

School-Based Child Sexual Abuse Prevention Programs: Implications for Practitioners

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Schools are a primary location for the delivery of child sexual abuse prevention programs. This has both advantages and disadvantages. Further, despite the rapid growth internationally of school-based abuse prevention programs, there continues to be a lack of systematic evaluation, and many of these programs are implemented on trust rather than on evidence of their effectiveness (Finkelhor & Dzuiba-Leatherman, 1995; MacIntyre & Carr, 1999a; Topping & Barron, 2009). Secrecy about abuse (Krivacska, 1990), the difficulty in measuring transfer of skills from programs to real life (Ko & Cosden, 2001), and the complex interaction of factors related to program, presenter, and student have all been barriers to good quality evaluation. In recent years, more evidence has accumulated, but critiques have been rare.

This article summarizes the authors' recent literature review and meta-analysis of the effectiveness of purely school-based child sexual abuse prevention programs (Topping & Barron, 2009) and outlines the primary implications for their effective delivery. We also provide recommendations for teachers and child protection practitioners in planning and delivering sexual abuse prevention programs. First, we present some background information to help frame the context of the issue.

Definitions of child sexual abuse In order for schools to intervene effectively in addressing child sexual abuse, clarity is needed regarding a definition of what constitutes child sexual abuse. This is all the more important given that child abuse is a morally loaded and complex concept (Thorpe, 1994). In a recent review of efficacy studies, Topping and Barron (2009) identified that definitions of child sexual abuse used in program evaluation studies were characterized by omissions and lack of clarity. Only two studies in the review, both of which came from the United States, explicitly defined sexual abuse. Telljohann, Everett, and Price (1997), defined *child sexual abuse* as "non consensual physical contact with a minor for the purpose of sexual gratification." Pohl and Hazzard's (1990) definition was from the *Feeling Yes, Feeling No* prevention program and was reported in child-like language, i.e., "When someone gives you the 'no' feeling by touching or looking at your private parts or having you touch or look at the private parts of their body."

Given the paucity of definitions in efficacy studies, definitions were explored through the broader perspective of child sexual abuse literature. Definitions of child sexual abuse were of three different types (Faller, 1993). They included *criminal* definitions, where the focus was on securing prosecutions; *child protection* definitions, where the focus was on protecting a child's safety; and *clinical* definitions, where the concern was more with the impact of abuse on the child. More recent definitions incorporate peer abuse, child prostitution, Internet grooming and pornography, and pedophile networks, along with traditional categories, such as incest (Chase & Statham, 2005).

For the purpose of the current literature review, *child sexual abuse* is defined as follows:

Any child below the age of 16 years may be deemed to have been sexually abused when any person(s), by design or neglect, exploits the child, directly or indirectly, in any activity intended to lead to the sexual arousal or other forms of gratification of that person or any other person(s) including organised networks. The definition holds whether or not there has been genital contact and whether or not the child is said to have initiated, or consented to the behaviour. (Scottish Office, 1998)

This definition had been adopted by education, social work, and police agencies in Scotland, and thus it provided a degree of fit between the review reported and practitioner guidelines.

The extent of child sexual abuse Schools need to be aware of the size of the problem. Child sexual abuse occurs across all socio-economic levels and in all ethnic groups (Dhooper & Schneider, 1995) and can have both short- and long-term consequences. The immediate impact of abuse can lead to a myriad of symptoms, including self-harm, dissociation, substance misuse, posttraumatic stress (intrusion, hyper-vigilance, and avoidance), difficulties in concentration and learning, and lowered self-esteem. In the longer term, difficulties can continue to be pervasive, including depression, interpersonal difficulties, substance abuse, delinquency, and revictimization (Finkelhor, 1986). According to a longitudinal study of 8,292 U.K. families (Roberts, O'Connor, Dunn, & Golding, 2004), child sexual abuse has long-term repercussions, including a negative

impact on adult mental health, parenting relationships, and child adjustment in the succeeding generation.

