14. Child maltreatment

Child maltreatment is an important public health problem worldwide.440 The 2003 Canadian incidence study of reported child abuse and neglect estimated an incidence rate of 22 per thousand for child maltreatment.441 Of reported cases, 15% involved emotional maltreatment, 28% involved exposure to domestic violence, 24% involved physical abuse, 30% involved neglect and 3% involved sexual abuse. Surveys conducted with nonrepresentative ethnic minority samples (which have likely included immigrants and refugees) have yielded higher rates of maltreatment than appear in official reports.442 This review was undertaken to clarify reports of child maltreatment in ethnic communities, to determine whether existing tools to screen for child maltreatment are appropriate for immigrant and refugee children, and to recommend strategies to improve the quality of care for these populations. The recommendations of the Canadian Collaboration for Immigrant and Refugee Health related to child maltreatment are outlined in Box 14A.

Methods

We used the 14-step approach developed by the Canadian Collaboration for Immigrant and Refugee Health¹⁶ (summarized in section 3 of this article, above). We considered the epidemiology of child maltreatment in immigrant populations and defined clinical preventive actions (interventions), outcomes and key clinical questions. We searched MEDLINE, Embase CINAHL, PsychLIT, the Cochrane Library and other sources from Jan. 1, 1995, to Dec. 31, 2010. Detailed methods, search terms, case studies and clinical considerations can be found in the complete evidence review for child maltreatment (Appendix 12, available at www.cmaj.ca/lookup/suppl/doi:10.1503 /cmaj.090313/-/DC1).

Results

We found no systematic reviews or guidelines on screening, prevention or treatment for child maltreatment in recently settled immigrants or refugees. The general literature search identified 180 titles with reference to child maltreatment. Seventeen citations were selected, and five key reviews retained as evidence.⁴⁴³⁻⁴⁴⁷ Studies conducted with general population and ethnic minority samples provided additional evidence that informed our recommendations related to child maltreatment among immigrants and refugees.

What is the burden of child maltreatment in immigrant populations?

The prevalence and incidence of child maltreatment among immigrant and/or refugee children in Canada are unknown. The evidence on maltreatment among ethnic minority children in the United States and Canada suggests that some ethnic minority children are disproportionately over- and under-represented in child protection services.⁴⁴⁸ These children are more likely to be screened for child maltreatment and also more likely to be reported to child protection services. Higher rates of screening result in a higher rate of

Box 14A: Recommendations from the Canadian Collaboration for Immigrant and Refugee Health: child maltreatment

Screening

Do not conduct routine screening for child maltreatment.

Be alert for signs and symptoms of child maltreatment during physical and mental examinations, and assess further when reasonable doubt exists or after patient disclosure.

Basis of recommendations

Balance of benefits and harms

The committee recommends against routine screening because of poor performance of screening instruments and the potential harms caused by the very high false-positive rates. Sensitivity ranged between 25% and 100%, specificity between 16.5% and 94.3%, and positive predictive value (when available) between 1.7% and 28.2%.

Quality of evidence

Low

Values and preferences

The committee attributed more value to evidence for the negative effects of screening in relation to the high potential for harms. Harms could result from false positives leading to inappropriate labelling, psychological distress, inappropriate family separation, impaired clinician–patient rapport, potential reduction in use of general medical services and legal ramifications associated with involvement of child protection services.

Prevention of child maltreatment and associated outcomes

A home visitation program encompassing the first two years of life should be offered to immigrant and refugee mothers living in high-risk conditions, including teenage motherhood, single parent status, social isolation, low socioeconomic status, or living with mental health or drug abuse problems.

Basis of recommendation

Balance of benefits and harms

Home visitation programs for high-risk mothers, provided by nurses, reduced days in hospital for children (p < 0.001). Harms from surveillance and reporting to child protection services were not clearly demonstrated.

