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Identifying Bully Victims: Definitional versus Behavioral Approaches

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Abstract

Schools frequently assess bullying and the Olweus Bully/Victimization Questionnaire (BVQ; Olweus, 1996) is the most widely adopted tool for this purpose. The BVQ is a self-report survey that uses a definitional measurement method — describing “bullying” as involving repeated, intentional aggression in a relationship where there is an imbalance of power, and then asking respondents to indicate how frequently they experienced this type of victimization. Few studies have examined BVQ validity and whether this definitional method truly identifies the repetition and power differential that distinguish bullying from other forms of peer victimization. This study examined concurrent validity of the BVQ definitional question among 435 students reporting peer victimization. BVQ definitional responses were compared with responses to a behavioral measure that did not use the term “bullying,” but instead included items that asked about its defining characteristics (repetition, intentionality, power imbalance). Concordance between the two approaches was moderate, with an area under the receiver-operating curve of .72. BVQ responses were more strongly associated with students indicating repeated victimization and multiple forms of victimization, than with power imbalance in their relationship with the bully. Findings indicate that the BVQ is a valid measure of repeated victimization and a broad range of victimization experiences, but may not detect the more subtle and complex power imbalances that distinguish bullying from other forms of peer victimization.

Keywords

bullying; assessment; validity; Olweus Bully/Victimization Questionnaire; California Bully Victimization Scale

Although a number of bullying measures have been developed (Hamburger, Basile, & Vivolo, 2011), one assessment, the Olweus Bully/Victimization Questionnaire (BVQ; Olweus, 1996), has been widely adopted by schools and researchers. The BVQ has been used worldwide in over 100 published studies of bullying prevalence and consequences (based on a PsycInfo search), and adapted by the World Health Organization for U.S. national and international studies (Nansel et al., 2001). It is also administered as part of the Olweus Bullying Prevention Program, which has been implemented in thousands of U.S. schools (www.olweus.org). The BVQ uses a definitional method to measure bullying — it begins with a question that includes a detailed description of what is meant by the term “bullying” and then asks respondents to indicate whether they have been bullied. This approach is designed to distinguish acts of bullying from other forms of peer victimization (e.g., one-time aggression, disputes between friends), and provides population estimates of the incidence of bullying victimization and perpetration. Despite its widespread use, questions remain about the validity of using a definitional method to measure bullying, such as employed by the BVQ, and whether this method is optimal when used in individual differences research for identifying victims of bullying (Lee & Cornell, 2010). Research clarifying the victimization experiences captured by the BVQ is needed to better guide educators and researchers on the selection and interpretation of instruments.

Researchers generally agree that bullying is a subset of peer victimization defined as (a) repeated and (b) intentional peer aggression that involves (c) an imbalance of power, such that the youth being bullied feels unable to defend him or herself from the aggressor (Olweus, 1993). These relational dynamics make bullying a particularly harmful form of peer aggression; youths whose experiences meet these criteria appear to be at greater risk for poor psychosocial outcomes than the broader set of youth exposed to peer victimization, but without an obvious power disadvantage for the victim (Hunter, Boyle, & Warden, 2007; Solberg & Olweus, 2003).

Questions have been raised about the definitional approach used by the BVQ, including whether respondents retain in working memory and apply with fidelity the definition of “bullying” provided by researchers or fall back on their own prior knowledge and assumptions about the term. That is, it is unclear whether or not respondents distinguish the narrower class of bullying from the broader class of peer victimization (Baly & Cornell, 2011; Greif & Furlong, 2006). Recent research has found that youth characterizations of bullying may differ from the definition developed by researchers. Studies asking children to generate their own definitions of bullying find that they describe aggressive behaviors, but frequently omit the characteristics of intentionality, repetition, and power imbalance (Land, 2003; Vaillancourt et al., 2008). Further, Baly and Cornell (2011) found that students provided with a definition of bullying and an educational video outlining the differences between bullying and other forms of peer victimization reported significantly lower rates of bullying than those provided with a written definition alone, suggesting that even when students are provided with an explicit description, they may not reference all aspects of the definition in their response.

