Exploring Safer and Unsafe Drug Use and Sexual Practices Among Female Injection Drug Users Living in Small Towns / Rural Communities, in Cape Breton, Nova Scotia

by

Samantha Hodder

Submitted in partial fulfilment of the requirements for the degree of Master of Arts

at

Dalhousie University Halifax, Nova Scotia October 2011

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## SCHOOL OF HEALTH AND HUMAN PERFORMANCE

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TITLE:	Exploring Safer and Unsafe Drug Use and Sexual Practices Among Female Injection Drug Users Living in Small Towns / Rural Communities, in Cape Breton, Nova Scotia				
DEPARTME	NT OR SCHOOL:	School of Health a	and Human Per	formance	
DEGREE:	MA	CONVOCATION:	May	YEAR:	2012
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# **DEDICATION PAGE**

This thesis is dedicated to my mother (Darlene) who has been a great source of motivation and inspiration since the beginning of my studies. She has taught me to value the richness of learning.

"You made me believe that if I tried hard enough I could do anything. And so I did!"

Helen Thomson, B. 1943

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#### **ABSTRACT**

The purpose of this qualitative research study was to understand the facilitators and/or barriers to safer drug use and sexual practices among a sample of young female injection drug users (IDUs) who live in small towns/rural communities in Cape Breton, Nova Scotia. This study examined how economic status, relationships, social roles, small town/rural living, and stigma function as facilitators and/or barriers to safer practices. Eight female IDUs aged 20-31, living in small towns/rural communities in Cape Breton, engaged in face-to-face, semi-structured interviews. The women described what day-to-day life is like for female IDUs living in small towns/rural communities. They spoke about managing drug addiction, their understanding of safer and unsafe injection drug use and risky and safer sexual practices, as well as their experiences with services/supports. The information obtained from this study will help to inform harm reduction policy and program initiatives.

# LIST OF ABBREVIATIONS USED

HIV Human Immunodeficiency Virus

AIDS Acquired Immunodeficiency Syndrome

HCV Hepatitis C Virus HBV Hepatitis B Virus

STI Sexually Transmitted Infections

IDU Injection Drug Use

WHO World Health Organization

PHAC Public Health Agency of Canada

#### **ACKNOWLEDGEMENTS**

It is gives me great pleasure to thank my mother (Darlene), my husband (Ryan) and the rest of my family for their patience, love, support and encouragement throughout the duration of my studies.

I would like to acknowledge and thank my supervisor (Dr. Lois Jackson) and my committee members (Dr. Jacqueline Gahagan and Carolyn Davison, MA) for their ongoing support and guidance.

I would like to express my sincere gratitude to all the women from Cape Breton, Nova Scotia who participated in this research study, as their participation made this research possible.

I would also like to thank those agencies and organizations in Cape Breton that assisted with participant recruitment.

#### **CHAPTER 1 INTRODUCTION**

## **Injection Drug Use**

In Canada, injection drug use has been recognized as a public health problem posing significant health, social and economic harms for injection drug users, families, communities and the larger population (Lennings, 2000; Health Canada, 2001; Fuller, Vlahov, Ompad, Shah, Arria & Strathdee, 2002; Fischer, et al., 2005). More recently, female injection drug users have been recognized as a marginalized population within the injection drug using population with challenges that are unique to them. These challenges may be attributed to the gendered roles and responsibilities women encounter in society and may contribute to unsafe drug use and sexual practices (Health Canada, 2001; Patten, 2006).

Some of the health harms associated with injection drug use include premature death, infectious diseases, infections or abscess, mental health issues and chronic illness (Patten, 2006; Health Canada, 2001). In addition to health harms and associated risks with injection drug use, there are alarming economic costs, such as the loss of productivity, law enforcement and health care costs. Injection drug users also often experience the social consequences of stigma, discrimination, isolation, and family dysfunction (Health Canada, 2001; Patten, 2006; Rehm et al., 2006) which may result in more adverse health, social and economic harms than even the drug use itself (Room, 2005). Thus, individuals who experience stigma and discrimination because of their drug use, often live in conditions of poverty, social inequalities and may have difficulties accessing the resources and programs they need (Room, 2005).

#### **Prevalence of Injection Drug Use**

It has been estimated that between 80,000 and 125,000 individuals inject drugs in Canada (Fischer et al., 2005), with females accounting for approximately one third of the injection drug using population (Canadian Center on Substance Abuse, 2008). In 2004 the highest prevalence of injection drug use in Atlantic Canada was reported to be in Nova Scotia. At that time it was estimated at least, 1,064 Nova Scotians engaged in injection drug use compared to 827 in New Brunswick and 140 in Newfoundland and Labrador (Patten, 2006). It is important to note that these numbers are only estimates, as there are difficulties in obtaining accurate information on the prevalence of injection drug use, given that the injection drug users are a 'hidden population' and often do not want to be identified or disclose that they use drugs (Patten, 2006).

There is also growing evidence that points to the increased incidence of injection drug use in Canada. In 1994, 175,000 individuals living in Canada reported they engaged in injection drug use at some point in their lives, but by 2005 this number had increased to 269,000 people (Health Canada and Canadian Centre on Substance Abuse, 2005). This increase in drug use by injection is important given the known health risks associated with sharing needles, injection supplies, and unsafe sexual practices among people who inject drugs (Public Health Agency of Canada, 2007; Health Canada, 2006; Abelson, Treloar, Crawford, Kippax, Beek, Howard, 2006; Lennings, 2000; Fuller et al., 2002), such as the transmission of infectious infections, drug overdose, pre-mature death and violence (Patten, 2006; Health Canada, 2001; Public Health Agency of Canada, 2007; Fischer et al., 2005).

Since the 1980s there has been evidence among the injection drug using population that shows increased awareness of health harms and risks associated with injection drug use, increased access to harm reduction services, as well as more education and a better understanding of blood borne pathogens such as Human Immunodeficiency Virus (HIV) (Public Health Agency of Canada, 2010; Strike, Myers, Millson, 2002; Riley et al., 1999). However, despite these gains there is also evidence that indicates some injection drug users continue to use drugs unsafely and have unsafe sexual practices, particularly under certain conditions such as when there is limited access to clean syringes (Jackson, Bailey, Fraser, Johnson, Currie & Babineau, 2002; Lennings, 2000; Fuller, Vlahov, Ompad, Shah, Arria & Strathdee, 2002; Fischer, et al., 2005; Patten, 2006) and are experiencing drug dependency (Patten, 2006).

## **Female Injection Drug Users**

## **Diversity among Women Who Use Drugs**

Women experiencing substance use problems are now being recognized as a population that have unique challenges and very different health needs then men with substance use problems. At the same time, the diversity that exists among women needs to be further explored, as there has been little research done to date on understanding the differences among women with substance use problems. It is critical to understand that women who have substance use issues are a heterogeneous population and there may be many factors, characteristics, experiences and situations that influence substance use among women (Vaillancourt and Keith, 2007). For example, a woman's age, living accommodations, level of education, socio-economic status, culture etc., may increase

her vulnerability to substance use problems or may strengthen her resiliency to problematic substance use (Poole and Greaves, 2007).

## Gender, Relationships and Power Imbalances - Unsafe IDU and Sexual Practices

Some research indicates that women are strongly influenced by their male partners to start using substances (Brady and Randall, 1999). There are also some research findings that report women are more likely to begin using substances at an older age than men (Brady and Randall, 1999). However, some recent research suggests that females engage in injection drug use at a younger age then men (Public Health Agency of Canada, 2009; Roy as cited in Wiebe & Reimer, 2000). These research findings are important relative to prevention efforts, given that younger injection drug users may be more likely to share injection equipment, thus increasing their risk for health harms such as transmission of diseases (Ploem, 2000).

Some research findings report that female injection drug users are more likely than males to live with a partner who has a drug addiction (Anglin as cited in Gogineni, Stein, & Fredimann, 2001), and they are more likely to be economically and or psychologically dependent on their partners. This is significant given that economic and psychological dependence can create power imbalances within the context of intimate relationships. For women who inject drugs this in turn may affect their ability to negotiate safer drug use and sexual practices (Patten, 2006; Pinkham, Malinowska - Sempruch, 2007), thereby increasing their risks for contracting infectious diseases, such as HIV, Hepatitis C Virus (HCV), Hepatitis B Virus (HBV). Female injection drug users may also be dependent on their male partner for their drug supply (Pinkham,

Malinowska-Sempruch, 2007); this may not be the case for male injection drug users (Weissman and Brown, 2002; Turner et al. as cited in Hartel, 1994).

Research studies have found that women are more likely to share needles and other equipment with a committed partner or a close friend (Barnard and Kane as cited in Hartel, 1994; Public Health Agency of Canada, 2004), while males are more likely to inject first or inject with strangers (Hartel, 1994). Females are also more likely to be injected by a helper or partner (Whynot, 1998; Doherty, Garfein, Monyerroso, Latkin, & Vlahov, 2000), especially the first time, putting them at a heightened risk to be the second user on the needle (Whynot, 1998). Some research studies found that female injection drug users are more likely to inject in the presence of others and be pressured by their partner or peers to share their drug equipment (Whynot, 1998; Patten, 2006). Doherty (2000) found that amongst those women who had their injection drug use initiated by a male were at greater risk on the HIV risk profile. Sharing equipment increases their risk for contacting infectious diseases and transmission of infectious diseases to others, including their children. Some female injection drug users also experienced coercion by their partner to participate in sex exchanges for drugs or money to obtain drugs (Ploem, 2000; Patten, 2006), thus increasing their risks for infectious diseases, and placing them in vulnerable and / or potentially unsafe situations for violence.

Research findings indicate that engaging in health risk behaviors such as sharing drug equipment or having sex without a condom with a committed partner may be seen as an act of trust or intimacy among injection drug users (Jackson, Bailey, Fraser, Johnson, Currie & Babineau, 2002). This practice may be perceived as a safe practice among female drug users and their partner however, it positions female drug users at a

heightened risk for health harms and associated risks during injection drug use and unprotected sex (Pinkham, Malinowska-Sempruch, 2007).

The level of drug dependency and access to clean equipment, such as needles and syringes are key factors linked to safer drug use and safer sexual practices for both male and female injection drug users (Grund et al. as cited in Hartel, 1994; Public Health agency of Canada, 2004; Ploem, 2000). Unsafe injection drug use can place injection drug users at risk for health related harms such as contracting infectious diseases (HIV, HCV, HBV), infections, overdose, pre-mature death etc (Patten, 2006, Public Health Agency of Canada, 2007; Health Canada, 2001).

Although both male and female injection drug users have been identified as populations that can be exposed to health risks related to unsafe injection drug use, females in particular may be more vulnerable given that they may also encounter stigma, discrimination and isolation relative to their gender as female injection drug users living in small towns / rural communities (Patten, 2006; Ploem, 2000).

## Stigma and Discrimination

Research has reported that many female and male injection drug users have low socio-economic status and often experience the social consequences of stigma, discrimination and isolation (Patten, 2006; Ploem, 2000), given that injection drug users may be perceived by the general public as sick and or dangerous individuals who are involved in criminal activities (Cooper, Moore, Gruskin & Krieger, 2005). Female injection drug users are subject to additional stigma, discrimination and isolation relative to the gendered roles women are assigned in society (Pinkham, Malinowska -Sempruch, 2007). Gender may determine if a woman has basic rights, control over their lives or if

basic needs are met. For example, the right to negotiate safer sex practices has been cited as a problem for females who inject drugs, as some female injection drug users are economically dependent on their male partner, as well their partner may be the person who supplies their drugs. Although gender may influence the health of both females and males, the socio-economic inequalities of gender can significantly impact the health of females (Sen & Ostlin, 2008; World Health Organization, 2011), and in particular female injection drug users (Health Canada, 2001). Women are typically positioned in society as care givers, often employed in lower paying occupations, with lower levels of education, while males have had greater wealth, better jobs and more education (Sen & Ostlin, 2008).

Female injection drug users face many challenges related to stigma, discrimination, isolation, poverty, lack of confidentiality and privacy and lack or limited access to treatment in small communities (Poole & Greaves, 2007). The social consequences of stigma, discrimination and isolation may be more evident when the female injection drug user is pregnant or caring for small children (Taylor, 1997), as they may be perceived as a threat to the more traditional roles of mother or caregiver in society. Female injection drug users may be very fearful of losing their children if members in their communities learn of their drug use (Taylor, 1997; Health Canada, 2006; Pinkham, Malinowska-Sempruch, 2007; Aston, Comeau and Ross, 2007). As a result they may try to conceal their addiction or decide not to access treatments and services within their communities (Vaillancourt and Keith, 2007; Aston, Comeau and Ross, 2007), this may have detrimental health outcomes for the female injection drug user, their family and the community where they reside.

#### Violence, Trauma and Victimization

For researchers and policy makers understanding the relationship between problematic substance use and victimization among women who use drugs is particularly important (Brady and Randall, 1999). Females often report initiating drug use to cope with emotional pain or following a traumatic event in their life (Health Canada, 2006). Researchers have found that the use of illicit drugs among women is strongly associated with both sexual and physical assault (Kilpatrick, Acierno, Resnick, Saunders, Best, 1997). There is some evidence that suggests females exposed to childhood abuse may engage in substance use as a coping mechanism to deal with the previous traumas. These women may also be more vulnerable to violence / victimization as adults (Braitstein et al., 2003; Kilpatrick, Acierno, Resnick, Saunders, Best, 1997). Violence among women who abuse substances is not something that is unique to urban settings. Research has shown that violence is also a common occurrence among women who engage in problematic substance use in rural areas (Boyd, 2003).

There is growing evidence to suggest female injection drug users are more likely to be involved in the more risky aspects of the drug culture such as low level street dealing, sex trade work, and unprotected sex (Hartel, 1994; Measham, 2002; Patten, 2006; Public Health Agency of Canada, 2007; Ploem, 2000; Health Canada, 2006). Involvement of females in the more risky aspects of drug use may be attributed to the gendered roles females generally encounter in the wider society, as well as other influential factors and risk conditions within the context of their social relationships (e.g., power imbalances, trust, violence), as well as their physical environment (e.g., rural living, lack of access to services) (Measham, 2002).

### **Injection Drug Use in Small Town / Rural Communities**

Injection drug use has largely been thought of as a problem that exists in large urban areas and as a result much of the research has focused on injection drug use in urban settings. More recently, research is recognizing that injection drug use is also a significant problem in small towns / rural communities (Aston, Comeau, and Ross, 2007; Patten, 2006, Jackson, Parker, Dykeman, Gahagan, Karabanow, 2010) such as Cape Breton, Nova Scotia. Although, there has been little research focused on the differences between urban and rural injection living and injection drug use, what we do know is that rural living, particularly in areas of high unemployment and with limited or no access to treatment, information or transportation may influence unsafe drug use and unsafe sexual practices among injection drug users (Aston, Comeau & Ross, 2007; Pinkham, Malinowska-Sempruch, 2007; Webber, 2007; Patten, 2006).

Existing research points out that there is often a relative lack of health services and community resources in small towns / rural communities (Aston, Comeau, Ross, 2007) which may significantly impact the injection drug users ability to access needed programs and services, such as needle exchange programs, and treatment (Parker, Jackson, Dykeman, Gahagan, Karabanow, 2011; Patten, 2006). Research also suggests that injection drug users in small towns / rural areas tend to be more isolated and discreet about their drug use than injection drug users in urban areas. This may be attributed to the social consequences (e.g., stigma, discrimination etc.) of members in their community learning about their drug use (Patten, 2006; Aston, Comeau, Ross, 2007). Issues related to stigma and discrimination, as well as the lack of confidentiality and privacy in small towns / rural communities are probable reasons why injection drug users may not access

available services, such as clean needles and condoms from the only local pharmacy in their communities (Day, Conroy, Lowe, Page, Dolan, 2006; National Treatment Strategy Working Group, 2008; Vaillancourt & Keith, 2007).

#### Health Promotion and Injection Drug Use

Health promotion is the process of enabling people to increase control over and improve their health (World Health Organization, 1986). It differs from more traditional biomedical approaches to improve health as it focuses on promoting health among the entire population by directing action on a broad range of interrelated factors known as the determinants of health (e.g., income, genetic endowment, social support, personal health practices, education, coping skills, employment, child development, working and living conditions, gender and culture, physical / social environments, health services etc.) (Public Health Agency of Canada, 2010). It also recognizes that access to sustainable resources, social justice and equity are all pre-requisites to health among populations (Talbot and Verrinder, 2010; WHO, 1986), and in order to enhance population health there is a need to implement multiple health promotion strategies such as building healthy public policy, creating supportive environments, strengthening community action, developing personal skills, and reorienting health services (WHO, 1986).

Viewing injection drug use as a public health problem requires one to examine the 'underlying conditions' or 'root causes' of injection drug use (Rhodes, 2002), in particular among vulnerable populations such as women in small towns / rural communities. This means gaining a better understanding of women's day-to-day lives and conditions that may act as barriers to safer drug use and sexual practices, as well as facilitators of safer drug use and sexual practice.

Female injection drug users who experience barriers such as lack of services in rural places, stigma associated with drug use, as well as the gendered roles women encounter across society may perpetuate the problem of injection drug use. For instance, female injection drug users living in small towns / rural areas may be unable to access the information and resources they need to exercise control over their lives and therefore control over their health and the health of their families. They may be unable to improve their education level, gain access to good jobs, and obtain adequate housing / food, which are widely recognized as key determinants of health. On the other hand, female injection drug users who have increased access to information and resources such as clean needles and condoms will have opportunities to exercise control and make decisions to practice safer drug use and sexual practices. Health promotion strategies that enable women to have control and make informed decisions to practice safer injection drug use and sexual practices will in turn promote a healthier population.

### **Purpose of Research Study**

Female injection drug users living in small town / rural communities are recognized as a vulnerable population at heightened risk for health harms with poorer health outcomes, but we know relatively little about their day-to-day lives and the barriers and facilitators to safer practice, as well as potential differences among this population / sub-population. The purpose of this research study was to explore with a sample of female injection drug users living in small towns / rural communities in Cape Breton, Nova Scotia, their perceptions of the barriers to safer drug use and sexual practices, as well as facilitators of safer drug use and sexual practices.

This study explored one main research question 'What are the facilitators and barriers of safer drug use and safer sexual practices among female injection drug users, living in small towns / rural communities in Cape Breton, Nova Scotia?' Particular emphasis was placed on understanding how gendered roles and responsibilities, relationships, stigma, and small town / rural living may act as facilitators or barriers to safer practices. For instance, does living in a small community with relatively little access to Needle Exchange services shape safer practices? Findings from this study are intended to support policy and program initiatives aimed at reducing the harms of injection drug use among female injection drug users living in small towns / rural areas.

#### **CHAPTER 2 LITERATURE REVIEW**

#### **Prevalence of Injection Drug Use**

The prevalence of injection drug use in Canada is estimated to be between 80,000 and 125,000 individuals (Health Canada, 2001; Fischer et al., 2005), with females accounting for approximately one third of the total injection drug using population (Canadian Centre on Substance Abuse, 2008; Wiebe and Reimer as cited in Public Health Agency of Canada, 2004). It is important to acknowledge that these statistics are only estimates, as the exact number of people who inject drugs in Canada remains unknown. The difficulties in determining the exact numbers of injection drug users are often attributed to the complexities related to gaining access to this hidden population (Patten, 2006; Wiebe and Reimer, 2000). For instance, injection drug users may be reluctant to self identify as individuals who use illegal substances because of the potential ramifications of disclosure. Disclosure of injection drug use may result in stigma, discrimination, social isolation from family and friends, incarceration, loss of employment, difficulty accessing accommodations and supplies, as well as apprehension of child(ren) (Patten, 2006; Ploem, 2000). Other difficulties such as having a fixed address, a phone or access to technologies such a computer and internet are also factors that may interfere with a user's ability to provide feedback related to their drug use and essentially their unmet needs (Patten, 2006; Wiebe and Reimer, 2000).

In Atlantic Canada, the highest prevalence of injection drug use has been reported in Nova Scotia (Patten, 2006). In 2004, it was estimated that 1,064 Nova Scotians were engaging in injection drug use compared to 827 in New Brunswick and 140 in Newfoundland and Labrador (Patten, 2006). It is important to keep in mind that these numbers are only estimates based on the prevalence of Hepatitis C not actual reported

cases of injection drug use. It has been estimated that injection drug use is a risk factor in almost 60% of all Hepatitis C cases in Nova Scotia. Thus, the actual number of injection drug users in Atlantic Canada may be higher than reported (Patten, 2006).

#### **Health Harms Associated with Drug Use**

All drug use, whether it is experiential use, casual use, regular use or drug dependence has the potential for some degree of health harms, such as overdose, injury / trauma, infectious disease transmission, and even death (Roberts, 2008). Individuals who are substance dependent or addicted to drugs are well recognized as a population experiencing significant risks and poorer health outcomes than the general population, such as premature death, infectious diseases, infections or abscess, mental health issues and chronic illness (Patten, 2006). Many health issues (i.e., infections, Hepatitis C, HIV, malnutrition, depression, suicide, family dysfunction, loss of productivity etc,) are directly and indirectly attributed to drug use (Alexander as cited in Lightfoot, Panessa, Hayden, Thumath, Goldstone, Pauly, 2009).

In 2002 there were 1,695 deaths in Canada attributed to illegal drug use, accounting for 0.8% of the total death rate; overdose was the leading cause of death related to illegal drug use, followed by suicide, hepatitis C, and HIV. Although, there are fewer deaths from illegal drug use than other substance use related deaths (e.g., alcohol, tobacco), illegal drug-related deaths often tend to involve younger people and therefore have a significant impact in terms of productive life years lost (Rehm et al., 2006).

#### **Blood Borne Pathogens**

Injection drug use is well recognized as a major risk factor for transmission of blood borne infectious diseases such as HIV/ AIDS, Hepatitis C and Hepatitis B (Health Canada, 2001). Research points to the growing urgency around prevention of blood borne pathogens within the drug using population (Health Canada, 2001). The tragedy with infectious diseases, such as HIV, HCV and HBV is that we know they are essentially preventable (Nova Scotia Department of Health, 2004); however these diseases continue to flourish among the injection drug using population. Blood borne infectious diseases will continue to present a serious public health threat among the drug using population and the entire population without considerable funding resources dedicated to prevention, harm reduction and treatment interventions (Health Canada, 2001; Nova Scotia Department of Health, 2004; Patten, 2006).

Prevalence and incidence of HIV / AIDS. In the 1980s HIV/AIDS was perceived as an infectious disease affecting only men who had sex with men (MSM), however we now understand that the transmission of HIV / AIDS crosses various populations regardless of socioeconomic status, gender, age and race (Public Health Agency of Health Canada, 2007). Research has shown that those at greatest risk for being infected with HIV / AIDS are among vulnerable populations such as injection drug users sharing injection equipment and women and men during unprotected sex (Public Health Agency of, 2007). Research has also reported that females are twice as likely as men to be infected with HIV during unprotected sexual intercourse (Albert and Williams, 1998; UNAIDS as cited in Pinkham & Malinowska-Sempruch, 2007).

In 2008 it was estimated that approximately 65,000 individuals were living with HIV / AIDS in Canada and an additional 26% were unaware of their HIV / AIDS infection status (Public Health Agency of Canada, 2010). Drug use by injection represents 17% of the total HIV / AIDS cases in Canada (Public Health Agency of Canada, 2010). Despite public health prevention efforts to increase awareness related to the modes of transmission of HIV among drug users (e.g., sharing drug equipment and risky sexual behaviors such as unprotected sex) the prevalence of HIV / AIDS among this population continues to be a growing concern (Lightfoot, Panessa, Hayden, Thumath, Goldstone, Pauly, 2009).

In Atlantic Canada the prevalence and incidence of reported HIV / AIDS positive cases is on the rise; between 1985 and 2004 there was a total of 1,223 reported HIV / AIDS positive cases with females accounting for 15% of the cases. A total of 656 positive cases were in Nova Scotia and Prince Edward Island as compared with 340 positive cases in New Brunswick (Patten, 2006). Statistics from Atlantic Canada between 2000 and 2004 report that Nova Scotia and Prince Edward Island (combined) had the highest incidence of positive HIV cases with a total of 11 cases, the next highest was New Brunswick with a total of 8 cases (Patten, 2006). Research findings gathered from 2000 to 2004 indicated that approximately 12% of positive cases of HIV / AIDS are attributed to injection drug users living in Atlantic Canada (Patten, 2006).

A critical concern is the prevalence of HIV / AIDS among Canadian females. Research findings reported that females account for approximately 22% of the population living with HIV / AIDS, with heterosexual contact and injection drug use representing the two leading risk factors for females in Canada (Public Health Agency of Canada, 2010).

Females also account for 26% of all new infections, and approximately 71% of the new infections among females were attributed to heterosexual exposure and 29% of new infections attributed to injection drug use (Public Health Agency of Canada, 2010).

Prevalence and incidence of hepatitis C virus (HCV). Hepatitis C is a liver disease with no known cure caused by the Hepatitis C virus (HCV) which spreads through direct blood-to-blood contact (Public Health Agency of Canada, 2003; Public Health Agency of Canada, 2009). It has been estimated in Canada that 242,500 individuals are infected with Hepatitis C (Public Health Agency of Canada, 2009), and approximately 35% of those infected are unaware of their infectious status (Public Health Agency of Canada, 2009). It is critical to prevention efforts to recognize that a major mode of transmission of the Hepatitis C virus is through injection drug use. Research has suggested that between 70-80% of all new cases of Hepatitis C in Canada can be attributed to unsafe injection drug use (Public Health Agency of Canada, 2009), with female injection drug users accounting for 58.2% of all new cases of Hepatitis C (Health Canada's Enhanced Hepatitis Strain Surveillance Strain System, as cited in Public Health Agency of Canada, 2004). Since 2006 research has also reported an increase in acute HCV infections among young female injection drug users between the ages of 15-24 and males between the ages of 25-34 (Public Health Agency of Canada, 2009).

In Nova Scotia the reported cases of HIV / AIDS are relatively low; however the rates of Hepatitis C are growing at an alarming rate among the injection drug using population (Patten, 2006; Public Health Agency of Canada, 2004). Atlantic Canadian research has found that Nova Scotia has the highest reported prevalence of Hepatitis C (Patten, 2006) in the four Atlantic provinces, and Hepatitis C cases among the injection

drug using population living in Nova Scotia has increased over time. For instance, injection drug use is cited as a risk factor in 59% of the reported cases (Patten, 2006). Between 2000 and 2004 there was 1198 reported positive HCV cases in Nova Scotia compared to Newfoundland with 263 cases, Prince Edward Island with 145 and New Brunswick with 955 (Patten, 2006). Given that there is no cure for Hepatitis C and treatment places tremendous economic burden on an already taxed health care system (Public Health Agency of Canada, 2003) this infectious disease is a significant public health concern and burden.

