



## It's time to face the hidden epidemic of STIs

By Gudrun Schultz

Sexually transmitted disease rates are skyrocketing in Canada. More than half of all infectious disease cases reported are sexually transmitted infections (STIs) and those reports account for only an estimated 10% of all cases. The health effects of STIs, including infertility, can be significant and long-lasting and the cost of treatment is a major drain on health resources. Young people are disproportionately represented in the affected population, with the highest rates among young women between the ages of 15-24. It's time for Canadians to face the facts on sexually transmitted infections and drop the "safer sex" message that has so clearly failed to inform our young people and protect them from the consequences of casual sexual activity.

In a 2004 Health Canada report on Canadian STI rates, the agency called sexually transmitted infections an "escalating public health concern." Four years later, the infection rate has increased significantly and shows no sign of coming under control. *Chlamydia trachomatis* infection is the most commonly reported sexually transmitted infection in Canada, accounting for more than 48% of all infectious diseases reported to the Public Health Agency. In 1997 there were 34,144 reported cases in Canada, or 113.9 per 100,000. Health Canada's projected rates for 2008 are more than double that number, at 239.3 per 100,000. Over two-thirds of those cases affect young people between the ages of 15-24, primarily women. The *Chlamydia* infection rate in young women is almost twice as high as that among men. Frequently asymptomatic, *Chlamydia* is a leading cause of infertility in women, who may not be aware they have contracted an infection until they are unable to have children. It is estimated that 3% of women with chlamydial infection will become infertile. Up to 40% of chlamydial infections lead to Pelvic Inflammatory Disease (PID). Women experiencing repeat episodes of PID suffer a nearly 40% increased risk of ectopic pregnancy or infertility. Health Canada acknowledges that chlamydial PID is the most important preventable cause of infertility.

Health Canada also estimates that at least 2% of women with a lower genital tract *Chlamydia* infection will experience ectopic pregnancy (or other adverse pregnancy outcomes). "That percentage is startling when one considers the incredibly high numbers of chlamydia cases in young women between the ages of 15 and 24," the 2004 Surveillance report states. "A previous history of PID is the strongest predictor for ectopic pregnancy."

*Chlamydia* infection rates in men have also been rising over the past decade. Between 1997 and 2006, male cases increased by 148.6 percent, to 145.9 per 100,100.

Gonorrhoea rates rose by 132% between 1997 and 2006. The rates continue to climb, to 34.9 per 100,000 in 2007 and a projected rate of 37.8 in 2008. A recent Ontario study found gonorrhoea is becoming increasingly resistant to antibiotics. Published in the February 2009 issue of the *Canadian Medical Association Journal*, the study examined the rise of antibiotic-resistance gonorrhoea infection in the province of Ontario between 2002 and 2006. The study found a rapid rise in the number of infections resistant to standard treatment, from 4% in 2002 to 28% in 2006.

Syphilis, while affecting proportionately fewer in the population, has shown the most staggering rate of increase. Since 1997 the infection rate in Canada has risen by 900%, mainly among the male population (males accounted for 86.3% of reported cases in 2006.)

HPV and herpes simplex virus infections are not reported nationally but both are considered “highly prevalent” infections in Canada. HIV infection rates have remained relatively constant at around 2,500 per year. Individuals who already have an STI are significantly more susceptible to HIV infection.

Canada is not alone in facing an epidemic of STIs. Both the United Kingdom and the United States have seen similar dramatic increases in the number of reported cases. In the US almost 19 million new infections occur each year, with nearly half among those aged 15 to 24, according to the Center for Disease Control. In addition to the mental and physical burdens experienced by STI sufferers, the financial implications for Canada's economy are significant. Treatment of STIs remains a major drain on the health care resources. Prevention by vaccine may appear to hold the answer—mega-drug company GlaxoSmithKline recently contributed 23\$ million in funding towards a *Chlamydia* vaccine—but the cost of such measures are enormous and effectiveness remains a question. The Gardasil vaccine for HPV infections is the most expensive vaccine on the market, has no proven track record and only protects against four of the many strains affecting women.

The costs associated with STIs face an exponential increase from infertility treatments as the current generation of young women infected with chlamydia begin to encounter the grim legacy of tubal damage inflicted by the disease. “Despite the visibility of the issue of infertility in Canada, few are aware of its direct connection to STIs,” Health Canada's 2004 Surveillance report states. “Tubal factor infertility remains the most common reason for in-vitro fertilization, a most costly procedure. Thus the expense to the health care system, as well as for individuals and the economy, due to chlamydia, PID and tubal factor infertility is enormous.”

Despite the unequivocal reports from Health Canada on the rising prevalence of STIs, there appears to be a determined blindness towards the issue among the media and those responsible for sexual health education. Very little, if any, media

coverage has been devoted to raising the alarm on STI rates. A recent report carried by the *Globe and Mail* February 17 highlighted the surge in STIs among the Canadian military, an increase of 71% in *Chlamydia* alone over the past 6 years, but drew no parallels to the situation in the general population.

It is apparent that “safer sex” education for young people is not working. Health Canada continues to rely on condom promotion to counter disease rates, despite the limited protection even careful condom use provides against STIs. A 2004 study in the *American Journal of Obstetrics and Gynecology* identified two factors in the failure of condom promotion to halt the rise of STI rates: Condoms fail to protect against oral or external-genital transmission, and condom effectiveness depends on careful, constant use. “Extensive research demonstrates that average people, particularly youth, do not use condoms consistently in the long-term, regardless of knowledge or education,” the study points out. Even among adult couples with HIV infection in one partner, who were counseled on proper condom use, only 43.3% used condoms consistently.

Society’s popular message that sexual freedom and experimentation are the rights of youth to enjoy has utterly failed to convey the seriousness of sexual responsibility and the profound effect of sexual consequences on the lives of young people, with disastrous effect. The misinformation on sexual health and responsibility that has been fed to young people under the guise of “sex education” has resulted in a bitter legacy of disease and infertility that is only now beginning to be felt in its full scope. It’s time that this hidden epidemic is acknowledged in the public square and the young people of today are given the true facts on sexuality and responsibility. There is far too much at stake to ignore the issue any longer.

*Gudrun Schultz is executive director of LifeCanada. First published in LifeCanada News, Vol.8 NO.1, January/February 2009.*