The extent of child sexual abuse is often reported by either incidence or prevalence statistics. Incidence statistics tend to refer to the number of reported incidents within a given time frame, e.g., the number of cases referred to the child protection system in any given year. Incidence statistics on the whole suggest fairly low levels of occurrence of child sexual abuse, e.g., 2.4 per 1,000 in the U.S. (Faller, 1993), although incidence statistics are increasing internationally. Possible reasons may include increased adult awareness, recognition and willingness to report, or indeed, increased numbers of disclosures from children (Faller, 1993).

In contrast, prevalence studies typically ask adults retrospectively to share whether they were abused in childhood, and as such, these reports are susceptible to memory deficits and distortions. Despite the use of different definitions, populations, and methods, such studies tend to indicate far higher levels of child sexual abuse. In the United States, between 8% and 71% of the female population report some form of sexual victimization, compared with 3% to 37% of the male population (Rind, Tromovitch, & Bauserman, 1998). The age range of greatest risk to both boys and girls is between 7 and 13, but sexual abuse occurs at any age from birth onward (Finkelhor & Baron, 1986).

In comparing incidence with prevalence statistics, we found that many cases go unreported and undetected, and most survivors never tell of their abuse in childhood (Gomes-Schwartz, Horowitz, Cardarelli, & Sauziet, 1990). A potential safety outcome for sexual abuse prevention programs could therefore be an increase in children reporting abusive experiences, resulting in a better match between prevalence and incidence statistics (Gough, 1993).

Perpetrators of child sexual abuse Schools need to be aware of where the harm is coming from to target prevention efforts effectively. Prevalence statistics suggest 10%–30% of perpetrators are strangers to their child victims, with the remainder being family members or other persons known to the child. Within this latter group, for girls, one third to half of the perpetrators are family members compared with one tenth to one fifth for boys (Finkelhor, 1984). Sexual abuse by peers is apparently being identified more frequently. Abel and colleagues (1987) reported that 59% of their sample began abusing in adolescence. With more males disclosing abuse, female perpetration is also being identified more often, with incidence figures suggesting that around 10% of substantiated child protection cases involve a female perpetrator (Mendal, 1995). In summary, prevention programs need to address abuse by known adults as well as by strangers, female as well as male perpetration, and abuse by peers.

School as a context for effective delivery Given the pervasiveness of child sexual abuse within society, schools are vehicles for reaching most children. Teachers have a central role in the delivery of the curriculum as well as noticing child behavior that might suggest child sexual abuse. School-based delivery locates the program in a system or ecology that can be sustained over time, so awareness raising in consistent peer and adult groups and consequent follow-up are both more possible. These advantages could be of great importance. However, school-based programs also have the disadvantage that they are likely to be brief and must fit within other curriculum priorities and demands. Programs may be delivered by teachers who are likely to have pedagogical competence but who may have limited content knowledge about child sexual abuse, with possible personal sensitivities and limited confidence. Another major limitation could be the quality of teacher training. Kenny (2004) reported that teachers' self-reported lack of awareness of the signs of child abuse and reporting procedures, and Baginsky and Macpherson (2005) found that providers of initial teacher training often struggled to prepare student teachers to deal with child protection concerns.

If schools are to deliver abuse prevention programs, we need clarity about what is to be achieved. Finkelhor (2009) concisely summarized the main aims of school-based abuse prevention programs as the prevention of significant harm for children, the disclosure of abuse, the reduction in child self-blame, and the increase of sensitivity by the school and community environment. This latter aim involves the education of parents, teachers, and other adults in responding more helpfully to children in need and at risk.

Debates in the absence of evidence Within the context of limited empirical evidence, there has been considerable dispute about the efficacy of school-based sexual abuse prevention programs. Some professionals suggest that these interventions are so sensitive that they should remain in a clinical context, while others have argued for a community-based approach that involves many types of adults in raising awareness. Programs have been criticized for putting too much responsibility on children for keeping themselves safe and for failing to understand the nature of the power adults hold over children (Wyre, 1993). Some opponents suggest that empowering children without parental education places children at risk of further abuse by experiencing physical punishment when they challenge existing parenting norms (Briggs & Hawkins, 1994a, 1994b). There is also debate regarding whether young children can comprehend certain abuse prevention concepts, as well as what concepts should be core for children's safety (Melton, 1992; Krivacka, 1990). Indeed, Cohn (1982) questioned whether children were the appropriate recipients of such programs, citing situations in which children who had a need to trust their adult caretakers for their psychosocial development were placed in the untenable position of being responsible for protecting themselves from their so-called

caretakers. Pelcovitz, Adler, Kaplan, Packman, & Kreiger (1992) suggested that professionals could erroneously conclude that because children had experienced an abuse prevention program, this meant that they were safe from harm.