Another significant concern is that a large portion of the injection drug using population may be unaware they are infected with the Hepatitis C virus, resulting in increased risk of infection transmission to those currently not infected through the use of contaminated injection drug equipment and unsafe sexual practices (Diaz, Des Jarlais, Vlahov et al. as cited in Public Health Agency of Canada, 2004; Patten, 2006). Some research findings suggest that after one year of using drugs by injection nearly 80% of these individuals will become infected with the Hepatitis C virus (Patten, 2006), and after 5 years of injecting 90% of injection drug users will be infected with HCV (Centers for Disease Control and Prevention, 1998).

Prevalence and incidence of hepatitis B virus (HBV). Hepatitis B is a preventable infectious disease affecting approximately 0.7% to 0.9% of the Canadian population (Public Health Agency of Canada, 2010) with more males infected than females. Exposures to contaminated blood and / or body fluids are known risk factors for transmission of the Hepatitis B virus. The two leading risk behaviors found to be

associated with Hepatitis B include injection drug use and unsafe sexual behaviors (i.e., sex without a condom) (Zhang, Zou, and Giulivi, 2001).

In 2001 Health Canada estimated that 80% of injection drug users were infected with Hepatitis B and approximately one third of all new reported cases of Hepatitis B were associated with injection drug use. In Atlantic Canada between 1995 and 2004 there was a total of 399 positive Hepatitis B cases reported, with the highest number of reported cases found in Nova Scotia. Between 1995 and 1999 the total number of positive Hepatitis B cases reported in Nova Scotia was 180, followed by New Brunswick with 68 reported cases. Some of the reported cases in Nova Scotia were attributed to an outbreak of Hepatitis B in 1998 among the injection drug using population in Cape Breton and Amherst, Nova Scotia (Patten, 2006). This Hepatitis B outbreak triggered a public health response to address this serious issue which resulted in the initiation of Needle Exchange programs in Nova Scotia.

Between 2000 and 2004 the total number of positive reported cases decreased in Atlantic Canada, one possible explanation for the decrease is the heightened awareness of the vaccine for Hepatitis B (Patten, 2006). While the overall incidence of Hepatitis B positive cases decreased in Nova Scotia, this province continued to have the highest reported cases in Atlantic Canada, with 58 reported cases between 2000 and 2004, followed by Newfoundland and Labrador with 36 cases (Patten, 2006).

#### **Economic Burden of Illegal Drug Use**

Illegal drug use represents a significant economic burden to Canadians, both in terms of direct costs to the healthcare, community and justice systems, and indirect costs associated with loss of productivity, ill health and premature death (Health Canada, 2001;

Health Canada and CCSA, 2005). The most recent estimates from 2002 indicate the economic costs attributed to illegal drug use are approximately \$8.2 billion dollars or 20.7% of the total drug use costs in Canada (Rehm, et al., 2006). Loss of productivity accounted for 4.7 billion dollars, law enforcement 2.3 billion and healthcare costs 1.1 billion dollars (Rehm, et al., 2006). Costs to the healthcare system include psychiatric hospitalization, specialized inpatient / outpatient treatment, ambulatory care, drugs and physicians. Overall, loss of productivity represents the largest part of the social costs due to illness and premature death (Rehm, et al., 2006).

Although the exact costs associated with injection drug use in Canada are unknown, we do know the costs are substantial. For instance, if we consider the economic costs associated with HIV / AIDS and HCV alone, we begin to develop a more informed understanding of how 'costly' and 'critical' the problem of injection drug use is (Erickson et al., 1997; Health Canada, 2001). The direct health care costs and indirect costs such as loss of productivity associated with these chronic diseases are extensive (Health Canada, 2001). For instance, in 2003 the annual treatment costs associated with HIV were estimated to be \$800,000 million annually (Werb, Wood, Kerr, Hershfield, Palmer, Remis, 2010). Research estimates that if the prevalence of HIV / AIDS continues to rise among the injection drug using population, the direct and indirect costs of HIV / AIDS will likely be over \$8.0 billion dollars over a six year period in Canada (Albert and Williams as cited in Health Canada, 2001).

The costs associated with treatment of HCV related diseases such as liver failure and cancer are expected to rise as injection drug users with HCV infections advance into the later stages of the disease with advances in treatments. Research has estimated that

140,000 active and ex injection drug users will be suffering with HCV annually until 2020. The projected number of ex injection drug users who will require a liver transplant will increase from 297 in 2006 to 681 in 2026. The average annual costs (direct and indirect) associated with injection drug users who have HCV are estimated to be \$188,516,400 (Werb, Wood, Kerr, Hershfield, Palmer, Remis, 2010).

Like HIV / AIDS and other chronic illnesses the economic burden associated with Hepatitis C virus has both indirect (e.g., productivity loss, premature death) and direct health care costs (e.g., detection of infection, management and treatment) for Canadians. In terms of direct health care costs associated with transplants related to Hepatitis C, in 1998 there were 217 liver transplants, costing the Canadian Health Care System approximately 26 million dollars. Between 1998 and 2008, the need for liver transplants related to Hepatitis C infections was expected to triple; thus the health care costs associated with the Hepatitis C virus were expected to significantly increase (Public Health Agency of Canada, 2003).

## Gender as a Key Determinant of Health

Research has provided solid evidence that points to key factors and conditions called the 'determinants of health' that help provide an understanding about why some populations are healthy and others are not as healthy. The determinants of health include income and social status, social support network, education and literacy, employment and working condition, social environment, physical environment, personal health practices and coping skills, healthy child development, biology and genetic endowment, health services, gender and culture (Public Health Agency of Canada, 2010). When we consider the determinants of health it is critical to realize that much of what determines health falls

outside of the actions and interventions of the more traditional health systems and therefore requires different thinking, partnerships and actions. In other words, intersectoral public action, policy and programs which means all levels of government, non-government, organizations and communities need to work together to effectively prevent and improve health inequalities across all populations (Public Health Agency of Canada, 2007).

The terms 'sex' and 'gender' are often used interchangeably, however the meaning of these terms are considerably different (Cohen, Chavez, Chehimi, 2007; Hyde, DeLamater, Byers, 2006). Reference to a person's 'sex' relates to biological characteristics and differences that exist between males and females, while a person's 'gender' refers to roles, expectations, behaviors, attitudes of femininity and masculinity that society ascribes to males and females (e.g., what it means to be female or male) (Cohen, Chavez, Chehimi, 2007; Public Health Agency of Canada, 2010; Hyde, DeLamater, Byers, 2006). Public Health Agency of Canada has positioned 'gender' as a key determinant of health in Canada; meaning researchers, policy makers and other key decision makers are recognizing the important role gender has on influencing health outcomes in a population (Public Health Agency of Canada, 2010; Cohen, Chavez, Chehimi, 2007), in particular vulnerable populations such as female injection drug users.

Gender relations and power imbalances are often seen as root causes of gender inequalities in society and one of the most influential social determinants of health (Sen & Ostlin, 2008). Although gender impacts the health of males and females, gender inequalities often significantly impact the health of females. Gender inequalities can determine whether females have basic rights, a voice and control over their lives (Sen &

Ostlin, 2008; World Health Organization, 2011). For example, gender inequalities can determine who is sick, who is well, who provides care, and whether someone has access to programs, services and care.

Women have been typically positioned in many societies as care givers, responsible for survival, reproduction and often employed in lower paid occupations, with lower levels of education, while males have had greater wealth, better jobs, and more education (Sen & Ostlin, 2008). In many societies males continue to exercise power over decision making for females, although this may not be the case for all females, the health implications for some women can be profound (Sen & Ostlin, 2008). Research has suggested that in order to address health inequalities in society, it is necessary to improve gender equity and advocate for improving basic women's rights in society (Sen & Ostlin, 2008; World Health Organization, 2011).

## Illegal Drug Use among Women

In Canada, the prevalence of illegal drug use among the female population is generally lower than males (Ahmad, Poole, Dell, 2007; Health Canada, 2001; Health Canada, 2006; Patten, 2006), however there is evidence that suggests the incidence of drug use is increasing among women (Adlaf, Begin, and Sawka, 2005; Patten, 2006). Findings from the most recent Canadian Addictions Survey indicates that 10.2% of females have used cannabis in the past year compared to 18.2% of males; 1.8% of females report using either cocaine, speed, ecstasy, hallucinogens and or heroin in the last year, compared with 4.3% of males (Adlaf, Begin, and Sawka, 2005). A critical finding from this survey was that over 40 percent of the women, who were either former users or current users, indicated they experienced harmful consequences that they attributed to

their drug use. The most common areas that were negatively impacted by illegal drug use included physical health, social life, home life, marriage, work / studies / employment opportunities, and their finances (Ahmad, Poole, Dell, 2007).

Another important issue is that gender-neutral language is often used to describe drug use and addiction among males and females, although research has shown that their experiences, contributing factors and conditions related to drug use and addiction are very different (Poole and Greaves, 2007; Whynot, 1998). Societal and cultural norms have played a significant role in setting different behavioral standards and expectations for males and females which are continuously reinforced (Hyde, Delamater, Byers, 2006). Female injection drug users are often exposed to poor living conditions, poverty, low socio-economic status and are more likely to live with a partner who has an addiction (Anglin as cited in Gogineni, Stein, Friedmann, 2001). Women may also be dependent on their male partner for drug supplies, as well as for economic support (Pinkham, Malinowska-Sempruch, 2007).

Research findings support the notion that socio-economic positions in society not only influence access to basic material resources (e.g., food, clothing, shelter), but may also impact a series of behavioral responses (e.g., illicit substance use, crime, mental health issues), due to the psychological strain of their lower socioeconomic position (Wilkinson, 1996). Role divisions and expectations related to gender, race, class, labour, socioeconomic status and power are as prevalent in the drug culture domain as they are in the larger context of society (Measham, 2002).

## Relationships and Unsafe Injection Drug Use

An individual's social network refers to groups of individuals where social interactions occur (i.e., friendships, intimate relationships). Risks networks are comprised of groups of individuals who engage in risky behaviors which may potentially expose them to harms such as infectious diseases and drug overdose (Neaigus et al., 1994). Often persons who are members of injection drug users' social networks (i.e., family, friends, partners) are also part of their risk networks, thus it can be argued that injection drug users may be exposed to increased health harms through their social networks.

One research study among 252 methadone maintenance patients from Codac, Inc., the state of Rhode Island's largest Methadone Maintenance Treatment Program (MMTP) found continued injection drug use was highest among those who had 'live in' partners and or social partners who engage in drug use. This study found unsafe drug using practices (i.e., needle sharing) were more prominent when others were present during drug injection (Gogineni, Stein, Friedmann, 2001). This study supports the notion that social networks (i.e., intimate partners, personal relationships) influence continued injection drug use (Gogineni, Stein, Friedmann, 2001).

Research among injection drug users (males and females) living in Nova Scotia found that injection equipment such as needles and syringes are sometimes shared within the context of an intimate relationship / partner. This may be attributed to the perception that their partner is "clean" (e.g., not infected with an infectious disease) (Jackson, Bailey, Fraser, Johnson, Currie & Babineau, 2002). The practice of sharing injection drug equipment among partners who are in a committed relationship may be perceived as

a safe practice (Neaigus et al. 1994), symbolizing a bond of trust between partners engaging in drug use (Rhodes and Quirk, 1998). Sharing used syringes between two sexual partners may be seen as appropriate and signify trust, despite the associated increased health risk, while sharing with new friends may be perceived as risky (Jackson, Parker, Dykeman, Gahagan, Karabanow, 2010).

Some researchers have found that female injection drug users are more likely than males to participate in health risk behaviors, such as unprotected sex with multiple partners, sex for money or drugs without protection, sharing needles / injection equipment and having unprotected sex with a partner who injects drugs (Hartel, 1994; Patten, 2006; Health Canada, 2001). Some female injection drug users may feel they are not in the position to negotiate safer drug using practices due to the power imbalances and economic inequalities within their relationships (Whynot, 1998).

Female injection drug users have been reported to be more likely to inject in the presence of others and often experience pressure and peer influence from their partner to share injection equipment, such as needles and syringes (Whynot, 1998; Patten, 2006). Some research indicates that females are more likely to share needles and other injection equipment with a committed partner or with a close group (Barnard; Kane as cited in Hartel, 1994; Public Health Agency of Canada, 2004), while males are more likely to inject first or inject with strangers or casual acquaintances (Hartel, 1994). Some research also indicates that females are more likely to be injected by a partner / helper, especially at the first time of injection; placing them at heightened risk of being the second user on the needle (Whynot, 1998; Doherty, Garfein, Monyerroso, Latkin, 2000).

Although females in general are less likely than males to inject drugs; they have been recognized in the research as a vulnerable population who are physiologically at a greater risk for transmission of infectious diseases (Hepatitis C, HIV) than males (Health Canada, 2006; Health Canada, 2001). Female injection drug users who engage in unsafe injection practices (i.e., sharing contaminated needles / equipment) and or high-risk sexual behaviors (i.e., having sex without a condom) are at risk for poorer and even fatal health outcomes, such as drug overdose, suicide, violence, and transmission of blood borne pathogen infections (i.e., HIV, Hepatitis B and Hepatitis C) (Lennings, 2000; Fuller, Vlahov, Ompad, Shah, & Strathdee, 2005; Fischer et al., 2005; Fast, Small Wood, Kerr, 2008). Females who participate in injection drug use during pregnancy also increase the risk of transmission of infectious diseases (i.e., HIV/AIDS, Hepatitis B, Hepatitis C) to other populations, such as to children during childbirth and when breastfeeding (Health Canada, 2001; Blume, Anderson, Fader, & Marlatt, 2001). Research has found the level of substance dependence and access to clean needles are key factors linked to safer drug using and sexual practices for both male and female injection drug users (Grund et al. as cited in Hartel, 1994; Public Health Agency of Canada, 2004).

#### **Violence and Trauma**

The issue of violence is a reality for many women across society; however females who engage in injection drug use are reported to be at heightened risk and may have been previously victims of physical, mental and or sexual abuse (Whynot, 1998). One research study found that among women who were receiving treatment for substance abuse / misuse, 70% reported that they were also victims of repeated physical and sexual abuse (Wasilow-Mueller and Erickson, 2001). The women's experiences of violence

may represent their powerlessness within the context of their relationship which may translate into an inability to negotiate safer practices, which in turn increases their risks (Patten, 2006; Ploem, 2000). It is not surprising female injection drug users are also exposed to and involved in the more risky aspects of the drug culture (e.g., violence, sexual abuse, low level street dealing, sex exchanges) (Measham, 2002; Ploem, 2000), given the power dynamics and economic dependency many females experience in their societal roles and social relationships (Webber, 2007). Furthermore, research findings has shown that previous life circumstances and emotions may be contributing factors for initiation and continuation of drug use among females, especially among the female injection drug using population (Patten, 2006).

# Stigma and Discrimination among Women Who Use Drugs

Perceptions and stigmas associated with female injection drug users may create an environment of social discrimination, isolation, lower socioeconomic status and only serve to ignore the unique unmet health needs of this vulnerable population. Women who use drugs may be stigmatized as sick or deviant individuals based solely on their behaviors and life circumstances in society (Erikson & Watson as cited in Erikson, Butters, McGillicudy & Hallgren, 2000). Female injection drug users are often perceived as a threat to the more traditional gender-based female roles in society as mothers and caregivers. This may be particularly evident when the female injection drug user is pregnant and or caring for young children (Taylor, 1997). For instance, being a mother and an injection drug user are not seen by society as roles that are able to co-exist. Female injection drug users who are pregnant or who have children should be seen as a population with unique and challenging needs related to treatment and prevention efforts,

given that they may be reluctant to seek treatment or others services out of fear of losing their children and or punishment from authorities due to the legal implications of engaging in illicit drug use (Vaillancourt and Keith, 2007; Aston, Comeau & Ross, 2007; Wasilow-Mueller and Erickson, 2001).

### **Intimate and Sexual Relationships**

Many females who use drugs by injection consider sexual contact with long term partners as a safe sexual practice (Health Canada, 2006; Health Canada, 2001). Non condom use can be perceived as an act of trust or intimacy among committed partners (Pinkham and Malinowska-Sempruch, 2007). There is also the perception among some female injection drug users that if condom usage was insisted upon with their regular partner, it might imply that the female had an infectious disease (Whynot, 1998).

Research conducted by Rhode's and Cusick (2000) explored unsafe / risky sexual practices and the role that intimacy and love plays in these relationships / sexual relations among HIV-infected drug users and their partners. Findings indicate that love and intimacy were two fundamental components in relationships and intimate disclosures/encounters (i.e., disclosing one's infection status, having unprotected sex), and having trust in one another enhances the relationship by maintaining relationship safety and security. For some, having a relationship that is intimate and trustworthy may be worth the risk of transmitting an infectious disease. That is, unprotected sex may be perceived as an acceptable risk in this context (Rhodes & Cusick, 2000).

In another study, Rhodes (1997) found that among some people who inject drugs the health risks associated with unprotected sex are perceived as less significant than the health risks associated with unsafe drug use. Sharing used equipment is an understood risk, but having unprotected sex is perceived to be less risky. This finding lends support to the existence of cultural and societal norms related to unsafe sexual practices. That is, unprotected sex is perceived as a common and 'normal' part of relationships whereas injection drug use is not; thus, unprotected sex is perceived as an acceptable risk.

Rhode's research also found that some injection drug users experienced some challenges related to negotiating safer sexual practices with their partners because of power imbalances that existed within their relationship. This means that in some relationships there is an inability to negotiate safer sex because of coercion or pressure to practice unsafely by partners (Rhodes, 1997).

## **Injection Drug Use and Sex Trade**

The sex trade industry has been reported as a means of employment for some women who inject drugs (Hartel, 1994; Ploem, 2000). This type of work requires the sex trade worker to have sexual contact with individuals (clients) for the exchange of money, drugs etc. Inconsistent condom use with some clients may occur among these workers, which may increase the risk for blood borne and other infectious diseases, such as Hepatitis B, Hepatitis C, HIV/AIDS, and STIs (Patten, 2006; Whynot 1998).

One research study in Winnipeg reported over 70% of female injection drug users participated in sex exchanges, and 25% of those females reported health risk taking behaviors such as inconsistent condom usage with their clients (Elliott, Blanchard, Dawood et al. as cited in Ogborne, Carver, & Wiebe, 2001). Although the extent of unsafe practices with clients is unknown, the study in Winnipeg found 68% of female injection drug users reported failing to consistently use a condom with regular sex partners (Elliott, Blanchard, Dawood et al. as cited in Ogborne, Carver, & Wiebe, 2001).

Another study in Nova Scotia found that female sex trade workers reported relatively consistent condom use with clients (and less so with intimate partners). Although the numbers of injection drug users among the sex trade workers is unknown in this research study (Jackson, Bennett, Ryan, Sowinski, 2001), some research indicates that the sex trade work is more prevalent among women who inject drugs (Public Health Agency of Canada, 2007; Ploem, 2000; Patten, 2006).

### **Injection Drug Use in Small Town / Rural Communities**

Injection drug use is often thought of as a problem or issue affecting individuals who live in large urban settings, however, this is not always the case (Vaillancourt and Keith, 2007). Recent research findings suggest injection drug use is also prevalent in small towns / rural communities and can cause significant health problems for injection drug users (Poole and Greaves, 2007; Parker, Jackson, Dykeman, Gahagan, Karabanow, 2011; Vaillancourt and Keith, 2007; Patten, 2006). Rural communities often lack access to many basic health services, as well access to specialized supports for individuals with substance use problems are minimal or non-existent in these areas (Patten, 2006; Poole and Greaves, 2007). In some cases there may not be withdrawal management, methadone maintenance programs, needle exchange programs and / or outreach services (National Treatment Strategy Working Group, 2008). A research study from Australia examined patterns of drug use and associated health risks among rural and urban injection drug users. The study findings concluded that rural injection drug users are similar to urban injection drug users; however, access and utilization of services are limited for those living in rural areas which may have a significant impact on drug use and equipment sharing practices (Day, Conroy, Lowe, Page, Dolan, 2006).

Some injection drug users living in rural areas reported longer periods of time between testing for infectious diseases due to inaccessibility of specialized services (i.e., Hepatitis C, Hepatitis B, and HIV / AIDS) (Day, Conroy, Lowe, Page, Dolan, 2006). Another research study reported that inaccessibility of health care professionals and services are common in many rural settings (Wasilow-Mueller, Erickson, 2001), for instance, the local pharmacy may be the only place an injection drug user has contact with in a rural community.

The lack of accessible community resources and harm reduction services such as, needle exchange programs, crack kits, bleach kits, condom distribution, withdrawal management, methadone maintenance programs and outpatient services may have serious implications for drug use and equipment sharing practices among injection drug users in small towns / rural communities (Patten, 2006). It is critical research efforts focus on health promotion strategies to address risk taking behaviors and drug using practices among injection drug users living in small towns / rural communities. Yet to date very little research efforts have focused on injection drug using practices in small towns / rural communities.

## Cape Breton, Nova Scotia

There are numerous health and inequalities which exist within the geographic region of Cape Breton, Nova Scotia. Relative to the rest of Nova Scotia, Cape Breton has higher unemployment rates, substance abuse, higher disability rates, high injury rates, increased cancer rates, lower life expectancy and generally poorer self reported health status (Statistics Canada, 2008). Like many other provinces in Atlantic Canada, Nova Scotia has experienced out-migration of its population, individuals leaving the province

in search of better opportunities. In the past decade, it has been estimated that over 14% of Atlantic Canada's population migrated to another part of Canada (Beale, 2008). Rural areas in Atlantic Canada have seen the largest loss from out-migration; this is a concern given that 46% of the Atlantic Canadian population is living in rural areas (Beale, 2008). Statistics Canada reports that 45% of Nova Scotian's are living in rural communities (Statistics Canada, 2009),

Cape Breton is an example of a community which has experienced economic depression and a steady decline in population following the closure of its two major industries (coal and steel) in the 1990s (Covell, 2004; Rainham, 2002) creating economic, health and social problems. Cape Breton has a population size of just under 106,000 people, accounting for approximately 11% of the provincial population. Data indicates that there has been a population decline of 10.3 % between 1996 and 2006 (Statistics Canada, 2007). Out-migration of people, specifically young people can have serious implications for an economically depressed area (e.g., declining population, aging workforce etc.). The unemployment rate in Cape Breton is 16.2%, which is 7.1% higher than the provincial unemployment rate and for those who were employed the median income of an individual was slightly over \$20,000 dollars/per year before taxes (Statistics Canada, 2007). In Cape Breton 25.4% of the population has less than a grade 12 certificate (Statistics Canada, 2007).

Research findings report individuals who live in Cape Breton may be at a heightened risk for higher rates of morbidity and mortality; this is evidenced by high incidences of cancer, respiratory illness, cardiovascular disease, smoking rates, lower socio-economic status and depression reported in this region (Veugelers & Guernsey,

1999). According to data from the Canadian Community Health Survey conducted in 2001, 17% of people in the Cape Breton District Health Authority reported their overall health as being poor compared with the provincial average of 14.2%. People in Cape Breton also reported that they had the highest rates of stress and depression in Nova Scotia (Nova Scotia Department of Health, 2007). These manifested risk factors and conditions may have laid the ground for the illegal drug problem in Cape Breton.

There have been many reports in the local and national media of the drug problem in Cape Breton communities; in particular media attention has highlighted the awareness of prescription abuse of the pain medication OxyContin (Covell, 2004). This drug can produce euphoric effects similar to the drug heroin. Abuse of the OxyContin drug was first reported in rural and industrial parts of the United States; neighborhood characteristics of these areas included communities that were heavily reliant on labour-intensive industries and economically disadvantaged (Canadian Centre on Substance Abuse, n.d.), these communities were relatively consistent with many of the community characteristics found in the Cape Breton area.

In March, 2004 the Cape Breton Community Partnership on Prescription Drug Abuse (comprised of community agencies, community members and other key stakeholders), formed as a response to the community crisis related to the harmful use of prescription drugs, specifically the drug OxyContin, in Cape Breton, Nova Scotia (Community Partnership on Prescription Drug Abuse, 2005). The Cape Breton Community Partnership successes have included the establishment of a framework to discuss community issues, advocacy for the establishment of Cape Breton's Methadone Maintenance Program, as well as advocacy for the legislation of the provinces

Prescription Drug Monitoring System (Community Partnership on Prescription Drug Abuse, 2005) and they successfully lobbied for a methadone maintenance program. The Partnership fulfilled its mandate and disbanded in 2009.

A recent report from Nova Scotia's Medical Examiners Service (2011) analyzed deaths where drug overdose was the cause of death in Nova Scotia. Findings from this report revealed that between January 2007 and December 2010 there were 283 drug overdose deaths in Nova Scotia. Cape Breton, had the second highest drug overdose death rate in Nova Scotia (49 deaths) accounting for 17% of the total drug overdose deaths in Nova Scotia. The majority of these deaths (30 deaths) occurred between 2009 and 2010. Although Halifax had the highest occurrence of drug overdose deaths in Nova Scotia (47% of the total drug overdose deaths), it should be noted that Cape Breton's population size is a third of the size of Halifax's population (Statistics Canada, 2007). Three other areas in Nova Scotia (Colchester, Kings and Lunenburg) trailed Cape Breton; each of those areas had 18 deaths between 2007 and 2010 (Medical Examiners Service, 2011).

Despite all the media and newspaper editorials on the seriousness of illegal drug problems in the Cape Breton community (e.g., several drug deaths, street use of the prescription drug OxyContin, police crackdowns), little qualitative or quantitative research has been conducted on illegal drug use in this area. More specifically there has been no qualitative research exploring the facilitators and barriers of safer drug using practices and sexual among female injection drug users who live in Cape Breton, Nova Scotia. Such research would be useful in identifying the unique challenges for illegal users in community.

Services and supports in Cape Breton. Addiction Services, Cape Breton District Health Authority is one of the nine district health authorities in Nova Scotia that receives funding from the province of Nova Scotia to provide a continuum of prevention, early intervention and treatment services for individuals with drug use and gambling problems. Addiction Service's Opiate Recovery Program, formally known as Methadone Maintenance Program has 266 clients actively engaged in a maintenance program for opiate addiction (S.MacKenzie, personal communication, September 19<sup>th</sup>, 2011); females account for 32% of the total clients (Addiction Services ASSIST Data: Cape Breton District Health Authority, 2010). The current reported drug of choice among Methadone Maintenance clients in Cape Breton is Hydromorphone (Dilaudid); 64 % report that they have a history of injection drug use and over 30% of program clients are Hepatitis C positive (S. MacKenzie, personal communication, September 19<sup>th</sup>, 2011).

