

FAMILY VIOLENCE AND THE NEED FOR PREVENTION RESEARCH IN FIRST NATIONS, INUIT, AND MÉTIS COMMUNITIES¹

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ABSTRACT

Existing sources produce widely varying estimates of family violence in First Nations, Inuit, and Métis communities; taken together, they imply a convincing if poorly quantified higher risk of family violence in Aboriginal communities, with the greater burden borne by women. With the accelerating HIV epidemic in some Aboriginal communities, prevention of domestic violence takes on even greater urgency. Five planks in a prevention research platform include: training emerging researchers from all Aboriginal groups to promote culturally specific research; systematic review of unpublished and published knowledge of interventions that reduce domestic violence; intervention theory development specific to each community; attention to the particular ethical issues; and methods development focused on interventions.

FAMILY VIOLENCE AS A PUBLIC HEALTH CRISIS

In the very moment of violence, the emergency is self-evident. The victim of family violence may be in a life threatening situation, in urgent need of intervention. Where the violence is not halted in time – and once begun

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it is seldom halted — at least one human being is turned into a victim and another into a perpetrator.

This is the real emergency: the relentless accumulation of victims and perpetrators whose relationship to each other and to others around them is altered forever. The very act of family violence is dreadful; it is dehumanizing. The effect of this violence in the genesis of more violence could be one of the major public health crises of our time.

Domestic violence, also referred to as family violence, includes all forms of violence directed against someone on the basis of their residence or family ties. It includes the physical dimension implicit in domestic abuse, spousal abuse, child abuse, elder abuse, intimate partner violence, and other violent acts between family members. The majority of cases affect women (Renzetti, 2000; García-Moreno et al., 2005) to such an extent that the United Nations Population Fund has described domestic violence as “the ultimate manifestation of unequal relations between men and women” (UNPFA, 2006).

However, it goes beyond women and it goes beyond the physical dimension to include the *mental health consequences* of coercion of any kind, irrespective of whether this is acceptable in contemporary perspectives of the culture. Domestic violence includes nonsexual physical abuse, emotional abuse, verbal abuse, economic abuse, and psychological abuse. A growing body of literature shows that family violence may be exacerbated by stress from cultural isolation, redefinition of gender roles, financial constraints, lack of stable housing, and threats and discrimination experienced by minorities (Champion et al., 2001; Saylor and Daliparthi, 2005; Bandyopadhyay and Thomas, 2002; McKeown et al., 2004; Visandjée et al., 2007; Raj and Silverman, 2002). The same factors reduce the likelihood that victims will receive appropriate care.

The link between domestic violence and mental health is neither simple nor unidirectional. Most perpetrators have themselves been victims of domestic violence, indicating a pernicious and self-perpetuating cycle involving domestic violence and its attendant mental health problems. Domestic violence has been linked with several mental illnesses including posttraumatic stress disorder, depression, substance abuse, and suicidal ideation (Roberts et al., 1998; Ullman et al., 2005; Afifi et al., 2008; Silver et al., 2005). It also reduces the ability to implement healthy choices, with implications for a wide range of health and health care issues (Plichta, 2007).

Substance use disorders are a frequent, but by no means invariable, risk factor for domestic violence as an isolated issue (El-Bassel et al., 2004; El-

Bassel et al., 2005; Wechsberg et al., 2005) and in conjunction with other issues (Wenzel et al., 2004; Ellickson et al., 2005). Illicit drug use is often a maladaptive mechanism to deal with depression (Miller, 1999). Drug use impairs judgement, suppresses painful memories, increases impulsiveness, and uses up financial resources needed for other priorities. These factors can increase the risk of gender violence. A USA based study found people who reported unwanted sex in childhood were more likely to have problems with alcohol and drug use, receive money or drugs in exchange for sex, to have unwanted sex, and to use mental health services (National Institute of Mental Health [NIMH], 2001).

HOW COMMON IS FAMILY VIOLENCE IN FIRST NATIONS, INUIT AND MÉTIS COMMUNITIES?

In almost every setting worldwide, estimating family violence through police reports is unreliable and misleading. Household surveys and personal interviews can be just as difficult to interpret. In preparing for a national audit of violence against women in a south Asian country, we found that disclosure could be doubled or trebled by greater attention to interviewer selection and training (Andersson et al., 2009). This huge dependence of the measured rates of family violence on such factors lends itself to massive variations in estimates from different sources.

RELATIVE OCCURRENCE ESTIMATES

Other than being too widespread, we do not know just how common domestic violence is in First Nations, Inuit, and Métis communities in Canada. Since the base information is likely to be unsound, the more reputable sources tend to report *relative* frequencies: for example, five times more or 25% more among Aboriginal women than in the general population. Even among those estimates, with a large degree of recycling as one source quotes another that quotes another, the figures from different sources vary dramatically. A major source of variation is whether the authors adjust the relative estimate to take into account other differences (for example, urban/rural residence).

In the late 1980s, the Ontario Native Women's Association (ONWA) reported that Aboriginal women were *eight times more likely* (not adjusted) to suffer abuse than non-Aboriginal women (ONWA, 1989). Based on 15 abused and 76 nonabused Aboriginal women receiving prenatal services in Saskatoon in 1993–4, Muhajarine and D'Arcy reported a nearly *three-fold*

Table 1. Published Estimates of Family Violence in First Nation, Inuit, and Métis Communities