By providing a definition and using the term “bullying,” researchers and educators may also be unintentionally eliciting socially desirable responses (Espelage & Swearer, 2003), for example, youth may underreport bullying because of the stigma associated with either victimization or perpetration (Furlong, Sharkey, Felix, Tanigawa, & Green, 2010). Related research on youth victimization, adult sexual harassment, and workplace bullying have compared definitional approaches to behavioral descriptions and found the prevalence of victimization is consistently lower when using a definitional approach (Sawyer, Bradshaw, & O’Brennan, 2008). Further, there is some evidence that these approaches may even identify somewhat differing groups of victims (Felix et al., 2011), with ethnic minority

students perhaps being less likely to endorse bullying with the definitional approach compared to behavioral methods (Sawyer et al., 2008). Finally, interpretations of the term “bullying” may change with age. For example, younger students may focus on the basic distinction between aggressive and nonaggressive behaviors, whereas older students have a more nuanced understanding of the definition of bullying (Monks & Smith, 2006).

The current study was designed to determine which characteristics of the definition of bullying are most strongly associated with endorsement of the BVQ definitional measure. Given the frequent use of the BVQ, a more comprehensive understanding of its measurement might help refine and enhance researchers’ understanding of youth bullying experiences. In this study, participants completed the BVQ definitional item along with the California Bully Victimization Scale (CBVS; Felix et al., 2011; Furlong et al., 2010), a self-report measure that does not use the word “bullying,” but is specifically designed to operationally measure all components of the bullying definition commonly used by researchers. First, we determine the extent to which responses to the BVQ item are associated with the CBVS behavioral definition of bullying (repeated victimization plus power differential). Second, we disaggregate CBVS items to determine the extent to which the BVQ definitional item is associated with a number of key components of bullying: (a) experiencing a range of different *forms of victimization*, (b) reports of *repeated victimization*, (c) the *number of forms of victimization* reported, (d) a range of different *forms of power differential*, and (e) the *number of forms of power differential* reported.

Method, Measures, and Analysis Procedures

Participants

Eight schools in a district just outside a major city in the northeast U.S. administered a bullying survey as part of a district-wide effort to reduce peer victimization. The eight schools included seven K–8 schools, as well as the district high school. All students in Grades 3, 5, 7, and 9 were invited to participate and a letter was sent home to parents. Teachers brought their students to a computer lab to complete an anonymous online survey. The students first completed the CBVS and then the BVQ item. Measures were administered in this order to reduce the effects of the BVQ definition and use of the word “bullying” on CBVS responses.

The current study included students in Grades 5 (10 to 11-years old), 7 (12 to 13-years old), and 9 (14 to 15-years old). Grade 3 did not complete the BVQ item. The online survey was initiated 1,246 times; however, 122 of these initiations were for 0 seconds (perhaps reflecting teachers demonstrating for their students, problems with Internet access, or students choosing to not complete the survey). An additional 27 surveys were excluded because they were completed in fewer than 120 seconds, well below the median completion time of 11 minutes. The sample was further reduced to the 990 students who had no missing data on the eight CBVS victimization questions (described later). The usable response rate was 80.2%. This analysis used a subset of 435 students who reported at least some peer victimization and, therefore, completed questions about power differential (power differential questions were skipped for students who reported no victimization). The Institutional Review Board at Boston University approved secondary analysis of these anonymous data.

Males and females were equally represented (48.2% female) with 39.3% in Grade 5 28.9% in Grade 7, and 31.8% in Grade 9. Students primarily identified as nonLatino/a White (59.1%), followed by Asian or Asian American (18.8%), Hispanic/Latino/a (8.7%), Black or African American (7.9%), and Other (5.6%).

Olweus Bully/Victimization (BVQ) Survey Question

Respondents completed the primary BVQ item (Olweus, 1996), used in numerous studies to classify individual youth as bullying victims and perpetrators (e.g., Solberg, Olweus, & Endreson, 2007). The BVQ specifically states that a youth should answer all subsequent questions by referring to a 207-word definition that defines “bullying” as a: (a) purposeful act, (b) composed of overt and covert acts, and (c) where the victim finding it difficult to defend himself or herself (see Solberg and Olweus [2003, p. 246] for the complete definition). Respondents are provided five response options (*I haven’t been bullied at school in the past couple of months, it has only happened once or twice, 2 or 3 times a month, about once a week, several times a week*). The BVQ item was collapsed to a dichotomous variable that classified respondents as having been bullied if they reported bully victimization at least two to three times in the past month (as suggested by Solberg and Olweus [2003]).