Inpatient Withdrawal Management Services, formally known as 'Detox', treated 732 registered clients for withdrawal management with females accounting for 27% of the total clients. Furthermore, 48% of the clients needing withdrawal management services reported opiates as their primary substance issue (Addiction Services ASSIST Data: Cape Breton District Health Authority, 2010). Overall, Addiction Services 'contact' with the injection drug using population has been mainly when an injection drug user comes forward to access treatment at one of the standard programs for drug addiction. In March 2009, a new private methadone program was introduced in Cape Breton called Global Recovery Program. In 2011, it was estimated that this program was treating approximately 283 clients in Cape Breton (K. MacDonald, personal communication, n.d.). It is significant to note that very few prevention efforts have

focused on the unique needs of injection drug users living in rural areas in Cape Breton, outside of the standard programs and services that mainly serve the more industrial areas of Cape Breton.

In Cape Breton local efforts to prevent the spread of blood borne pathogens through injection drug use have also been carried out through Sharp Advice Needle Exchange (SANE). SANE is a community and volunteer driven organization managed through AIDS Coalition of Cape Breton. They offer a range of services to the injection drug using population including but not limited to injection equipment distribution, anonymous testing and education (Public Health Agency of Canada, 2007). Sharp Advice Needle Exchange offer outreach services and distribution of gear off site; this service is underfunded and have had difficulties meeting the basic equipment demands for injection drug users in Cape Breton. For example in 2010 / 2011 this program distributed over 285,000 syringes in the Cape Breton area; this is a significant increase from the previous year (2009 / 2010) where 186,000 syringes were distributed (C.Porter, personal communication, September 19<sup>th</sup>, 2011).

#### **Illegal Drug Reduction Approaches**

Injection drug use is a controversial problem mixed with many emotional responses, opinions and personal beliefs about how to quickly eliminate or fix the illegal drug problem in communities. A number of initiatives have been implemented in various places that range from ways to eliminate and reduce the supply of drugs on the street to reducing the harms and demands associated with illegal drug use among the individual user and the greater population (Lennings, 2000). This section provides a description and critical review of some of the approaches used to address the problem of illegal drug use,

more specifically injection drug use. This section examines three main approaches: drug control / law enforcement, medical based interventions that focus solely on abstinence and harm reduction approaches rooted in population health – 'the new public health movement'.

### **Drug Control and Law Enforcement Strategies**

Individuals who engage in injection drug use are often perceived by the public as bad or deviant individuals who are in need of punitive or criminal consequences related to their behaviors or actions. Law enforcement initiatives such as "police drug crackdowns" are frequently implemented with the primary goal to eliminate availability of illegal drugs (Cooper, Moore, Gruskin, & Krieger, 2005; Roberts, 2008; Canadian Nurses Association, 2011) by reducing possession and sales of drugs through drug surveillance and arrests of drug users and street dealers (Cooper, Moore, Gruskin, & Krieger, 2005; Lennings, 2000). Although this approach may be perceived as a creditable strategy with media releases that report arrests of street dealers and injection drug users in communities, these types of initiatives are costly and not well evaluated to determine their success and long term sustainability in reducing the supply of illegal drugs (Canadian Nurses Association, 2011; Roberts, 2008).

There is even some evidence which suggests the prevalence of illegal drug use in communities has continued despite law enforcing efforts, and that these types of strategies may actually be more harmful then beneficial (Cooper et al., 2005). For example, reducing the supply of a particular drug may increase the street value of the drug which may have the negative consequence of increasing criminal activities to obtain the money to purchase the drug (Roberts, 2008). Research has also demonstrated the

effectiveness of needle exchange programs in reducing the spread of infectious diseases (Riley et al., 1999, Strike, Myers and Millson, 2002) yet, injection drug users may actually refrain from carrying clean syringes or obtaining syringes from needle exchange programs because they are fearful of getting "caught" by the police with the drug equipment (Cooper, et al., 2005).

There is some research findings to suggest that law enforcement strategies may actually increase the stigma and discrimination associated with injection drug (Erikson, Riley, Cheung, O'Hare, 1997). This can have serious implications for injection drug users; however, for women who inject drugs the implications can be detrimental to their health and the health of their families (Patten, 2006). For instance, research has reported female injection drug users are less likely than male drug users to seek treatment services or access programs due to the threat of punitive measures from the legal system (Pinkham and Malinowska, 2007). Female injection drug users who are pregnant or who have children often fear that they will lose their children if someone learns about their drug use. These may be possible reasons why female injection drug users fail to seek treatment for their addictions or access services when needed for themselves and their families (Erikson, O'Riley, Cheung, O'Hare, 1997; Pinkham and Malinowska-Sempruch, 2007; Whynot, 1998).

#### **Medical or Disease Model**

The medical or disease model has been a popular approach used by those working in the healthcare system to treat prevailing illnesses and 'cure' health problems (Talbot and Verrinder, 2010) including problems associated with injection drug use. The medical model is based on the ideology that drug users are sick individuals who are in powerless

situations; unable to control their drug use (Lennings, 2000). This approach often requires medical based treatments and interventions to cure the disease of addiction and drug dependence (Erickson, Riley, Cheung, O'Hare, 1997). Although this approach may address many of the immediate health concerns of addiction, such as physiological drug dependence and withdrawal symptoms, it often fails to take a more holistic approach to addiction which would necessitate an understanding and consideration of underlying root causes or influences associated with drug use. For stance, taking intersectoral action to develop policy and programs that address the factors that actually determine healthy populations (i.e., gender inequalities, unemployment, education and literacy, adequate housing).

Solely relying on a medical approach to drug addiction may increase the vulnerability among injection drug users by suggesting a high degree of helplessness. It may initiate a strong moral disapproval of injection drug users, which may lead to further stigma, isolation and the perception that drug users are less than normal or sick people who need to be cured (Lennings, 2000). The medical approach fails to consider and address gender specific experiences and needs of the female injection drug using population, such as gender inequality, power dynamics, social networks environments and physical environments which may result in poorer health outcomes for this population.

### Harm Reduction Approach - Population Health Promotion

**Harm reduction.** Harm reduction can be described as "... a policy or program directed at decreasing the adverse health, social, and economic consequences of drug use without requiring abstinence from drug use" (Riley et al., 1999, p.21). During the last

several decades harm reduction has gained a lot of popularity and been described as "...a paradigm to guide actions ..." (Roe, 2005, p.243) for drug related problems. Much of the popularity and stature of harm reduction strategies in the mid-1980s can be attributed to the public health response to reduce the spread of infectious diseases (i.e., Hepatitis C, HIV) among the injection drug using population (Riley and O'Hare, 2000; Ball, 2007).

Harm reduction initiatives aim to reduce drug related risks by setting realistic goals and recognizing that abstinence may not be a realistic goal for the drug user, especially in the short term (Riley and O'Hare, 2000; Roe, 2005). It perceives drug use as a problem the individual is experiencing rather than labeling the individual as a sick or dangerous person (Lennings, 2000). This approach respects the drug users' rights to continue to use drugs if they choose to do so (Riley and O'Hare, 2000). The individual engaging in drug use is secondary to the primary focus which aims to address the negative consequences associated with drug use and its impact on the drug user, the community and the population as a whole (Riley and O'Hare, 2000; Erikson et al., 1997). The harm reduction approach may be seen as a beneficial strategy for female injection drug users because it offers and supports individual decision making capabilities which may allow a shift in control back to females (Erickson, Riley, Cheung, O'Hare, 1997; Pinkham, Malinowska-Sempruch, 2007).

Moffat (1999) suggests that the harm reduction approach is nothing more than a creative, cost effective form of social control, where drug users are controlled through self-regulation under the careful guidance and supervision of medical and social workers (Moffat, 1999, as cited in Roe, 2005). In other words, drug users are recognized as a vulnerable group who need the help of professionals, specialized programs and services

to continue to be healthy and function in society, thus promoting the idea that drug users are permanently disabled by drug dependence.

Miller (2001) argues the harm reduction approach allows "... society to continue causing harms to individuals without accepting responsibility for or acknowledging the social, legal, and economic source of those harms" (Miller, 2001, as cited in Roe, 2005). The harm reduction approach from this perspective supports the notion of being nonjudgmental and supportive of drug use and drug users, as well the systems that have created the problems associated with drug use (Roe, 2005). Roe (2005) argued the primary focus of the harm reduction approach has centered on individual consequences and costs to society rather than on social root causes and societal responsibilities. Harm reduction from this perspective accepts that drug use cannot be prevented and instead focuses on decreasing consequences of health harms and crime both from an individual and population perspective (Roe, 2005).

Although harm reduction approach gained respect and some acceptance, the philosophy and strategies associated with this approach often generate heated controversy among health care professionals, researchers, government, the addictions community, the media and the general public (Riley et al., 1999). For instance, the initiation of programs like needle exchange and safe injection sites may be perceived by some members in society as programs that promote the continuation of injection drug use and crime.

The harm reduction approach (i.e., policies, programs, services) has its place, it can be a practical, needed, cost effective approach for the individual, community and the population, however on its own harm reduction offers little long term solutions for problems of drug use (Roe, 2005). The right mix of harm reduction initiatives may be

very beneficial, however it should be planned within the context of what is happening within a community. For example, if availability and access to a dedicated needle exchange program was expanded in a community that already had clean injection equipment widely available through pharmacies, this harm reduction strategy would have little impact on the health of the individual or community (Ball, 2007).

It is essential for policy and programs to focus on both the immediate health risks and the underlying risk conditions / influences that may result in health disparities among vulnerable populations and the population as a whole (Roe, 2005). To accomplish this it is important to understand that a range of strategies are needed to effectively deal with the problem of injection drug use, including specific strategies that may be needed for female injection drug users living in rural communities (i.e., community education, women centered treatment, active community outreach services).

Harm reduction programs. Some of the most popular and effective harm reduction initiatives that are utilized to address injection drug use in Canada include Methadone Maintenance Programs, Needle Exchange Programs, Safe Injection Sites, Community Outreach and Distribution of Safe Drug Equipment and Supplies (e.g., bleach kits, syringes etc.) (Riley, et al., 1999; Patten, 2006).

In Canada, Methadone Maintenance had its beginnings in the late 1950s, as one of the earliest forms of harm reduction (Riley and O'Hare, 2000). These programs were seen as a harm reduction approach initially designed to assist individuals who were opiate dependent to stabilize and normalize their lifestyles (Brettle as cited in Riley and O'Hare, 2000). Over time, Methadone Maintenance programs have demonstrated effectiveness in reducing morbidity, mortality, crime reduction and reduction in the spread of infectious

diseases (Riley, 1999). Program availability, accessibility and long waitlists for admissions continue to be problematic with this approach. In addition, it has been a challenge recruiting and retaining physicians to prescribe methadone for clients who are opiate dependent (Public Health Agency of Canada, 2003).

The Needle Exchange is a relatively newer harm reduction initiative which had its beginnings in Canada in the late 1980s (Public Health Agency of Canada, 2003). In Canada, there are more than 200 needle exchange programs, however there is a need to continue to expand these services, especially in small towns and rural communities, where access is limited or nonexistent (Public Health Agency of Canada, 2003; Strike, Myers and Millson, 2002). Research reports that needle exchange programs are a cost effective means of reducing harms associated with injection drug use, such as reducing needle sharing rates, reducing the spread of infectious diseases, as well as promoting linkages with health care services and supports (Riley et al., 1999; Strike, Myers and Millson, 2002). Research findings also report that there is no association between needle exchange programs and the increase in number of individuals injecting drugs, nor is there a decrease in age for initiation of drug injection relative to these programs (Public Health Agency of Canada, 2003).

Safe Injection sites are areas where injection drug users can obtain clean injecting equipment, condoms, seek medical attention or have a safe environment to inject rather than using in public places (Riley et al., 1999). Canada's 'Supervised Injection Facility' in Vancouver is one of the most controversial harm reduction approaches in North America. This site opened as a harm reduction initiative where injection drug users could use a supervised facility to inject their own heroin and cocaine (Wood, Tyndall,

Montanter, Kerr, 2006). Evaluations of the Vancouver safer injection facility have shown this harm reduction initiative has decreased publicly discarded needles, decreased needle and drug equipment sharing among injection drug users and increased uptake of withdrawal management services. Furthermore, this harm reduction initiative has not been associated with increased criminal activity (Wood, Tyndall, Montanter, Kerr, 2006). The process of developing, implementing and sustaining harm reduction initiatives can be very complex, even when the evidence supports the initiative, this is evident given there was a pending closure of the Vancouver's Safe Injection Site despite its demonstrated effectiveness (Hwang, 2007).

Harm reduction initiatives aim to reduce the negative consequences and health related harms among populations engaging in risky behaviors, such as injection drug use, needle and drug equipment sharing, unprotected sex (Riley, et al., 1999; Erickson, 1997), therefore research is advocating specialized policies, outreach services, treatment and safe injection sites to address health risks (Lennings, 2000). It is important to recognize and understand that although some prevention / risk reduction approaches such as Methadone Maintenance programs, needle exchange programs and safe injection sites are used to address the risks associated with injection drug use, they may also create controversy in some communities. If initiatives are to have long term success and sustainability, decision makers and researchers must carefully consider the unique needs, interests and characteristics of the female injection drug using population and the community (Mittelmark, 2001) and then tailor strategies to meet the unique population and community needs (Stokwell, 2008 as cited in Roberts, 2008).

**Population health.** Population health can be best described as a public health approach, which aims to improve health and reduce the health inequalities among the entire population (Public Health Agency of Canada, 2001). It differs from other models used in healthcare because it strives to address contributing factors known as the determinants of health which are known to have direct and indirect consequences on the health of the population, where as other approaches focused solely on individual risk factors for disease (Health Canada, 1998).

Health Canada recommends utilizing a population health approach, as part of a comprehensive strategy to reduce the harms associated with injection drug use among the Canadian population (Health Canada, 2001). A population health approach is useful in addressing problems associated with injection drug use because it focuses on improving health outcomes by dealing with the immediate individual health and social risks and by examining a wide range of underlying conditions such as gender, socio-economic status, living conditions, work conditions, access to health services, culture (Public Health Agency of Canada, 2010; Public Health Agency of Canada, 2001; Nova Scotia Department of Health, 2002) that can result in health disparities and inequities among populations, such as female injection drug users living in small towns / rural communities.

**Health promotion.** The World Health Organization has largely been responsible for positioning health promotion as a comprehensive investment strategy that will benefit society in both short and long term social and health outcomes (Viney, Hass & Seymour, 1996). The Ottawa Charter for Health Promotion defined health promotion as "... the process of enabling individuals and communities to increase control over and improve

their health" (World Health Organization, Health and Welfare Canada, Canadian Public Health Association, 1986, p.2).

Although, worldwide the concept of health promotion and prevention has been recognized as the prescription for a healthy society (Wass, 2002). It is important to recognize and understand that if health promotion and prevention initiatives are to be successful in addressing and influencing policies and research across health sectors, strategies should not be confined solely to any one approach, (i.e., behavior modification approaches, policy, harm reduction approaches) (Wass, 2002). The future creditability of health promotion and prevention lies within its capacity to address the unique health needs and barriers of individuals, in this case female injection drug users living in small towns / rural communities by utilizing and implementing comprehensive strategies and encouraging active participation / partnerships across all sectors (Levin and Zigilio, 1996).

Given the number of risk factors and conditions that may contribute to the problem of injection drug use among females living in small towns / rural communities, a combination of health promotion and prevention strategies may be needed rather than one single strategy in isolation. The Ottawa Charter for Health Promotion identifies five key action areas: building healthy public policy, strengthening community action, developing personal skills, creating supportive environments, and reorienting health services (WHO, 1986). In order to adequately address public health problems like injection drug use in small towns / rural communities and to have the greatest success with population health outcomes, these five action areas need to be used collectively rather than in isolation (Kickbusch, as cited in Talbot and Verrinder, 2010). For example, researchers and policy

makers need to engage vulnerable populations like female injection drug users and the community when developing policies and programs specific their unique needs.

Research supports the notion of utilizing health promotion strategies within a harm reduction framework, with the goal of minimizing risks and harms associated with injection drug use and implementing strategies which focus on promoting health and avoiding diseases among vulnerable populations (Riley and O'Hare, 2000). Engaging vulnerable populations in the process of research by exploring their experiences and stories and implementing public polices, programs that address their unique needs, as well as mobilizing community support and resources for new initiatives right from the start. For example, the issue for female injection drug users in small towns / rural community may be accessibility to needle exchange programs, but other factors and conditions that may influence safer drug practices need to be considered. Factors and conditions that are unique to a particular population living in a small town / rural community (i.e., transportation, money, child care, stigma and discrimination, gender).

Health promotion and harm reduction approaches emphasize the importance of empowering individuals (i.e., injection drug users) in an effort to reduce health inequalities and improve health outcomes within supportive environments (Riley and O'Hare, 2000). Determinants of health identify health disparities among vulnerable populations, such as female injection drug users living in small towns / rural communities and work with communities, government, nongovernment, organizations to implement strategies that may benefit the health and wellbeing of the entire population (Senate Subcommittee on Population and Health, 2009). Health promotion and harm reduction strategies promote individual and community action, as well as environmental change.

They refrain from relying solely on individual behavior modification strategies to reduce risk, rather they address environmental conditions aimed to reduce health inequalities and improve health outcomes (Rhodes, 2002).

#### CHAPTER 3 METHODOLOGY AND STUDY DESIGN

#### Introduction

This chapter presents an overview of the methodological approach to this study. It also provides a brief overview of feminist theory as this theory provided a guiding framework. In addition, this chapter includes a description of the research design, participant inclusion and exclusion criteria, procedures for participant recruitment, data collection and management and the analysis of the research findings. It concludes with a discussion of the plans for dissemination of the research findings.

### **Constructivism Paradigm**

The constructivist paradigm was selected to guide this exploratory research. Constructivism assumes that there are multiple subjective meanings, and that there are often shared meanings with any group (Guba and Lincoln, 1994). These meanings are often formed through social interactions and cultural norms (Creswell, 2003; Slife & Williams, 1995; Guba and Lincoln, 1994).

The validity of any research inquiry depends on whether it describes the reality that exists accurately (Guba & Lincoln, 1989). In this case, a human inquiry must describe the 'truth' from the data collected. In constructivism, truth has been defined as "...most informed and sophisticated construction on which there is consensus among individuals most competent to form a construction" (Guba & Lincoln, 1989, p.86). From this perspective the interactions between participants and the researcher involve a process of seeking to understand and reconstruct the beliefs and meanings held by both. The aim of this process is to work towards consensus between the research participants' experiences and the researcher's interpretations. It is necessary to be open to new

interpretations by uncovering, refining, improving and sometimes replacing constructions of realities, thereby creating new knowledge (Guba & Lincoln, 1994). Interactions during the research process reveal constructions that can challenge the researcher's own beliefs and meanings, but this leads to new constructions and the realization that multiple constructions may exist side by side; as long as they meet the criteria in the definition of 'truth' (Guba & Lincoln, 1989).

A criticism of the constructivist paradigm is that it places the researcher in dual roles as both a participant and a facilitator, which some argue expands the role beyond what is a reasonable expectation for the role of the researcher in the research process (Guba & Lincoln, 1994). However, within the constructivist paradigm, the researcher's role(s) of facilitator and participant improve the research process as both the researcher and participants become more actively engaged in constructions of realities (Guba & Lincoln, 1994).

# **Feminist Theory**

Feminist theory seeks to study and understand conditions that shape the lives of women, and explore what it really means to be a woman living in society (Jackson and Jones, 1998). It is guided by the political aims of the Women's Movement. In the early years (18th through early 20th centuries) feminist theory sought to understand and change the subordination, exclusion and marginalization of women within society (Jackson & Jones, 1998). The second wave of feminism began in the 1960's, as feminism became more focused on the inequality of opportunities for women in work, political influence and the attitudes held towards women in the personal sphere (Payne, 2005). Feminist perspectives have evolved as a vast field of learning that continue to develop, diversify

and contribute through the ongoing process of debate, critique and reflection on the experiences of women (Jackson & Jones, 1998).

There are many perspectives within feminism from a liberal approach that seek to promote the interests and experiences of women within existing structures in society, to more radical approaches which focus on patriarchy and advocate for sweeping changes in society (Campbell & Bunting, 1991). Although feminist thinking and approaches are diverse, feminist research has the primary goal of presenting women centered patterns of experiences, which create knowledge that will hopefully improve the lives of women in society (Jackson & Jones, 1998). Feminist research focuses on advocating for attention and action directed towards helping marginalized populations (Creswell, 2003).

Gender-specific experiences and meanings relative to women are often missing in social science research, and what we consider as knowledge has often been framed and produced by men (Polifroni & Welch, 1999). Feminist researchers seek to ensure that the voice of women is heard, and that there is an understanding of the conditions of their life. Therefore, to develop an understanding of the perceptions of risk and experiences related to the facilitators and barriers of safer drug use and sexual practices among female injection drug users, it is important to engage women in the research process in order to capture their stories and experiences. The perspectives of women allow us to understand the meanings they have of the world in which they live, and the ways in which these meanings are shaped by the conditions of their life.

A feminist perspective within a constructivist paradigm was utilized in this study. The goal of this research study is to describe the realities of female drug users living in small towns / rural communities, and the meanings they gave to their world

depicted through their experiences (Seibold, 2000). This research study speaks to social inequalities, gender constructions and the health needs of a marginalized population that has been previously ignored in society (Olesen as cited in Creswell, 2003; Amaro, Raj & Reed, 2001). This research study viewed gender as a critical component that shaped the lives of women. In other words, the researcher used a feminist lens to view and interpret meanings and beliefs relative to the women in this study.

In this research study advocacy means providing a 'voice' for female injection drug users and raising awareness of unmet health needs among this vulnerable population (Creswell, 2003). Feminist research seeks to develop a better understanding of the position of women as an oppressed social group in society (Oakley, 1990). This study was conducted so as not to further oppress this population (Tri-Council Policy Statement: Ethical Conduct for Research Involving Humans) but allow them to tell their stories and talk about their experiences thus enabling the researcher to develop an understanding of the unique experiences of the population. This research study relied on the understandings and meanings that female injection drug users living in small towns / rural communities in Cape Breton, NS held about safer and unsafe drug use and sexual practices, with a particular focus on the participants' perceptions of the barriers and facilitators to safer and unsafe drug use and sexual practices. The researcher conducted this research with the expectation that this study would add new knowledge to inform policy and practice, thus helping to improve health outcomes and reduce health inequalities among women who inject drugs.

The researcher identified with female participants by listening and trying to perceive the experiences, beliefs and concerns from their perspective. When working

with vulnerable populations such as female injection drug users, the researcher's level of education, socioeconomic status and position in the community may influence perceptions and interpretations of the participants' experiences and meanings. Therefore, it was important for the researcher to recognize and consider the potential power imbalances and pre-existing bias and make every effort to ensure the relationship between the researcher and participants was one of equality, or as close to equal as possible. In other words, the researcher worked in partnership with the participants rather than the researcher imposing her expertise on the female participants (Mies, 1983 as cited in Wass, 2000).

## **Grounded Theory Methodology**

A qualitative research framework was selected for this research study in order to develop an in-depth understanding (Patton, 2002) of the day-to-day lives of female injection drug users. This study utilized inquiry strategies from a grounded theory design. Grounded theory is a useful design to use in areas in which little research has been conducted (Gillis and Jackson, 2002). Grounded theory methods seek to understand and explain behavior; the researcher is interested in developing an understanding of the meanings people give to their actions (Gills and Jackson, 2002). In some instances, the goal of using grounded theory design is to develop a theory that explains underlying social and psychological processes (Gillis and Jackson, 2002). However, in this research study there was no intent by the researcher to develop a theory; rather the research findings provided a conceptual understanding of the lives of eight female injection drug users living in small towns / rural communities, and their perceptions and experiences of safer and unsafe drug use and sexual practices (Corbin and Strauss, 2008). Key themes

emerged from the data which represent the researcher's understandings of the participants' experiences (Corbin and Strauss, 2008).

#### Methods

In order to develop an in-depth understanding of the barriers and facilitators related to safer drug use and sexual practices among female injection drug users, one-on-one, face-to-face interviews were conducted using a semi-structured interview guide (See Appendix A). Semi-structured questions enabled the researcher to gather responses from the viewpoint of female injection drug users. More specifically the researcher was interested in exploring how factors such as relationships, social roles, small town / rural living, and stigma may have functioned as facilitators and / or barriers to safer practices among this population. The researcher utilized quotations, to demonstrate the women's emotions, experiences and perceptions (Patton, 2002).

The research questions allowed participants to describe their own meanings and understandings of their experiences. The following are examples of the research questions: What is a typical day like when you're injecting drugs? What does safer and unsafe drug using and sexual practices mean to you? What are the facilitators and barriers influencing your ability to practice safer injection / sexual practices? Tell me about the services / supports in your community that help you practice safer sex / drug use? These types of questions allowed the researcher to gather responses from the perspective of the participants as they had individually constructed subjective realities of barriers and facilitators to safer drug use and sexual practices, as well as perceptions on how being a women and living in a small town / rural community influenced these barriers and facilitators.

This research study received ethics review and approval from the Dalhousie Health Sciences Human Research Ethics Board, and the Cape Breton District Health Authorities Ethics Board prior to beginning recruitment and data collection / analysis.

### Participant Selection – Inclusion and Exclusion Criteria

This study sought to interview eight to ten English speaking female injection drug users, between the ages of 18 to 35 currently living in a small town / rural community in Cape Breton, Nova Scotia. The researcher was interested in studying this population of women because research from the perspective of young female injection drug users living in small towns / rural communities is limited, and injection drug use among young females appears to be growing at rapid rate (Public Health Agency of Canada, 2009). All of the women had to self-identify as an injection drug user and who had participated in injection drug use within the past year. Interviewing women who injected drugs within the last year allowed the researcher to capture recent life experiences related to facilitators and barriers to safer drug use and sexual practices that women encountered. For the purpose of this research study, small town / rural living referred to persons living outside the commuting zone of the larger urban center of Sydney, Cape Breton (Statistics Canada, 2002). The target areas were small towns / rural communities such as New Waterford, Glace Bay, North Sydney, Sydney River, Port Hawkesbury, Baddeck, Inverness etc.

#### Recruitment

A purposive strategy was utilized to recruit participants for this research study (Patton, 2002). The following section outlines the three main strategies that were utilized for participant recruitment.

1) Contacts with local service providers and agencies. Contact was made by the researcher with the Sharp Advice Needle Exchange Coordinator to help with participant recruitment for this study. Sharp Advice Needle Exchange offers a variety of services and supports including needle exchange, community outreach, and harm reduction education to people who inject drugs in Cape Breton, Nova Scotia.