<i>Author, Year</i>	<i>Aboriginal Groups and Place</i>	<i>Type of Study/Size</i>	<i>Type of Violence</i>	<i>Frequency of Occurrence and Relative Frequency</i>
ONWA, 1989	Ontario First Nations and Métis women on reserve, in urban, rural/isolated, status/non-status	104 Aboriginal women completed a self-administered questionnaire. Included consultation with community care and health professionals by telephone (127) and personal interviews (40).	Mental, emotional, physical, and sexual abuse	<ul style="list-style-type: none"> • 80% Aboriginal women had experienced family violence. • Aboriginal women were <i>eight times more likely</i> to suffer abuse than non-Aboriginal women
Correctional Service of Canada, 1990	Aboriginal women in Canadian prison system	Two Aboriginal women who had been through the Canadian prison system conducted interviews with 39 Aboriginal women.	Physical and sexual abuse, childhood violence, and witnessing abuse.	<ul style="list-style-type: none"> • 90% of Aboriginal women reported physical abuse compared with 61% of non-Aboriginal women. • 61% of Aboriginal women reported sexual abuse, compared with 50% of the non-Aboriginal women. • 69% (27/39) Aboriginal women reported experiences of childhood violence, rape, regular sexual abuse, the witnessing of a murder, watching their mothers repeatedly beaten, and beatings in juvenile detention centres at the hands of staff and other children.
Amnesty International, 2004 reporting INAC, 1996	North American Indian (First Nations), Métis or Inuit	1996 Census. 799,010 individuals aged 25-44 reported as North American Indian, Métis or Inuit, about 3% of total population	Death from violence	<ul style="list-style-type: none"> • Aboriginal women were <i>five times more likely</i> than other Canadian women of the same age to die of violence.
Muhajarine and D'Arcy, 1999	Saskatoon First Nations and Métis women	Interviews with 728 women receiving prenatal services (91 or 16.8% Aboriginal)	Physical abuse	<ul style="list-style-type: none"> • 16.5% (15/91) Aboriginal women were abused • Aboriginal women were <i>2.8 times</i> (95% CI 1.0-7.8) more likely than non-Aboriginal women to have suffered abuse, after adjusting for partner drinking, perceived stress, and lower social support
Heaman, 2005	Aboriginal women delivering in Winnipeg 1999-2000	Interviews with 680 women (38% Aboriginal)	Physical abuse	<ul style="list-style-type: none"> • 18% (46/256) of Aboriginal women reported abuse during pregnancy • Aboriginal women were <i>4.1 times</i> more likely than non-Aboriginal women to experience physical abuse in the year of pregnancy.

<i>Author, Year</i>	<i>Aboriginal Groups and Place</i>	<i>Type of Study/Size</i>	<i>Type of Violence</i>	<i>Frequency of Occurrence and Relative Frequency</i>
Canadian Centre for Justice Statistics, 2001b	Aboriginal women and men (First Nations, Inuit and Métis) (excludes NWT, Yukon, or Nunavut)	General Social Survey including a sample size of 25,876. Aboriginal people made up 2% aged 15+	Emotional abuse	<ul style="list-style-type: none"> • 37% of Aboriginal women and 30% of Aboriginal men reported experiencing emotional abuse over a five-year period. • 57% of the Aboriginal women who experienced abuse indicated that children witnessed the assaults against them.
Janssen et al., 2003	First Nations women in Vancouver	Nurses interviewed 4750 women who gave birth in 1999–2000; 2.4% (112) were First Nations	Physical violence, fear of violence, pregnancy	<ul style="list-style-type: none"> • 17.9% (20/112) of First Nations women reported violence during pregnancy. • A First Nation woman was 14.6 times 95%CI 9.5–24.8 (unadjusted) more likely to report violence in pregnancy compared with other women.
AFN–CPNP, 2003	First Nations women in 85 reserves including the Yukon and the NWT.	Cross sectional household survey by researcher from same community 2,523 mothers	Physical abuse, emotional/verbal abuse	<ul style="list-style-type: none"> • 22% (523/2359) reported domestic violence in the year prior to the interview. Of these, 59% (286/487) reported physical and 41% (201/487) reported emotional/verbal abuse. • 14% reported abuse during their latest pregnancy.
Canadian Centre for Justice Statistics, 2005	Aboriginal women (First Nations, Inuit, Métis) (excludes NWT, Yukon or Nunavut)	2004 GSS Survey. 25,000 sample, 2% Aboriginal.	Spousal violence	<ul style="list-style-type: none"> • 24% of Aboriginal women and 18% of Aboriginal men reported partner violence in 5 years up to 2004. • Aboriginal people were 3 times more likely to be victims of spousal violence (21% vs. 7%) and 3 times more likely to be the victims of spousal assault than non-Aboriginal women (24% vs. 7%)
Statistics Canada, 2006			Spousal violence, physical or sexual abuse	<ul style="list-style-type: none"> • 54% of Aboriginal women had experienced severe and potentially life threatening violence • Aboriginal women were more likely (54% vs. 37%) than non-Aboriginal women to experience this violence which included being beaten or choked, having had a gun or knife used against them, or being sexually assaulted.

Author, Year	Aboriginal Groups and Place	Type of Study/Size	Type of Violence	Frequency of Occurrence and Relative Frequency
			Reports to police, use of social services	Aboriginal women were more likely to contact police regarding spousal violence (50% vs. 35%) and more likely to use social services (55% vs. 46% non-Aboriginal).
			Homicide	<ul style="list-style-type: none"> • Aboriginal women were <i>eight times</i> more likely to be homicide victims than were non-Aboriginal women. • Aboriginal men had <i>38 times</i> more spousal homicide than did non-Aboriginal men.
Pearce et al., 2008	Aboriginal males and females in two BC urban centres Vancouver and Prince George.	Cohort study of 543 Aboriginal youth (52% male and 48% female) between 14 and 30 years of age who use injection and non-injection drugs. Interviewed between October 2003 and April 2005.	Drug use (smoking and injection), HIV risk, and sexual abuse.	<ul style="list-style-type: none"> • 68% (179/262) of women and 28% (79/281) of men reported sexual abuse at least once in their lifetime • Among those who reported sexual abuse, 69% were Aboriginal women and 31% were Aboriginal men. • Adjusting for sociodemographic variables, sexual abuse survivors were <i>twice as likely</i> to be HIV-positive compared to those who did not report any sexual abuse.

increased risk for Aboriginal women, after adjusting for partner drinking, perceived stress, and lower social support (Table 1). Some scholars would make the case that some of these factors are in fact part of the syndrome of historical trauma and social marginalization, so adjusting for these will underestimate the true difference between Aboriginal and non-Aboriginal groups.

Reporting relative frequencies assumes, usually correctly, that whatever rate is reported, the real rate is likely to be higher. There are many reasons for underreporting. The act of disclosure carries a risk to the victim, with possible retribution. If someone else can overhear their interview, this will reduce the likelihood that victims disclose. Or even if a survivor prefers not to think about the episode, they might decide to keep the information to themselves.

However, the approach assumes that the pressures not to disclose are the same in all social groups and whatever any differences will cancel out if reported in relative terms. There is no evidence to support this assumption.

It is quite likely that the pressures in tight-knit First Nation reserve communities are very different from urban non-Aboriginal settings. Historical trauma changes disclosure yet again. Abuse in childhood could affect it yet again.

ABSOLUTE ESTIMATES

Several sources have bravely published absolute rates of family violence (Table 1). For example, Statistics Canada, in 2006, reported that 54% of Aboriginal women had experienced severe and potentially life threatening violence (Statistics Canada, 2006). A year earlier, they reported that 24% of Aboriginal women and 18% of Aboriginal men said that they had suffered violence from a current or previous spouse or common-law partner in the five-year period up to 2004 (Statistics Canada, 2005). Studies involving small numbers of Aboriginal women reported physical abuse in pregnancy: 16.6% in Saskatoon (Muhajarine and D'Arcy, 1999), 17.9% in Vancouver (Janssen et al., 2003) and 18% in Winnipeg (Heaman, 2005).