Evidence from narrative reviews Although previous research reviews have sought to critique efficacy studies, the focus and quality of these reviews have been highly variable. Reviews have grouped all kinds of interventions with diverse populations in all kinds of contexts. Not surprisingly, this identified a range of potentially relevant variables underpinning program effectiveness. These variables included diversity of teaching approaches, impact of different presenters, age range of participants from kindergarten to school-age, developmental appropriateness of the curriculum, and impact of parental involvement. What is important for schools, despite the limited scope of these reviews, is that evidence across studies supported the conclusion that most children could benefit from the concepts learned from abuse prevention programs and the perceived acquisition of self-protection skills (Finkelhor & Strapko, 1992; Gough, 1993; Mayes, Currie, MacLeod, Gillies, & Warden, 1992; Carroll, Miltenberger, & O'Neil, 1992; MacMillan, MacMillan, Offord, Griffith, & MacMillan, 1994; Bevill & Gast, 1998; Miltenberger & Roberts, 1999; MacIntyre & Carr, 2000; Topping & Barron, 2009). The importance of behavioral skills training, modeling, role-playing, and corrective feedback was identified as underpinning skill development. Finkelhor and Strapko (1992) found that programs could lead to knowledge and skill gains for both parents and teachers. None of these reviews, however, was able to conclude that there had been an actual reduction in abuse. School-based sexual abuse prevention programs were, therefore, seen as just one intervention in the range of preventative measures necessary to assure children's safety in society.

Supportive findings from meta-analysis On the whole, meta-analytic reviews, although covering diverse studies, did affirm the main findings of traditional narrative reviews. Davis and Gidycz (2000) for example, reviewed 27 studies and found that children who received prevention programs performed 1.07 SD higher on knowledge and skill measures than control group participants. The highest effect sizes were found for programs that lasted more than four sessions and utilized active behavioral training. The authors argued that longer programs gave children more time to integrate self-protection skills into their cognitive repertoires. Earlier research, however, had indicated that both brief and longer-term programs could be effective, with knowledge gains being maintained (effect size = 0.47) up to a year after program delivery (Heidotting, Keiffer, & Soled, 1995). Program content, participants' age, and socioeconomic status were found to be the significant factors influencing program effectiveness (Rispen, Aleman, & Goudena, 1997).

Despite these findings, there was lack of evidence regarding students' transfer of knowledge and skill gains into real life situations,



with Bolen and Scannapieco (1999) concluding that there was little evidence that programs actually reduced child sexual abuse. As a rebuttal, Finkelhor (2007) reported on over a decade of national U.S.-substantiated child sexual abuse cases up to 2004, indicating a reduction in incidence of child sexual abuse since the implementation of sexual abuse prevention programs. The authors, however, were tentative in making a causal link between prevention programs and the apparent decline in child sexual abuse. Indeed, changes in incidence figures can be more a reflection of changes in policy than actual change in the prevalence of abuse.

In summary, while schools are well situated for teaching children self-protective knowledge and skills and for responding to disclosures of abuse, significant systemic hurdles exist. These include the nature of the school context in which the programs are delivered, levels of parental involvement, clarity of program aims, school and teacher motivation, and teacher skill levels in teaching abuse prevention programs and responding to disclosures. Appropriate training for teachers and schools in the delivery of programs is a key issue (Barron & Topping, in press-a).