California Bully Victimization Scale (CBVS)

The CBVS asks respondents if they experienced each of eight forms of victimization at school in the past month “in a mean and hurtful way”: (a) teased or called names by another student; (b) rumors or gossip spread behind your back; (c) left out of a group or ignored on purpose; (d) hit, pushed, or physically hurt; (e) threatened; (f) had sexual comments, jokes, or gestures directed at you; (g) had your things stolen or damaged; (h) been teased, had rumors spread, or threatened through the Internet. Students rated event frequency on a five-point scale (*never, once in the past month, 2 or 3 times in the past month, about once a week, and several times a week*). Respondents reporting no victimization were skipped to the next section of the survey, whereas those reporting any victimization completed additional questions assessing power imbalance (expanded from the original CBVS; Felix et al., 2011). These respondents were asked to reference their “main” aggressor and indicate: (a) How popular is this other student? (b) How smart is this student in school? (c) How physically strong is this student? (d) How good looking is this student? (e) How likeable is this student? (f) How athletic is this student? (g) How much money does this student have? and (h) How old is this student? For each item, students compared their aggressor on a three-point scale (*less than me, same as me, more than me*).

Analysis Procedures

We first tested agreement of CBVS bullying, defined as repeated victimization plus power differential (i.e., at least one form of victimization experienced two to three times in the past month and of at least one form of power differential) with BVQ item endorsement. We tested CBVS bullying sensitivity (SN; percent of BVQ positives detected by the CBVS bullying item) and specificity (SP; percent of BVQ negatives classified as negative by the CBVS bullying item) against the BVQ. We also calculated percent agreement and area under the receiver-operating curve (AUC). AUC was selected as a measure of individual-level concordance between endorsement of bullying based on the CBVS and BVQ. Although the AUC was developed to study the association between a continuous predictor and a dichotomous outcome, it can be used when the predictor is dichotomous, in which case AUC equals $(SN + SP)/2$.

Second, CBVS items were used to derive 25 unique components of bullying: (a) eight variables indicating *forms of victimization* (e.g., any teasing — even once in the past month); (b) one variable indicating *repeated victimization* (any form of victimization experienced at least two or three times in the past month); (c) five variables indicating the *number of different forms of victimization* (exactly one, exactly two, ... five or more); (d) eight variables indicating *types of power imbalance* (e.g., aggressor more popular, aggressor smarter); and (e) three variables indicating the *number of forms of power imbalance* (exactly

one, exactly two, three or more). Each of these variables was dichotomized to a yes/no response.

To examine aspects of bullying associated with BVQ response, we entered CBVS components in a series of logistic regressions predicting BVQ response. We began by entering each CBVS component in a bivariate model, testing its association with BVQ response, while controlling for grade, sex, and race/ethnicity to account for potential variation associated with known demographic differences in bullying experiences, and to demonstrate the independent association of behavioral components of bullying and responses to the BVQ. To determine if the association of each of these counts with BVQ response was additive, we entered as one set the dummies for the number of different forms of victimization and number of forms of power imbalance. PROC GLIMMIX, a regression procedure for multilevel modeling (SAS, version 9.2), was used to account for school clustering. Next, we built a series of multivariate models to identify factors most strongly associated with BVQ response. The first model included a separate dummy variable for each of the 8 forms of victimization (forms of victimization were moderately correlated, $r_s = -.02-.45$). A second model added dummies for number of forms of victimization (we started at exactly 2 rather than 1, because the variable for exactly 1 form of victimization was perfectly accounted for by the 8 dummy variables for individual forms of victimization). A third model tested the association of each of the 8 forms of power imbalance with BVQ response (forms of power imbalance were moderately correlated, $r_s = -.05-.63$). A fourth model added number of types of power imbalance. A fifth model included all forms of victimization, number of forms of victimization, all forms of power imbalance, and number of forms of power imbalance. The final sixth model added the dummy variable indicating repeated victimization to model five. We report odds ratios and 95% confidence intervals.