Very few studies provide any estimate of sexual abuse among males in First Nations, Inuit and Métis communities. An exception was Pearce and colleagues (2008) who reported 28% (79/281) had been sexually abused at some point of their life.

There are some data available for nonphysical abuse. Some 37% of Aboriginal women and 30% of Aboriginal men reported experiencing emotional abuse (such as insults, jealousy, and the attempt to control and limit the activities and social relationships of one's partner) during the previous five-year period (Canadian Centre for Justice Statistics, 2001).

Children who witness violence in their family suffer long-term emotional and behavioural problems. Of the Aboriginal women who experienced abuse, 57% indicated that children witnessed the assaults against them (Canadian Centre for Justice Statistics, 2001). Aboriginal women were more likely than non-Aboriginal women to contact police regarding spousal violence and more likely to use social services. This could fit with more serious violence perpetrated against them (Statistics Canada, 2006), or it could be that all levels of violence are more common — or more reported.

THE AFN EVALUATION OF PRENATAL CARE 2003

The Assembly of First Nations evaluation of prenatal care provided insight into domestic violence in a sample of 85 First Nations, including the Yukon and the Northwest Territories (AFN-CPNP, 2003). Some 135 community-based researchers from all participating Bands received training and inter-

viewed all women in their communities who had given birth in the preceding three years.

The 2,523 mothers in the sample provided information on 2,819 pregnancies and children born in the preceding three years. The average age of respondents at interview was 27 years, the youngest being 14 years and the oldest 47 years. Most of the women interviewed (58%) were between 20 and 30 years of age and 12% were under the age of 20 years. Most respondents (80%) had just one child in the preceding three years; 28% of women were first-time mothers.

One in every five mothers reported suffering abuse in the year prior to being interviewed (22% 523/2359). Of these, 59% (286/487) reported suffering physical abuse while 41% (201/487) reported suffering emotional/verbal abuse. Some 14% of all respondents said they had been abused during their latest pregnancy. Table 2 shows multivariate models of abuse during pregnancy and smoking, alcohol use, street drugs, and premature birth. In all cases, the associations were independent of all other factors that could be taken into account in the analysis.

Interpretation of the study requires caution. There is ample literature on partner violence and adverse pregnancy outcomes (Bohn, 2002; Berenson et al., 1994; McFarlane et al., 1996; Janssen et al., 2003; Paredis-Solis et al., 2005; Heaman, 2005). Because it was a cross-sectional study, it is inappropriate to infer more about the relationship between domestic violence and

<i>Associated with Physical Abuse during Pregnancy</i>	<i>Odds Ratio Adjusted</i>	<i>95%CI Adjusted</i>	<i>Adjusted for Factors (taken into account in the multivariate model)</i>	<i>Source</i>
Smoking in pregnancy	1.69	1.22-2.35	seeing a doctor more than 10 times, education, civil status, alcohol and drug use during pregnancy and taking it easy at some stage in the pregnancy	Table 32
Drinking alcohol in pregnancy	1.83	1.32-2.54	receiving food coupons, partner support, education, smoking and drug use during pregnancy	Table 33
Use of street drugs	1.91	1.30-2.82	prenatal classes, supportive family during pregnancy, education, alcohol consumption during the pregnancy	Table 34
Premature delivery	2.27	1.43-3.59	discussions with elders (protective effect), diabetes, high blood pressure and low income	Table 44

Source: Assembly of First Nations, Prenatal Health and Nutrition Sub-Committee, The AFN-Canada Prenatal Nutrition Program Evaluation Report. AFN, Ottawa 22 April 2003.

smoking, drinking, and use of street drugs. In the case of premature birth, however, there is a very clear temporal relationship — the abuse was *during pregnancy* while the delivery was at the end of the pregnancy. There is a theoretical but unlikely possibility that women who had premature deliveries were more likely to remember or report abuse.

After taking account of the protective effect of discussions with elders, and the negative effects of diabetes, high blood pressure, and low income, the average First Nations woman who was *not* physically abused during pregnancy was more than twice as likely to have the pregnancy go to term, compared with First Nations women who did experience physical violence in pregnancy. If abuse of pregnant women could be eliminated, assuming there are no other determinants that explain the association, the rate of premature delivery in Canadian First Nations reserve communities would be reduced by 14 per thousand (from its current level of 100 per thousand) — after adjusting for those other factors that the study was able to take into account.

THE SOCIAL INFRASTRUCTURE OF DOMESTIC VIOLENCE

Historical trauma has been repeatedly linked to mental health, including substance abuse (Brave Heart and DeBruyn, 1998; Brave Heart, 2003; Cedar Project, 2008). The Indian residential schools had a well documented impact on Aboriginal communities, affecting not only those who attended these schools, but very often the rest of their communities — for generations to come. Separated from their parents, residential school survivors had weak or inappropriate models for parenting (Bombay et al., 2009); many of the “stolen generation” (<http://archives.cbc.ca/society/education/topics/692/>) themselves never learned important parenting skills.

The term “intergenerational trauma” describes “the effects of sexual and physical abuse that were passed on to the children, grandchildren and great-grandchildren of Aboriginal people who attended the residential school system” (Aboriginal Healing Foundation [AHF], 2006). Some authors see this aspect of family violence in Aboriginal communities as the reason conventional strategies have failed to reduce family violence (MacMillan et al., 2005).

Libby and colleagues (2008) examined the relationship between childhood abuse and later parenting outcomes in two American Indian tribes, specifically examining the roles of adult depression and substance use disorders. This study found that childhood sexual abuse was more prevalent for mothers than for fathers in both tribes. It also revealed that childhood

physical abuse was more prevalent than childhood sexual abuse. Social support played strong roles in the relationships with parenting outcomes (impairment and satisfaction). The experience of having a violent father or mother while growing up significantly increased the likelihood of parenting role impairment in both tribes. Lifetime substance use disorder was found to be a mediator of the relationship between childhood abuse and parenting role impairment in both tribes. "Findings suggested potential variables that could be the targets of interventions: concrete social support, attention to both fathers and mothers in their parenting roles, and substance abuse disorders."