Contact was also made with the program managers at Addiction Services Withdrawal Management, Daytox, Community Based Services, and the Methadone Maintenance Program. These programs offer a variety of services and supports including community outreach, withdrawal management, counseling, day withdrawal management, programming, and methadone maintenance to clients experiencing addiction related problems in Cape Breton. The program managers were agreeable to assist with participant recruitment for this study. This community partnership provided increased awareness of the existence of this study among potential participants by providing them with information on how they could get involved in this study. A poster with the study description and the contact information was displayed in the agency (See Appendix B).

In addition, contact was initiated by the researcher with the Global Psychiatry Research Inc. program coordinator. This is a community based private Methadone Maintenance Program offered in Cape Breton. The program coordinator was agreeable to assist with the participant recruitment for this study. This entailed increased awareness of the existence of this study among potential participants by providing them with information on how they could get involved in this study. The poster with the study description and contact information was displayed in the agency (See Appendix B).

- 2) Recruitment posters. Advertising this research study was done by hanging posters (See Appendix B) at local agencies including Addiction Services, AIDS Coalition of Cape Breton, Sharp Advice Needle Exchange, local pharmacies, and Community Services. Community groups such as the Hepatitis C support group were also used as a venue for the posters.
- 3) Snowballing technique or "word of mouth". After the completion of interviews, each participant was asked if they knew of any other female injection drug users that met the study's inclusion criteria, who would be willing to participate in this research study. If they did know a potential participant, they were asked to refer the person by passing on the researcher's contact information to the potential participant.

Effectiveness of recruitment strategies. Some participants reported that they retrieved information about the study from recruitment posters hanging in an organization/ pharmacy (4 participants), some participants were informed about the study by a local service provider and were then directed to the recruitment poster for additional study information (2 participants), and other participants noted that they had heard about the study through a friend (2 participants). Hanging posters in local agencies and community settings proved to be the most effective method for participant recruitment.

#### **Data Collection**

Participants made initial contact with the researcher via telephone. During this initial phone call each participant was given a verbal overview of the study, the inclusion and exclusion criteria, and the study's procedures. Any questions that the participants had were answered at this time. If the participant was agreeable to take part in the study, the researcher set-up an interview by providing a date, time and location.

Prior to commencing the interviews each participant was asked to provide verbal consent. Written consent was not obtained in an effort to protect the confidentiality of the participants due to the legal implications of participating in injection drug use. The researcher verbally reviewed with each participant a participant consent form (See Appendix C), prior to having each participant confirm on audio-recording that they agreed to participate. The researcher documented that verbal consent was given (See Appendix D).

The researcher informed each participant that their participation in the study was voluntary and that they could refuse to answer any of the questions or withdraw from the study at any time. Each participant was given an opportunity to ask questions or raise concerns with the researcher. Participants also had the opportunity to contact the researcher within a two-week period after completing the interview if they wished to add, delete or change any part of their interview. Although this was an option for each of the participants, none of the participants chose to contact the researcher after the interview was completed.

Socio-demographic (See Appendix E) information about each participant was collected at the beginning of the interview. Participants were given the choice of either completing the form on their own or by having the researcher ask them the questions. This information was collected in order to have an understanding of the participants' socioeconomic status, relationship status, age, and injection drug use history.

The interview guide (See Appendix A) was developed with the researcher's thesis committee members and supervisor. The guide included semi-structured questions with probes. Field notes and reflexive journaling were completed following each interview

and throughout the data collection process. These processes helped to capture the researcher's emotions, feelings and responses during the data collection phases (Corbin and Strauss, 2008). It was essential for the researcher to review the journaling and field notes during data analysis, as this helped to examine the researcher's influence on the data (Corbin and Strauss, 2008). The socio-demographic questionnaire and the semi-structured interview guide were pilot tested twice to determine whether or not the interview questions needed to be modified for the study. The data gathered from the pilot tests were not analyzed or used in the research findings (See Appendix F and G for Consent Forms).

Each interview was held in a quiet, comfortable private office located in a community / local agency in Cape Breton, NS including but not limited to: Addiction Service's offices in Sydney, New Waterford, Port Hawkesbury; Sharp Advice Needle Exchange Program office located in Sydney and an office located in a community based methadone maintenance clinic in Sydney. These office spaces ensured the confidentiality and safety of both participant and researcher. Each interview took approximately 1-1.5 hours to complete. At the end of the interview a list of community services and supports was provided to each participant, so they were aware of the services and support in their communities that they could access if they chose to do so (See Appendix H).

Prior to commencing each interview the participants were explicitly asked not to reveal any information related to infectious disease status as it was not the intent of this study to collect any information related to participants' disease status. In fact, due to the sensitive nature of information pertaining to one's infectious disease status the following statement was read to each participant (as per instructions of Dalhousie's Ethics Review

Committee). "If you have HIV/AIDS or are Hepatitis C positive, you have a legal responsibility to disclose your HIV/AIDS and / or Hepatitis C status to people who are potentially at risk by having contact with you. Some people believe you also have a moral responsibility to do so" (See Appendix I).

Participants were made aware of the limits to confidentiality, which are imposed on researchers including the duty to report disclosure of suspected child abuse or neglect, or the abuse and / or neglect of an adult in need of protection. Also, each participant was notified that their identity and the information they provided would not be shared with the authorities, unless the researcher was required to do so by law such as when a transcript is subpoenaed.

Each participant was given an honorarium of \$20.00 to help compensate for time lost and / or costs associated with the interview. Each participant gave verbal consent that they had received the \$20.00 honorarium, and the researcher documented consent was obtained on the Honorarium Consent Form (See Appendix J). Each participant was informed that if they chose to stop the interview or withdraw from the study, the twenty-dollar honorarium would still be provided. As per Dalhousie University Ethics guidelines participants were also told that even though they would not receive a T4 slip confirming this income, they should include it as extra income on their tax return for 2010.

#### **Data Management**

The interviews were audio-recorded and then transcribed verbatim by a transcriber who was required to sign a confidentiality form (See Appendix K). The transcripts were reviewed against the digital audio-recordings by the researcher to ensure the accuracy of the transcripts. All audio-recordings were destroyed immediately

following completion of the transcription process because there may have been identifying information on the audio-recordings, which were removed by the researcher from the transcripts. Each interview was assigned an identification number and code to distinguish one transcript from the other, for example: I#1  $\rightarrow$  Interview # 1.

The hard copies of the transcripts / data were stored in a locked file cabinet in the researcher's home office in Cape Breton, NS. The researcher was the only person to have access to this locked filing cabinet. The electronic copies of the transcripts were stored on a password-protected memory stick which when not in use was stored in the locked filing cabinet. For data analysis / management, the researcher's personal, password-protected laptop computer was used with the researcher being the only person to have access to the computer. The researcher, Samantha Hodder had access to the raw data, and the researcher's supervisor, Dr. Lois Jackson, had access to the themes, several quotes taken from the transcripts, and preliminary findings. The interviews were downloaded into Atlas Ti for data management.

# **Data Analysis**

The transcripts were read and re-read by the researcher, and categories were identified in the transcripts utilizing open coding. This involved the researcher reading each line of the transcript and identifying, describing and labeling the concepts found in the data (Corbin and Strauss, 2008). The key concepts were then identified, compared and contrasted. The researcher organized the concepts into core categories, which were labeled with a code (Corbin and Strauss 2008; Given, 2008). Corbin and Strauss (2008) refer to this process as "conceptual ordering". After conceptual ordering was completed the researcher grouped the similar categories into key themes and sub-themes were

developed (Given, 2008). The researcher utilized conceptual maps to assist in the ordering of the themes, this involved the researcher examining the relationship and linkages between the themes and sub-themes. To do this the researcher examined each theme to identify the underlying issue or problem and then created headings to help identify similarities and differences among themes and subthemes. These processes helped the researcher link and organize the data (Given, 2008). Atlas ti, computer-assisted qualitative software was used to assist with data management. The researcher's supervisor and committee members provided ongoing feedback regarding the formation of concepts, categories and themes.

Researcher's position. It was important for the researcher to recognize how preexisting biases related to her personal / professional background and experiences might
influence her interactions with participants and interpretations of the data. The researcher
is a Caucasian female of middle class status, who lives in a small town in Cape Breton,
Nova Scotia. The researcher has lived in Cape Breton, NS for most of her life and has
been exposed to some of the social, political, economic issues that exist in Cape Breton,
NS. For example, high rates unemployment, poverty, out migration of citizens to obtain
employment, media attention related to drug use and drug related deaths and the
existence of stigma and discrimination towards people who use drugs in the community.

The researcher has a Bachelor of Science in Nursing Degree, with an advanced major in Nursing from Cape Breton University / St. FX University. The researcher also has experience working with people who engage in substance use through her employment as a Registered Nurse on the Inpatient Withdrawal Management Unit in Cape Breton as well as her most recent role as the Manager of Health Promotion and

Prevention at Addiction Services, Cape Breton District Health Authority. All of the participants were made aware at the beginning of the interview that the researcher held a position as one of the managers at Addiction Services. This did not appear to influence the type of information disclosed by the participants as they appeared to be very honest in discussing their day-to-day lives. However, the researcher cannot know for certain if her educational background and work history influenced the stories the participants relayed about their lives.

Through the process of reflecting on how her background and the research process, it became clear to the researcher that her understanding of drug use and female injection drug users in particular, changed over the course of conducting the research. Specifically, she developed a new understanding of, and appreciation for, the day-to-day challenges and needs in the lives of female injection drug users.

#### **Ethical Considerations**

The researcher implemented many measures to safeguard the anonymity of the participants, and the confidentiality of the information that each participant provided. For example, given the legal implications of discussing injection drug use and the sensitivity of the information, participants were being asked not to discuss names and aliases during the interview process. The researcher did not collect any personal identifying information and any personal identifying information that was mentioned throughout the interviews was removed from the transcripts. Each participant was made aware that they would not be personally identified in any reports or publications.

As per Dalhousie's University Policy on Scholarly Integrity and as indicated on the consent form, the data will be securely retained for a period of 5 years postpublication at Dalhousie University, Halifax, NS in a locked filing cabinet in Dr. Lois Jackson's office (Dalhousie University).

### **Research Quality**

# Study Limitations and Methodological Rigor

Recruitment: contact with local service providers. The researcher acknowledges that there were some limitations with the recruitment strategy in this study. The researcher's main recruitment strategies were through contacting service providers in Cape Breton and recruitment posters. Notably all of the women who participated in this research study had some form of contact with services and/ or supports in Cape Breton, NS (i.e., Addictions, methadone programs, needle exchange services etc.). As a result, the experiences of injection drug users who did not access services are not part of this study.

Social context. When analyzing and interpreting the findings it was important for the researcher to consider the social context in which the data were collected (Radcliffe, 2011; Rhodes, Bernays & Houmoller, 2010). In particular consideration was given to the fact that the data were collected in a small town / rural place where there has been substantial media and public attention given to the drug problem in the community (i.e., drug related deaths, examination of service utilization, police crackdowns etc.). This context may have influenced what participants said because they may have been concerned that in a small town 'everyone knows everyone's business' and they may have had difficulty believing in the confidentiality of the research. It should be noted that the participants appeared to be comfortable and willing to disclose information to the researcher pertaining to their day-to-day lives and their drug use and sexual practices.

#### **Credibility of Research Findings**

Credibility refers to the accuracy of the descriptions of the research findings (Guba 1981 as cited in Lincoln and Guba, 1985; Shenton, 2004; Gillis and Jackson, 2002). The credibility of the research methods depend on the skill level, competence and methodological rigor of the researcher collecting the data (Patton, 2002). In this research study the credibility has been enhanced by the researcher taking into account pre-existing biases, by capturing and respecting the multiple perspectives of participants under investigation and developing a trusting relationship with the participants through the development of a rapport (Patton, 2002; Creswell, 2007). The researcher developed a report by utilizing a non judgmental approach, being reliable, holding the interviews in a comfortable / quiet environments, effective communication, actively listening and allowing the participants to tell their story. Peer debriefing was also done with the researcher's supervisor, Dr. Lois Jackson. The peer debriefing process involved discussing the study's design and methodological approach, discussing the interviews seeking advice and feedback on the interpretations of the findings. Peer debriefing with an experienced researcher adds to the credibility of the research findings (Lincoln, Guba as cited in Creswell, 2007; Patton, 2002). In addition, the researcher's thesis committee provided feedback on the research, including the quality of the study's design, methodological procedures, and analysis (Patton, 2002).

#### **Transferability of Research Findings**

Lincoln and Guba (1985) propose that transferability in qualitative research is an analog to external validity (generalizability) in quantitative research (Lincoln and Guba, as cited in Patton, 2002). With qualitative research, the researcher collects information

about a small number of people, giving the researcher the ability to develop an increased understanding of participants' experiences and situations (Patton, 2002). It is not the intent for the findings in this research study to be generalized, however transferability of the findings is enhanced by the researcher describing details of the study / contexts, thus permitting other researchers to make comparisons with other contexts or settings. Examples of such detail include the characteristics of the sample, the setting, the data collection processes, and the key themes that emerged from the data. This level of detail allows other researchers to determine whether or not the findings from this research study can be transferred to other contexts and settings (Erlandson et al. as cited in Creswell, 2007; Gillis and Jackson, 2002).

# **Dependability and Confirmability of Research Findings**

Dependability refers to the extent to which the researcher of another investigation, possessing similar knowledge and similar methodology training, makes the same or similar observations (Gillis and Jackson, 2002; Shenton, 2004). The researcher described in detail the research design and methods used in the study, thus allowing for other researchers to assess the research practices and their effectiveness. This enables other researchers to replicate the study's methods if they chose to do so. Reflexive journaling was also done in this study which supports the dependability of the research findings (Patton, 2002); it allowed the researcher to reflect on the research processes, account for changes in context and evaluate the effectiveness of the data inquiry approaches utilized.

Steps were taken to ensure that the findings that emerged from the data are the experiences of the participants rather than the preferences of the researcher (Shenton, 2004). In order to do this the researcher recognized and admitted to pre-existing biases,

utilized quotations from the participants to support the key themes and sub themes that emerged from the data, checked and re-checked the data and provided a detailed description of the methodological process used (Shenton, 2004). These strategies help to enhance confirmability of the research findings, as providing detailed descriptions will allow other researchers to determine the degree to which the results can be confirmed.

#### **CHAPTER 4 RESULTS**

#### Introduction

This chapter presents an analysis of data gathered from interviews conducted with eight female injection drug users living in small towns and rural communities in Cape Breton, Nova Scotia. It presents participants' socio-demographic background information, a brief summary of the women's injection drug history, and three key themes relative to the facilitators and barriers to safer injection drug use and safer sexual practices among the women. The three themes are as follows:

Theme I: The Day-to-Day Lives of Female Injection Drug Users (IDUs) Living in Small Towns / Rural Communities.

Theme II: Safer and Unsafe Injection Drug Use and Sexual Practices.

Theme III: Services and Supports for Female Injection Drug Users Living in Small Towns / Rural Communities.

Quotes from the interviews are provided and are identified by codes. For instance, code I#8 refers to interview number eight.

# **Socio-demographic Background Information**

The eight participants in this study were English speaking women, who self-identified as Caucasian, and were between the ages of 20-31, with the average age being 25 years. All of the women reported that they lived in a small town / rural community in Cape Breton, and used drugs by injection within the past year (See Table 1). At the time of the interviews, the majority of the women (six of the eight) were involved in a committed relationship (i.e., married, living together or had a committed partner), and two of the women reported being single or not involved in a committed relationship. Six

of the eight women were sexually active at the time of the interview. Seven of the eight women had children and / or were pregnant (two women were pregnant at the time of the interview). Four of the women had not completed high school, one had completed high school, and three had some post secondary education. The majority of the women (six of the eight) indicated that their source of income was through income assistance, and two reported they had formal employment.

All of the women indicated that they had lived in a small town / rural community for at least two years, and six reported they had lived in a small town/ rural area for over ten years. Most of the women lived in Cape Breton for at least five years with the exception of one woman, who lived in Cape Breton for only two years. All of the women had lived outside of Cape Breton at some point in their lives, and three out of the eight women reported they had relocated for a period of time for employment opportunities.

All of the women who identified as being in an intimate sexual relationship at the time of the interview (six of the eight) reported that their partners engaged in drug use at some point during their relationship. The two women who did not identify as being in an intimate relationship indicated that they were involved in intimate sexual relationships in the past with persons who engaged in injection drug use.

Table 1 Socio-demographic Summary of Female Participants

n=8	Number (%)	
Ethnicity (self-reported)		
Caucasian	8	(100%)
Age at time of the interview (years)		
20-24	5	(62.5 %)
25-31	3	(37.5 %)
Education		
Less than High School	4	(50%)
Completed High School	1	(12.5%)
Some Post-secondary	3	(37.5%)
Income Sources		
Income Assistance *	6	(75%)
Formal Employment	2	(25%)
*Income Assistance includes disability pensions, social		
assistance, Employment Insurance benefits.		
Length of Time Lived in a Small Town/ Rural Community		
2 years	2	(25%)
10 years	1	(12.5%)
> 20 years	5	(62.5%)
Length of time lived in Cape Breton, NS		
2 years	1	(12.5%)
7-10 years	2	(25%)
>18 years	5	(62.5%)
Lived outside of CB, NS for a period of time		
Yes	8	(100%)
Relocated outside of CB, NS for a period of time for		
work		
Yes	3	(37.5%)
No	5	(62.5%)

# **Injection Drug History**

Discussions with participants about their injection drug use revealed that most of the women (six of the eight) started injecting drugs in their early twenties, and two of the women reported they started injecting drugs in their teenage years (See Table 2). The length of time the women reported injecting drugs varied from one year to eleven years. All of the women spoke about injecting opiates, and four of the eight women also talked about injecting cocaine. Six women reported they had been receiving methadone

maintenance treatment for opiate dependence. Some of the women had been on the program for a few months; however, they had injected opiates within the last twelve months. All of the women indicated they were poly-substance users, or in other words that they used more than one type of drug, such as cocaine, marijuana, ecstasy etc.

### **Initiation into Injection Drug Use**

Each participant was asked to reflect back to when she first began injecting drugs, and to describe what was happening at that time in her life. Many of the women spoke about starting to inject because they were curious and wanted to see what injecting drugs was all about. They also recalled experiencing some pressure to start injecting drugs from people in their lives who were also injecting drugs. These people included male partners, family, and close friends. A number of women spoke about starting to inject because their boyfriends were injecting drugs and they wanted to be a part of what their boyfriends were doing. One woman explained that her boyfriend was always away from the home when he was injecting drugs because he was looking for his next fix, and she felt isolated from his life. As described below, she decided to start injecting drugs in an effort to be part of his life, and she was curious to see what 'the big fuss was about'.

I started [injecting], this is going to sound so stupid, but umm my boyfriend and I had a child at the time and he was always out running around [using], doing his own thing... it was horrible, but then like one day well "I wanna try, I wanna know why your [her boyfriend] always out running the roads, yanno why can't ya [her boyfriend] stay home". And I went straight to shooting; I didn't snort it or anything, right to banging it. And I sit here every day and say why did I do it, but

anyway yup, that's what I did, just for something to do, to see what the big fuss was about. (I#4)

Another woman reported that she started to inject drugs because she was feeling influenced by people around her who were also injecting, and in particular her mother and close friends. She explained, "...my mom was using and everything else, so it was just like well I see everybody else using so I may as well use, all my friends use ..." (I#7). This woman also indicated that at the time she began using, she was dealing with a lot of trauma and stress in her life, specifically the recent death of her ex-boyfriend and the removal of her daughter from her care by social services.

...my boyfriend got murdered [a month before she starting injecting]... I was just so traumatized... so they [ex-boyfriend's brother] did it for me [injected her]... one feeling and I was hooked... Plus at that time I was in the process of my daughter being taken away by social services. (I#7)

Wanting to get a better 'high' from drugs was also cited as a reason for starting to inject drugs. As one women states, "...my boyfriend, he was doin it all the time so and I was doin it in other ways but I never tried shootin... and ya get a better high off injecting it" (I#2).

Table 2 Injection Drug Use History of Female Participants

n=8	Number (%)	
Age of first injection		
15	1	(12.5%)
17	1	(12.5%)
20	3	(37.5%)
21	3	(37.5%)
Length of time injecting		
1-5 years	6	(75%)
>5 years	2	(25%)

# **Key Themes**

Three key themes emerged from the interviews with the women. The first theme, 'Day-to-Day Lives of Female Injection Drug Users (IDUs) Living in Small Towns / Rural Communities', describes day-to-day life for female injection drug users living in small towns and rural places in Cape Breton, as well as the work that goes into managing their drug addiction. Theme I also highlights gendered roles, responsibilities and relationships that are fundamental to the women's day-to-day lives. The second theme, 'Safer and Unsafe Injection Drug Use and Sexual Practices', examines the women's understanding of safer and unsafe injection behaviors, and risky and safer sex, as well as their current injection and sexual practices. The third theme, 'Services and Supports for Female Injection Drug Users', discusses the women's experiences with services and supports in Cape Breton, Nova Scotia, including the barriers that prevent some from seeking help.

# Theme I: Day-to-Day Lives of Female IDUs Living in Small Towns / Rural Communities A Typical Day Injecting Drugs

Each participant was asked to describe a typical day when they are injecting drugs. Many of the women spoke about the planning, time, and work involved in managing their drug addiction, as well as the time that it takes to search for money to buy drugs. As one woman noted, "...ya have to run around and search for money... I would go and steal from the liquor store to bring to my dealers... and I'd trade them for what I needed" (I#4). The women spoke about how being an injection drug user was very labour intensive, and how their thoughts and conversations became dominated by 'drug talk'. Injecting drugs and searching for drug dealers to 'score' their next 'fix' consumed

every aspect of the women's lives from the time they woke up in the morning until they went to bed. As one participant notes, "... well I'd wake up in the morning and first thing I'd do was shoot a pill and umm spend most of my day looking for my next fix... yeah, my whole life revolved around using" (I#2).

At the beginning of the women's drug use most reported that they used drugs occasionally to experience the euphoric effects of the drug, or 'to get a better high'. However, they noted that they quickly found themselves consumed with using, and injecting drugs on a daily basis because they needed the drugs to feel 'normal' and function every day. As one woman describes, "...I was doing the drugs just to feel normal" (I#5).

Many women spoke about how often they needed to inject in a given day. The frequency tended to be dependent on the type of drug they were using and the drug supply they had on hand. For instance, when they spoke about injecting opiates there was a need to inject several times a day, on a daily basis, to avoid and or alleviate withdrawal symptoms. As one participant notes,

...[when injecting pills], it was just an everyday thing we had to do to feel better so we'd maybe like [inject] 5 times a day if we were lucky to have it [pills]... a guaranteed 2-3 times a day at least. (I#4)

Avoiding withdrawal or becoming 'dope sick' was a major concern for the women. One woman highlights her experiences with drug withdrawal, stating "...the [withdrawal] symptoms are really bad... ya just feel completely under the weather. It feels like you have the stomach flu plus insomnia, plus you're really sore" (I#1).

Some women saved drugs from the previous day in order to have some drugs in the morning to help them get out of bed and perform daily tasks such as feeding their children. They recalled how injecting drugs made participating in leisure activities, attending school or keeping a job very difficult.

...half way through my school year I dropped out of college cause I couldn't go no more, and then I was working and kept missing time... I ended up quitting... (I#8)

...I couldn't work, I couldn't hold a job, nope...I was bartending and stuff and I mean I couldn't... (I#3)

Two women reported working in the paid labor force. One woman was recently hired in her position and was scheduled to begin work a few days after the interview. She was not able to comment much on her experiences with work, as she had not officially started her job. The other woman had started working after she was accepted in the methadone program.

Some women reported that they engaged in theft and street dealing to obtain drugs to feel 'normal' and engage in at least some day-to-day household and childcare activities. As one woman stated, "...I never stole anything before in my life before I got hooked on to the drugs, so it was horrible..." (I#4). Another woman described how she would drive her male friends to different places so they could steal, and then she would get a cut of the drugs for being the 'driver'.

But me and the guys, we would actually do stuff that the guys would do, stealing and stuff. I would drive them around and steal, and I would get a cut because I drove them. (I#1)

Two of the women spoke about performing sexual favors for money or drugs. They indicated that they had done sex exchanges when their drug addiction was extremely severe. As one woman noted, "I've done it [sex exchanges for money or drugs] myself, but not from strangers. Umm, I've done oral, oral favors when I was at my worst" (I#5).

# Female Injection Drug Use in a Small Community

The women described what it was like to be a female injection drug user in a small community. Some women noted that there were no secrets in their communities. One woman notes that, "When you come from a small place... everybody knows your business, it's embarrassing ... Everybody knows what you're doin ..." (I#3). A couple of women reported they were able to hide their drug use, but were fearful that if their injection drug use was discovered it would affect how community members would treat them. Fears about the consequences of being discovered as an injection drug user were very real, because women who were known to be injection drug users reported difficulties in finding work. As many of the women explained, work in the Cape Breton area is scarce because unemployment is relatively high compared to many other areas; the challenges in finding work are often compounded by the stigma related to injection drug use.

Yeah it's hard to get full time employment, there's not many jobs around here, everyone knows that, and especially for a person that's known to use drugs... (I#2)

...I don't know if it's because people heard about me... I think personally we're in such a small town and everybody knows everybody... people have heard things about me and that's why I can't get a job... (I#6)

Among the women who reported that people knew they were injection drug users, they indicated it was extremely difficult to move past this 'label'. One woman described her struggles as she tried to get off the drugs.

...You know I just got into some trouble with this drug, but I'm off now [a few months clean on the methadone program] and I just want to go back to having a normal life and it's something that's not so easily done. (I#5)

Another woman spoke about her frustrations related to discriminatory language that was often used by people in her community to describe women who inject drugs. She felt that this was unique to females because the language was not directed at, or used to portray, male injection drug users.

...girls are called [names], oh look at those sluts, dirty ones, ugh they're injecting! Where the guys are like pfft [whatever], who cares, like it's no big deal. Just cause a girl does stuff different, 'oh she must be selling herself'... (I#7)

Some of the women indicated that they felt assumptions were often made about them, because they injected drugs. For example, it was assumed that they also participated in sex exchanges for money or drugs. However, this was not the case for the majority of the women (six out of eight women) who reported they had not participated in sex exchanges for money or in kind. A number of women were affronted by these assumptions.

...I was offered many times [sex exchange], that's why it aggravates me cause they'd be like, oh I'll give ya 500 bucks, 500 dollars to go with them for a night.