Quality of evidence

Moderate

Values and preferences

The committee attributed more value to supporting high-risk mothers with an offer of a home visitation program to provide practical support for families and the program's potential to improve health outcomes for children than to the potential risks associated with increased reporting to child protection services. inappropriate referral to child protection services. Ethnic minority children who received medical examinations were twice as likely (p < 0.001) to be reported to child protection services.⁵⁵

The Canadian incidence study of reported child abuse and neglect⁴⁴¹ found that ethnic minority children had a 1.8 times greater likelihood to be over-represented, whereas white and Arab children were under-represented. The higher rates were found among Aboriginals, Blacks, Latinos and Asians (the latter group for only physical abuse). This racial bias⁴⁴⁹ may be one explanation why ethnic minority children are disproportionately represented at all levels of the child protection process,450-452 despite the fact that they do not seem to be at higher risk of maltreatment.453 Another explanation may be professionals' divergent views as to what should be considered grounds for clinical suspicion of child maltreatment,454 which is associated with recency of training in child abuse, prejudices about the perpetrator^{454,455} and the professionals' beliefs in the positive or negative consequences of reporting a given family to child protection services.454

Does screening for child maltreatment reduce harm and premature death or disability?

Screening tools

Most screening methods consist of self-administered questionnaires generally completed by the mother, interviews or checklists completed by the professional who collects information directly from the child or clinical judgments by nurse or professional teams.^{443,445} All screening methods attempt to predict child maltreatment on the basis of either parents' potential for maltreatment or the presence or level of risk factors associated with maltreatment, rather than on the occurrence of actual maltreatment. Three systematic reviews have reported that these instruments tend to have high sensitivity but poor specificity and false-positive rates too high for use in clinical settings.^{443–445} Sensitivity ranged between 25% and 100%, specificity between 16.5% and 94.3%, and positive predictive value (when available) between 1.7% and 28.2%.

Table 14A: Summary of findings for home visitation by nurses to prevent child maltreatment

Patient or population: Pregnant first-time mothers with at least one "sociodemographic risk characteristic" **Settings:** US clinic with free prenatal services and private obstetricians' offices;⁴⁵² US public system of obstetric care⁴⁵⁹ **Intervention:** Home visitation by nurses

Comparison: Usual care

Sources: MacMillan HL; Canadian Task Force on Preventive Health Care. Preventive health care, 2000 update: prevention of child maltreatment. *CMAJ* 2000;163:1451-8.⁴⁴⁴ Olds DL, Eckenrode J, Henderson CR Jr, et al. Long-term effects of home visitation on maternal life course and child abuse and neglect: fifteen-year follow-up of a randomized trial. *JAMA* 1997;278:637-43.⁴⁵⁹ Kitzman H, Olds DL, Henderson CR Jr, et al. Effect of prenatal and infancy home visitation by nurses on pregnancy outcomes, childhood injuries, and repeated childbearing: a randomized controlled trial. *JAMA* 1997;278:644-52.⁴⁶²

	Absolute effect					
Outcome	Risk for control group	Difference with home visitation by nurses (95% Cl)	Relative effect (95% Cl)	No. of participants (studies)	GRADE quality of evidence	Comments
Out-of-home placements (follow-up: 16 mo)	226 per 1000	31 more per 1000 (70 fewer to 201 more per 1000)	RR 1.14 (0.69–1.89)*†	197 (1)	Moderate‡§	NNT not statistically significant
Mean no. of substantiated reports of child abuse and neglect over 15 yr	0.54¶	0.25 fewer¶	0.77 (0.34–1.19)**	245 (1) ⁴⁶²	Moderate	NA
Mean no. of days in hospital for injuries and ingestions over 2 yr	0.16	0.13 fewer	NA	697 (1) ⁴⁶²	Moderate	p < 0.001
Mean no. of health care encounters for injuries and ingestions over 2 yr	0.55	0.12 fewer	NA	697 (1) ⁴⁶²	Low	p = 0.05

Note: CI = confidence interval; GRADE = Grading of Recommendations Assessment, Development and Evaluation; NA = not applicable; NNT = number needed to treat; RR = risk ratio.

*Calculated using http://statpages.org/ctab2x2.html.

†Because RR crosses 0 (i.e., not statistically significant), the NNT could not be estimated.