More than half of Canada's Aboriginal population lives away from their communities of origin. Inuit recently moved away from their traditional lifestyle to one of 53 communities in the North, or to urban areas like Ottawa. One consequence for many is isolation from their "resilience of origin." In the community of origin, the resilience underlying primary prevention of mental health problems of First Nations and Inuit people is influenced by spirituality, family strength, elders, oral traditions, and support networks (Heavyrunner and Marshall, 2003). This collective sense of resilience goes beyond the standard definition of resilience as being "the capability of individuals to cope and flourish successfully in the face of significant adversity or risk" (Reid et al., 1996). Much of this collective sense may be lost when away from the community of origin and perhaps is necessary to reformulate the basis of prevention initiatives in more isolated individuals and fragmented families.

Migration from a reserve or northern community to cities often results in the fracture of kinship and peer bonds; migrants must navigate their new society, developing access to social support from newly truncated family units (Stewart et al., 2008; Spitzer et al., 2003). Women who move to their husbands' families often encounter acute isolation which enhances stress. Migration may also disrupt gender roles, opening space for renegotiation of gender norms (Dion and Dion, 2001; 2004; Talbani and Hasanali, 2000). Economic insecurity is a consistently reported association of gender violence (Conwill, 2007; Kalichman et al., 1998; Weinreb et al., 1999; Jewkes et al., 2006). Women may have certain advantages in a wage economy (Spitzer et al., 2003). The erosion of status and role as provider for the family in particular is associated with gender violence (VanderPlaats, 2007).

A study of the relationship between public policies and migrant health data found that a 21.6% reduction in social assistance payments resulted

in increased mental health problems and a rise in abuse against women (Steele et al., 2002). Migrant Aboriginal women, who are often isolated and lack extended family support, may wish to access formal support services as a way of preventing or dealing with gender violence. Emergency shelters and their attendant programs may not be culturally appropriate or linguistically accessible to Aboriginal women (Agnew, 1998; Shirdwadkar, 2004; Smith, 2004). Migrant women are less likely to report gender violence than nonmigrant women (Ahmad et al., 2005; Cohen and MacLean, 2003). This reluctance to report could be exacerbated among First Nations, Inuit, and Métis women, although there is no formal research on the subject.

Marginalization and discrimination put communities at risk of violence and the same factors deny victims protection of the welfare and justice system. Kate Rexe of the Native Women's Association of Canada writes in this issue about the 520 cases of missing and murdered First Nations, Inuit, and Métis women. She places these individual and community catastrophes within a spectrum of gender violence cases that includes family violence, illustrating how their occurrence signals a convergence of system breakdowns.

CHOICE DISABILITY AND GENERALIZATION OF THE HIV EPIDEMIC IN ABORIGINAL COMMUNITIES

Agency is an assessment of "what a person can do in line with his or her conception of the good" (Alkire, 2008). A mirror concept is that of choice disability, a term coined to describe the inability (through gender violence, fear of gender violence, or transactional sex) to implement HIV/AIDS prevention decisions (Andersson, 2006). *Agency* is relevant to this concept in both positive and negative senses. People who enjoy high levels of agency are engaged in actions that are congruent with their values. Where those values are informed by a culture of origin, translated through positive parenting, they are more likely to translate into a reduction of gender violence and its associated mental health and addictions. If agency is founded in negative values, a need to assert oneself, and a disdain for other people, it could perpetuate the cycle of gender violence, mental illness, and addictions.

With the exception of postexposure prophylaxis for reported rape, HIV prevention efforts do not specifically address those who might like to benefit from prevention, but do not have the power to make and to act on their decisions. The term *choice disabled* (Andersson, 2006) aptly describes the predicament of those who have survived forced sex, historical trauma, and

low self-esteem, living under the threat of violence, extreme economic disadvantage, or in other power gradients that restrict their choices. The choice disabled are at higher risk of HIV and other sexually transmitted infections because they cannot respond to common sense or to AIDS prevention advice; the same refractory relationship to prevention means they constitute a reservoir of infection.

Highlighting the desperate need for high quality evidence on this crucial issue, anecdotes that suggest an increasing role of gendered choice disability in Aboriginal communities are starting to accumulate. The type of violence implicit in nonmilitary resolution of colonial occupation in Canada could only have been accentuated by the residential school policy which, at a massive level, sought to acculturate First Nations, Inuit, and Métis children into the Canadian mainstream. "Reducing Aboriginal women's power and choice in their relationships and in other aspects of their lives is contributing to low self-esteem and poor health among Aboriginal women" (Neron and Roffey, 2003). Low self-esteem coupled with acts of sexual violence increase women's vulnerability and risk of HIV infection.

In the early years of the HIV epidemic in Canada, the virus affected primarily men who have sex with men and those who received blood and blood products. By contrast, women have accounted for about one-quarter of adult HIV diagnoses in each year since 2000. Compared with the general population, Aboriginal people who test positive for HIV are more likely to be female, under 30 and infected through injection drug use (Canadian Institute of Health research [CIHR], 2005).

A study among Aboriginal pregnant women in BC reported HIV prevalence rates approximately seven times higher than among non-Aboriginal pregnant participants (Forbes et al., 1997). By 2005, women represented nearly half of all positive HIV test results among Aboriginal peoples (47.3%) whereas in non-Aboriginal populations, approximately 20% of the positive test results were women (Public Health Agency of Canada [PHAC], 2006). In Saskatchewan, Aboriginal women aged 15–29 are reported to be the hardest hit group (Kyle, 2009), the same population segment as in southern Africa.

In the absence of any serious science on the issue, or even a response from the Public Health Agency of Canada about these possible trends, there is a risk that headline grabbing may replace serious science. The *Montreal Gazette* (20 August 2009) reported one medical officer in Saskatchewan who claimed that "HIV in this province will kill 15 to 30 percent [of the Aboriginal population]."

While perhaps resonating with the beliefs of many that a major if poorly quantified problem seems to be ignored, such overstatements detract from the actionable dimensions of the changing HIV epidemic in Aboriginal communities: (1) unprotected heterosexual sex is an increasingly important factor; (2) some people are choice disabled and cannot implement their prevention choices, and (3) domestic violence and the fear of violence are key elements — if not the main single element — in choice disability. These could be the central issues in the changing HIV epidemic in many Aboriginal communities.

PREVENTION RESEARCH NEEDS

Returning to the compelling imagery of family violence about to happen or in process, a first reaction would be that this must be stopped. Because it happens in the privacy of homes, there is seldom any mechanism for stopping the hand in mid strike. Almost all efforts are channelled into dealing with the result of the strike, at best trying to make sure it doesn't happen again. This tertiary prevention focuses on looking after the victims, punishing and hopefully rehabilitating the perpetrators.