Results

A comparison of respondents reporting any victimization ($n = 435$) to those reporting no victimization ($n = 555$) indicated no significant sex differences. However, respondents reporting victimization were more often in Grades 7 and 9, $\chi^2(2, 990) = 11.7, p < .05$. They were less likely to be Asian/Asian American and more likely to be Black/African American or Latino/a, $\chi^2(4, 990) = 30.0, p < .05$. The most frequently reported forms of CBVS victimization were teasing (58.9%), having rumors or gossip spread (49.0%), and being excluded or ignored by peers (44.8%; see Table 1). Half of the respondents endorsing victimization reported that it was repeated (50.8%). Most respondents reporting victimization endorsed at least one form of power differential (72.0%), with a third of respondents reporting that their aggressor was more popular (32.2%) or more athletic (30.3%).

We first examined concordance of the BVQ definitional measure with the CBVS bullying measure (repeated victimization plus any type of power differential) to determine whether the two measurement methods detected the same group of bully victims. Among respondents in our victimization subsample, 22.1% endorsed the BVQ definition and 39.3% met criteria for bullying based on the CBVS definition, $\chi^2 = 62.0, p < .001$, indicating that the CBVS identified a larger subset of respondents. SN was 73.9% and SP was 70.5%. These results indicate that the CBVS assessment of bullying identified almost three-quarters of respondents who went on to endorse the BVQ, however, it also identified 30% of respondents as having been bullied, who did not report bullying on the BVQ. The AUC (a measure of concordance) was .72, which is generally considered “fair” classification. Percent agreement across the two measures was 71.3%. As another indicator of agreement between the CBVS indicator and the BVQ item, we estimated a logistic regression using the CBVS indicator to predict BVQ response. Results indicated that respondents endorsing the

CBVS were over 6.5 times more likely to endorse the BVQ item than those who did not endorse the CBVS, $OR = 6.56$, 95% CI [3.87, 11.12], large effect size. Repeating this regression stratified by grade, we found that agreement between the CBVS and BVQ was highest among students in Grade 9, $OR = 10.64$, 95% C.I. [3.44, 32.94], versus Grades 5 and 7, $ORs = 5.35$, 95% C.I. [2.31, 12.38] and 5.11 95% C.I. [2.16, 12.06], respectively.

We next examined, in bivariate analyses, which components of the bullying definition (as measured by the CBVS) were associated with BVQ endorsement. Respondents were most likely to endorse the BVQ if they reported at least one form of repeated victimization, $OR = 12.31$, 95% CI [6.21, 24.42], large effect size. Each of the eight forms of victimization was significantly associated with BVQ response, $ORs = 2.06$ – 6.00 , $p < .05$, small–moderate effect sizes, indicating that BVQ endorsement was related to diverse forms of victimization. In addition, as the number of forms of victimization increased, the likelihood of endorsing the BVQ increased from 7.7% (one form of victimization) to 55.6% (five or more forms of victimization), suggesting a dose-response relation for number of forms of victimization predicting BVQ response (ORs increased from 1.83 to 16.83 as number of forms of victimization increased from two to five or more). In contrast, when we assessed the association of BVQ endorsement with the different forms of power differential, only reporting that the aggressor was more likeable was significant, $OR = 2.17$, 95% CI [1.19, 3.97], small effect size. Youth reporting one or more forms of power imbalance were more likely to endorse the BVQ than those reporting no power imbalance — $ORs = 2.14$ 95% CI [1.03, 4.44] for one form and 2.41 95% CI [1.21, 4.82] for three or more forms (all $p < .05$), small effect sizes.

