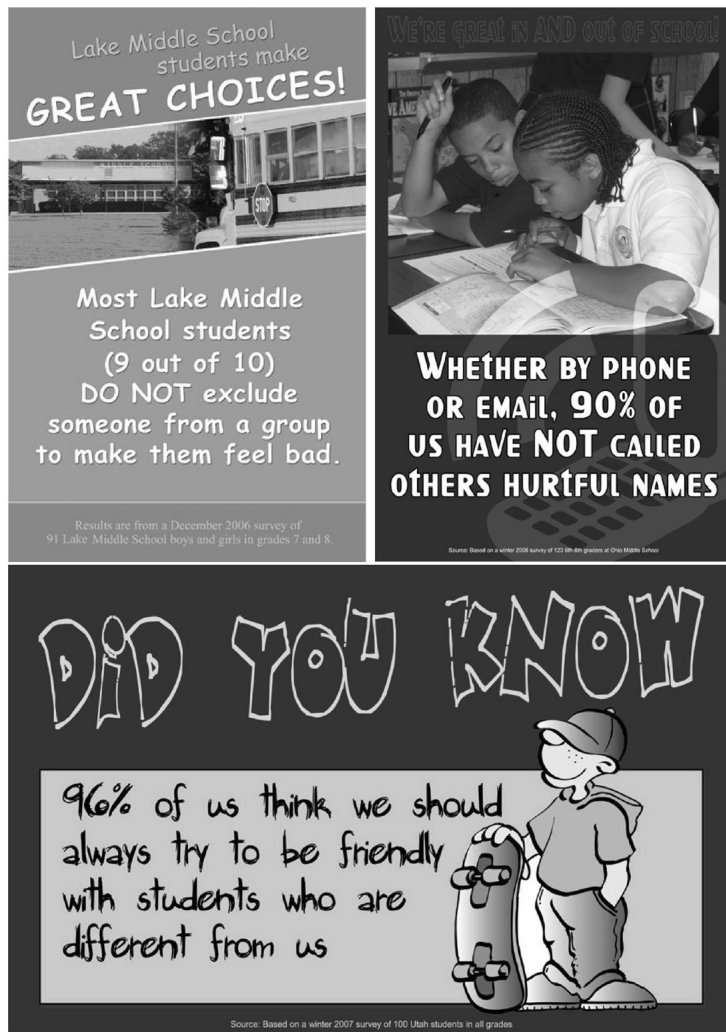


Figure 6: Posters displayed around school that communicated data collected from student-body. From Perkins et al., 2011.

Post-survey results showed significantly reduced perceptions of peer bullying and pro-bullying attitudes; personal experiences of bullying and victimization were reduced; support for reporting bullying to an adult was increased.

Social-emotional learning (SEL). Social-emotional learning approaches typically involve planned curriculum implemented in classrooms. In keeping with research recommendations to provide direct intervention for the smaller sector of the student population

engaged in bullying (Napolitano et al., 2010), social-emotional learning programs have been studied as an intervention for students with disabilities, who are overrepresented in bullying prevalence – as both bullies and victims (Part I). Research suggests that these students' tendencies to struggle with social and communication skills make them more vulnerable to involvement in bullying scenarios.

One such program, Second Step: Student Success Through Prevention (SS-SSTP) (Committee for Children, 2008) was studied as an intervention to reduce bullying, physical aggression, and peer victimization among middle school students with disabilities (Espelage et al., 2015). The program features components that have been shown to be effective with SEL programs more generally, including: direct instruction, scripted and highly interactive lessons, collaborative discussions and activities, whole-class instruction, individual work, video in the areas of self-awareness, social awareness, self-management, problem solving, and relationship management. Teachers provide students cueing and coaching designed to improve their skills in bullying scenarios. Study results show a significant intervention effect for bullying perpetration, leading researchers to conclude that "SEL offers promise in reducing bullying perpetration among students with disabilities" (Espelage et al., 2015, p. 299). However, the intervention's effect on victimization was insignificant.