No one would begrudge the meagre resources that go into this tertiary prevention. But it does not take any great insight to see that, if family violence is on the rise or if more of those affected seek help, the already sparse resources for tertiary prevention will be all the more inadequate. It makes sense to look for ways to move upstream, to reduce the number of people involved in any sort of family violence.

Moving upstream to reduce the flow has quite different research requirements. We have identified at least five specific needs that, together, constitute a prevention research agenda.

1. Culturally specific research skills

To go beyond simple description of the dimensions of the problem, domestic violence research must reach upstream into cultural origins, to the resilience that can be built upon to prevent violence. Much of this cultural content is simply not accessible to researchers from outside the culture. It makes more sense, and it is a lot simpler, to train researchers from each cultural group to lead their own research in violence prevention. Recruiting and training emerging researchers from diverse cultural contexts will promote culturally specific research. This singular, although not simple, restructuring of the research agenda — training researchers from each culture, rather than

trying to train Western researchers in intercultural methods (much as this is needed) — changes many ground rules, including the ethical concerns, of prevention research. It also increases its chances of success.

2. Evidence synthesis

One starting point for each cultural setting could be a systematic review of unpublished and published intervention studies to collate and synthesize international experience of prevention. The systematic review by Shea and colleagues in this special issue lists what is currently known about interventions that might reduce domestic violence in Aboriginal communities.

A particular exercise in knowledge synthesis focuses on contemporary theories about the range of modifiable, interpersonal, and often gender-specific dynamics (household, community, society) affecting this issue, and their relevance for primary prevention (Health Canada, 2004; Anthony, 1987). There is a considerable, if dispersed, international body of theory to draw upon. We have heard calls for integrative and theory-based prevention of gender violence across the lifespan (Committee on the Assessment of Family Violence Interventions, 1998; Dube et al., 2002; Ehrensaft et al., 2003; Riggs and O'Leary, 1989; Wolfe et al., 2003). Several authors have attempted to affect change with variables associated with negative early family experiences (Kumpfer and Alvarado, 2003; Schewe, 2002; Wolfe et al., 2003). In societies where women's roles are valued, where male violence is not esteemed, and where bonds between women offer sanctuary and support, the prevalence of gender-based violence (gender violence) is minimized (Brown, 1999). Several authors have contributed insights into the stress accompanying migration, for example, from reserve to city, and how this might be mitigated by recovery of identity (Kinnon, 1999; Hyman, 2001; Kasturirangan, 2008). Another promising prevention theme is spirituality (Wong et al., 2006; Phillips, 1998), underlining the need for the inclusion of culture in addition to any prevention research. There have also been advances in parenting research, with increasing use of high quality research to test interventions (Whittaker et al., 2006).

3. Local theory development

With the synthesis of existing methods and theories in hand, a related type of knowledge synthesis is needed for systematic documentation of traditional, local, and unwritten knowledge that might otherwise escape standard research tools. Cognitive mapping (Giles et al., 2007) has already served for

documenting relevance of traditional knowledge to gender violence prevention. This is presented in an article in this Special Issue. In the *Rebuilding from Resilience* project, cognitive mapping set the themes and terms for the baseline survey. Structuring the instruments on these community-generated concepts of resilience and prevention, the initial data can focus on local concepts and questions. The baseline survey results will feed into another all important local process: the development of theories of prevention. These can result in concrete prevention strategies, some aspects of which can be implemented without additional resources while others will require investment.

4. Ethical aspects

Research on prevention and the role of culture in prevention will inevitably deal with issues of spirituality and, in some settings, sacred knowledge. This requires particular handling, ideally through researchers from each cultural group doing their own culturally specific research. Whatever the cultural origin of the researchers, enquiries into domestic violence include certain risks. The very act of disclosure may involve emotional and sometimes physical risks for the respondent (Ellsberg and Heise, 2002). Psychological distress may be present prior to, during, or following the study. After absolute assurance of anonymity and confidentiality is provided, the order of questions, language, and method of termination of the interview may often make a difference to its psychological impact (Jewkes et al., 2000). Preludes may be introduced to facilitate transition between different sections of an interview schedule and to provide a rationale for further enquiry. Adequate sensitization, ongoing training and supervision of research staff are essential (Satyanarayana and Chandra, 2009). It is almost always necessary to guarantee the availability of trained counsellors, whose contacts will be shared with all interviewees, in the unlikely event that this is needed as a result of the interview.

5. Methods development emphasizing interventions

The search for these protective factors and the way they can be mobilized against gender violence requires new methods. *Sampling strategies* might need to evolve further in the direction of “snowball” and other respondent-defined sampling approaches for urban settings, where Aboriginal communities may not be concentrated in a single area. It is also necessary to *develop questionnaires and interview guides* to identify the operational content of potential resilience factors, allowing for the specific needs of each

group. A special area of focus is the development of tools for researching the *role of spirituality* in primary prevention of gender violence. The mechanisms for *generating the preventive interventions* in the community of origin will require considerable innovation, but will likely combine key informant interviews, focus groups, talking circles, and other techniques like cognitive mapping. Cultural safety should be an overriding concern in domestic violence prevention research; the article in this special issue by Cameron and colleagues advances this.

6. Privacy and confidentiality

Ideally, face-to-face interviews should be done in complete privacy to maximize the comfort, safety, and disclosure of the respondent. This is not always practical in underfunded surveys that often have other primary objectives. One way to take some of these factors into account in a survey of family violence is to have the interviewer note, at the time of implementing the questionnaire, whether someone else is in earshot. This allows one to flag responses that may be affected by overhearing or the fear of overhearing for separate analysis. Personal safety of community-based researchers needs special attention as these will be holders of sensitive information of family/community members.

Finally, those of us focusing on prevention research should increase our familiarity with and dominion over high level research methods. The reason is quite pragmatic, not detracting at all from other (sometimes more fitting) research approaches. If randomized controlled trials (RCTs) are what it takes to get resources allocated, then this is the type of evidence we need to present in order to get prevention resources to work against domestic violence.

Funded by CIHR, a partnership of Aboriginal women's shelters across the country is currently researching exactly what it will take to implement a large scale Aboriginal-run RCT. The proposal that led to this project (*Rebuilding from Resilience*) is produced as an article in this special issue.

REFERENCES

- Aboriginal Healing Foundation. (2006). *Aboriginal Domestic Violence in Canada*. Ottawa: Aboriginal Healing Foundation. Accessed 1 February 2010, www.ahf.ca/pages/download/28_38.