To identify the behavioral components of bullying most strongly associated with BVQ response, we estimated a series of multivariate regression models, successively adding CBVS bullying components as predictors of BVQ response. The first model included *all eight forms of victimization* and revealed that reports of teasing, ignoring, and hitting were significantly associated with BVQ endorsement, $ORs = 2.01$ – 4.64 (results available from the first author on request). The second model included *forms of victimization* and *number of forms of victimization* and found that teasing, ignoring, and hitting continued to be significant, $ORs = 2.38$ – 5.82 . Although number of forms of victimization previously had a significant additive affect, in the model including both form and number of forms of victimization, the ORs associated with number decreased as the number increased. Although nonsignificant, this trend indicated subadditive interactions among forms of victimization (i.e., the ORs for the joint effects of multiple forms of victimization are significantly less than the product of the ORs associated with individual forms of victimization). In a third model, which tested *all eight forms of power imbalance*, only rating the aggressor as more likeable was significantly associated with BVQ response, $OR = 2.07$, 95% CI [1.02, 4.21], small effect size. This variable remained significant in a fourth model adding *number of power imbalances*, $OR = 2.16$, 95% CI [1.02, 4.55], small effect size. Although number of forms of power imbalance previously had an additive effect on endorsement of the BVQ, their effect was nonsignificant in the model including forms of power imbalance. A fifth model included *all forms of victimization*, *number of forms of victimization*, *all forms of power imbalance*, and *number of forms of power imbalance*. When considered together, only teasing and ignoring were significantly associated with BVQ responses and all indicators of power imbalance became nonsignificant. Finally, in the sixth model we added *repeated victimization*, as it previously demonstrated a strong association with BVQ endorsement in bivariate analyses. In the context of this multivariate model, repeated victimization continued to be significantly associated with BVQ response, as well as teasing, ignoring, and hitting (see Table 1).

Discussion

Although the BVQ explicitly defines bullying as repeated, intentional victimization involving an imbalance of power between the victim and aggressor, when we examined if behaviorally-defined repeated, intentional victimization plus power differential mapped onto the definitional approach of the BVQ, we found that agreement between these two measurement strategies was only fair. Analyses of sensitivity and specificity indicated that the two measurement strategies identified somewhat different respondents as both victims and nonvictims. This result is consistent with prior research finding that survey questions using the term “bully” elicit different prevalence rates of bullying than survey procedures that do not use the term (Kert, Coddington, Tryon, & Shiyko, 2010). It may be that endorsing an item that includes the word “bully” requires youth to have psychologically accepted the identity of being a victim of bullying and that students who self-identify as victims are qualitatively different from those who have experienced similar victimization behaviors, but do not endorse the bullying label.

Our analyses identified four components of the definition of bullying that are most strongly predictive of BVQ response. Repeated victimization emerged as the most important factor. The odds that students experiencing repeated victimization also endorsed being bullied on the BVQ was 7 times greater than odds for students who experienced victimization that was not repetitive. It could be that repeatedly being targeted by peers is a main contributor to developing an identity of a bully victim. The student may internalize that she or he is being targeted for an inherently personal reason. In contrast, if a student is targeted once or sporadically over time, even if severely, the student may be able to externalize the reason, conceptualizing the aggressors as “bullies” (i.e., something negative about them) not that she or he is a “victim.” It may also be that the psychological process of taking on the identity as a victim could generalize to other aspects of self-identity, such that youth are more likely to identify as generally ineffective and powerless in interpersonal relationships. To explore the possibility that youth endorsement of the definitional approach was associated with higher levels of psychological distress, we conducted a follow-up regression analysis in which we entered the CBVS and BVQ bullying indicators as predictors of the Total Difficulties Scale derived from the Strengths and Difficulties Questionnaire (SDQ; Goodman, 2001), an assessment of psychological symptoms co-administered with our survey. As hypothesized, we found that although the CBVS and BVQ were both significantly associated with psychological symptoms, the association was stronger for the BVQ. Further research on the association of different bullying measurement strategies with distal and proximal outcomes for youth could be important for differentiating students who are likely to identify themselves using different methods.

The finding that each form of victimization was significantly associated with BVQ endorsement in bivariate analyses addresses concern that students who experience relational (Crick & Bigbee, 1998) or sexual harassment (Felix & McMahon, 2007) victimization may not be identified with traditional measures. However, different forms of victimization are co-occurring and their inter-relationship may have artificially inflated the association of any particular form with BVQ response. In fact, when we entered all forms of victimization into a multivariate regression, only the experiences of being teased, ignored, and hit emerged as significantly associated with BVQ response. This suggests that youths may be most likely to reference these particular forms of victimization when responding to the BVQ. A possible reason is that teasing, hitting, and purposeful ignoring are among the most observable forms of victimization and are often used as exemplars of bullying in prevention programs.