Legislation as intervention. The U.S. Department of Education (DOE) has established and disseminated a framework for states to implement anti-bullying laws in their schools, issuing a report in 2011 that found heterogeneity among states in adopting and adhering to the DOE's recommendations. Such legislation can be considered a public health intervention, instituted at the policy level. A subsequent study looked into the effectiveness of anti-bullying laws and found that compared to states with no DOE-related bullying legislation, states with at least one anti-bullying law had a 24% reduced odds of student-reporting bullying (Hatzenbuehler et al., 2015). The most consistently cited DOE components that were associated with decreased bullying were: statement of scope, description of prohibited behaviors, and requirements for school districts to develop and implement local policies – another example of intervention success as tied to local context. In schools and districts that identify specific student groups (e.g., students with disabilities or LGBTQ) as protected from bullying, students feel safer and experience less harassment (Hatzenbuehler et al., 2015; Espelage et al., 2013). Thus, anti-bullying policies at the state and local levels can be effective interventions that reduce the risk of bullying in schools.

Conclusions

Prominent in the public realm of interest and concern, bullying has simultaneously garnered the attention of the research community, yielding findings that can inform a more accurate depiction of bullying's prevalence, contributing factors (Part I), as well as instructive guidelines for intervention efforts (Part II). This brief has synthesized and elucidated data that school practitioners can rely upon to understand bullying among their students. The following short list of facts provide some salient results of this brief's review of research.

While on the decline, bullying in schools, in any form or with any frequency, represents both a public health concern and a human rights violation. Schools have a responsibility to understand, address, and prevent bullying with research-supported data, which will lead to more effective interventions.

Resource Guide for Anti-Bullying in Schools

[Blueprints for Healthy Youth Development](#). This organization, based at the University of Colorado, provides a registry of evidence-based positive youth development programs, including anti-bullying interventions. Of the approximately 1,500 programs reviewed, they have selected 5% that they deem 'model' or 'promising.' Their website has multiple search features which produce results that list programs, designated ratings, a cost-benefit analyses and impact data.

[Office of Juvenile Justice and Delinquency Prevention \(OJJDP\)](#). This organization's Model Programs Guide (MPG) contains information about evidence-based juvenile justice and youth prevention, intervention, and reentry programs. It is a resource for practitioners and communities about what works, what is promising, and what does not work in juvenile justice, delinquency prevention, and child protection and safety. Included under their 'Children Exposed to Violence and Victimization' category, is a 'Bullying' link that connects to a page where users can filter (by age, protective factors, risk factors, etc.) to find programs specific to a school community's needs. The bullying section page includes 10 anti-bullying programs, their descriptions, a rating from OJJDP, and links to webpages for the programs.

[Collaborative for Academic, Social, and Emotional Learning \(CASEL\)](#). This organization's mission is to build momentum for social and emotional learning (SEL) in our nation from preschool through high school. CASEL's website provides a variety of resources – research, policy information, implementation tools, media archive – for a variety of stakeholders who are interested in SEL with some information specific to bullying prevention.

[Prevention of Bullying in Schools, Colleges, and Universities: Research Report and Recommendations \(2013\)](#). This special edition report, prepared by the American Educational Research Association (AERA) Task Force on the Prevention of Bullying in Schools, Colleges, and Universities, focuses on the social context of bullying in educational settings. Formatted as a series of 11 separate briefs, this report captures state-of-the-art research on bullying's causes and consequences, training, prevention programs, and related legislation.

[Alberti Center for Bullying Abuse Prevention at the University of Buffalo](#). This center carries out its mission of reducing bullying in schools and the community by providing knowledge and evidence-based tools to promote changing attitudes among children, parents, educators, and society. Their website provides a curated selection of resources that support anti-bullying efforts.

stopbullying.gov. This website is managed by the U.S. Department of Health and Human Services and provides definitions, research, national statistics, and information about laws and legislation related to bullying. This is an easily navigable, accessible resource for anyone, including children and teens, who are interested in stopping bullying.

[NCES Fast Facts: Bullying](#). The U.S. Department of Education's National Center for Education Statistics (NCES) maintains statistics and accompanying graphs, several of which appear in this brief, to explicate bullying's prevalence. This webpage highlights a graph and accompanying textual analysis for *Percentage of students ages 12-18 who reported being bullied at school by type of bullying and sex*, as well as numerous links for similar data.

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