*Pregnant women with "specified psychosocial risk factors": substance abuse, homelessness, domestic violence, psychiatric illness, incarceration, HIV infection or lack of social support. §"When the recommendation is in favour of an intervention and the 95% confidence interval (or alternative estimate of precision) around the pooled or best

estimate of effect includes no effect and the upper confidence limit includes an effect that, if it were real, would represent a benefit that would outweigh the downsides" (GRADE Pro software).

¶Adjusted for socioeconomic status, marital status, maternal age, education, locus of control, support from husband or boyfriend, working status, and husband or boyfriend use of public assistance at registration.

**Estimate = (comparison log incidence) - (intervention log incidence).

Relative benefits and harms from screening

False-positive ratings, which are the most common result in low-risk populations, can lead to a number of negative consequences, such as inappropriate labelling and punitive attitudes, psychological distress,⁵⁶ inappropriate separation of children from family support systems, destruction of family supports, loss of resources and loss of autonomy for those falsely accused.⁴⁵⁶ This may leave parents wary of any subsequent assistance that may be offered,⁵⁶ thus reducing their access to care. A systematic review of the performance of screening tests concluded that adding a screening protocol to the clinical encounter yielded additional false-positives that exceeded additional abused children detected.⁴⁵⁷

Compared with the general population, immigrant and refugee families may be more likely to suffer from the direct and indirect harms related to screening. Screening instruments have not been culturally validated and are less likely to be accurate because of factors such as language barriers, different cultural norms of behaviours and different attitudes toward institutional authority.⁴⁵⁸ Given the limited state of knowledge in immigrant populations, potential harms from routine screening for child maltreatment outweigh benefits, which have not yet been clearly established.

Relative benefits and harms of preventing child maltreatment

Home visitation programs by nurses aim to prevent child

maltreatment by assessing and supporting families. To date, the 15-year longitudinal study by Olds and associates⁴⁵⁹ has provided the best evidence for the effectiveness of a nurse– family partnership program in reducing actual child maltreatment. The effectiveness of this program is particularly evident for first-time mothers who are younger than 19 years of age, single or economically disadvantaged (Table 14A).^{444,446,460,461} Another prevention program (the Early Start Program) has also shown efficacy in reducing hospital admissions for child injuries at 36 months (17.5% v. 26.3% for control group).⁴⁶³

Relative benefits and harms of treatment for child maltreatment

Several specific forms of intervention have been devised to reduce the consequences of child maltreatment. Traumafocused cognitive–behavioural therapy reduces sexually abused children's symptoms of anxiety, depression and sexual behaviour problems⁴⁶⁴ in both general population and ethnic minority children. Table 14B presents the outcomes of cognitive behavioural interventions.⁴⁴⁷ Parent–child interaction therapy⁴⁶⁵ showed a reduction in repeated reports of physical abuse in treatment relative to control groups (standard psychoeducational program) (19% v. 49%). In most other studies, the outcomes were not statistically significant but there was a consistent tendency in favour of treatment programs. The lack of evidence of efficacy for immigrant or

Table 14B: Summary of findings for cognitive-behavioural therapy for sexually abused children

Patient or population: Sexually abused children aged 2–18 yr

Settings: Unted States and Australia, communities and hospitals

Intervention: Cognitive–behavioural therapy for children

Comparison: Variable: group information-based approach, cognitive-behavioural therapy for parents and children, community control, wait-list control

Source: Macdonald G, Higgins JPT, Ramchandani P. Cognitive-behavioural interventions for children who have been sexually abused. *Cochrane Database Syst Rev* 2006;(4):CD001930.⁴⁴⁷