Literature Review and Meta-Analysis

Methods

A systematic literature review and meta-analysis were conducted on efficacy studies of school-based child sexual abuse prevention programs over a 12-year period between 1990 and 2002. Computerized bibliographic searches of the Educational Resources Information Centre (ERIC) and the Social Science Citation Index utilized both general and advanced searches. Inclusion criteria included the following: programs designed to prevent child sexual abuse, evaluations with a formal structure and specified outcomes to be assessed, target population representative of the whole school

population, and publications in English. We did not include studies that exclusively focused on preschool children or students with disabilities, or that solely reported parents' and teachers' experiences. There were 22 efficacy studies that met the inclusion criteria. Their methodology was analyzed through four dimensions (target population, prevention program implementation, evaluation methodology, and cost-effectiveness), and outcomes for students were analyzed using nine categories (knowledge, skills, emotion, perception of risk, touch discrimination, reported response to actual threat/abuse, disclosure, negative effects, and maintenance of gains).

Results

Despite the diversity of participants, small sample sizes, differing study designs, variations in measurement tools, and types of intervention, nearly all the studies reviewed found a small but statistically significant knowledge gain. Interestingly, students displayed high levels of prior knowledge of abuse prevention concepts, although the researchers were uncertain about how such knowledge had been obtained. Most of the studies used pencil and paper tests to assess skill acquisition, although the psychometric properties of these tests were largely unknown.

Just over a third of the studies reported emotional gains for participants who participated in a prevention program. These gains tended to be reported as percentages of children's responses or adult observations of a child. The studies used few formal measures, such as an anxiety inventory, self-esteem inventory, or locus of control scale. There were few qualitative studies that sought to explore children's subjective experiences of such programs, and only a small number of studies looked at the participants' perceptions of risk. The results were mixed and, as such, inconclusive. Different methodology and evaluation measures were used in the studies included in the review, which made it difficult to make comparisons among them.

Just over a third of the included studies reported disclosure rates. Many gave overall disclosure rates rather than separate figures for the experimental and control groups, or they reported that disclosures had occurred but gave no figures (Dhooper & Schneider, 1995). For those studies that did indicate the difference, children who experienced prevention programs reported higher disclosure rates. Such disclosures were reportedly characterized by an absence of false allegations (Oldfield, Hays, & Megal, 1996). Hazzard, Kleemeier, & Webb (1990) found that there was little difference in the disclosure rate regardless of whether the program was presented by a teacher or an outside expert consultant. Teacher presenters, however, were required to be well trained.

Just over half the studies maintained data collection on the effects of prevention programs over periods that ranged from 6 weeks to the time students transferred to high school (at age 13 years). Some studies showed that knowledge gains were maintained at 2, 3, and 5 months after the program had been completed (Jacobs & Hashima,

1995; Oldfield et al., 1996; Taal & Edelaar, 1997; Warden, Moran, Gillies, Mayes, & MacLeod, 1997; MacIntyre & Carr, 1999a). By contrast, Warden and colleagues (1997) found that unrehearsed knowledge gains tended to be lost between 2 and 3 months postprogram, while in the study conducted by Herbert, Lavoie, Piche, and Poitras (2001), skills decayed at 2 months, yet they were still at higher levels than demonstrated on the pretest.

Over half the studies reported a range of negative experiences for a small number of children who had participated in a program. There was no evidence to suggest that the anxiety experienced by some children was overwhelming. It was unclear whether the reported anxiety was a result of the program, the evaluation measures, or the methodological limitations of the studies. Some authors went on to suggest that a degree of anxiety was helpful, as this may have helped some children to be more alert to the risk of child sexual abuse (Herbert et al., 2001). Casper (1999) explored and addressed the positive outcomes for children from these programs. Older children with lower anxiety and an internal locus of control were positively associated with higher scores following a prevention program. Children who were younger and who felt more anxious, however, were more likely to report that the abuse prevention program enabled them to "learn what to do if touched inappropriately." However, the research into child characteristics has been minimal and narrow in focus.

Discussion

Self-protection knowledge Evidence suggests that the strength of school-based sexual abuse prevention programs lies in their capacity to increase children's knowledge and possibly their skills in relation to avoiding child sexual abuse. Because children come into programs with surprisingly high levels of prior knowledge, gains from these prevention programs are small on average (Tutty, 1994). The amount of prior learning tends to vary with the socioeconomic status of parents (Briggs & Hawkins, 1994a). To fine tune programs for children's learning needs, schools will need first to assess children's prior knowledge. Schools in areas of environmental deprivation may need more comprehensive programs utilizing training for parents (MacIntyre & Carr, 1999a).