Notably, although number of forms of victimization was significantly and monotonically associated with BVQ endorsement when considered on its own, in more complex models

including forms of victimization, number was nonsignificant and associations with number and BVQ endorsement decreased as number increased. This result suggests that the effects of various forms of victimization differed and that a simple summary count of types of victimization may be inadequate to capture the true effects of multiple forms.

Finally, in bivariate analyses, when respondents indicated that aggressors were “more likeable,” they were significantly more likely to endorse the BVQ. However, this association was nonsignificant in the model that also accounted for forms of victimization. The existence of a power differential has been the keystone element of the empirical definition of bullying from the beginning (Olweus, 1993); however, there is limited research on how or if youth incorporate power imbalance in their conceptualization of bullying (Rodkin & Berger, 2008). A striking finding in the current study is that only the measure of the aggressor being “more likeable” was statistically significant in bivariate models. The traditional forms of power imbalance associated with bullying, such as an aggressor being older or stronger, did not emerge as significant.

Together, these results suggest that the BVQ definitional item may not be sensitive to capturing the presence of a power differential in peer victimization — often considered the critical distinction between repeated victimization and bullying. In fact, the largest effect sizes indicated that endorsing the BVQ item was much more strongly associated with repeated victimization and different forms of victimization than any of the power differential items. Thus, presenting the long, detailed definition of bullying prior to querying bullying experiences appears to elicit the persistence of victimization rather than the nuanced power differential element of the scientific bullying definition, a critical concern for the accuracy of conducting bullying research.

The BVQ item was originally designed as a tool to assess the incidence of bullying-related experiences across large samples, even to obtain national population estimates, and not for individual differences research. In this context, the BVQ can be used effectively as a brief assessment of prevalence and for monitoring population trends. However, prevention, intervention, and social justice values recognize the importance of being able to help individual youth and to understand better the short- and long-term sequelae of their bullying experiences. This interest led to increased use of the BVQ and other peer victimization instruments to develop classifications (e.g., bully, bullied, bully-bullied; see Lovegrove, Henry, & Slater, 2012). The results of the current study suggest that such classification strategies are not invariant across measurement approaches.

Regardless of approach used, no single method will be able to capture the phantom pool of bully victims and the findings of this study do not inform researchers about which measurement approach is “more accurate.” Our end conclusion is that it may be more useful to recognize that youth self-perceptions of bullying matter and that these perceptions of victimization and its associated psychological harm *are* the most critical matters to assess. Previous studies find that self-perceived bullied youth have poorer life satisfaction, school connectedness, and hope than the more general class of peer victims (Felix et al., 2011). This study additionally demonstrates that (a) the experience of repeated victimization is not perfectly correlated with endorsement of a power differential, which suggests these may be two distinct experiences, and (b) the frequency and forms of victimization may be sufficient to identify the majority of youths who would self-identify as bully victims.

This study has several limitations. First, this sample was limited to one school district in the northeastern U.S. and results may have limited generalizability. It is possible that behavioral components would be differentially associated with the BVQ in another school district and among a different group of students. Second, both the CBVS and BVQ were administered to

all students in the sample and the CBVS behavioral victimization questions were always asked before the BVQ. This order of assessments may have prompted respondents to think more broadly or deeply about various victimization experiences than if the BVQ had been presented alone. As such, the potential bias is for inflated agreement between these two measures. In other words, the BVQ may have even fewer associations with behavioral components of the CBVS (and weaker associations with indicators of power imbalance) than what we found here. Third, we administered only the first item of the BVQ and, while this single item is most often cited in research on the BVQ, students did not complete other BVQ items that include more specific questions about forms of bullying. Finally, although self-report measures have been promoted as the best method to determine prevalence estimates (Solberg & Olweus, 2003), and are likely to be the most accurate way to identify indirect forms of victimization that are not readily observable (Felix et al., 2011), they may have modest criterion validity to teacher- and peer-reports (Henry, 2006; Lee & Cornell, 2010).