- Afifi, T., Enns, M., Cox, B., Asmundson, J.G., Stein, M., and Sareen, J. (2008). Population attributable fractions of psychiatric disorders and suicide ideation and attempts associated with adverse childhood experiences. *American Journal of Public Health*, 98(5), pp. 946–952.
- Agnew, Vijay. (1998). *In Search of a Safe Place: Abused Women and Culturally Sensitive Services*. Toronto: University of Toronto Press.
- Ahmad, F., Ali, M., Stewart, D. (2005). Spousal abuse among Canadian immigrant women. *Journal of Immigrant Health*. 7(4), pp. 239–246.
- Alkire, S. (2008). Agency. University of Oxford Working paper No. 9. http://www.ophi.org.uk/pubs/Alkire_Agency_WP9.pdf
- Amnesty International. (2004). *Stolen Sisters: A Human Rights Response to Discrimination and Violence Against Indigenous Women in Canada*. Accessed 1 February 2010, <http://www.amnesty.ca/stolensisters/amr2000304.pdf>.
- Andersson, N. (2006). Prevention for those who have freedom of choice or among the choice-disabled: Confronting equity in the AIDS epidemic. *AIDS Research and Therapy*, 3, p. 23.
- Andersson, N., Cockcroft, A., Ansari, N., Omer, K., Chaudhry, U.U., Khan, A., and Pearson L. (2009). Collecting reliable information about violence against women safely in household interviews: Experience from a large-scale national survey in South Asia. *Violence Against Women*, 15: 482–496, first published on February 11, 2009.
- Anthony, E.J. (1987). Risk, vulnerability and resilience: An overview. In: E.J. Anthony and B.J. Cohler, eds., *The Invulnerable Child*. New York, Guilford Press, pp. 3–48.
- Assembly of First Nations. (2003). *The AFN-Canada Prenatal Nutrition Program Evaluation Report*. Ottawa: Prenatal Health and Nutrition Sub-Committee, Assembly of First Nations. Accessed 1 February 2010, http://www.ciet.org/en/documents/projects_library.../2006224123859.pdf.
- Bandyopadhyay, M. and Thomas, J. (2002). Women migrant workers' vulnerability to HIV infection in Hong Kong. *AIDS Care* 14(4), pp. 509–21.
- Berenson, A.B., Wiemann, C.M., Wilkinson, G.S., Jones, W.A. and Anderson, G.D. (1994). Perinatal morbidity associated with violence experienced by pregnant women. *American Journal of Obstetrics & Gynecology*, 170, pp. 1760–6.
- Bohn, O.K. (2002). Lifetime and current abuse, pregnancy risks and outcomes among Native American women. *Journal of Health Care for the Poor & Underserved*, 13(2), pp. 184–98.

- Bombay, A., Matheson, K., and Anisman, H. (2009). Intergenerational trauma among First Nations: Communities in crisis. *Journal of Aboriginal Health*, 5(3), 6-47. Ottawa: National Aboriginal Health Organization.
- Brave Heart, M.Y. and DeBruyn, L.M. (1998). The American Indian holocaust: Healing historical unresolved grief. *American Indian and Alaska Native Mental Health Research*, 8(2), pp. 56-78.
- Brave Heart, M.Y. (2003). The historical trauma response among natives and its relationship with substance abuse: A Lakota illustration. *Journal of Psychoactive Drugs*, 35(1), pp. 7-13.
- Brown, Judith. (1999). Introduction: Definitions, assumptions, themes, and issues. In: D. Ayers Counts, J. Brown, and J. Campbell, eds., *To Have and to Hit: Cultural Perspectives on Wife Beating*. 2nd Edition, Urbana: University of Illinois Press, pp. 3-26.
- Canadian Centre for Justice Statistics (2001). Family violence in Canada: A statistical profile 2001. Ottawa, ON: Statistics Canada.
- Canadian Institute of Health Research. (2005). *Health Research: Investing in Canada's Future 2004-5*. Ottawa, viewed on 1 February 2010, <http://www.cihr-irsc.gc.ca/e/28902.html>.
- Cedar Project. (2008). Acknowledging the pain of our children. *The Lancet*, 372(9644), pp. 1132-1133.
- Champion, J.D., Shain, R.N., Piper, J., and Perdue, S.T. (2001). Sexual abuse and sexual risk behaviours of minority women with sexually transmitted infection. *Western Journal of Nursing Research*, 23(3), pp. 241-254.
- Cohen, M. and MacLean, H. (2003). *Violence against Canadian Women*. Ottawa: Health Canada.
- Committee on the Assessment of Family Violence Interventions, Board on Children Youth and Families. (1998). Comprehensive and collaborative interventions. In: R. Chalk and P.A. King, eds., *Violence in Families: Assessing Prevention and Treatment Programs*. Washington, DC: National Academy Press, pp. 260-273.
- Conwill, William. (2007). Neoliberal policy as structural violence: Its links to domestic violence in Black communities in the United States. In: N. Gunewardena and A. Kingslover, eds., *The Gender of Globalization: Women Navigating Cultural and Economic Marginalities*. Sante Fe, NM: School for Advanced Research, pp. 127-146.
- Correctional Service of Canada. (1990). Creating Choices: The Report of the Task Force on Federally Sentenced Women, note 4, at 51. Chapter V — The Voice of research. <http://www.csc-scc.gc.ca/text/prgrm/fsw/choices/choice6e-eng>.

[shtml](#)