And I was like that's ridiculous. (I#1)

# Gender-based Expectations, Roles and Responsibilities

Gendered roles, responsibilities and relationships are fundamental parts of the women's day-to-day lives. Some women spoke about the gendered assumptions that existed in relation to being a female injection drug user. For example, one woman argued that if a woman injects drugs, it is assumed that she is not a good mother, because mothers are not supposed to inject drugs. She felt these same assumptions are not equally applied to male injection drug users who are fathers.

...cause a mother's not supposed to act like that [inject drugs/ engage in illicit drug use], yanno what I mean. Society yanno, they can go with their friggin women's rights and all this stuff all they want, but when it comes right down to it a mother shouldn't act like that... I mean a father can go and run the roads and yanno what I mean he can do this and do that, but if a mother does it she's no good right! (I#3)

The women who had children explained that they had major roles and responsibilities related to childcare, but their male counterparts did not assume their fair share of responsibilities. One woman talked about fulfilling her roles and responsibilities related to childcare even when she was 'dope sick'. In contrast, her male partner would often stay in bed and sleep until he got his next fix rather than engage in childcare responsibilities. She explained that when she picked up drugs from their drug dealer, she would return with the drugs and then feed their child or do whatever else needed to be

done in the house. She had to do 'everything' regardless of how 'dope sick' she was feeling.

...There was times when I would get back with the drugs and he [boyfriend] didn't do none of that [feed the child], and I'm like not gonna to [shoot up]... when I know he's hungry [their child]... Like I don't feel good about that...so I would try like to do it all. (I#6)

# **Relationships with Other Drug Users**

Many of the women talked about the changes they experienced within the context of their social networks or peer groups after they started injecting drugs. They indicated that when drug use became part of their day-to-day life, they quickly became isolated from their non-using peer group and developed new relationships with people who engaged in the drug using culture. These new relationships were either with injection drug users and/ or persons who sold drugs. As one woman indicated, she had to leave close friends that she grew up with and establish new relationships with people who were engaged in drug use. She felt her previous friends would not want to associate with her if they knew that she was an injection drug user.

...my best friends that I was with everyday... I didn't call them, I didn't go with them, because none of them knew that I did it [injected drugs]... I wasn't about to tell any of them that I did it [injected drugs]... they wouldn't have associated with me... (I#8)

Discussions with the women about their relationships with other drug users also suggest that there is some camaraderie that exists with drug users. The women talked about how they helped each other gain access to drugs, injection supplies, and assisted at

times with housing, transportation and food. For instance, one woman indicated that her chances of getting access to drugs greatly increased when she was surrounded by other drug users. She noted, "I went onto meeting people to get high with and people that did drugs and they became my friends...I had a better chance of getting drugs being with people who also wanted drugs ..." (I#8).

The women reported that when they first started using, they typically needed the assistance and expertise of other injection drug users to learn how to inject, and prepare / 'cook' the drugs. In some cases, the support person also assisted them with the actual injection of the drug. As one woman related, her ex-boyfriend's brother injected her the first time she decided to inject. Following the initial time she was injected, this woman continued to require assistance and was heavily reliant on other injection drug users for help.

...my ex-boyfriend's brother did it to me [inject her with drugs] the very first time, and then he mostly did it for me all the time... or I would go find one of my other friends that know how to do it, and they'd do it for me. (I#7)

One woman spoke about relying on her boyfriend to inject her at the beginning of her drug use, but she eventually learned how to inject on her own without requiring any assistance. From her perspective, she did not feel that she was truly 'addicted' when her boyfriend was injecting her, however, once she began injecting on her own she realized she had a problem with drugs because she needed to use to avoid being ill.

I had assistance because for a long time I didn't want to learn how to do it [inject] on my own because I knew at that point I would have to admit to being addicted.

He [participant's boyfriend] would help me... but there was times it came down

to having to figure it out on my own when there was no one around. Once I had to admit I was addicted and I would get sick without it and I had no option. (I#8)

Some of the women also spoke about the protective factors that existed within the context of their intimate relationships when their partners also used drugs. For example, one woman indicated that her partner protected her by assuming the responsibilities and consequences of their criminal activities.

...There's so many things that he protected me from too. Like he'd make sure I would never get a criminal record... some of the things he's done, I may have been standing around and stuff like that, so I knew what was going on, like when he was doing it, but he didn't want me to get in trouble or anything. So I really do appreciate a lot of the things that he did do. (I#1)

In another instance, a woman reported that she perceived her partner protected her from contracting an infectious disease, as it was her partner who insisted their equipment be clean when they injected. She attributed being disease free to his insistence on safer injection practices.

...he [the participant's boyfriend] was very clean with everything and if it wasn't for him I probably would have contracted something, because he was very clean and his process was very clean and I had to follow his process or I would get no drugs... (I#8)

The women also spoke about the relationship challenges such as violence, exposure to risks (e.g., sharing of drug paraphernalia), engaging in sex without a condom, and exposure to crime. For instance, one woman indicated that because she and her boyfriend were both addicts, their relationship was often volatile when their drug supply

was low. She says, "...you'll be super happy at times, but if drugs are getting low, moneys getting low or you don't even got drugs it's just nasty..."(I#6). On the other hand, she also explained how they needed one another in order to survive in the drug culture. She notes "...no matter what, your co-dependent on each other; that is a guarantee..." (I#6).

### **Relationships with Family Members**

Many of the women spoke about needing to have supportive people in their lives including family. However, the level of support they actually received from family members varied. For instance, some of the women talked about how their families supported them by providing housing, caring for children, paying their rent or listening to them when they needed someone to talk to. As one woman commented, her mother was a great source of support, someone she could talk to about her addiction.

...oh yeah, I can always talk to my mother about it [my drug use]... like I don't want to, cause she's never even experienced being drunk ever in her life, let alone drugs or anything like that. And it's hard for her to understand but she tries to. She listens anyway; she's a good listener... (I#1)

A number of women talked about challenging dynamics that existed within their families. For instance, many of the women experienced regular strain, stress and conflict with family members, and these stressors appeared to be linked to the complexities associated with their drug addiction. One woman reported that there were times when she physically harmed members of her family out of desperation to get her next fix and this caused great family strain.

I've sliced my hands open; crack her in the head [participant's grandmother]... like when you are on drugs you really don't care who you hurt or what you do as long as you get your next fix. And once you get that fix your normal and you act like nothing happened, but it did. (I#7)

Another woman spoke about the conflict she experienced with her mother-in-law because her mother-in-law reported her drug use to social services and this resulted in the participant's children being removed from her care.

...his [the participant's boyfriend] mother is umm, she's a bitch! We use to get along very well but ...like she found out we were doin pills...she calls Children's Aid...that's obviously gonna cause problems... (I#6)

There were some women who had little or no contact with their family. For example, one woman was completely isolated from her family except for her grandmother, and she indicated she did not trust her family. She also felt that they didn't care about her or understand what she was going through as an injection drug user. This woman expressed a lot of resentment and anger when she spoke about her family.

My family? Are hateful, they're hateful, they're hateful. I mean to me, honestly, like my family is dead to me! Besides my grandmother... They don't understand me, they don't care to understand, they don't try to understand, they don't care for me period. (I#5)

Other women spoke about stealing from family members because of their drug addiction, and this lead to feelings of shame, guilt and embarrassment. One woman recalled instances where she scammed members of her family to get money to pay for drugs. She explained, "...scam even the ones like my family, my poor family, I lied and

scammed and cheated just to get money"... (I#4). Another woman spoke about the guilt, embarrassment and regret she felt for not helping members of her family when they needed her. Her drug addiction interfered with her ability to care for her ill mother, and she felt her drug use was embarrassing for her daughter.

The last year my mother was alive, I couldn't give her nothing, couldn't help her... So the last 5 years of my mother's life I wasn't there, cause I was usin... It wasn't fair for her [the participant's daughter] what was goin on and yanno embarrassment was a lot of it yanno what I mean? (I#3)

# Theme II: Safer and Unsafe Injection Drug Use and Sexual Practices Safer Injection Drug Use

Clean injection gear, equipment and supplies. Each participant was asked to think about the notion of 'safer injection drug use', and describe what safer injection drug use means to them as well as how they engage in safer injection practices in their life. A number of women indicated there was always some level of risk when injecting drugs and that it was almost impossible to be completely safe all of the time. As one woman describes, "...the only safe situation I was in was when I wasn't using needles... there's no safe way to use them [needles]... I've never been totally safe" (I#7). Nevertheless, all of the women did speak about a number of practices that they had implemented to help make their drug use safer for themselves, other injection drug users, their family, as well as for their communities. According to the women, having access to their own gear and clean injection equipment are key facilitators to safer drug use. As one participant notes, "...my own spoon, your own spoon, my own needle, your own needle and that's like safe to me" (I#6).

Many of the women indicated that the responsibility for using clean gear fell mainly on the individual user, that is, one had to find ways to access the clean gear from services that would either distribute or sell what they needed for safer drug use. Most of the women reported they obtained their clean gear and injection equipment from the needle exchange program, other drug users, or by purchasing syringes from local pharmacies. As one woman notes, "...sometimes I come to the needle exchange to get my rigs or I bought bags of them at the drug stores" (I#2). Some women spoke about 'stocking up' on clean gear from the needle exchange program. As one woman describes, "...I'd go on a field day shopping at the needle exchange, which I loved. Well I hadda go there because every time, like even if I had stuff I'd go there and stock up..." (I#1).

Many of the women also spoke about helping to facilitate safer drug using practices among other injection drug users. For instance, some women indicated they would give other injection drug users clean gear to use. This process is sometimes referred to as 'natural helpers' or people who informally supply other IDUs with clean injection equipment or persuade them to use clean gear to reduce risks if they were contemplating an unsafe practice. As one woman related, she would often persuade her boyfriend to wait until they had a clean supply of equipment before they injected. She notes, "...ah like my boyfriend sometimes he would be think yanno I'll just grab whatever and I was like no. I hadda actually tell him, it's not a good idea. Just wait a couple minutes..." (I#1)

Cleaning practices and labeling gear. All of the women spoke about the cleaning practices that they implemented, such as bleaching, boiling equipment, and

using rubbing alcohol when they were planning to re-use injection equipment. This was not perceived as an ideal practice, but it was described as a practice that helped to reduce risks when they did not have access to unused injection equipment.

If I don't [have a clean needle] I clean it out with boiling water and I always use those alcohol swabs. (I#5)

I'd use bleach, bleach out my rigs, ...fill my needle up with Javex and just rinse it out and hot water and like boil them in hot water. (I#2)

A number of women indicated that if they were planning on re-using their injection gear, they would label their syringes. They indicated labeling their syringes helped to reduce their risk by avoiding a potential mix-up of their gear with another injection drug user's gear.

Yeah, I labeled mine with nail polish one day... (I#1)

Sometimes I'll just make a mark on my rig at the top so I know it's mine. (I#2)

Injecting with needles that were previously used and no longer sharp was cited as an unsafe practice by many of the women. This was a practice they typically tried to avoid, as some women felt they were at risk for developing an infection if they injected with dull needles. Implementing strategies to distinguish which needles were dull and which ones were still sharp was an important practice that helped make their drug use safer for some of the women. As one women explained, she would often fill the sharp needles with water and leave the dull ones empty. This helped her to determine which ones were in need of disposing and which ones were sharp enough to be used again. She noted,

...when we went through them all we just kept using those ones over... I put so much water in it [the needle] and let it sit there so I know mine is at 30 units. And that's a good one cause there might be other ones with nothing/ no water in them. So I know they're dull now, and they need to be disposed of. And the one with so much water in it was the good one. (I#1)

Safer disposal and storage of syringes, needles and equipment. All of the women spoke about the ways in which they safely disposed of used syringes. None of the women reported that they disposed of their syringes by throwing them on the ground or placing them loose in the garbage. The women perceived these types of disposal methods as unsafe and potentially dangerous to others. Some of the disposal methods the women implemented included: placing used syringes in sharps containers, placing syringes in sewer drains, using puncture proof containers, such as plastic pop bottles, bringing them to the needle exchange program for disposal etc. The women felt that these practices helped to significantly reduce the risk of others being exposed to contaminated equipment. For instance one, woman explained she always used a sharps container for disposal of her used syringes. As this woman explained, "...the sharps containers, we [participant and her boyfriend] always had one of those and when it would be full we'd exchange it" (I#8). Another woman spoke about placing her used syringes in a sharps container and then burning the container once it was full, because it was not always possible to return the container to the needle exchange. She noted, "...he [participant's close friend] would just burn them [their needles], burn the sharp container in his barn" (I#1).

One woman reported that she did use a sharps container some of the time, however, more often she would flush the tip of the needle down the toilet and use a pop bottle for the disposal syringes. This woman recognized that this practice was not the safest method of disposal; however, she did feel that she was engaging in a form of safer disposal. She explained,

...I got a needle box sometimes... I know it's not right but you break the top off and take the little pin and I'd flush the pin down the toilet, and the needle itself I would put them in the pop bottles with covers and throw them in the garbage. (I#7)

In addition to ensuring safe disposal of used gear one woman further commented on the importance of storing her drug paraphernalia out of reach others (e.g., her children). She indicated that she would place her equipment in a container on a high shelf to eliminate the possibility of her children gaining access to her drug equipment.

...Everything was up high too, or even like our old needles, we would put them in a pop bottle with the lid on super tight, plus we would tape that up and put it way up high above the fridge in the cupboard. The same with our stuff... in a little zipper thing and then in another container, then up way high. (I#6)

This same woman also spoke about implementing safer practices in the community to try and protect others from getting needle stick injuries. For instance, she indicated that when she comes across a used syringe on the ground, she finds something to pick it up with and then places it in the sewer for safer disposal. She said, "...even if I'm walking and I see a needle on the ground, I'll find something, you know to pick it up with, I'll like put it in the sewer or something, you know..." (I#6).

Using in a safer environment. The women reported that they injected their drugs in many different places, such as their own or someone else's home, indoor public spaces (e.g., public washroom, gas stations, Laundromats), and outside spaces and / or cars. For example, one woman stated that she injected her drugs in the following spaces, "...public places, bathrooms and in my house, sneakin in the bathroom, anywhere" (I#2). Regardless of the particular space they used to inject drugs, all of the women talked about the importance of using drugs in a space they considered to be a safe environment. For instance, using in spaces where they could easily access equipment and materials needed to properly prepare the drugs (i.e., water, something to cook the drug on) helped to decrease risks.

A number of women also spoke about the importance of injecting in spaces that were private. They indicated that they tried to avoid preparing and using in spaces where there were multiple injection drug users present because they feared that their gear would get mixed up. For instance, one woman said that she attempted to use in private with her boyfriend because she felt this helped decrease the risk of their injection gear being mixed-up with other users. She notes, "...we [participant and her boyfriend] would go some where's we could be private to do our own [inject their drugs] and nothing [injection equipment] would get mixed-up..." (I#8).

Many of the women reported they had used in public indoor and outside spaces, however using outside was not seen as the ideal location because of the difficulties with properly preparing the drugs, given the lack of water, stove, and privacy, as well as the degree of cleanliness relative to most indoor spaces. Most of the women preferred to inject in a house / apartment. One woman indicated that although her preference was to

use at home, she recalled instances where she used in public indoor places (e.g., bathrooms) because she did not have access to a house to use in. She also indicated that she knew of people who had used water from puddles when injecting outdoors.

I'd use in my home, my mother's home, it gets so bad you'll go into [store name / restaurant deleted], and go in the washroom and use there. Like you'll use anywhere you can use, it never gets this bad for me but I know other people, like they can't find water and they'll take it out of puddles to use... luckily I never got that bad... (I#7)

Although using at home or someone else's home was viewed as safer than using in a public indoor or outdoor space, one woman described how she refrained from engaging in drug use in her own home in an effort to protect her daughter from exposure to drug use. She stated, "I never used in my own apartment... I wouldn't do it, no that's my daughter's home, I wouldn't... One of the places I lived, there was an apartment downstairs and I'd use down there" (I#3).

# **Unsafe Injection Drug Use**

Sharing and re-using injection equipment, gear and supplies. Each participant was asked to think about the concept of unsafe drug use and describe some of the risky injection behaviors that they felt were associated with unsafe drug use. Some of the risky behaviors the women felt contributed to unsafe drug use included sharing injection gear with other injection drug users, re-using their own equipment, using with people known to have blood borne pathogens, saving and recapping needles, and injecting in risky bodily sites (e.g., injecting in their neck). One woman described unsafe

drug use as, "Using the same needle as someone else, ah um, using an old needle, sharing spoons, like that's dirty drug use to me" (I#6).

Most of the participants were aware that there are many health risks associated with unsafe injection drug use, such as the transmission of infectious diseases, developing tissue infections, overdose, etc. Yet, all of the participants reported that they had participated in some components of risky injection drug use. For example, a number of women reported incidents of sharing and re-using injection equipment when their supply of syringes was depleted or they could not get access to clean gear. As one woman reported, she relied on her boyfriend to access her injection supplies but during a period when her boyfriend was in treatment she had to inject unsafely because she did not have clean gear available and she would not access the supplies herself.

I didn't have clean equipment at this time cause my boyfriend was in Detox and I didn't go get clean equipment and I actually, I don't know if I even would have went without him, I have never gone to the coalition on my own... But I knew everyone there like, and they knew I did drugs but I don't know what my reason for not goin was and also I probably didn't have the money to go spend three dollars on needles at the drugstore. (I#8)

In another instance a woman indicated she had to re-use her own needles as she could not get access to a clean supply of syringes because of where she was living. She said that she re-used her own gear so many times that she developed an infection.

Well I've seen me, living out in the woods where I'm from and have to use the same needle cause you just couldn't get to town to get anymore... so I'd use the

same one [needle] over again, and I actually ended up with a pretty bad infection one time from using the same needle. (I#2)

This woman also recalled sharpening her needles with a matchbook so they would not be as dull.

I always re-use my own equipment... ya run outta needles your gonna use whatever, like I've seen me use a needle over and over so many times it'd be so dull I'd be sharpenin it on a matchbook. (I#2)

Many of the women reported that there were times when their drug addiction / dependence was so severe that safer injection was not the priority. They understood that re-using gear was unsafe, however, given the severity of their addiction, sometimes they injected with a needle that was not sterile or used by someone else if a new one was not available. One woman related a situation when she had a drug supply, but did not have access to clean injection equipment. In this particular instance, she took a used needle from a sharps container in a public bathroom and injected her drugs. The physical and psychological need for the drug out-weighed the safer injection practice.

Yeah, there was one time that was really bad, I was really bad. I couldn't find any [needle] anywhere and I had drugs. And I went and took a needle outta one of those containers in the bathroom and just washed it out and used it. Like that was probably the worst time. (I#2)

A number of women indicated that they shared their injection equipment with other users, but would share with only select individuals. Sharing practices would often occur among injection drug users they trusted, had a close relationship with, or someone they perceived as being "clean" (free from disease), such as a boyfriend, intimate partner,

close friend or relative. This was often not perceived as a high-risk practice by the women. As one woman notes, "Yanno what I mean, if we [participant and close friend] had one needle there, we'd use that, both of us. The two of us were clean, but it was usually me first [to inject]" (I#3). She further explains, "...there was a girl that lived down below me, both of us, we would use each other's needles, but we were both clean" (I#3).

Some of the women talked about allowing others to use their needles and/or equipment that they had just finished using. Often, although not always, this drug sharing practice occurred among close friends or intimate partners.

...I said [to my friend] you can use mine [needle] after me, ah that's kinda unsafe to him... (I#1)

Some women said that they were aware of the infection status of their partners, and their partner was "clean", so it was okay to share equipment in those instances. As one woman indicated, "...I always used clean except with the father of my kids, because I seen his paper work. He had nothing [no disease], so we'd use..." (I#5). In another instance, one woman indicated she shared equipment with her partner, because they were 'in it together'. In other words, if they contracted a disease, at least they would be dealing with it together. She stated,

So me and him [participant's boyfriend] will use the same spoon and stuff cause he'll cook it all up in the same spoon and stuff like that but to use each other's needles we didn't unless we absolutely had to. But we knew it was only mine and his which is still bad but we know if someone got something then they didn't get it alone. (I#4)

Some of the women felt that there were situations where they experienced pressures from other injection drug users to use unsafely. One woman recalled the pressure she experienced from her partner to inject unsafely. She described a situation in which they were both desperate to shoot up, but they did not have access to clean gear. In the end, he made the decision to use unsafely and get "high" without her.

...my boyfriend made it kind of difficult because I wanted to do it just as bad as he did. But he'd just find some random needle that's all dull or something and be like well I'm doing mine with this. And I'm like what am I suppose to do? Stay around, wait around and sit. And I wanted to do it as well but at the same time I'm thinking I can't do that it's too much of a risk for me. So that kinda stressed me out because I don't want to see him high without me being high. (I#1)

**Needle stick injuries.** One woman reported that she had experienced a needle stick injury while recapping a needle following injecting drugs with a friend. The needle stick injury was perceived as a risky incident for the participant because she was not sure whether she had stuck herself with her friend's used needle or her own needle. She stated,

...Another time with another friend of mine we weren't using the same needles, but I have a bad habit of making sure all the needles are capped, right. I just capped them, when I went to put the cap on it... it nicked me in the finger and I didn't know if it was mine or hers. That was pretty spooky. (I#3)

**Injecting in risky bodily sites.** Another woman talked about shooting up in risky injection sites on her body due to the lack of viable veins; she reported needing the assistance of her partner to shoot up in her neck. She states, "...see where I have to inject

in my neck, I don't have to hold my breath as long cause he [boyfriend] does it for me, where I gotta find a vein..." (I#4).

Addicted to the process of shooting-up 'injecting repeatedly'. Some of the women reported that they were not only addicted to the drug, but also developed an addiction to the process of preparing and injecting the drug. They referred to this as being 'hooked on the needle'.

...yeah you get hooked on the needle... I dunno, it's like in your mind it's a fascination, the whole getting it ready [cooking/ preparing the drug], the whole works, the whole, its kinda sick, but not even so much the drug anymore it's just more of the whole using and injecting. (I#2)

One woman further described that she found herself injecting with 'drug wash' so many times that she was sure it was just water she was injecting. She noted, "...sometimes I do it [shoot-up] knowing that it's probably only water just to make my brain happy" (I#1).

#### **Safer Sexual Practices**

The women discussed a number of 'facilitators' to safer sex including safer sex education, access to condoms and birth control. Most of the women reported they had received some information and / or education about safer sexual practices, such as using condoms and birth control, and many reported they used this information to ensure safer sexual practice(s) when they were having sex with someone they did not know well or if they were starting a new relationship. One woman states, "... So like at first yeah we'd practice yanno the safe stuff" (I#4).

Access to condoms. None of the women reported having any significant problems with accessing condoms. Some of the most commonly reported places the

women accessed condoms were from Youth Health Centers, the Needle Exchange Program and at the local pharmacy. One participant related that if she was going to use condoms, she would obtain them free of charge from the Youth Health Center. She explained "Yup well I go there [Youth Health Centers] to get condoms..." (I#1).

**Utilization of condoms**. All of the women spoke about whose responsibility it was to ensure condoms were used during sexual encounters. Some women indicated that the decision was a shared responsibility; others felt it was the female's decision and others felt it was the male's decision. As one woman described below, she felt that men usually don't like to use condoms; therefore, the decision to use a condom was her 'call'.

I am, I think I am [responsible for ensuring condom usage], cause if not I don't think the guy does care. I think they'd rather, every guy that I knew, even just talking were like I don't like using condoms, they make me feel like I'm going with a plastic bag or something. (I#1)

In contrast, another woman felt the decision to use condoms was the man's responsibility, she thought that this was his 'job'.

I think it is the man's responsibility, it's his dick, you know what I mean, it's his, you know if he wants the sex from the woman he's got to do his job... Like he has got it, wrap it [male genital], like that is his body part, you know what I mean, he's responsible for his body part. You'd think he wouldn't want to catch any diseases as well. (I#5)

## **Risky Sexual Practices**

All of the participants spoke about their understanding of risky sexual behaviors, such as having sex without a condom, having sex with a stranger or someone they did not

know well without protection, and having sex without birth control. They also described some of the health risks and their fears associated with unsafe sexual practices including contracting a sexually transmitted infection or getting pregnant. As one woman notes, "…I think if you don't use condoms I just think STD's and pregnancy" (I#6).

Unsafe sex with people they trust. All of the women spoke about the importance of protecting themselves if they were engaging in sexual practices in a new relationship or having sex with people they did not know well. However, many of the women did not consider sex without a condom to be a risk if they were in a monogamous relationship or having sex with someone they 'trusted' and / or knew over an extended period of time, even though in many instances their partners were current or past drug users. One woman described how she did not believe it was necessary to use condoms with her boyfriend because they were in a monogamous relationship.

...when we first met like we were together all the time, so I'd make him use a condom and everything. And as time went on I just used birth control instead because we were monogamous, he's the only one with me, I'm the only one with him... (I#1)

Many of the women further explained that they trusted their partners and perceived them as being 'clean' or free from infectious diseases. Therefore, the women did not feel that they were at risk for contracting infectious diseases. As one woman described, "...if it's you and your partner [you're having sex with] you've got nothing to worry about right!" (I#3).

Some of the women indicated that they were aware of their partner's lab results for infectious diseases and if they were clean, there are no risks. One woman stated, "...I

mean I'm such a hypocrite, because I'm seeing somebody now and were not using condoms and but yanno when ya just know the person don't got AIDS yanno" (I#5).

A number of the women indicated the length of time they knew a person was an influential factor in determining whether or not they would use a condom / protection when having sex.

If you just met someone ya don't know them then you'd use a condom, but if it was my boyfriend, and I've known him forever and sometimes, I dunno it depends at the time. (I#2)

...I feel like a hypocrite cause I don't use none of that stuff [condoms / birth control] right. I've been with the same guy so long, but um I don't know. Just I mean if you're not with a certain person you should use all that stuff, where I've been with the same guy for six years I have no reason to anymore. I'm havin no more kids, trust me, I know when, how to make it so we don't have kids. (I#4)

Safe sex may not be the main priority. Another woman spoke about not making safe sex a priority. She indicated that she was less concerned about contracting a blood borne pathogen through unsafe sex, because she felt that if she was going to contract a blood borne pathogen it would likely happen as a result of sharing needles. This woman notes, "...you just don't care right? [About safe sex] You're like fuck it! I'm using needles anyways. So if I have something I have something [blood borne pathogen]!"(I#7). This woman further explained that she did not receive a lot of sexual health information growing up and maybe if she had it might have helped her to facilitate safer sexual practices. "I wasn't really taught anything about sex... if they talked to me it might have been a bit better..." (I#7).