The BVQ has a distinguished history in bullying research and has contributed substantially to scientific knowledge of the bullying phenomenon and to applied prevention and intervention practices. Not surprisingly, therefore, the results of the present study support the use of the BVQ as a valid measure of repeated victimization that is related to a broad spectrum of victimization experiences. However, the BVQ may not be as sensitive to detecting important power differences that distinguish bullying from other forms of peer aggression. These findings point to the need to advance the measurement of bully victimization beyond prevalence estimates to the more precise goal of assessing youth for experiences that cause psychosocial harm. As self-identified bullied youth appear to have significantly poorer health outcomes than the broader group of peer victims, it seems critical to identify valid measures that are sensitive to this distinction. More effective screening for bully victimization experiences would allow professionals to identify youth who are suffering repeated peer experiences that may require social and psychological intervention to avoid harmful consequences. Given the high prevalence of bullying in schools worldwide, such a tool would be invaluable in the goal to stop the harm of bullying experiences.

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Prevalence of Each Victimization Component, Bivariate and Multivariate Association of Each Component with Endorsement of BVQ Bullying Item (N = 435).

Table 1

	% Endorsing Component of Bullying	% Of those Endorsing Each Component, % Endorsing BVQ	Tetrachoric Correlations between Bullying Component & BVQ	Bivariate Association Bullying Component & BVQ ¹	Multivariate Association All Bullying Components & BVQ ²
	%	%	r	OR	95% CI
Part I: Victimization					
<i>Forms of victimization</i>					
Any teasing	58.9	32.4	.55	6.00*	[3.17, 11.33]
Any rumors	49.0	27.7	.23	2.20*	[1.34, 3.61]
Any ignoring	44.8	31.8	.36	2.94*	[1.79, 4.82]
Any hitting	23.4	41.2	.43	3.41*	[2.03, 5.73]
Any threatening	18.6	43.2	.43	3.49*	[2.02, 6.04]
Any sexual	26.7	35.3	.33	2.74*	[1.65, 4.55]
Any stealing	23.0	32.0	.24	2.06*	[1.21, 3.51]
Any internet	17.2	41.3	.38	3.97*	[2.21, 7.13]
Repeated victimization	50.8	38.5	.69	12.31*	[6.21, 24.42]
<i>Number of victimization</i>					
Exactly 1	35.9	7.7	-.50	—	—
Exactly 2	22.1	13.5	-.23	1.83	[0.78, 4.32]
Exactly 3	16.6	27.8	.12	4.64*	[2.06, 10.46]
Exactly 4	11.0	33.3	.20	5.30*	[2.20, 12.77]
5 or More	14.5	55.6	.57	16.83*	[7.47, 37.94]
Part II: Power Difference					
<i>Forms of power difference</i>					
More popular	32.2	28.6	.19	1.60	[0.98, 2.63]
Smarter	12.6	30.9	.17	1.54	[0.80, 2.96]
				1.31	[0.61, 2.78]
				1.82	[0.74, 4.48]

	% Endorsing Component of Bullying	% Of those Endorsing Each Component, % Endorsing BVQ	Tetrachoric Correlations between Bullying Component & BVQ	Bivariate Association Bullying Component & BVQ ¹	Multivariate Association All Bullying Components & BVQ ²
	%	%	<i>r</i>	<i>OR</i>	95% CI
Stronger	24.4	25.5	.09	1.31	[0.77, 2.23]
Better looking	17.9	23.1	.02	1.10	[0.60, 2.02]
More likeable	14.9	35.4	.26	2.17*	[1.19, 3.97]
More athletic	30.3	22.7	.02	1.02	[0.61, 1.71]
More money	23.2	29.7	.19	1.64	[0.97, 2.77]
Older	23.4	26.5	.11	1.15	[0.67, 1.97]
<i>Number of power differences</i>					
Exactly 1	22.8	24.2	.05	2.14*	[1.03, 4.44]
Exactly 2	20.2	25.0	.09	2.15*	[1.02, 4.53]
3 or more	29.0	27.8	.16	2.41*	[1.21, 4.82]
				1.10	[0.25, 4.96]

¹In bivariate models, each bullying component was entered individually as a predictor of BVQ response, while controlling for sex, grade, and race/ethnicity, and accounting for school clustering.

²In the multivariate model, all bullying components were entered together as predictors of BVQ response, while controlling for sex, grade, and race/ethnicity, and accounting for school clustering.

* $p < .05$.