- Dion, K.K. and Dion, K.L. (2004). Gender, immigrant generation, and ethnocultural identity. *Sex Roles, 50*(5/6), pp. 345–355.
- (2001). Gender and cultural adaptation in immigrant families. *Journal of Social Issues, 57*(3), pp. 511–521.
- Dube, S.R., Anda, R.F., Felitti, V.J., Edwards, V.J., and Williamson, D.F. (2002). Exposure to abuse, neglect, and household dysfunction among adults who witnessed intimate partner violence as children: Implications for health and social services. *Violence and Victims, 17*, pp. 3–18.
- Ehrensaft, M.K., Cohen, P., Brown, J., Smailes, E., Chen, H., and Johnson J. (2003). Intergenerational transmission of partner violence: A 20-year prospective study. *Journal of Consulting and Clinical Psychology, 4*, pp. 741–753.
- Ellickson, P.L., Collinsm R.L., Bogartm L.M., Kleinm D.J., and Taylor, S.L. (2005). Scope of HIV risk and co-occurring psychosocial health problems among young adults: Violence, victimization, and substance use. *Journal of Adolescent Health, 36*(5), pp. 401–409.
- Ellsberg, M. and Heise, L. (2002). Bearing witness: Ethics in domestic violence research. *Lancet, 359*, pp. 1599–1604
- El-Bassel, N., Gilbert, L., Wu, E., Go, H., and Hill, J. (2005). HIV and intimate partner violence among methadone-maintained women in New York city. *Social Science and Medicine, 61*: pp. 171–183.
- El-Bassel, N., Gilbert, L., Golder, S., Wu, E., Chang, M., Fontdevila, J., and Sanders, G. (2004). Deconstructing the relationship between intimate partner violence and sexual HIV risk among drug-involved men and their female partners. *AIDS and Behavior, 8*(4), pp. 429–439.
- Forbes, J.C., Burdge, D.R. and Money, D. (1997). Pregnancy outcome in HIV infected women in British Columbia: The impact of antiretroviral therapy on maternal-infant HIV transmission. *Canadian Journal of Infectious Disease, 8*, 31A (Abstract 235).
- García-Moreno, C., Jansen, H.A.F.M., Ellsberg, M., Heise, L., and Watts, C. (2005). *WHO Multi-country Study on Women's Health and Domestic Violence against Women: Initial Results on Prevalence, Health Outcomes and Women's Responses*. Geneva: WHO.
- Giles, B.G., Findlay, C.S., Haas, G., LaFrance, B., Laughing, W., and Pembleton, S. (2007). Integrating conventional science and aboriginal perspectives on diabetes using fuzzy cognitive maps. *Social Science and Medicine, 64*, pp. 562–576.

Health Canada. (2004). *Acting on What We Know: Preventing Youth Suicide in First Nations*. Ottawa: Health Canada.

Heaman, M.I. (2005). Relationships between physical abuse during pregnancy and risk factors for preterm birth among women in Manitoba. *Journal of Obstetric, Gynecologic, and Neonatal Nursing*, 34(6), pp. 721-731.

HeavyRunner, I. and Marshall, K. (2003). Miracle survivors. Promoting resilience in Indian students. *Tribal College Journal*, 14, pp. 15-18.

Hyman, I. (2001). *Immigration and Health*. Ottawa: Health Canada, .

Indian and Northern Affairs Canada (INAC). (1996). *Aboriginal Women: A Demographic, Social and Economic Profile*. Ottawa: Indian and Northern Affairs Canada.

Janssen, P.A., Holt, V.L., Sugg, N.K., Emauel, I., Critchlow, C.M. and Henderson, A.D. (2003). Intimate partner violence and adverse pregnancy outcomes: A population based study. *American Journal of Obstetrics & Gynecology*, 188, pp. 1341-1347.

Jewkes, R., Dunkle, K., Nduna, M., Levin, J., Jama, N., Khuzwayo, N., Koss, M., Puren, A., and Duvvury, N. (2006). Factors associated with HIV sero-status in young South Africa women: Connections between intimate partner violence and HIV. *International Journal of Epidemiology*, 35, pp. 1461-1468.

Jewkes, R., Watts, C., Abrahams, N., Penn-Kekana, L., and Garcia-Moreno, C. (2000). Ethical and methodological issues in conducting research on gender-based violence in Southern Africa. *Reproductive Health Matters*, 8, pp. 93-103.

Kalichman, S.C., Williams, E.A., Cherry, C., Belcher, L., and Nachimson, D. (1998). Sexual coercion, domestic violence, and negotiating condom use among low-income African American women. *Journal of Women's Health*, 7(3), pp. 371-378.

Kasturirangan, A. (2008). Empowerment and programs designed to address domestic violence. *Violence Against Women*, 14(12), pp. 1465-1475. DOI: 10.1177/1077801208325188

Kinnon, D. (1999). *Canadian Research on Immigration and Health*. Ottawa: Metropolis Project, Health Canada, .

Kumpfer, K.L. and Alvarado, R. (2003). Family-strengthening approaches for the prevention of youth problem behaviors. *American Psychologist*, 58, 457-465.

Kyle, A. (2009). Saskatchewan HIV-AIDS infection rates on the rise. *Leader-Post*, 16 November, accessed 1 February 2010, <http://www.leaderpost.com/health/Saskatchewan%20AIDS%20infection%20rates%20rise/2230017/story.html>.

- Libby, A.M., Orton, H.D., Beals, J., Buchwald, D. and Manson, S.M. (2008). Childhood abuse and later parenting outcomes in two American Indian tribes. *Child Abuse & Neglect*, 32, pp. 195–211.
- MacMillan, H.L., Thomas, H., Jamieson, E., Walsh, C.A., Boyle, M.H., Shannon, H.S., and Gafni, A. (2005) Effectiveness of home visitation by public-health nurses in prevention of the recurrence of child physical abuse and neglect: A randomised controlled trial. *The Lancet*, 365(9473), pp. 1786–1793.
- McFarlane, J., Parker, B., and Soeken, K. (1996). Abuse during pregnancy: Associations with maternal health and infant birth weight. *Nursing Research*, 45(1), pp. 37–42.
- McKeown, I., Reid, S., and Orr, P. (2004). Experiences of sexual violence and relocation in the lives of HIV infected Canadian women. *International Journal of Circumpolar Health*, 63(Suppl 2), pp. 399–404.
- Miller, M. (1999). A model to explain the relationship between sexual abuse and HIV risk among women. *AIDS Care*, 11(1), pp. 3–20.
- Muhajarine, N. and D'Arcy, C. (1999). Physical abuse during pregnancy: Prevalence and risk factors. *Canadian Medical Association Journal*, 160, pp 1007–1011.
- National Institute of Mental Health (NIMH). (2001). Multisite HIV Prevention Trial Group. A test of factors mediating the relationship between unwanted sexual activity during childhood and risky sexual practices among women enrolled in the NIMH Multisite HIV Prevention Trial. *Women & Health*, 33(1–2), pp. 163–180.
- Neron, C. and Roffey, R. (2000). HIV, sexual violence and Aboriginal women. *Native Social Work Journal: HIV/AIDS: Issues Within Aboriginal Populations*, 3, p. 58.
- Ontario Native Women's Association (ONWA). (1989) *Breaking Free: A Proposal for Change to Aboriginal Family Violence*. Thunder Bay: Ontario Native Women's Association.
- Paredes-Solís, S., Villegas-Arrizón, A., Meneses-Rentería, A., Rodríguez-Ramos, I.E., Reyes-de Jesús, M.L. and Andersson, N. (2005). Physical violence against pregnant women: A community based study in Ometepepec, Guerrero, México. *Salud Pública de Mexico*, 47, pp. 335–341.
- Pearce, M.E., Christian, W.M., Patterson, K., Norris, K., Moniruzzaman, A., Craib, K.J., Schechter, M.T., Spittal, P.M., and the Cedar Project Partnership. (2008). The Cedar Project: Historical trauma, sexual abuse and HIV risk among young Aboriginal people who use injection and non-injection drugs in two Canadian cities. *Social Science & Medicine*, 66(11), 2185–2194.