Access to reliable birth control. Some of the women reported they used birth control to prevent pregnancy. However, some of the women indicated they did not use birth control regularly or consistently. One woman indicated that she struggled with the cost associated with birth control, as she needed all of her money for drugs. This woman was pregnant at the time of the interview and indicated that she would have taken birth control regularly if it was made available free of charge.

Like if there would have been free birth control available I would have been on it the entire time, but once I was addicted to doing drugs there was no way I was spending the money on anything else... we did have free condoms and I can't tell ya out of the times we had sex, I don't know how many times we even used them. (I#8)

Another woman indicated that she did not have access to birth control because she was living on the streets. She stated, "...living on the streets, I mean you don't got access to none of that stuff [contraceptives], but I always had condoms" (I#5).

# Theme III: Services and Supports for Female Injection Drug Users Lack of Adequate Services and Supports

There was a general consensus among the women that services for people who inject drugs in Cape Breton were lacking and needed to be improved. Some of the women argued that there is a need for access to the basic life necessities (i.e., housing, income and food) because they were not able to afford such necessities. One woman indicated that most days she was hungry and did not have adequate income to pay for housing. She relied on disability pension and was currently staying at a homeless shelter

because she could not afford adequate housing. She expressed a sense of hopelessness and struggled with the lack of support in her community.

...that's my main issue, homelessness and havin money to eat and financial wise, it's ridiculous. Like I'm on disability... if I was to buy that [lights and heat], and pay that [700 dollars] for rent then I'd be literally starved. I'd have no money for food every month and it's just the resources aren't there and the funding, there's no money... (I#5)

One woman spoke about the lack of addiction-related services and supports in Cape Breton. The only service she felt was available for people with addictions was withdrawal management, also known as 'detox'. She did not feel that this service adequately met her needs.

Nothing [no service] for women here, or like men! The only thing around here is like detox in [community removed]. And don't get me wrong, they helped me a little this time, but really it's nothing for nobody. Detox up here is bull poop. (I#7)

Another woman indicated that harm reduction services such as methadone, free condoms, and free needles/injection equipment were non-existent in her local community. She reported there were no physicians in her community that she was aware of who were able to prescribe methadone or help her with her addiction.

There is nothing here, like a doctor, none of the doctors around here will even go and get a methadone license because they're are all going to be embarrassed because there is going to be drug addicts in their office. Well we're out there! Like drug addicts are everywhere and that's the problem, everyone you know

especially in this small area, especially here, like there's nothing. There is not even a place to go get condoms, you know or birth control or anything... needle wise and all that there is really nothing. (I#6)

Some women spoke about their experiences with counseling services in Cape Breton. The women who had utilized these services found they were helpful, however, they noted that there were not enough counselors, and they struggled with treatment engagement. As one woman explained, she needed to see her drug counselor frequently but was not able to do so because the counselor was busy with other appointments.

...I mean even my drug counselor; I'd see her once every two weeks, because she's so booked... I had an appointment to see a grief counselor, but its hard getting into see somebody...and promising something new...it's hard for people, yanno. I mean one hour every two weeks isn't enough, I mean I used to go to town and talk to someone [within her drug using network] every day of my life. (I#3)

#### Lack of Services that Meet the Needs of Women

All of the women indicated that services were most helpful when they used a caring and non-judgmental approach. For instance, many of the women spoke about the Needle Exchange Program being a service that was safe, offered a non-judgmental environment, and was staffed by people they could trust. As one woman noted,

...good people [at the Needle Exchange Program], and they actually wanna help ya... they're nice to ya, they don't look down on ya... never judged me ever. I haven't heard of them judging anybody and I mean people have done some pretty

crappy things to fuckin people that work here and they're still yanno, there's always a second chance. (I#3)

A number of women commented on their experiences with inpatient withdrawal management in Cape Breton, and most felt strongly that there needed to be improvements in the quality of this service. As one woman explained, there needs to be more counselors, implementation of visiting hours, and outdoor privileges to help with retention.

...well I know that the detox downtown aren't good at all... I think the success rate, people stay probably a day or two and then they're gone... [the detox needs to have] more counselors... ya don't get to get outside up there, ya have to quit smokin on top of everything else your commin off of, you're not allowed outside for fresh air, no visitors nothing, its worse, worse than prison... I know I've been there! (I#2)

Another woman spoke about her frustrations with the addiction counselor turnover rates. She found it frustrating to talk about her problems and develop a relationship with one counselor, then have to re-explain her situation or problems to another person because the initial counselor ended up leaving. She states, "...You can talk to a counselor and that but, I don't want to talk to a counselor about my problems cause then they end up leaving me and I explain everything else to the next one" (I#7).

## **Accessibility of Services**

Many women spoke about methadone being a viable treatment option for their opiate addiction, yet all of them spoke about the challenges they encountered in trying to access this service. For instance, one woman indicated that there were methadone

treatment options available in Cape Breton; however, for many years she was unable to access this treatment because of wait times and the strict admission criteria. She spoke about her struggles with trying other treatment options and failing, and how frustrated she was with the length of time it took to get accepted into the methadone program.

That was a fight and a half for almost three years. I fought to get on that and you've had to be in detox like 10 times and that's ridiculous you know. If you're an everyday user and you cannot stop yourself they shouldn't second guess someone who is crying for help. I literally went to detox 15 times, fought to get on methadone. (I#5)

Some of the women spoke about their inability to access methadone treatment in their local communities. For example, one woman indicated that the local pharmacy was not able to accommodate all the people in her community that required methadone, and that the pharmacy put a 'cap' on the number of people they were able to service. As a result, this woman and many other drug users in the community had to travel on a daily basis to another community pharmacy to access their medication. The costs associated with travel fell on the individual, and they also had to endure the time lost due to travel, which was approximately 4 hours a day.

[in order to get access to methadone] 60% of us [drug users] all have to travel into [industrial Cape Breton], everyday and like pay the money there, so even if we're trying to do good we're still kicked in the ass and sent 10 feet back. (I#7)

Some of the women discussed failing to access services and supports because of their fears related to confidentiality. For instance, some women did not want to come forward for help or tell service providers that they had a drug addiction, because they worried about where their information might go, or who else might be able to obtain access to their information (e.g., courts). As one woman describes, she worried that the information that she disclosed related to her addiction counselor could be taken to court and used against her. She stated, "...Somebody can always access your information, and I don't like that. Like if you're confiding to an addiction counselor they shouldn't be able to take your information to court" (I#5). Another woman indicated that she initially had some reservations about accessing help, but she eventually learned that she could trust service providers and her information would be kept confidential.

...the only thing I was thinking of was [initially about accessing services], I was scared to go out there and yanno say 'I'm a drug addict'... but at this point I know that there are certain... things that are confidential. (I#1)

All of the women identified lack of adequate transportation as one of the biggest barriers they encountered in trying to access services to support safer injection drug practices. The women reported that services and supports are mainly located in the industrial area of Cape Breton, which means injection drug users who reside outside of the industrial area have to travel by bus or car to access even basic harm reduction services. Many of the women spoke about relying on the public transit system or a friend's vehicle for transportation because they did not own a vehicle. It should be noted that many of the women spoke about their concerns related to Cape Breton's public transportation system, because in some communities it was either poor or nonexistent. One woman noted, "...transportation is terrible unless you have a car because buses only run at certain times" (I#8).

The costs associated with transportation were also problematic. One woman described how the distance to harm reduction services (i.e., Needle Exchange) was troublesome and she needed all her money to pay for drugs and the basic life necessities (e.g., food, shelter, transportation to appointments etc.).

...well the main challenge was the distance, like when I had my vehicle it was fine to go to [city deleted]... when you have no [vehicle], you couldn't get the bus because yanno every penny had to go towards drugs, even then we were probably a couple cents short. (I#1)

Many women spoke about accessing syringes and condoms at their local pharmacies, however, there was a cost the women had to endure if they were going to access injection equipment through pharmacies. As one woman notes, "... you can't just walk into a drugstore and ask for everything [clean gear], cause they won't give it to you unless you pay for it" (I#4). Some women also indicated there were certain pharmacies that would not sell injection drug users syringes because they feared the women would be using them to inject drugs. One woman described her experience with a pharmacy that refused to sell her needles unless she had a prescription for insulin. She states, "There was one place [pharmacy] I went and they were like you have to have a prescription to buy needles here... they were like, we don't sell them without prescriptions, it says you need insulin" (I#1).

Most of the participants indicated they had either directly accessed services from Sharp Advice Needle Exchange Program or indirectly accessed services through the Sharp Advice Needle Exchange 'Natural Helper Network'. The women reported that they obtained clean injection equipment, condoms as well as harm reduction information/

resources from the Needle Exchange Program (NEP). One woman indicated that the NEP had a good understanding of addiction issues, harm reduction practices, and their social and health needs.

... It's awesome [Needle Exchange Program]... they just wanna help you and get everything [injection supplies/ gear and condoms]. And make sure that you're safe, and that's the main thing... So it was my main source to get everything clean and I felt comfortable going. (I#1)

Although the NEP was viewed as helpful, most of the women indicated that at times the location was problematic, as they would have to travel regularly to the NEP to access the free injection gear they needed.

All of the women commented that in order for services to successfully serve the injection-drug using population they need to be non-judgmental and have flexible operating hours. Most of the women commented that the existing services were normally only open during regular business hours, meaning they were only open during the day and closed on the weekends. As one woman describes, this tended to be problematic especially if she was in "trouble" and needed to access services at night.

...The fact that yanno there's no place to go late at night when you've got no where's to go and you're in trouble. Yanno you're hungry, you're scared, yanno you're sick or too high 'out of it'. Nobody to help you... no where's to go... this town, this island is slowly dying in my eyes... (I#5)

## **CHAPTER 5 CONCLUSIONS & DISCUSSION**

This chapter presents three main conclusions, a discussion of the key research findings, and the implications for health promotion policy, research and practice. This chapter will conclude with the researchers plan for communicating and disseminating the key findings from the study.

## **Conclusions**

## **Understanding Safer and Unsafe Injection Drug Use and Sexual Practices**

It is apparent from the information gathered in this study that the women had a good understanding of safer and unsafe injection drug use. This was evident in their conversations about the risks as well as the strategies they put it place to help make their drug use safer for themselves, their families and the larger community. The women also talked openly about times when their practices were unsafe and it was evident from these conversations that they understood when they were taking risks. They also expressed the need for additional resources in their communities to help make their drug using practices safer.

The 'logic' of the women being responsible when engaging in safer practices appeared to break down with respect to condom use during sexual encounters with their long term/committed partners. The women understood the risks associated with participating in unsafe sex, and they were also aware that having sex with a condom would make their sexual practices safer. Yet using a condom within the context of a long term/ committed relationship was not perceived as a necessary practice or as priority in their relationships. The 'trust' factor within their intimate relationships appeared to be

extremely important for women, and condom use was considered a barrier to a trusting / intimate relationship.

## **Responsible Citizenship**

The women in this study assumed many roles and responsibilities in their day-to-day lives such as drug management, household duties, childcare, financial obligations, finding and securing adequate housing etc. The daily demands of these responsibilities weighed heavily on the women. Yet the women still found time to implement many strategies / interventions to help facilitate safer drug using practices for themselves, their families and their community. That is, the women assumed and adopted additional roles to reduce risks and harms associated with their injection drug use as 'Responsible Citizens'. For example, they spoke about cleaning and labelling their drug equipment if they were going to re-use it; they accessed and used clean needles whenever possible and talked about safer disposal and safer storage of drug paraphernalia.

# Small Town / Rural Living - Stigma, Discrimination, Confidentiality

The women in this study felt that they were forced to 'jump through hoops' to obtain access to basic resources and treatment programs. They experienced long waitlists for addiction programming (specifically methadone programming) and some had to travel extreme distances in order to obtain methadone treatment. Some women also reported difficulty accessing a doctor and felt judged by service providers. They also commented on the lack of availability to injection gear/ supplies, and having to pay for clean syringes at the local pharmacy. If resources and services were available in their communities, this did not necessarily mean resources / programs were accessible when they needed them most such as during the evenings and on the weekends.

The women talked about the stigma, discrimination and the lack of confidentiality they experienced living in small towns / rural communities. They expressed fear that people in their communities might learn about their drug use and that this would have serious implications for future employment opportunities, as well as being looked poorly on by community members. From a societal context, there is a lot to consider relative to the supports needed for female injection drug users living in small towns / rural communities.

#### **Discussion**

Health and social service investments have and continue to be mainly focused on treatment and rehabilitation, that is, services and supports that are implemented after serious problems have developed. In order to improve population outcomes health and social service investments need to make a 'shift' in investments, to be more inclusive of primary prevention initiatives, commonly referred to as "up-stream approaches". For this type of approach to be successful a change in thinking is required. Investing "up-stream" requires action to be taken before a problem arises (Cohen, Chavez, Chehimi, 2007). For instance, when we typically think about addressing a health issue such as injection drug use, HIV, infections etc., we think about developing programs and services in response to the presenting issue. In these instances we may be looking for a behavioral change, treatments or cures. However, upstream approaches are more focused on making changes in the societal context and the environments in which these problems occur. The idea is to implement approaches that are proactive rather than reactive (Cohen, Chavez, Chehimi, 2007). To do this we need to influence and take action on the factors and conditions known as 'determinants of health' (e.g., gender, socio-economic status, living

conditions, work conditions, access to health services, culture) (Public Health Agency of Canada, 2010; Public Health Agency of Canada, 2001; Nova Scotia Department of Health, 2002). Research tells us that if action is not taken on these factors the result will be increased health disparities and inequities among populations. It would be a unreasonable expectation to entirely shift to only focus on implementing 'upstream approaches', as communities are already experiencing complex health and social problems, so there is also a need to continue to implement risk avoidance and risk reduction approaches. A more balanced approach is needed, with a combination of upstream and down-stream approaches.

In this chapter the recommendations are framed in a way that recognizes the need for investments to be inclusive of primary prevention initiatives or "up-stream approaches" as well as risk avoidance and risk reduction approaches. The following seven items are the focus of the discussion:

- 1. Unpaid Work is Plentiful and Paid Work is Scarce among Female IDUs
- 2. Stigma and Discrimination
- 3. Access to Equipment, Gear and Supplies
- 4. Contact and Relationships with Experienced Drug Users
- 5. Sharing and Re-Using Equipment
- 6. Safer and Unsafe Sexual Practices
- 7. Supports and Services Small Town/ Rural Living

## **Unpaid Work is Plentiful and Paid Work is Scarce among Female IDUs**

The time, commitment, and planning involved in managing one's drug addiction may be compared to the work-related demands one might encounter in a full time 'job'

and / or 'career' (Levy & Anderson, 2005). The findings from this research study support this notion as the women interviewed likened the demands of their drug addiction to that of a full time job. For the women to effectively manage their drug addiction they had to inject drugs every day, several times a day, search for dealers to replenish their drug supply, as well as try to figure out how to obtain more money to purchase drugs. The women explained the work involved in managing their drug addiction left little time for daily unpaid responsibilities and activities such as child care, meal preparation, domestic work or paid employment.

Women, who perform unpaid domestic labour, have been discussed at length in the literature (Health Canada, 2004). However, there has been little research to date related to women who have a drug addiction who are also expected to perform unpaid domestic labour. This research study revealed that many women carry out activities widely understood to be women's work, in spite of their drug addiction. According to some of the women, domestic responsibilities are gender-based, which means there is an expectation within the context of their personal relationships that domestic tasks belong to them – because they are 'women'. Many of the women argued that their male partners did not feel the same level of responsibility to perform 'unpaid work' such as domestic tasks and child care, and would therefore not perform such tasks to the same extent as the women.

Participants spoke about how challenging it is to carry out typical day-to-day responsibilities and maintain their drug use, given that both 'jobs' require a lot time and energy. They further explained that there is an expectation in their personal relationships that they should carry out these responsibilities even when they were feeling the effects

of drug withdrawal, commonly referred to as being 'dope sick'. This expectation is in sharp contrast to the widely held belief that female injection drug users do not try to carry out duties as mothers because they are drug users or have a history of using drugs (Health Canada, 2006; Pinkham, Malinowska-Sempruch, 2007; Aston, Comeau, Ross, 2007).

Most of the women felt that it was impossible to obtain 'paid' employment in Cape Breton, as their communities continue to experience high rates of unemployment. The closure of major industries (i.e., steel and coal) has contributed to a declining economy which is a key factor in the out migration of many young people, and a growing aging population (Statistics Canada, 2007). The women stated that being an injection drug user further compounded their struggles of finding 'paid' employment in Cape Breton, as they felt local employers would not want to hire them because of their drug addiction. These circumstances left many of the women unemployed and reliant on some form of income assistance. Inadequate employment opportunities made it very challenging for the women to improve their financial and life situations, as some of the women struggled to attain even the most basic life necessities such as food, adequate living conditions, medical coverage and transportation, all of which are key determinants of what determines their health and the health of their families.

Injection drug use, low social-economic status, the demands of unpaid work, as well as the lack of paid work has significant implications for women's health, their sense of identity and purpose in their communities. Research reports that many injection drug users are often from low socio-economic backgrounds and live in poor housing conditions (Anglin as cited in Gogineni, Stein, Friedmann, 2001; Public Health Agency of Canada, 2009; Ploem, 2000). We know that higher income and social status are

closely linked with improved health status, higher education and higher literacy levels which have been also linked to improved health outcomes (Public Health Agency of Canada, 2010). In contrast, individuals who have lower education and literacy levels often experience difficulties obtaining and maintaining employment, processing health information, and trying to understand and make decisions about accessing services and care related to their health and the health of their families (Public Health Agency of Canada, 2008). Some of the women in this study also commented that they would benefit from more formal education. They felt this was an area that would allow them to obtain qualifications for more skilled work, a better wage and ultimately a better quality of life.

Clearly a dichotomy exists for the women, on the one hand they express difficulties in securing adequate employment and see more formal education as a way to secure adequate employment; on the other hand they describe some behaviors, as a result of their drug use that are not conducive to attending school or securing and maintaining adequate employment such as, reliability and attendance. For instance, the women report not being able to get up in the morning unless they had drugs to use in the morning (often saved from the previous day), not being able to focus, unable to work or do the fundamental activities needed to obtain and maintain paid work.

## **Implications for Health Promotion Policy, Research and Practice**

Government commitment and investment is needed to improve the health of female injection drug users living in small towns / rural communities. When we consider the funding allocation to addictions prevention and treatment in Cape Breton and many other parts of Nova Scotia we realize this population continues to be underserved and

ignored. For example, in 2010-2011 the global budget for Addiction Services in Nova Scotia was \$39.4 million (Nova Scotia Department of Health and Wellness, 2011), which only represents 1% of the overall health care budget (C. Davison., personal communication, September 19<sup>th</sup>, 2011). The gap between investment in services and the health and social costs associated with injection drug use continues to widen (National Treatment Strategy Working Group, 2008). For example, female injection drugs users often lack support for even basic health and treatment needs, such as adequate housing, formal employment, education/ re-training, gender specific programs.

Careful consideration should be given to creating environments that are more supportive of women who inject drugs or have a history of injection drug use in Cape Breton. For instance, an opportunity presents itself every time service providers come into contact with injection drug users to reach out, and move beyond the traditional treatment approaches (e.g., inpatient withdrawal management, acute care). Service providers need to take a more active role in helping to facilitate access to programs and services that enhance life skills, build capacity and promote self management, as this will increase the options available to female injection drug users to exercise control over their own health and environments, as well as the health of their families and communities (Talbot and Verrinder, 2010).

Implementation of supportive employment options for female injection drug users in Cape Breton should be a top priority for government and policy makers. Organizations, such as Addiction Services, need to become 'client advocates' and begin to explore ways to recruit employers in Cape Breton that will hire people who are either in recovery or experiencing some stability with their addiction. Building strong

partnerships and relationships between client advocates, local employers and employees are essential for this type of initiative to be successful and sustainable. For example, implementing education sessions that enhance the employers' knowledge and understanding of addiction. This new knowledge may allow for some flexibility in shifts among employees who were receiving treatments, as there are demands placed on clients receiving addiction treatments such as, clinic appointments, obtaining their daily dose of methadone from the pharmacy, counseling appointments etc. Regular contact between client advocates, the employer and the employee should be established for ongoing follow-up and support.

## **Stigma and Discrimination**

Perceptions and stigma associated with female injection drug users can create an environment of social discrimination and isolation, thus, ignoring the health and social needs of this marginalized population. A commonly held belief in society is that people who engage in injection drug use also engage in criminal activity, thus injection drug use is often not perceived as a 'health issue' requiring community support or help, rather it is perceived as a criminal activity that requires punitive actions and consequences (Health Canada, 2001). This type of thinking and subsequent decision making has resulted in injection drug users becoming further marginalized, underserved and socially isolated in society (Canadian Nurses Association, 2011). Thus opinions and decisions about injection drug use are often based on values, attitudes and belief systems that exist in society, rather than on evidence.

Stigma and discrimination appeared to be largely related to social conditions and life circumstances such as high rates of unemployment, lower socioeconomic status,

lower education and the perception that injection drug users are 'deviant' or 'bad people' because of their drug addiction. The reality for many women who inject drugs is that they are exposed to stigma and discrimination on a daily basis (Aston, Comeau & Ross, 2007) due to the power dynamics and social roles in society. Participants in my study report a particular 'gendered' character to the stigma and discrimination they experienced within their communities. For example, women who inject drugs do not meet society's expectations of 'what a woman should be doing' and 'what a woman should not be doing' – women are expected to be mothers and caregivers; mothers and caregivers do not inject drugs (Taylor, 1997; Pinkham and Malinowska-Sempruch, 2007). The stigma appears to be stronger when women participated in dual roles of injection drug user and mother. Participants who are mothers spoke about feeling judged by people in their community, including service providers. They expressed fears related to losing their children to child welfare / child protective services and talked about the commonly held assumption in society that you cannot possibly be a good mother and properly care for your children if you are an injection drug user (Naylor, 2007). Previous research findings indicate that the fears associated with losing their children and or the legal implications of admitting that they engage in drug use can prevent female injection drug users who are pregnant and or who have children from accessing treatment or prevention services (Wasilow-Mueller and Erickson 2001).

Research has also identified the sex trade industry as being a means of employment for many females who engage in injection drug use (Hartel, 1994, Whynot 1998, Patten, 2006). Many participants in my study felt assumptions were made by people in their communities that because they were female injection drug users they must

also be sex trade workers. These assumptions were frustrating for the women as they perceived that it added another layer to the stigma and discrimination that they already encountered as female injection drug users.

## Implications for Health Promotion Policy, Research and Practice

Policy makers, service providers and community members need to change the way in which injection drug users are valued and treated if progress is going to be made to improve the health and wellbeing of female injection drug users living in small towns / rural communities. This requires an attitudinal shift or a 'cultural change' among government departments, local service providers and communities to ensure services are not discriminatory or punitive. Capacity needs to be built with service providers through education, knowledge exchange workshops, as well as policy development that targets fears, misinformation and lack of knowledge about addiction and harm reduction. Service providers need to understand addiction as a health issue, and utilize a nonjudgmental and supportive approach to increase the chances that an injection drug user will access help and return for help when they need it. These types of initiatives will help raise the profile of addiction as a health issue, which can help decrease stigma and discrimination and ensure injection drug users are supported in receiving the health and social services they need.

Health promoters, researchers, and policy makers need to better educate communities on the importance of harm reduction policy and practices; as implementing harm reduction practices will reduce the risks and improve the overall health and social functioning within the population. It is recommended that the Cape Breton area host a community dialogue to raise the level of awareness about addiction and harm reduction.

This will provide Cape Bretoners with an opportunity to learn more about addictions, engage in a deliberate discussion regarding injection drug use, explore commonalities and differences in thinking and then propose ways to move forward on this significant public health issue

Policy makers and decision makers also need to pay considerable attention to the 'gendered' component of stigma and discrimination and engage female injection drug users as key stakeholders in the decision-making process. Formal consultation mechanisms need to be established so that female injection drug users are involved in policy making and the design of services that are appropriate and meet their unique needs. It is recommended that a Women's Advisory Committee be established in Cape Breton with service consumers represented on this committee as well as service providers, this will allow information related to the needs of female injection drug users to be shared' with policymakers and decision makers. Service providers in Cape Breton such as Addiction Services, Public Health Services, Needle Exchange Programs and Methadone Treatment Services can utilize recommendations from this group to improve the quality and efficiency of services for female injection drug users in Cape Breton.

Feeling isolated, lacking of access to services, lacking confidentiality are all common themes among women who use drugs and live in small towns / rural communities. It is critical to further examine whether or not female injection drug users want to access treatment in their local communities and whether or not this further increases the stigma and discrimination that they experience. Being labeled a drug user can have detrimental consequences for the individual user and their families, for example, if their drug use is exposed they may be unable to obtain suitable employment, sustainable housing etc.

This also provides some insight as to why there is some hesitation or refusal to access services and supports related to drug use, as some of the participants tried to 'conceal' or keep their drug use a 'secret', because of the stigma and discrimination they experienced from people in community. If service provision is to be localized and accessible, careful consideration needs to be given to ensure privacy and confidentiality for this population. It is recommended further research be conducted to explore female injection drug user's experiences with stigma and discrimination relative to accessing services and supports.

## Access to Equipment, Gear and Supplies

The decision to implement harm reduction practices, such as using clean gear, safer disposal, reducing sharing practices largely rests with the individual injection drug user, however this decision is dependent on what supports are available in the community to help facilitate safer drug use (i.e., access to gear and supplies, support from other users / non users, needle exchange program, methadone maintenance program, anonymous testing, mobile outreach, pharmacies etc.). Therefore, it is critical to the health of the population to have accessible harm reduction services such as clean injection equipment to help facilitate safer drug use among injection drug users. This is consistent with earlier research which found that access to clean needles, injection supplies and other harm reduction services are critical factors linked to safer drug use for injection drug users (Riley et al., 1999; Jackson, Bailey, Fraser, Johnson, Currie, Babineau, 2002; Grund et al. as cited in Hartel, 1994; Public Health Agency of Canada, 2004).

This research study found that female injection drug users implement a range of harm reduction practices in an effort to help make their drug use safer for themselves, other injection drug users, their families and community. Female injection drug users engaged in 'responsible citizenship' activities within their communities. For example, some of the women who came across used injection gear that was thrown on the ground would remove the gear to prevent someone else from getting a needle stick injury. A number of the women talked about other injection drug users who would throw their gear on the ground, they reported that they would not participate in this type of unsafe practice. Some of the women also talked about being part of the local Needle Exchanges 'Natural Helper' network, which required them to supply other injection drug users with clean gear; some were also receipts of supplies from the Natural Helper network. It is important to recognize and value the efforts of these women in implementing harm reduction practices and safety measures that are protecting themselves, other drug users, their families and community members.