How best to adapt programs across the age range will be a challenge for schools. For example, Conte, Rosen, Saperstein, and Shermack (1985) noted that although older children can learn abstract ideas, younger children need concrete concepts with visual cues. Barnett, Manley, and Ciccetti (1993) warned against delivering the curriculum on the erroneous assumption that a child's chronological and developmental age is always consistent. Further, the family's degree of acceptance of the concepts being taught can also affect understanding and retention for some children (Briggs, 1991; Tutty, 1994, 1997, 2000). Two concepts were difficult for children across the age range to grasp; the first is why perpetrators abuse (Pohl & Hazard, 1990), and the second is that trusted

adults, including family members, can be abusers (Tutty, 1992). In considering what content should be taught to children of different ages, schools will need to evaluate whether programs are developmentally and culturally appropriate for students targeted to receive the program, with particular attention paid to concepts that are more difficult to understand.

Self-protection skills While gaining self-protection knowledge is seen as a necessary prerequisite to action, it is not sufficient to keep children safe (Cormack, Johnson, Peters, & Williams, 1998; Briggs & Hawkins, 1994a). Some researchers refer to an attitude/behavior discrepancy, in which children's reports of behavioral intentions to protect themselves do not always fit with their behavior in an actual situation (MacIntyre & Carr, 1999a). However a national study (Finkelhor, Asdigian, & Dzuiba-Leatherman, 1995) indicated that children who had experienced an abuse prevention program were more likely to use the self-protective strategies than children who had not participated in a program. The former group members were also more confident about their strategies. Although there is little research to indicate that self-protective strategies reduce the likelihood of sexual abuse, evidence does exist to suggest that children who have experienced prevention programs do disclose abuse earlier (Gibson & Leitenberg, 2000).

Kolko (1988) broadened the debate over how to teach skills by observing that many of the skills taught in programs are the same as those taught in social education lessons (communication, self esteem, assertiveness, conflict resolution, etc.). A challenge yet to be addressed by research is whether there is a need to teach abuse prevention skills specifically, or whether it will be sufficient to teach children communication skills with advice about how to tell and keep on telling trusted adults about uncomfortable, threatening, and/or abusive experiences. In the absence of evidence supporting the effectiveness of social education lessons, schools are advised to implement evidence-based abuse prevention programs.

Effect sizes It was possible to calculate effect sizes for 11 out of the 22 studies that focused on knowledge and skill gains. Effect sizes were diverse, ranging from 0.14 to 1.40 (small to large effect size). For the 5,812 participants, the mean effect size equalled 0.61, a moderate effect size (Cohen, 1977). In other words, immediately after the completion of the prevention program, children made modest average gains in knowledge and perceived skills.

Researchers identified effective programs by selecting those programs with moderate- to high-effect sizes, i.e., four or more gains in outcome measures (knowledge, skills, emotion, disclosure, and maintenance). These "effective" programs were characterized by a combination of participants seeing how to respond in abusive situations (modeling), talking about and reflecting on what had been seen (discussion) and skills rehearsal (role-playing). Effective programs averaged above five sessions. Because these programs were led by teachers, trained volunteers, mental health professionals, social service staff members, a theater group, and female community workers, it appears that the programs can be delivered effectively by a range of personnel.



Maintenance of gains Follow-up studies suggested another strength of school-based prevention programs; the acquired skills were maintained as long as a year even after a program of only short duration (Briggs & Hawkins, 1994a; Hazzard, Webb, Kleemeier, Angert, & Pohl, 1991). Active involvement of parents and teachers, both during and following the program, can also lead to knowledge and skill gains (MacIntyre & Carr, 1999a; Briggs & Hawkins, 1994b; Hazzard et al., 1991). Casper (1999) reported that participants who received multiple exposures to programs learned significantly more, even when the last exposure had been 3 years earlier, and recommended that children participate in repeated abuse prevention programs. Likewise, booster sessions were found to enhance learning (Tutty, 1997; Briggs & Hawkins, 1994a; Hazzard et al., 1991). Some concepts, however, are more difficult to retain than others, especially "abuse by someone you know" (Plummer, 1984).

