Drug Use, Disease, and Reduction of Harm
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OVERVIEW

- **Increases in injection drug use** reported throughout U.S. over past decade
  - Much of this occurring in suburban and **rural areas**
- **Heroin use** has shifted from a problem of inner city minorities to **nonurban, middle-class Caucasians**
  - Heroin use increased 60% in U.S. between 2002 to 2013; *increase had been 114% in Caucasians*
- Many **rural areas have higher methamphetamine use** than urban areas
  - Rural meth users have higher likelihood of **using this drug via injections** than urban counterparts
OVERVIEW

- **New HIV diagnoses** had been declining for several years
  - Since 2010, this has stabilized (stopped decreasing) in rural areas
- Persons who inject drugs (PWID) account for 48% to 70% of new hepatitis C (HCV) infections and 16% of new HIV infections in the U.S.
- There has been **significant increase in acute HCV infections in young people**, 84% of whom report history of recreational drug use
  - The increase in HCV in young people is more than **2x greater in nonurban areas** compared to urban
HIV
Prevalence of HIV

• Average prevalence of HIV for Michigan, 2014 = 179 per 100,000

• Average prevalence of HIV for CMDHD = 121 per 100,000

• Overall prevalence in the United States = 303.5 per 100,000

• By region, prevalence =
  • 417.8 in the Northeast
  • 359.3 in the South
  • 248.6 in the West
  • 170.6 in the Midwest
RATES OF PERSONS LIVING WITH HIV, 2014
Figure 3: HIV infection cases currently living in Michigan by risk transmission category, January 2014 (N = 16,750)

- MSM: 52%
- Hetero: HCM: 14%
- Hetero: HCFR: 4%
- MSM/IDU: 4%
- IDU: 9%
- Perinatal: 1%
- Blood recipient: 1%
- Other/unk: 16%

13% associated with drug use.
Figure 18: Estimated rate of new HIV infections in Michigan by age at infection, 2006-2010
HEPATITIS C
ACUTE HEPATITIS C RATES, 2016
Identified Risk factors for Acute Hepatitis C, Michigan, 2016*

- Injection Drug User: 57%
- Used Street Drugs: 47%
- Received a Tattoo: 36%
- Contact of Person with Hepatitis C: 31%
- Other Surgery: 28%
- Oral Surgery or Dental Work: 20%
- Any Part of Body Pierced (other than ear): 13%
- Incarceration Longer than 6 Months: 12%
- Accidental Needle Stick: 8%
- Employed in Medical Field: 6%
- Received Blood Products: 5%
- Employed as Public Safety Officer: 1%
- Hemodialysis: 1%

*among those that answered questions; may have more than one risk factor present

Chronic HCV Case Rate Maps by County, 2016

Young Adult (18-29 years old)  All Ages
Identified Risk factors for Chronic Hepatitis C, Michigan, 2016*

- Injection Drug User: 28%
- Incarcerated in Lifetime: 22%
- Contact of Person with Hepatitis C: 15%
- Treated for a Sexually Transmitted Disease in Lifetime: 8%
- Employed in Medical Field: 3%
- Received Blood Transfusion Prior to 1992: 3%
- Hemodialysis: 1%
- Received Clotting Factor Concentrates Prior to 1992: 0%
- Received an Organ Transplant Prior to 1992: 0%

*among those that answered questions; may have more than one risk factor present

Figure 7.1 Number of Chronic Hepatitis C Cases Reported to MDHHS by Year of Birth, 2016

- "Baby Boomers" (1925-1964)
- "Young Adults" (18-29 yrs old, 1981-1988 and 1995-1997)

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**Number of Cases**

- 500
- 450
- 400
- 350
- 300
- 250
- 200
- 150
- 100
- 50
- 0

**Year of Birth**

Figure 7.2 Number of Chronic Hepatitis C Cases Reported to MDHHS by year, 18-29 years of age, 2000-2016

Change in case definition, 2016*
METHODS OF HARM REDUCTION
SYRINGE SERVICE PROGRAMS (SSP)
DEFINITIONS

- **Harm Reduction**: a set of practical strategies and ideas aimed at reducing negative consequences associated with drug use.

- Recognizes that:
  - Drug use is very complex, ranges from severe abuse to total abstinence and anywhere between
  - Drug use is part of our world
  - Need to meet drug users where they are at with their drug use, working to reduce risks
  - Does not attempt to minimize or ignore the real harm and danger associated with drug use; rather affirms that the drug users themselves are the main person that can reduce the harm of their drug use and are able to share information with and support other drug users to do the same
DEFINITIONS

- **Syringe Service Program**: SSPs, also referred to as syringe exchange programs (SEPs), syringe access programs (SAPs), needle exchange programs (NEPs) and needle-syringe programs (NSPs), are community-based organizations that provide access to sterile needles and syringes, often with other supplies needed for safe injections, free of cost and facilitate safe disposal of used needles and syringes.
What is Offered at SSPs?