## Implications for Health Promotion Policy, Research, and Practice

To adequately address the harms associated with female injection drug use and to improve health outcomes among this vulnerable population, policy makers and other key decision makers need to utilize a harm reduction and population health approach to guide decision making and service delivery. Partnerships and relationships need to be built between harm reduction champions, researchers, service providers (i.e., such as pharmacies, EHS, ER's), community and service consumers. Health promoters, researchers and policy makers can build capacity among frontline service providers and community through education, policy and knowledge exchange workshops.

It is recommended that policymakers and decision makers take a closer look at current access points for distribution of clean injection gear. There needs to be formal policy recommendations relative to gear distribution sites, which answers questions like: Where else or what other services are able to distribute clean gear (other than needle exchange program)? Are there existing policies in place that prevent other services from distributing clean gear in Cape Breton? Distributing syringes that have retractable needles may be another viable option to help reduce the risks of sharing syringes with other injection drug users (which would decrease the spread of blood borne pathogens) and it would also prevent injection drug users from re-using their own gear (decreasing the risk of infection).

It is crucial to recognize the importance of having adequate methods for safe disposal of needles and injection gear. This will not only protect the individual user but will also protect family members and the community as a whole. Injection drug users should be able to access sharps containers free of charge at multiple sites. For instance, pharmacies have been identified as places where injection drug users have regular contact, however policies currently exist that prevent the distribution of sharps containers to injection drug users. From a policy perspective it is recommended that the College of Pharmacists conduct a policy review and put forward policy recommendations that are inclusive of injection drug users being able to access sharps containers. It is also recommended service providers such as Pharmacies, Needle Exchange Programs, Addiction Services and Public Health Services provide injection drug users with "locked boxes" for the storage of their drug paraphernalia. This would help to decrease the exposure of drugs and equipment among others who they are living with (e.g., children)

## Contact and Relationships with Experienced Drug Users

When the women in my study began injecting drugs they experienced significant social changes in their lives. They reported experiencing isolation from mainstream

groups or 'non-users', and developed new relationships with people in their community who were experienced drug users or dealers. They relied on the other drug users for help finding their next fix, money to purchase drugs, clean gear, housing, social support, etc. These contacts were fairly regular, especially at the beginning of the women's drug use, and were typically partners, close friends, or relatives. This person was typically a partner, a close friend or relative who helped teach them the techniques of injecting. Previous research findings indicate that the first time women inject drugs they are likely to be injected by a partner or helper, thus placing them at a heightened risk of being the second user on the needle (Whynot, 1998; Doherty, Garfein, Monyerroso, Latkin, 2000). My findings do not support these findings. Participants spoke about requiring help with injecting from an experienced drug user the first time they injected, but they all reported that they used a clean needle the first time they injected. Once the women developed drug dependence and they became more comfortable with the injection process, most were more selective about who they used with. Typically it was a close friend, partner or relative; some of the women reported they began injecting alone.

Some research suggests that women may become dependent on a male partner for drug supplies, as well as for economic support (Pinkham, Malinowska-Sempruch, 2007; Weissman and Brown, 2002; Turner et al. as cited in Hartel, 1994). Some of the findings from my research support this finding; however, some women also spoke about a codependency that exists between female injection drug users and their partners. This meant that partners experience a level of dependency on one another, rather than the female injection drug user being solely dependent on their male partner.

Some of the women's relationships and interactions with their male partners exposed them to many health and social risks such as criminal activity, unsafe drug use, unsafe sex, violence, and in some instances their partner was cited as one of the main reasons why they began injecting. Earlier research has shown that persons who are members of injection drug users social networks (e.g., partners), may also be part of their risk networks. It can be argued that injection drug users may be exposed to increased harms through their social networks also known to be their risk networks (Neaigus et al., 1994). Despite the risk exposures that occurred within their relationships with their male partners the findings from this research study also demonstrate that male partners also play a key role in risk reduction. That is, according to many of the women, male partners provide protective factors that helped reduce risk among women, such as obtaining clean gear to use, assisting in financial obligations, accepting responsibility for criminal charges, assisting/ teaching them to inject safer, and supporting their partners in accessing services and supports.

Other research has explored the role that peer users have on influencing safer and unsafe injection practices, and in some instances peer injection drug users help to facilitate safer use by providing access to harm reduction supplies and safer drug using techniques (Jackson, Bailey, Fraser, Johnson, Currie, Babineau, 2002). The participants in my study supported this research as they spoke about their relationships and regular interactions with other more experienced injection drug users. They relied on other drug users for help to find their next fix, money to purchase drugs, clean gear, housing, social support, etc. The existence of these relationships appeared to be a common among the women, especially at the beginning of their drug use.

## **Implications for Health Promotion Policy, Research, and Practice**

Given that injection drug users, including the women in this study report regular contact with other users, prevention efforts that target peer injection drug users to promote harm reduction practices may help to reduce risks (Jackson, Bailey, Fraser, Johnson, Currie, Babineau, 2002). Consideration should be given towards enhancing harm reduction capacity among injection drug users and / or former users who are willing to assume the role of peer supporters for other injection drug users. This may be accomplished through education / training sessions, and the establishment of knowledge exchange networks among users who are willing to become peer helpers.

It is recommended that further research be conducted with males who are partners of female injection drug users to examine the barriers and facilitators to safer drug use and sexual practices. It would be interesting to compare male and female perspectives related to roles and responsibilities in facilitating safer drug use and sexual practices to see if there are similarities or differences related to their perspectives. It would also be interesting to see if there is a "gendered character" related to the males' roles and responsibilities for safer drug use and sexual practices in their relationships. Conducting research with this population my reveal different strategies that could be implemented to help women with some of the pressures they are experiencing related to making their drug use and sexual practices safer. Questions that might be asked include: Do males support safer drug use and sexual practices in their relationships? What types of pressures do they experience in their relationships? Do these pressures increase risks, such as blood borne pathogens, infections and other social determinants that impact overall health outcomes? How might men better engaged in the process of facilitating

safer practices in their relationships? How have their relationships been affected by injection drug use?

# **Sharing and Re-Using Equipment**

Participants spoke about their awareness and understanding of the potential 'dangers' or 'health risks' associated with risky injection drug use, such as contracting blood borne pathogens, drug overdose, developing an infection and even death. Many of the women feared that risky injection drug use would result in serious health consequences. Despite this knowledge, all of the women spoke about engaging in risky injection practices such as sharing gear or re-using equipment. They did not perceive the practice of re-using their own equipment as an ideal practice, but viewed it as relatively safe when they did not have access to a clean needle. This research supports earlier findings which suggest that re-using syringes and injection gear occurs among injection drug users (Parker, Jackson, Dykeman, Gahagan, Karabanow, 2011; Gogineni, Stein, Friedmann, 2001; Patten, 2006; Health Canada, 2006; Ploem, 2000; Health Canada, 2001, Jackson, Bailey, Fraser, Johnson, Currie, Babineau, 2002; Patten, 2006). In order to avoid reusing needles / syringes, it is necessary to have new equipment with each injection, as this will decrease the risks for infection and disease transmission.

Some research findings among male and female injection drug users living in Nova Scotia indicate that drug equipment such as needles and syringes are sometimes shared within the context of an intimate relationship / partner (e.g., spouse, boyfriend/girlfriend, regular sex partner, drug using friend or relative). This may be attributed to the 'trust' and 'love' they have for their partners; perceiving their partner as being 'clean' (i.e., not infected with an infectious disease) (Patten, 2006; Jackson, Bailey, Fraser,

Johnson, Currie & Babineau, 2002). For the women in this research study, the practice of sharing or using someone else's gear was not perceived as the ideal situation, but if the women knew the person well, a person that they trusted, and the person was perceived to be clean or free from disease, the women felt that their risks were reduced.

Some studies have found that sharing practices may differ between men and women, for example, female injection drug users may be more likely to share needles and other injection equipment with a committed partner or with a close group (Barnard; Kane as cited in Hartel, 1994; Public Health Agency of Canada, 2004). When the women's supply of clean gear became depleted, and they did not have access to clean gear the women spoke about increased incidence of re-using gear, and using someone else's gear that they trusted or perceived was 'free' of infectious disease. It is important to note that, sometimes equipment was shared without the existence of a close relationship; in these particular situations injecting with used equipment was related to severity of drug dependency and lack of clean drug equipment.

Frequency of injection and the type of drug being injected are key factors that influence safer and unsafe drug use. For instance, when using cocaine one injected more often than when using opiates, this meant equipment became quickly depleted and they also had more syringes to dispose of.

## **Implications for Health Promotion Policy, Research, and Practice**

Having knowledge of infection status is one approach that has been shown to be critical in controlling and preventing the spread of blood borne pathogens, as well as access to services and supports (Public Health Agency of Canada, 2007; Riley et al., 1999; Fast, Small, Wood, and Kerr, 2008). Research has shown that many individuals

who are aware of their HIV infection status will decrease risk taking behaviors such as unprotected sex or needle-sharing (Public Health Agency of Canada, 2007). Policy makers and decision makers need to recognize barriers (e.g., confidentiality of test results, fear of discrimination if a positive test result is revealed, negative consequences for medical or life insurance, fear of knowing the test result) that may prevent safer practices for vulnerable populations. Once barriers are identified, policies, programs and services can be tailored to meet the needs of specific populations (e.g., injection drug users, people who share needles, syringes and other drug using equipment, those who have unprotected anal, vaginal sexual intercourse or oral sex) that are at increased risk for blood borne pathogens (Nova Scotia Department of Health, 2004) by engaging them as key stakeholders in the process.

Nova Scotia's policies, programs and services should be aimed at protecting and preventing transmission of blood borne pathogens among individuals, communities and the population as whole. Although risk behaviors (i.e., sharing needles, syringes and other drug using equipment, having unprotected anal, vaginal sexual intercourse or oral sex) associated with Hepatitis B, Hepatitis C and HIV transmission are similar with comparable prevention strategies, the alarming rates of Hepatitis C among injection drug users in Nova Scotia would suggest the need for more urgent and tailored prevention approaches to specifically address the rise in Hepatitis C in Nova Scotia (Nova Scotia Department of Health, 2004), such as accessible needle access and exchange programs in small towns / rural communities, heightened surveillance of Hepatitis C which may target specific populations for intervention (i.e., young female injection drug users living in small towns / rural communities).

#### Safer and Unsafe Sexual Practices

Previous research explored contraceptive usage among women who were engaged in a methadone program and found that unreliable and/ or no methods of contraceptive were used among participants (Harding, Ritchie, 2003). The findings in this study support these earlier findings as many women indicated that they did not regularly use contraceptives such as condoms or oral contraceptives.

This research study supports earlier research which found that unsafe sex is perceived to be less risky then unsafe drug use among some people who inject drugs (Rhodes, 1997). As previously discussed, the participants in this study assumed a tremendous amount of responsibility related to safer drug use and adopted many strategies to help make their injection drug use safer, however the responsibility for engaging in safer practices appeared to breakdown with respect to condom usage. For instance, participants in this study who reported being in committed or monogamous relationships felt there was little or no risk having sex without a condom; they trusted and loved their partners and therefore felt there was no need for condoms. Some of the women who were not in committed relationships reported the length of time they knew a person would influence whether or not they would use a condom. Research that was conducted with HIV infected drug users and their partners found that trust and intimacy are critical factors in relationships (Rhodes and Cusick, 2000), and condom usage may be perceived as a barrier to obtaining relationship intimacy. From this perspective the desire to obtain and establish a trusting and intimate relationship may be more important than protecting oneself or one's partner from the risks associated with having unsafe sex (Rhodes and Cusick, 2000). Other researchers have also found that many people who use

illicit drugs by injection perceive sexual behavior with long term partners as safe sexual practices (Health Canada, 2006; Patten, 2006; Jackson, Bailey, Fraser, Johnson, Currie & Babineau, 2002).

It is particularly concerning that the women perceived sexual intercourse without a condom as a safe practice, given that research reports women are at a heightened risk (i.e., twice as likely as men to be infected with HIV, Hepatitis C) during unprotected sexual intercourse (Albert and Williams, 1998; UNAIDS as cited in Pinkham and Malinowska-Sempruch, 2007). It is important to keep in mind that engaging in unsafe sexual practices is not unique to the injection drug using population, as unsafe sex is also prevalent among the general population. For example, findings from Cape Breton District Health Authority's Our Health status report (2008) found that one in three people in Cape Breton were practicing unsafe sexual practices at the time of the survey.

# Implications for Health Promotion Policy, Practice, and Research

Engaging in safer sexual practices to help prevent the spread of sexually transmitted infections and blood borne pathogens are important areas to focus prevention efforts among female and male injection drug users. One key harm reduction and health promotion message might be that condoms should be used at all times when it comes to one's health. Rhodes and Cusick (2000) recommend that in order to promote safer sexual practices (i.e., using condoms); condom usage needs be re-configured as a feature of intimate relationships, partnership and security, rather than a symbol self-protection or individual responsibility. That is, trust and love are important components of intimate relationships and using condoms needs to be conceptualized as an act of 'trust' and intimacy among partners.

Consideration should also be given to interventions for women who inject drugs and have children, such as enhanced home visiting programs. These types of services can help create an environment that focuses on safety and health. For instance, life skill development, assistance with housing, nutrition, and parenting skills. Supportive interventions could also include assistance with the prevention of unplanned pregnancies by facilitating access to affordable birth control, information sessions and access to condoms.

## Supports and Services - Small Town / Rural Living

Recent research findings indicate that injection drug use is a serious problem in small towns / rural communities and female injection drug users living in rural communities may be at a heightened risk given the issues related to gender, accessibility of services, the need for specialized programs and supports (Patten, 2006; Parker, Jackson, Dykeman, Gahagan, Karabanow, 2011). Many of the women who participated in this research study reported that specialized services such as methadone maintenance, withdrawal management, needle exchange, and counseling services were at times difficult to access, because of where they lived in proximity to the services (small towns / rural communities). They also indicated that some services such as methadone maintenance had strict admission criteria and long waitlists that resulted in difficulties related to admission into the program (e.g., they needed to have several other failed treatment attempts, refrain from using other substances etc.).

There were also public transportation challenges noted by the women, which made accessing treatments and supports difficult. For instance, some women talked about having to travel to another community on a weekly basis for their clinic

appointments. While other women spoke about traveling daily to another community to access a pharmacy for their methadone, as their local pharmacy was not accepting any new clients. Some women struggled with the costs associated with the bus fare as well as the added time commitment when they were required to travel long distances to access services and supports. These findings are not surprising as other research has found that small towns / rural communities often lack many basic health and social services, as well specialized services and supports for individuals who inject drugs are virtually nonexistent (National Treatment Strategy Working Group, 2008). Research suggests that injection drug users who live in small towns / rural areas may be at greater risk for drug related harms (e.g., spread of blood borne pathogens, infections / abscesses) because of the lack of services in these areas (Day, Conroy, Lowe, Page, Dolan, 2006).

Many participants reported regular contact with community-based pharmacies. They spoke about purchasing syringes from pharmacies and obtaining methadone medication daily from a community-based pharmacy. Accessing syringes from a pharmacy was sometimes necessary because they were unable to travel the distance to the needle exchange program. Some of the women refused to access syringes from the needle exchange program because they feared someone might see them getting supplies. Some women indicated that the cost of obtaining syringes from a pharmacy was sometimes challenging, as this placed an economic burden on them that would be nonexistent if they were able to access the syringes for free. Some of the women, also reported some pharmacies, on occasion denied selling them syringes because they were injection drug users.

In many ways the women in this research study were exposed to hardships on a day-to-day basis, however, it is also evident that the women overcame great adversities. That is, the women were vulnerable yet exercised remarkable resilience. Ungar (2010) suggests resiliency is best understood as the capacity of individuals to navigate and negotiate resources that will sustain ones wellbeing in a meaningful way. Living in small towns / rural communities made it challenging for the women to access services, created problems related to confidentiality and stigma and as a result created barriers for safer drug use and sexual practices. Yet the women went to great lengths to try and make their drug use safer and access treatments / services. For instance, some women spoke about travelling many hours to get access to methadone treatment, travelling into the city in order to obtain clean injection equipment, paying for needles at the drugstore etc.

#### **Implications for Health Promotion Policy, Practice and Research**

Improvements are needed related to surveillance of the prevalence and incidence of injection drug use in small towns / rural communities. This is not an easy task, as injection drug users have been identified as a 'hidden population' and conducting research in rural settings may present even greater challenges. For instance, female injection drug users living in small towns / rural communities may be more difficult to reach because they are living in an isolated area, they may not want to come forward to participate in research out of fear that someone in the community might discover that they inject drugs, or they may experience transportation barriers that inhibit their ability to participate in research.

Addressing the needs of women who inject drugs in small towns / rural communities requires a change in how we approach their health and deliver services. To

be effective, services for female injection drug users need to be accessible, flexible and appropriately funded. Female injection drug users must be able to access services when and where they need the services most. For instance, hours of operation may need to be extended to include evening and weekends, as well as they may need assistance with transportation and child care.

Women who inject drugs need access to a full range of services and supports (i.e. prevention, outreach, treatment); these services and supports must be responsive and tailored to their unique needs (National Treatment Strategy Working Group, 2008). It is recommended that addiction services, public health and primary care services consider piloting 'one stop shops' as a framework for female injection drug users in Cape Breton. This would allow for female injection drug user's needs to be addressed holistically when they come into contact with the health system. This type of model would enable female injection drug users to access services such as methadone, counseling, clean injection equipment, pap smears, health education, prenatal support, birth control, immunizations, and anonymous testing in one location. The need to make multiple appointments and travel trips to access the health system would be eliminate; this could be done in the form of mobile outreach / mobile vans. A more formal partnership needs to be initiated between Addiction Services, Primary Care, Public Health Services and the Needle Exchange Program to examine resource allocation and develop a pilot framework for this 'one stop shop' approach.

Living in small towns / rural communities may place female injection drug users at greater disadvantage related to accessing clean gear and injection supplies. It is recommended that the distribution of clean injection equipment and condoms (i.e.,

syringes, tie offs, spoons etc) be made available at multiple sites and free of charge. Other sites such as pharmacies and emergency departments, walk in clinics may be appropriate sites for condoms and clean gear distribution in small towns/ rural communities.

Consideration should also be given to increasing outreach services in small towns/ rural communities. Outreach services should 'reach out' to individuals who are not otherwise connected to mainstream services. Outreach services need to be mobile and readily available and accessible. Outreach services should incorporate a combination of interventions such as street contacts, intensive case management to assist with access to basic health needs (e.g., food, clothing, and shelter), assist with screening / early intervention and also assist female injection drug users to connect with other intensive / specialized services when needed.

Prevention and risk reduction approaches should be flexible; program rules and regulations should be designed to enhance client engagement. Service providers need to be educated on the harm reduction philosophy and framework. This would ensure policy and strategy implementation incorporates aspects of the harm reduction framework aimed at reducing immediate harms associated with drug use and unsafe sexual practices among female injection drug users (Pinkham, Malinowska-Sempruch, 2007).

An integrated approach to policy, program development, implementation and evaluation is needed. An essential first step for health promotion planning would be the development of partnerships with government, provincial organizations, local community groups and the target population (female intravenous drug users) to help initiate the development of meaningful goals, objectives, policies / strategies and access to resources

to adequately address injection drug use among females in small towns / rural communities in Cape Breton, Nova Scotia.

It is also recommended that an evaluation plan coincide with the implementation of each recommendation. Careful monitoring and evaluation is needed to determine the effectiveness of changes related to service delivery and in order to make future recommendations for quality / service improvements initiatives.

#### **Communication and Dissemination Plan**

Although participating in this study had no immediate benefits to the participants, the information obtained may help to increase our understanding of female injection drug users' day-to-day lives and the work involved in managing their drug addiction, as well as the barriers and facilitators to safer drug use and safer sexual practices among female injection drug users living in small towns / rural communities in Cape Breton. This may help to inform policy and future program initiatives.

The thesis was examined by the researcher's examining committee and an oral defense was held at Dalhousie University in October 2011. Based on the findings from this research, Abstracts will be developed and submitted to various health conferences such as, Canadian Center on Substance Abuse (CCSA): Issues of Substance Use Conference, and others. Preliminary findings were presented at the Cape Breton Health Research Symposium in the spring of 2011. Findings from this research study will also be submitted for peer review to academic journals.

The researcher will also relay and disseminate key findings and recommendations from this research study to local agencies/ key stakeholders. Specifically, the researcher will prepare and hold information sessions with various key stakeholders and service

providers in the Cape Breton community including but not limited to Sharp Advice Needle Exchange, Addiction Services, Public Health Services and Association for Safer Cape Breton Communities. The researcher will seek permission to discuss the study's results and recommendations with policy / decision makers at Nova Scotia Department of Health and Wellness, Addiction Services division. Finally, the researcher will develop a community bulletin with the key findings from the study; this will be sent to key service providers electronically using email distribution lists.

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#### APPENDIX A - INTERVIEW GUIDE



#### Interview Guide

Exploring Safer and Unsafe Drug Use and Sexual Practices among Young Female Injection Drug Users Living In Small Towns/ Rural Communities in Cape Breton, NS.

Introduction: Hi! Thanks for agreeing to participate in this interview. I really appreciate you taking the time to be here. As you may remember, the purpose of this interview is to talk about your experiences related to safer and unsafe drug use and sexual practices. I am hoping the information gathered from you and other research participants will help us to develop an understanding of what some of the facilitators associated with safer drug use and safer sexual practices among women who inject drugs and live in small towns/ rural communities in Cape Breton, NS. I am also hoping to identify and gain an understanding of what some of the barriers are that may prevent safer drug use and safer sexual practices among women who inject drugs, living in small towns/ rural communities in Cape Breton, NS. Throughout this interview I will be asking your opinion on many different questions, it is important to recognize that there are no right or wrong answers to these questions; I am mainly interested in your thoughts and opinions. Please remember that if I ask a question that you do not want to answer, or if you decide you want to stop the interview, let me know and we can either move on to the next question or stop the interview; your participation is entirely voluntary. The interview should take between 1 and 1.5 hours; so if you need a break we can stop the interview, just let me know. If you have any questions about the study or the interview process,

please feel free to ask me at anytime. I am going to be digitally audio recording this

interview, so that I can go back and review what we talked about; however you can ask

me to turn off the audio recorder at anytime. At the end of the interview I would like to

get your feedback on how you felt the interview went, and if there is anything you would

recommend changing.

I am very interested in hearing your perspective.

Do you have any questions or concerns before we begin?

Is it okay if I turn on the audio recorder and get the interview started?

Start Audio Recording → Could you please confirm for me on audio recording that free and informed verbal consent to participate in the interview and to be audio

recorded has been obtained.

A: Safer and Unsafe Drug Use

**Question 1** 

Can you tell me about what your typical day is like when you are using injection drugs?

**Probes:** 

o Tel me about your use...

• Are there any aspects of your drug use that concerns you?

• Who do you typically use with if anyone? Who is typically present? Or do you

typically inject alone?

• Are they a friend? A partner?

• Where do you use – that is at home, in a public space etc?

If uses with someone...

o Can you tell what happens when you use with someone?

o Do you inject yourself, or do you have assistance, if you have assistance from

whom? Use your own needle?

Trompt

**Prompts:** Are they a friend? A partner?

**Probes:** 

o So when someone else helps injects you, is that a clean needle or is it one that

might have been used?

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#### **Question 2:**

Can you tell me about the first time you injected drugs?

#### **Probes:**

- o How old were you?
- o Why did you start injecting drugs?
- Where was it? Were there others present? If so who?
- Did you inject yourself, or did you have assistance, if you had assistance from whom?
- Where did you get your injection equipment from (rigs/ gear)?

#### **Question 3:**

When you think of using drugs safely what comes to mind for you?

#### **Probes:**

- When you hear the term "safer drug use", what do you think of?
- What types of things do you do to help make injection drug use safer for you (facilitators)?

#### **Prompts**:

Do you have access to clean needles? Where do you access clean needles?

Not sharing needles, using equipment only once, safe disposal, labeling needles etc.?

What about cleaning equipment?

Do you always use a clean needle every time you inject (shoot)?

How many times do you inject (shoot up) when you are on a run? How long does this

last? Are you practicing safer at the beginning of the run? ...and less safer as the run goes

on?

#### Probes:

- How is it different being a female injection drug user?
- Do you think being a woman makes it easier to practice safer drug use? What about harder?

**Prompts**: access to services; stigma; care-giver role etc.

#### Probes:

- What resources/ supports can you access to help you practice safer?
- o Do you think there are ways to make your drug using practices safer?
- O Where do you go to get clean supplies?

#### **Prompts**:

Needle exchange, Addiction Services, friend, partner, dealer/supplier

**Question 4:** When you think of unsafe drug use what comes to mind?

#### Probes:

- What makes it difficult or hard for you to practice safer drug use (barriers)?
- Do you experience any social or financial difficulties that make it hard for you to practice safer injection drug use?

Prompts: lack of services, pressure from partner, stigma, transportation, income

#### **Probes:**

O Do you ever feel pressure to practice unsafe injection drug use? If so tell me about these pressures...

**Prompts:** housing, financially dependent on partner or others, fear, stigma, peer influence

#### Probes:

- How do you know what is a safe amount of a drug to inject?
- Tell me about your alcohol usage, do you typically use alcohol when you inject drugs?

**Prompts**: sometimes, all the time, never; does this impact you ability to use safe?

#### **Question 5**

Can you tell me about a time you practiced unsafe injection drug use?

If participant answers no skip question, if participant answers yes probe

#### **Probes**

- o Can you describe what was happening and what made it unsafe for you?
- o Who was there with you?
- o Did you share or reuse any of your or someone else's equipment?
- What types of supports/resources would you have needed to make this situation safer for you?

**Prompts**: clean supplies, safe place to inject, less pressure

#### **Question 7:**

Where do you go in your community to get your injection equipment/ supplies?

#### **Probes:**

- o Does where you live make it difficult?
- o Is there anything else that makes it challenging,

**Prompts**: travel, childcare, stigma, confidentiality

#### **Probes:**

o Tell me about your access to Needle Exchange Services, Methadone Maintenance Program or other community services?

**Prompts**: Do you access these services? Why or Why not? Do you feel these services are safe?

#### **Probes:**

• Tell me about where you go to get information or who you talk to about safer drug use?

**Prompt**: family, other injection drug users, friends, partner, Addiction Services, Needle Exchange, family doctor

#### **B:** Safer and Unsafe Sexual Practices

#### **Question 8:**

When you think of unsafe sex what comes to mind? What about safe sex?