Disclosure of significant harm One of the strengths of these programs is their capacity to enable children to share their stories of harm. MacMillan and others (1994) argue that abuse disclosure is the most valid and reliable measure of program success. Most studies to date show that school-based programs lead to small numbers of disclosures, compared with the extent of abuse indicated by prevalence statistics gleaned from the degree to which adults disclose sexual abuse that occurred during their own childhoods.

A recent study suggests that programs may well have the capacity to enable disclosures to levels closer to prevalence statistics. Barron and Topping (in press-b) found that an effective program could lead to a large number and wide diversity of disclosures of significant harm, with such disclosures made confidentially to a survivor help line after the completion of program lessons. Only a small number of previous studies would support the generalization of disclosure beyond program lessons. (MacIntyre & Carr, 1999b; Finkelhor et al., 1995). Barron and Topping concluded that schools need to expect disclosures and be prepared to respond in a variety of ways, including individual support, group work, and where necessary, child protection referrals. A barrier to this was lack of recognition by teachers of disclosures that occurred in the classroom.

A number of studies have sought to clarify factors affecting disclosure, i.e., adult support and belief (Lawson & Chaffin, 1992), the seriousness of the abuse and the relationship to the abuser (Farrell, 1988), and the developmental level of the victim (Hollinger, 1987).

Emotional gains and consequences Children, on the whole, report their experience of abuse prevention programs as positive, and they report emotional gains, such as increased confidence and self-esteem, at the end of programs. For a small number of children, programs seem to generate anxiety (Finkelhor & Dzuiba-Leatherman, 1995; Pohl & Hazzard, 1990; Tutty, 1997). These feelings are mostly mild in nature and of short duration (Binder & McNeil, 1987; Garbarino, 1987; Wurtele, Mars & Miller-Perrin, 1987) and have failed to reach levels of statistical significance (Hazzard et al., 1991; Oldfield et al., 1996). The positive role of anxiety in promoting self-protective behavior has yet to be explored. As a consequence, schools will need to be attentive to children's emotional response to programs, both positive and negative. Some children may need more support to talk about their feelings and deal with their anxiety (Finkelhor & Dzuiba-Leatherman, 1995; Herbert et al., 2001; Pohl & Hazzard, 1990; Herbert et al., 2001). It is important to recognize, however, that some anxiety may be a normal reaction to content and a motivator for change. Further, there is much still to be discovered about the interaction among children's personal characteristics, their reactions (positive or negative) to abuse prevention programs, and the outcomes following programs.

Outcomes for teachers and parents A small number of the reviewed studies also included evidence regarding teachers' outcomes from abuse prevention programs. Early indications suggest that following the delivery of programs, teachers can develop their knowledge, and their attitudes and feelings of comfort may shift in a positive direction (MacIntyre & Carr, 1999a; Pohl & Hazzard, 1990; Madak & Berg, 1992; Sylvester, 1996). Schools need to recognize that teachers may need the opportunity to explore their beliefs and feelings in order to deliver programs effectively. Teachers also need explicit guidance and support to continue the implementation of programs from year to year. Barron and Topping (in press-b) identified the need for schools to train teachers in a prevention mindset, i.e., to maintain disclosure as the primary goal, to expect disclosures, to recognize disclosures as they occur, to receive disclosures in an affirming manner, and move to appropriate action following the disclosure.

Although parental involvement was described as important in the effectiveness of programs, there was little evidence to back up such an assertion. Limited data on outcomes for parents suggest that programs lead to gains in child protection knowledge and safety skills for parents (Finkelhor & Strapko, 1992). Further, programs were found to create a context for communication between children and their parents on a topic that is often difficult to discuss (MacIntyre & Carr, 1999a; Pohl & Hazzard, 1990; Herbert et al., 2001). Prior to program delivery, a small number of parents expressed anxiety about some of the program content, as well as concern for their child's reaction. After children experience a program, their parents are generally positive (Tutty, 1997). Moreover, parents who attend abuse prevention workshops are more likely to be supportive when their child discloses (Briggs & Hawkins, 1994a, 1994b).