	Absolute effect, mean score				
Outcome	Risk for control group	Difference with cognitive– behavioural therapy (95% Cl)	Relative effect, % (95% Cl)	No. of participants (studies)	GRADE quality of evidence
Depression, by Child Depression Inventory	5.47*	1.8 lower (3.98 lower to 0.38 higher)	–33 (–73 to 7)	443 (5)	Moderate†
Anxiety, by various scales	27.76*	0.21 lower (0.40 to 0.02 lower)	-0.8 (-1.4 to -0.1)	456 (5)	High
Post-traumatic stress disorder, by various scales	2.32	0.43 lower (0.69 to 0.16 lower)	–19 (–0 to –7)	464 (6)	High
Sexualized behaviour	8.2	0.65 lower (3.53 lower to 2.24 higher)	-8 (-43 to 27)	451 (5)	Very low†‡
Externalizing behaviour	13.82	0.14 lower (0.44 lower to 0.15 higher)	–1 (–3 to 1)	560 (7)	Moderate§

Note: CI = confidence interval; GRADE = Grading of Recommendations Assessment, Development and Evaluation.

*Representative study chosen on basis of sample size.

+95% Cl includes no effect and the upper or lower confidence limit crosses the minimal important difference (MID), either for benefit or harm. (GRADE Pro software recommends that "if the MID is not known or the use of different outcomes measures required calculation of an effect size [ES], we suggest downgrading if the upper or lower confidence limit crosses an effect size of 0.5 in either direction.")

 \pm Test for heterogeneity p = 0.02.

§Test for heterogeneity p = 0.01.

refugee children precludes extrapolation of the findings to these groups.

Clinical considerations

What are the potential implementation issues?

Some forms of child discipline may be unusual or outside Canadian social norms but are not pathological⁴⁶⁶ or dangerous for the child. Immigrant or refugee families may resort to other disciplinary behaviours (e.g., hitting a child with an object) that are condoned in their cultural context but that contravene child protection laws in Canada. Some cultural practices (e.g., scarification as part of life cycle rituals among some African children or cupping, a common traditional healing method in some Asian cultures that leaves circular ecchymoses) may be misinterpreted as signs of child abuse. Other culture-specific practices (e.g., female genital cutting) contravene child protection and civil laws in Canada. In situations where child maltreatment is suspected, observed or disclosed, the practitioner must take action in accordance with the child protection law in his or her region.

Language barriers, fear of separation from the child, fear of punitive institutional power and fear of deportation may constitute major barriers to disclosure of child maltreatment. Failure to investigate family dynamics and intergenerational conflicts, after disclosure of maltreatment by an immigrant child, may further disempower the parents and attribute greater power to the child, consequently aggravating his or her problem. Immigrant and refugee children placed in foster care may suffer from loss of connection with language of origin and religious, familial and cultural traditions. As a preventive strategy, clinicians may want to provide families with sources of information about their province's child protection law, their legal rights and their obligations regarding children, in addition to addressing other risk factors for child maltreatment. Recent research is showing that the SEEK (Safe Environment for Every Kid) model is promising.467

Recommendations of other groups

The US Preventive Services Task Force concluded that there is insufficient evidence for or against routine screening of child abuse.⁴⁵⁶ The Canadian Task Force on Preventive Health Care concluded that there is fair evidence to exclude screening for child maltreatment.79 The American Academy of Paediatrics468 and the American Medical Association469,470 do not support universal screening, but recommend that physicians be alert for signs and symptoms of child maltreatment during routine physical examination. The Task Force on Community Preventive Services of the US Centers for Disease Control and Prevention recommends early childhood home visitation for the prevention of child maltreatment in high-risk families and families with low-birth-weight infants.⁴⁷¹ Our recommendations highlight the importance of prevention and the potential harms of routine screening in the context of cultural and linguistic diversity.

Take-home messages

- Children from ethnic minorities, including recently settled immigrants and refugees, are eight times more likely to be subjected to screening for child maltreatment than children in the general population.
- Immigrant and refugee families may be particularly vulnerable to the harms that can occur because of legal and institutional interventions consequent to false-positive screening results, such as over-reporting for child maltreatment and unnecessary separation of the child from his or her family.

For the complete evidence review for child maltreatment in immigrant populations, see Appendix 12, available at www .cmaj.ca/lookup/suppl/doi:10.1503/cmaj.090313/-/DC1.

More detailed information and resources on cultural aspects of child maltreatment can be found at: www.mmhrc.ca.