- Phillips, R.E., III. (1998). A psychometric evaluation of the *spiritual* well-being scale. Unpublished manuscript. Bowling Green State University. .
- Plichta, S.B. (2007). Interactions between victims of intimate partner violence against women and the health care system. *Trauma, Violence, & Abuse*, 8(2), pp. 226-239.
- Public Health Agency of Canada. (2006). HIV/AIDS Epi Updates, August 2006. Ottawa: Surveillance and Risk Assessment Division, Centre for Infectious Disease Prevention and Control.
- Raj, A. and Silverman, J. (2002). Violence against immigrant women. The roles of culture, context and legal immigrant status on intimate partner violence. *Violence Against Women*, 8(3), pp. 367-398.
- Reid, G., Stewart, M., Mangham, C., and McGrath, P. (1996/97). Resiliency: Implications for health promotion. *Health and Canadian Society*, 4(1), pp. 83-116.
- Renzetti C., ed. (2000). *Sourcebook on Violence Against Women*. London: SAGE Publications
- Riggs, D.S. and O'Leary, K.D. (1989) The development of a model of courtship aggression. In: M.A. Pirog-Good and J.E. Stets, eds., *Violence in Dating Relationships: Emerging Social Issues*. New York: Praeger, pp. 53-71.
- Roberts, G., Lawrence, J., Williams, G., and Raphael, B. (1998). The impact of domestic violence on women's mental health. *Australian and New Zealand Journal of Public Health*, 22(7), pp. 796-801.
- Satyanarayana, V.A. and Chandra, P.S. (2009). Should mental health assessments be integral to domestic violence research? *Indian Journal of Medical Ethics*, 6(1), pp. 15-18.
- Saylor, K., Daliparthi, N. (2005). Native women, violence, substance abuse and HIV risk. *Journal of Psychoactive Drugs*, 37(3), pp. 273-280.
- Schewe, P.A. (2002). *Preventing Violence in Relationships*. Washington, DC: American Psychological Association.
- Shirdwadkar, S. (2004). Canadian domestic violence policy and Indian immigrant women. *Violence Against Women*, 10(8), pp. 860-879.
- Silver, E., Arsenault, L., Langley, J., Caspi, A., and Moffitt, T. (2005). Mental disorder and violent victimization in a total birth cohort. *American Journal of Public Health*, 95(11), pp. 2015-2021.

- Smith E. (2004). *Nowhere to Turn? Responding to Partner Violence Against Immigrant and Visible Minority Women*. Ottawa: Canadian Council on Social Development.
- Spitzer, D.L., Neufeld, A., Harrison, M., Hughes, K. and Stewart, M. (2003). Caregiving in transnational context: My wings have been cut, where can I fly? *Gender & Society*, 17(2), pp. 267–286.
- Statistics Canada. (2006). *Measuring violence against women: Statistical trends 2006*. (Statistics Canada, Catalogue No.85-570-XWE). Ottawa, ON: Statistics Canada.
- (2005). *Family Violence in Canada: A Statistical Profile 2005*. Ottawa, ON: Canadian Centre for Justice Statistics, Statistics Canada (Cat. No. 85-224 XIE).
- Steele, L., Lemieux, C., Clark, J. and Glazier, Richard. (2002). The impact of policy changes on the health of recent immigrants and refugees in the inner city. *Canadian Journal of Public Health*, 93(2), pp. 118–122.
- Stewart, M., Anderson, J., Mwakarimba, E., Neufeld, A., Simich, L., and Spitzer, DeL. (2008). Multicultural meanings of social support among immigrants and refugees. *International Migration*, 46(3), pp. 123–159.
- Talbani, A. and Hasanali, P. (2000). Adolescent females between tradition and modernity: Gender role socialization in South Asian immigrant culture. *Journal of Adolescence*, 23, pp. 615–627.
- Ullman, S., Filipas, H., Townsend, S. and Starzynski, L. (2005). Trauma exposure, post-traumatic stress disorder and problem drinking in sexual assault survivors. *Journal of Studies on Alcohol*, 66(5), pp. 610(10).
- United Nations Population Fund. State of World Population. (2006). *A Mighty but Silent River: Women and Migration*. New York: UNFPA.
- VanderPlaat, Madine. (2007). *Integration Outcomes for Immigrant Women in Canada: A Review of the Literature 2000-2007*. Working Paper No. 7. Halifax: Atlantic Metropolis Centre.
- Visandjée, B., Thurston, W., Apale, A., and Nahar, K. (2007). Women's health at the intersection of gender and the experience of international migration. In: Olena Hankivsky, Marina Morrow, Marina Helen Morrow, and Colleen Varcoe, eds., *Women's Health in Canada*. Toronto: University of Toronto Press, pp. 221–243.
- Wechsberg, W.M., Luseno, W.K., and Lam, W.K. (2005). Violence against substance-abusing South African sex workers: Intersection with culture and HIV risk. *AIDS Care*, 17(S1), S55–S64.

- Weinreb, L., Goldberg, R., Lessard, D., Perloff, J., and Bassuk, E. (1999). HIV-risk practices among homeless and low-income housed mothers. *Journal of Family Practice*, 48(11), pp. 859–867.
- Wenzel, S.L., Tucker, J.S., Elliott, M.N., Hambarsoomians, K., Perlman, J., Becker, K., Kollross, C., and Golinelli, D. (2004). Prevalence and co-occurrence of violence, substance use and disorder, and HIV risk behavior: A comparison of sheltered and low-income housed women in Los Angeles County. *Preventive Medicine*, 39(3), pp. 617–624.
- Whittaker, K., Sutton, C. and Burton, C. (2006). Pragmatic randomised controlled trials in parenting research: the issue of intention to treat. *Journal of Epidemiology and Community Health*, 60, pp. 858–864.
- Wolfe, D.A., Wekerle, C., Scott, K., Straatman, A., Grasley, C. and Reitzel-Jaffe, D. (2003). Dating violence prevention with at-risk youth: A controlled outcome evaluation. *Journal of Consulting and Clinical Psychology*, 71, pp. 279–291.
- Wong, Y.J., Rew, L., and Slaikeu, K.D. (2006). A systematic review of recent research on adolescent religiosity/spirituality and mental health. *Issues in Mental Health Nursing*, 27, pp. 161–183.

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