Challenges for schools include enabling parents to attend briefing and training sessions, dealing with parents' anticipatory anxiety, working collaboratively with parents by encouraging helpful parental advice and support, and enabling children to share the content and experience of the program with their parents. When such support is provided, there is some evidence to suggest parents can effectively support and teach personal safety (Burgess & Wurtele, 1998). However, responding appropriately to children's disclosures of intrafamilial abuse and effectively managing parent/school communication is a major challenge for schools and child protection agencies. Schools need to address teachers' lack of knowledge and training about abuse; to help teachers manage their emotional responses, and particularly their fear of disclosure and the potential for litigation following the passing on of information (MacIntyre, 1987, 1990); and to ensure that staff members pass on accurate information to parents (Chen, Dunn, & Han, 2007). School managers influence whether teachers respond by providing clear guidance, support, and encouragement to report abuse (Trudell & Whatley, 1988).

Recent studies Over the past decade, efficacy studies of individual abuse prevention programs have been largely absent from the literature. While a number of authors have sought to review the efficacy literature (Greytak, 2003, Adair, 2006; Zwi, Woolfenden, Wheeler, O'Brien, Tait, & Williams, 2007), outcome evaluation of specific programs has occurred primarily in countries where programs are being delivered for the first time (del Campo & Lopez, 2006). It is interesting that computer-assisted sex abuse prevention programs are being evaluated with some promising results for knowledge, if not attitude gains (Bae & Panuncio, 2009; Yom & Eum, 2005). A recent U.K. study (Barron & Topping, in press-a) highlighted that the way programs are taught may be as significant as what is taught. The authors concluded that teachers and other presenters need to have a thorough knowledge of child abuse and child protection, as well as the capacity to apply child-centered communication within program protocols.

While the review involved an in-depth analysis of the direct effects for children from prevention programs, the broader impact of these programs still needs to be explored in a systematic and thorough manner. Schools need to be attentive to a wider range of benefits, which may include the following: children experiencing a more physically and emotionally safe environment (Weist et al., 2009; Wekerle & Wolfe, 1999); awareness raising for parents, teachers, and the larger community; improving the professional response to suspicion and disclosure of abuse (Finkelhor & Daro, 1997); and addressing the consequences of disclosure for children (Finkelhor, 2007). This seems to fit with Wurtele (1999), who argued for programs to be embedded within a public health approach with a focus on environmental and social change.

Conclusions

Despite the methodological limitations of efficacy studies, it appears that schools provide a cost-effective way of delivering abuse prevention programs to the entire child population. Evidence suggests that school-based child sexual abuse prevention programs not only increase children's self-protective knowledge but may also enable a significant proportion of children to disclose a wide range of abuses during abuse prevention lessons. The disclosure of child sexual abuse, however, may be more likely to occur in private to a trusted person or within a confidential context, e.g., survivor helpline. Emotionally, children, on average, report enjoying the programs, benefitting from increases in self-confidence, and feeling less self-blame (Finkelhor, 2009). A small proportion of children experience mild anxiety, but this may actually help to motivate self-protective behaviors. Program effectiveness may relate to how closely teachers follow program guidelines. Despite the above findings, no studies make the connection between program effectiveness and children's actual safety. As such, it is suggested that adult responsiveness is paramount in listening to, believing, and acting to keep safe our children. Prevention programs may be one way of mobilizing such action (Finkelhor, 2009). A range of recommendations for future practice based on the evidence from the current review follows.

Recommendations for Teachers and Practitioners

Effective school-based sex abuse prevention programs need to:

1. Be delivered within a supportive school context
2. Have evaluation of effectiveness built in
3. Incorporate modeling, discussion, and skills rehearsal
4. Be at least four to five lessons long
5. Include booster sessions
6. Have the capacity to be delivered by a range of personnel
7. Involve active parental involvement
8. Assess children's prior knowledge
9. Be developmentally appropriate with concrete concepts and visual aids for younger children
10. Pay particular attention to difficult-to-understand concepts
11. Be observant of children's emotional reactions and provide support as necessary
12. Provide training for teachers that takes into account their attitudes, gives them opportunity to explore their concerns about delivering prevention programs, and enables them to notice and respond appropriately to disclosures.

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