#### Probe(s)

- Would you consider having sex without a condom with your boyfriend, girlfriend, or spouse as a safe sex practice? Why or why not?
- What about condom usage?... Do you use them when you have sex? Why or why not?
- Tell me about what you think safe sex is? When you hear "safe sex", what do you think of?
- Are you currently sexually active?, if so how do you protect yourself?;
- If not can you tell me about some things you have done in the past to protect yourself?

#### **Ouestion 9:**

Tell me what you think are some of the things that impact sexual practices.

#### Probe(s):

• What are some of the things you encountered that prevented you from having safe sex?

**Prompts**: friends, partner, work, money, being high, access to equipment, information

#### **Probes:**

- Do you have more or less sex when you inject drugs (when you are high)? Do you "do" different things (sexual activities/ practices) when you are high as opposed to when you are not using"
- Do you think being a woman makes it easier to practice safe sex? What about harder?
- o If harder, tell me about these pressures; if easier, what makes it easier?

**Prompts**: partner, family, friends, drug dealer/ suppliers, clients, access to condoms **Probes**:

- o Tell me how you access contraceptives (condoms, birth control)?
- Who's responsible for ensuring a condom is used during sex?
- Tell me about your alcohol usage, do you typically use alcohol when you have sex; does this impact your ability to practice safe sex?

#### **Ouestion 10:**

Have you ever participated in sex exchanges for money, drugs or to get high? *If the participant answers no skip question, if participant answers yes probe* 

#### **Probes:**

- o Tell me did you practice safe sex in these situations (e.g., use a condom)
- o Is there anything that prevented you practicing safer sex

**Prompts**: drugs, pressure from client/ partner, being a female

#### **Question 11**

Tell me about the last time or any time that you had sex when using injection drugs? Do you think it was it safe; why or why not?

#### **Probes:**

• What are some of the things that helped you practice safe sex (facilitators)?

**Prompts**: having a condom on hand, talking to someone/ support, mutual agreement to practice safe sex, feeling safe/ sex partner free from infection

#### **Probes**:

• What things prevented you from practicing safe sex (barriers)?

**Prompts**: high, pressure from partner or others, no condom available

#### **Ouestion 12:**

Does where you live impact your ability to practice safer sex?

#### **Probes:**

Tell me about your access to condoms, contraceptives?

• What services are available or who can you talk in community about safer sex practices

**Prompts**: treatment/ testing for STI's, condoms

#### Probes:

• What prevents you from accessing services/ supports in your community?

**Prompts**: being a female, travel, inaccessibility of services/ supports, children, confidentiality, fear, stigma, embarrassed, time

#### C: Supports and Services

#### **Question 13**

When you think about your community/ Cape Breton in general, can you describe what is like to live here?

#### **Prompts**:

- Ability to access steady employment
- Out migration (people leaving to seek employment and a better life)
- o Health inequalities (health problems)
- o Access to transportation, services and supports
- Cost of living

#### **Question 14:**

When you think about the community you live in do you feel like there are opportunities?

#### **Probes:**

o What types of opportunities? If any?

Prompts: work, family, recreation.

#### **Probes**:

o Do you think the opportunities are the same or different for females?

#### **Question 15:**

What is like being an injection drug user in your community?

#### **Question 16:**

Tell me about the types of services and supports you can access in your community that help female injection drug users practice safer drug use and safer sexual practices?

#### **Probes:**

- What is out there to help?
- As a female tell me about some of the challenges you encounter when trying to access services and supports? ... what gets in the way?

**Prompts**: childcare, transportation, confidentiality, access to services, embarrassment, services not meeting your needs

#### Probes:

What makes some services/ supports better than others?
 Prompts: qualified people to talk to, non judgmental atmosphere, location, hours of operation

#### **Question 17**

Are there any additional services and supports that you can think of that do not currently exist in your local area that could help you or other female injection drug users practice safer drug use and sexual practices?

Thank You

#### APPENDIX B - RECRUITMENT POSTER



# Research Study

## **ARE YOU...**

- ✓ A FEMALE INJECTION DRUG USER
- ✓ 18 TO 35 YEARS OF AGE
- ✓ LIVING IN SMALL TOWN/ RURAL COMMUNITY IN CAPE BRETON, NS (OUTSIDE INDUSTRIAL SYDNEY AREA)

### WHO IS WILLING TO...

- ✓ DISCUSS EXPERIENCES RELATED TO SAFER AND UNSAFE DRUG USE AND SEXUAL PRACTICES
- ✓ PARTICIPATE IN A ONE-ON-ONE INTERVIEW (1.5 HOURS IN DURATION)
- ✓ \$20.00 HONORARIUM WILL BE PROVIDED

# IF YOU ARE INTERESTED IN BEING INTERVIEWED OR WANT MORE INFORMATION, CONTACT SAMANTHA HODDER BY PHONE OR EMAIL

**PHONE:** 1-902-578-4347

EMAIL: SAMANTHA.HODDER@DAL.CA

Researcher: Samantha Hodder, School of Health and Human Performance, Dalhousie University Supervisor: Lois Jackson, School of Health and Human Performance, Dalhousie University

#### APPENDIX C – PARTICIPANT CONSENT FORM



School of Health and Human Performance 6230 South Street Halifax, NS B3H 3J5 902-494-2152 (phone) 902-494-5120 (fax)

"Safer and Unsafe Drug Use and Sexual Practices among Young Female Injection Drug Users Living in Small Towns/ Rural Communities in Cape Breton, NS".

Principal Investigator: Samantha Hodder	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 1-902-578-4347 Fax: 902-494-5120 Email: Samantha.Hodder@dal.ca
Supervisor: Lois Jackson	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 902-494-1341  Fax: 902-494-5120  Email: lois.jackson@dal.ca

#### 1. Introduction

You are invited to take part in a research study being conducted by Samantha Hodder who is a graduate student at Dalhousie University, as part of her Masters in Health Promotion Degree. Your participation in this study is entirely voluntary and you may withdraw from the study at any time. The information collected from this research will be used as the basis for a university paper /thesis. Results may also be published in articles for journals and used for conference presentations. Your access to community based services and other services will not be affected by whether or not you participate. The study is described below. This description tells you about the risks, inconvenience, or discomfort that you might experience. Participating in the study might not benefit you directly, but might help us learn things that will benefit others. You should discuss any questions you have about this study with Samantha Hodder (1-902-578-4347, or email Samantha.Hodder@dal.ca).

### 2. Purpose of the Study

The researcher is interested in developing an understanding of what helps female injection drug users living in small towns/rural communities in Cape Breton, Nova Scotia to use safely and practice safer sex and what makes it hard to do so. The researcher is interested, in particular in how living in a small town and being a female injection drug user affects safer/unsafe practices.

### 3. Study Design:

8-10 female injection drug users will be invited to participate in this study. If you choose to take part in the study you will be asked to participate in a one-on-one face to face interview; the interview will help the researcher to develop an in-depth understanding about your perceptions of what helps you related to safer and unsafe drug using and sexual practices while living in small town/ rural Cape Breton communities.

## 4. Who can participate in the Study?

You can participate in this study if you:

- Are a female
- Self identify as an injection drug user and have participated in injection drug use within the past year.
- English speaking
- Between the ages of 18-35
- Currently living in a small town/ rural community in Cape Breton, Nova Scotia

#### 5. Who will be conducting the Interviews?

Samantha Hodder who is a graduate student in the Master of Arts in Health Promotion at Dalhousie University will be conducting this research study. You should also be aware that Samantha Hodder is also employed as a Manager of Health Promotion and Prevention at Addiction Services in Cape Breton District Health Authority. Samantha Hodder's supervisor, Lois Jackson, PhD, Dalhousie University will also be involved in the research process

### 6. What will you be asked to do?

You will be asked to voluntarily participate in a one-on-one, face-to-face, digitally audio recorded interview using an interview guide. However, if you do not want the interview audio recorded, the interview will take detailed notes of the interview. You will be asked a few demographic questions at the beginning of the interview (e.g., age, employment status). You may refuse to answer any question or questions and we will move on to the next. You may withdraw from the interview at any time.

#### 7. How long will it take to conduct the interview and where will it be held?

The interview will take approximately 1-1.5 hours; it will be held in a quiet, comfortable and private office located in a community setting/ local agency, which is agreeable to both you and the interviewer.

#### 8. Possible Risks:

There is minimal risk associated with this research study. There may be some uneasiness associated with the interview questions asked; some of the questions may raise some issues that may be emotionally upsetting to you. However you may choose not to answer any of the interview questions or stop the interview at any time. If you are feeling uncomfortable the interviewer will refer you to someone local who can assist you. You will also be provided with a list of supports and services in your local area.

The information you provide will be kept confidential and we will not be collecting any personally identifying information however you should also be aware of the limits to confidentiality, which are imposed on researchers due to their legal obligations. The researcher is obligated to report any disclosure of suspected child abuse and or neglect, or the abuse and or neglect of an adult who needs protection. The information you provide will not be shared with the authorities, unless the researcher is required to do so by law (e.g., transcript subpoenaed, or provide a description of who was interviewed). In such cases the researcher will be required to provide the required information.

#### 9. Possible Benefits:

Participating in this research study may not have any direct benefits for you; however the information obtained may help increase our understanding of the facilitators and barriers of safer/ unsafe drug use and sexual practices among young adult female injection drug users living in small towns/ rural communities in Cape Breton and help to inform future policy and program initiatives.

### 10. Compensation:

You will be provided with \$20.00 honorarium, to help compensate for time lost and/ or costs associated with the interview (i.e., travel, childcare etc.). If you choose to stop the interview or withdraw from the interview process the twenty-dollar honorarium will still be provided to you. The researcher has no financial interest in the study.

### 11. Confidentiality and Anonymity:

Personal identifying information will not be collected and you will not be identified in any reports, publications, or presentations. You will be asked to provide free and informed verbal consent only. You will receive a copy of the consent form and read the participant information forms prior to starting the interview. Personal identifiers will not be collected during the study; rather you will be assigned an ID number, which will be used to distinguish one transcript from the other.

With your permission the interview will be digitally audio recorded, however if you do not want the interview audio recorded, the interviewer will take detailed notes of the interview. The data you provide will be transcribed by a transcriber, who will sign a confidentiality form (if any personal identifiers exist they will be removed), once the interview is transcribed the tapes will be destroyed. All data will be stored in a locked file cabinet in a locked office in Cape Breton, NS and in a password-protected memory stick and computer. Samantha Hodder (researcher) and Dr. Lois Jackson (researcher's supervisor) will be the only ones to have access to the data collected.

You should be aware of Dalhousie's University Policy on Research Integrity, which requires data be securely maintained by the institution for 5 years, post publication at Dalhousie University, Halifax, NS. The data will be stored in Dr. Lois Jackson's office setting in a locked cabinet. You should also be aware of the limits to confidentiality, which are imposed on researchers due to their legal obligations (i.e., duty to report disclosure of suspected child abuse or neglect, or the abuse and or neglect of an adult in need of protection). The identities and the information you provide will not be shared with the authorities, unless the researcher is required to do so by law (e.g., transcript subpoenaed, or provide a description of who was interviewed). In such cases the researcher will be required to provide the required information.

#### 12. Questions:

If you have any questions about the interviews or the study in general please contact, Samantha Hodder (researcher) at 1-902-578-4347 or <u>Samantha.Hodder@dal.ca</u>. You may also contact Samantha Hodder's supervisor Dr. Lois Jackson at 902-494-1341 or lois.jackson@dal.ca.

#### 13. Problems or Concerns:

If you have any difficulties with, or wish to voice concern about, any aspect of your participation in this study, you may contact Patricia Lindley, Director of Dalhousie University's Office of Human Research Ethics Administration, for assistance (902) 494-1462, <a href="mailto:patricia.lindley@dal.ca">patricia.lindley@dal.ca</a>

This research has also been reviewed and approved by the Cape Breton District Health Authority Research Ethics Board. If you have any questions or concerns about the study, you may contact myself Samantha Hodder (1-902-578-4347 or the Chair, District Research Ethics Board @ 902-563-1833 (p).

#### APPENDIX D -SIGNITURE PAGE



Participant Consent Form: Signature Page

School of Health and Human Performance 6230 South Street Halifax, NS B3H 3J5 902-494-2152 (phone) 902-494-5120 (fax)

"Safer and Unsafe Drug Use and Sexual Practices among Young Female Injection Drug Users Living in Small Towns/ Rural Communities in Cape Breton, NS".

Principal Investigator: Samantha Hodder	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 1-902-578-4347 Fax: 902-494-5120 Email: Samantha.Hodder@dal.ca
Supervisor: Lois Jackson	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 902-494-1341  Fax: 902-494-5120  Email: lois.jackson@dal.ca

I have read the participant information sheet for the study entitled "Exploring Safer and Unsafe Drug Use and Sexual Practices among Female Injection Drug Users". I am agreeing to participate in this study by giving my **verbal consent** to partake in a one-on-one, face-to-face confidential interview. I understand that my participation in this study is entirely voluntary and I may refuse to answer any of the questions or withdraw from the study at any time. I have been given opportunity to raise any questions or concerns related to the study and or the interview process and these question/ concerns have been answered to my satisfaction.

Verbal consent obtained for interview participation	
Verbal consent obtained for the use of quotations yes,no	
Verbal consent obtained for the interview to be digitally audio recorded yes,	nc
Full Name of the Researcher obtaining the verbal consent	
Signature of Researcher obtaining consent:	
Date	

# APPENDIX E -SOCIO-DEMOGRAPHIC INFORMATION



1.	Age Range
	18-21
	22-26
	27-31
	32-35
2.	<b>Highest Level of Education</b>
	Less than High School
	Completed High School/GED
	Some Post-Secondary Education
	Completed Post-Secondary
	Other
3.	Relationship Status (check all appropriate)
	Married
	Single (never married)
	Divorced
	Common Law Partner
	Committed Relationship
	Widowed
	Other
4.	<b>Employment Status/ Income Sources (check all appropriate)</b>
	Part-time Formal Employment
	Full-time Formal Employment
	Informal Employment (i.e. sex trade, pan handling)
	Employment Insurance/ Worker Compensation
	Social Assistance/ Disability/ Pension
	Income from family/ friend or partner
	Other

	5.	Drug History
	At	approximately what age did you start inject your injection drug use?
exclud		proximate the total amount of time you have been injecting illicit drugs? (Try to e g periods of times of absence if any)
	6.	Ethnicity: How you self-identify. Please check all that apply.
		Caucasian Aboriginal Black Asian Other
	7.	Geographic: Small Town/ Rural Living
	Но	w long have you lived in a small town/ rural community?
	Но	w long have you lived in Cape Breton, Nova Scotia?
	Ha	ve you ever lived elsewhere (outside of Cape Breton, NS)?
		ve you ever had to move/ relocate outside of the province of Nova Scotia in order obtain employment?
	-	you have a partner, have they ever had to move/ relocate outside of the province of eva Scotia in order to obtain employment?

#### APPENDIX F – PILOT TEST CONSENT FORM



Pilot Test: Participant Consent Form

School of Health and Human Performance 6230 South Street Halifax, NS B3H 3J5 902-494-2152 (phone) 902-494-5120 (fax)

"Safer and Unsafe Drug Use and Sexual Practices among Young Female Injection Drug Users Living in Small Towns/ Rural Communities in Cape Breton, NS".

Principal Investigator: Samantha Hodder	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 1-902-578-4347  Fax: 902-494-5120  Email: Samantha.Hodder@dal.ca
Supervisor: Lois Jackson	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 902-494-1341  Fax: 902-494-5120  Email: lois.jackson@dal.ca

#### 1. Introduction

You are invited to take part in a pilot phase for a research study being conducted by Samantha Hodder who is a graduate student at Dalhousie University, as part of her Masters in Health Promotion Degree. Your participation in this pilot phase is entirely voluntary and you may withdraw from the study at any time. The information collected from this research will be used as the basis for a university paper /thesis. Results may also be published in articles for journals and used for conference presentations. Your access to community based services and other services will not be affected by whether or not you participate. The pilot phase is described below. This description tells you about the risks, inconvenience, or discomfort that you might experience. Participating in the study might not benefit you directly, but might help us learn things that will benefit others. You should be aware that the data you provide pilot phase of this study will not be analyzed as part of the study's findings, rather data collected during the pilot phase will give the researcher an opportunity to ensure the interview questions are appropriate and eliciting the desired information. You should discuss any questions you have about this

study or the process with Samantha Hodder (1-902-578-4347, or email Samantha.Hodder@dal.ca).

## 2. Purpose of the Study

The researcher is interested in developing an understanding of what helps female injection drug users living in small towns/rural communities in Cape Breton, Nova Scotia to use safely and practice safer sex and what makes it hard to do so. The researcher is interested, in particular in how living in a small town and being a female injection drug user affects safer/unsafe practices.

## 3. Study Design:

Two females will be asked to pilot test the interview guide. You will be asked to participate in a pilot test of a one-on-one face to face interview; the interview will help the researcher to develop an in-depth understanding about your perceptions of what helps you related to safer and unsafe drug using and sexual practices while living in small town/ rural Cape Breton communities. Piloting testing the semi-structured interview guide will give the researcher an opportunity to ensure the interview questions are appropriate and eliciting the desired information. The data gathered from the two pilot tests (socio-demographic information and interview guide) will not be analyzed or used in the research findings.

## 4. Who can participate in the Pilot Test?

You can participate in this pilot test if you:

- Are a female
- Self identify as an injection drug user and have participated in injection drug use within the past year.
- English speaking
- Between the ages of 36-38
- Currently living in a small town/ rural community in Cape Breton, Nova Scotia (approximately under 10,000 people).

#### 5. Who will be conducting the Pilot Test/ Interviews?

Samantha Hodder who is a graduate student in the Master of Arts in Health Promotion at Dalhousie University will be conducting this research study. You should also be aware that Samantha Hodder is also employed as a Manager of Health Promotion and Prevention at Addiction Services in the Cape Breton District Health Authority. Samantha Hodder's supervisor, Lois Jackson, PhD, Dalhousie University will also be involved in the research process

#### 6. What will you be asked to do?

You will be asked to voluntarily participate in a one-on-one, face-to-face, digitally audio recorded interview using an interview guide. However, if you do not want the interview audio recorded, the interview will take detailed notes of the interview. You will be asked a few demographic questions at the beginning of the interview (e.g., age, employment status). You may refuse to answer any question or questions and we will move on to the next. You may withdraw from the interview at any time.

## 7. How long will it take to conduct the interview and where will it be held?

The interview will take approximately 1-1.5 hours; it will be held in a quiet, comfortable and private office located in a community setting/ local agency, which is agreeable to both you and the interviewer.

#### 8. Possible Risks:

There is minimal risk associated with this research study. There may be some uneasiness associated with the interview questions asked; some of the questions may raise some issues that may be emotionally upsetting to you. However you may choose not to answer any of the interview questions or stop the interview at any time. If you are feeling uncomfortable the interviewer will refer you to someone local who can assist you. You will also be provided with a list of supports and services in your local area.

The information you provide will be kept confidential and we will not be collecting any personally identifying information however you should also be aware of the limits to confidentiality, which are imposed on researchers due to their legal obligations. The researcher is obligated to report any disclosure of suspected child abuse and or neglect, or the abuse and or neglect of an adult who needs protection. The information you provide will not be shared with the authorities, unless the researcher is required to do so by law (e.g., transcript subpoenaed, or provide a description of who was interviewed). In such cases the researcher will be required to provide the required information. The data gathered from the two pilot tests (socio-demographic information and interview guide) will not be analyzed or used in the research findings.

#### 9. Possible Benefits:

Participating in this research study may not have any direct benefits for you; however the information obtained may help increase our understanding of the facilitators and barriers of safer/ unsafe drug use and sexual practices among young adult female injection drug users living in small towns/ rural communities in Cape Breton and help to inform future policy and program initiatives. Piloting testing the semi-structured interview guide/ demographic questions will give the researcher an opportunity to ensure the interview questions are appropriate and eliciting the desired information.

#### 10. Compensation:

You will be provided with \$20.00 honorarium, to help compensate for time lost and/ or costs associated with the interview (i.e., travel, childcare etc.). If you choose to stop the interview or withdraw from the interview process the twenty-dollar honorarium will still be provided to you. The researcher has no financial interest in the study.

## 11. Confidentiality and Anonymity:

Personal identifying information will not be collected and you will not be identified in any reports, publications, or presentations, nor will the data you provide be analyzed as part of the study's findings. You will be asked to provide free and informed verbal consent only. You will receive a copy of the consent form and read the participant information forms prior to starting the interview. Personal identifiers will not be collected during the study; rather you will be assigned an ID number, which will be used to distinguish one transcript from the other.

With your permission the interview will be digitally audio recorded, however if you do not want the interview audio recorded, the interviewer will take detailed notes of the interview. The data you provide will be transcribed by a transcriber, who will sign a confidentiality form (if any personal identifiers exist they will be removed), once the interview is transcribed the tapes will be destroyed. All data will be stored in a locked file cabinet in a locked office in Cape Breton, NS and in a password-protected memory stick and computer. Samantha Hodder (researcher) and Dr. Lois Jackson (researcher's supervisor) will be the only ones to have access to the data collected.

You should be aware of Dalhousie's University Policy on Research Integrity, which requires data be securely maintained by the institution for 5 years, post publication at Dalhousie University, Halifax, NS. The data will be stored in Dr. Lois Jackson's office setting in a locked cabinet. You should also be aware of the limits to confidentiality, which are imposed on researchers due to their legal obligations (i.e., duty to report disclosure of suspected child abuse or neglect, or the abuse and or neglect of an adult in need of protection). The identities and the information you provide will not be shared with the authorities, unless the researcher is required to do so by law (e.g., transcript subpoenaed, or provide a description of who was interviewed). In such cases the researcher will be required to provide the required information.

### 10. Questions:

If you have any questions about the interviews or the study in general please contact, Samantha Hodder (researcher) at 1-902-578-4347 or <a href="mailto:Samantha.Hodder@dal.ca">Samantha.Hodder@dal.ca</a>. You may also contact Samantha Hodder's supervisor Dr. Lois Jackson at 902-494-1341 or lois.jackson@dal.ca.

#### 11. Problems or Concerns:

If you have any difficulties with, or wish to voice concern about, any aspect of your participation in this study, you may contact Patricia Lindley, Director of Dalhousie University's Office of Human Research Ethics Administration, for assistance (902) 494-1462, <a href="mailto:patricia.lindley@dal.ca">patricia.lindley@dal.ca</a>

This research has also been reviewed and approved by the Cape Breton District Health Authority Research Ethics Board. If you have any questions or concerns about the study, you may contact myself Samantha Hodder (1-902-578-4347nor the Chair, District Research Ethics Board @ 902-563-1833 (p).

## APPENDIX G-PILOT TEST SIGNATURE PAGE



Pilot Test: Participant Consent Form: Signature Page

School of Health and Human Performance

6230 South Street Halifax, NS B3H 3J5 902-494-2152 (phone)

902-494-5120 (fax)

"Safer and Unsafe Drug Use and Sexual Practices among Young Female Injection Drug Users Living in Small Towns/ Rural Communities in Cape Breton, NS".

Principal Investigator: Samantha Hodder	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 1-902-578-4347 Fax: 902-494-5120 Email: Samantha.Hodder@dal.ca
Supervisor: Lois Jackson	School of Health and Human Performance, Dalhousie University, 6230 South St, Halifax, NS B3H3J5	Phone: 902-494-1341  Fax: 902-494-5120  Email: lois.jackson@dal.ca

I have read the participant information sheet for the study entitled "Exploring Safer and Unsafe Drug Use and Sexual Practices among Female Injection Drug Users". I am agreeing to participate in this study's pilot test by giving my **verbal consent** to partake in a one-on-one, face-to-face confidential interview. I understand that my participation in this study's pilot test is entirely voluntary and I may refuse to answer any of the questions or withdraw from the interview at any time. I have been given opportunity to raise any questions or concerns related to the study and or the interview process and these question/concerns have been answered to my satisfaction.

Verbal consent obtained for interview participation	
Verbal consent obtained for the interview to be digitally audio recordedy	es,no
Full Name of the Researcher obtaining the verbal consent	
Signature of Researcher obtaining consent:	
Date	

## APPENDIX H -SUPPORTS AND SERVICES



## Supports and Services in Cape Breton, Nova Scotia

## Supports and Services in Cape Breton, NS

General

Kid's Help Phone: 1-800-668-6868 Parent Help Line: 1-888-603-9100

**Health and Community Services** 

Cape Breton Regional Hospital: 567-8000

Addiction Services:

TOLL FREE Number 1-888-291-3535

www.addictionservices.ns.ca

Withdrawal Management: 563-2040 Community Based services: 563-2590 Health Promotion and Prevention: 563-8646

Methadone Maintenance 563-2043

Mental Health Services:

Emergency Crisis Services: 902-567-7767 Adult Outpatient Services: 902-567-7730 Inverness Mental Health Clinic: 902-258-1911

Inpatient Services: 902-567-7975 Administration: 902-567-8093

Sharp Advice Needle Exchange: 539-5556

Planned Parenthood Cape Breton: 539-5158

Cape Breton Transition House Association

Support Line 539-2945 Outreach Office 562-3045

Elizabeth Fry Society 539-6165

Every Women's Centre 567-1212

## APPENDIX I – LEGAL AND MORAL RESPONSIBILITIES



Legal and Moral Responsibilities RE: Hepatitis C and HIV/AIDS

The following statement will be read by the researcher to each research participant prior to commencing the interview...

## Legal and Moral Responsibilities RE: Hepatitis C and HIV/AIDS

If you have HIV/AIDS or are Hepatitis C positive, you have a legal responsibility to disclose your HIV/AIDS and/ or Hepatitis C status to people who are potentially at risk by having contact with you. Some people believe you also have a moral responsibility to do so.

### APPENDIX J -HONORARIUM CONSENT FORM



### Honorarium Consent Form

I am acknowledging that I am being provided with \$20.00 honorarium, to help compensate for time lost and or costs associated with the interview (i.e., travel childcare etc.). I understand that I will not receive a T4 slip confirming this income; however I should include it as extra income on my tax return for 2010.

Verbal consent obtained yes	
Researcher's Signature	
Date	

# APPENDIX K - CONFIDENTIALITY AGREEMENT



Confidentiality Agreement for Transcriber

	transcriber for the digital
audio recordings used for the research study, "Exploring	g Safer and Unsafe Drug Use and
Sexual Practices among Young Female Injection Drug Users Li	ving in Small Towns/ Rural
Communities in Cape Breton, NS", agree that I will not repeat a	any of the information obtained
from the digital audio recordings or the transcripts. I understand	I that all information pertaining to
this study is confidential and it is to remain confidential.	
Name (print)	
Signature	
Date	
Witness	
Date	