- Integrated Services
  - Screening For HIV, Hepatitis, STDS and linkage to care
  - Hepatitis A Virus And Hepatitis B Virus Vaccinations
  - Referral And Linkage To Primary Medical Care And/Or Mental Health Services
  - Provision Of Naloxone To Reverse Opioid Overdoses

- Harm Reduction Counseling And Education
- Provision Of Safer Sex Supplies
- Referral, Linkage To, And/Or Provision Of Substance Use Disorder Treatment, Including Medication-assisted Treatment Like Buprenorphine Or Methadone
- Referral And Linkage To Supportive Services, Such As Navigation To Homelessness/Housing Services, Disability Benefits, Etc.
SSPs are highly cost-effective

- Lifetime cost of treating HIV-positive person estimated to be $385,200-$618,900; estimated that every dollar invested in SSP saves $3 to $7 by prevented HIV infections alone

- Statistics show that SSP services improve public health and safety
  - Decrease in break-ins, burglaries; reduced needle stick injuries to law enforcement, firefighters

- Large bodies of evidence support SSP effectiveness in reducing HIV and HCV transmission in PWID
  - Increase in SSP programs in NYC from 1990 to 2001 associated with 78% decrease in HIV prevalence in IDUs and decrease in HCV from 90% to 63%
SOME OF THE FACTS

- One study: within 6 months of use of SSP, clients saw **45% increase in employment**, **25% more likely to be referred to mental health treatment and prescribed medication**

- New Jersey: **22% of SSP clients enter drug treatment**; Seattle: more likely to significantly **decrease IDU, stop IDU, remain in treatment**

- **Proven to not increase or encourage drug use**

- Per Michigan Public Health Code, Act 368 of 1978, Sec. 7457: Distribution of injection supplies (or any drug “paraphernalia”) by a state or local governmental agency or by a person authorized by a governmental agency to prevent transmission of infectious agents is **legal**

- **Federal funds can now be used to support SSPs**
MANY ORGANIZATIONS SUPPORT SSP

- American Academy of Family Physicians
- American Academy of Pediatrics
- American Bar Association
- American Medical Association
- American Public Health Association
- American Society of Addiction Medicine
- The Centers for Disease Control and Prevention
- International Red Cross-Red Crescent Society
- Latino Commission on AIDS
- NAACP
- National Academy of Sciences
- National Black Police Association
- National Institute on Drug Abuse
- Office of National Drug Control Policy
- Presidential Advisory Committee on AIDS
- US Conference of Mayors
- World Bank
- World Health Organization

Faith Communities:
- Central Conference of American Rabbis
- Episcopal Church
- National Council on Jewish Women
- Presbyterian Church of the United States
- Society of Christian Ethics
- Union for Reform Judaism
- Unitarian Universalist Association
- United Church of Christ
Syringe Services Program Coverage in the United States - June 2014

Syringe services programs (SSPs) serve as a safe, effective HIV prevention method for people who inject drugs (PWID) to exchange used syringes for sterile needles, thereby significantly lowering the risk of HIV transmission. Since the 1980s, SSPs in conjunction with other HIV prevention strategies have resulted in reductions of up to 80% in HIV incidence among PWID.

- There are currently 194 syringe services programs in 33 states, the District of Columbia, the Commonwealth of Puerto Rico, and the Indian Nations. (NASEN)
- This map shows the location of 196 cities with SSPs.

This map was prepared by amfAR. The Foundation for AIDS Research. Information on syringe services programs was provided by the North American Syringe Exchange Network (NASEN) and Mount Sinai Beth Israel from their lists of syringe services programs that confirmed their willingness to have this information made public.
HIV AND HCV OUTBREAKS LINKED TO SYRINGE SHARING ALREADY OCCURRED IN THE US

- Austin, Indiana (pop.: 4,200)
  - Rural, high unemployment levels and poverty, low educational attainments
  - November 2014 to October 2015, 181 individuals were newly diagnosed with HIV, and 92% of them were found to be co-infected with hepatitis C
    - Entire county had less than 5 new HIV infections in prior 10 years
    - Outbreak was linked to unsterile injection of a prescription opioid
  - As a result of this outbreak, an analysis of several variables was used to determine the U.S. counties at highest vulnerability for HIV and HCV outbreak
  - There were 220 counties identified in 26 states that exceeded the 95th percentile for high vulnerability
    - The majority of counties were rural
    - Eleven counties in Michigan were determined to be vulnerable for HIV and HCV outbreaks

TOP 220 U.S. COUNTIES AT HIGH VULNERABILITY FOR RAPID DISSEMINATION OF HIV OR HCV INFECTIONS AMONG PERSONS WHO INJECT DRUGS

MICHIGAN COUNTIES AT HIGH VULNERABILITY FOR RAPID DISSEMINATION OF HIV OR HCV INFECTIONS AMONG PERSONS WHO INJECT DRUGS

<table>
<thead>
<tr>
<th>County</th>
<th>Ranking out of 220 (Nationally)</th>
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<tbody>
<tr>
<td>Ogemaw</td>
<td>86</td>
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<tr>
<td>Clare</td>
<td>87</td>
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<tr>
<td>Oscoda</td>
<td>88</td>
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<tr>
<td>Montmorency</td>
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<td>Lake</td>
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<td>Alcona</td>
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<td>Roscommon</td>
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<td>Crawford</td>
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<tr>
<td>Kalkaska</td>
<td>207</td>
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<tr>
<td>Cheboygan</td>
<td>215</td>
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</tbody>
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Cities with SSP:
- Detroit
- Flint
- Grand Rapids
- Ypsilanti
EFFORTS UNDERWAY TO EXPAND ACCESS

- MDHHS Division of HIV facilitating development of SSP in 2 Northern Lower Peninsula areas and two Upper Peninsula areas
- Other non-profit organizations may be working to develop more
Any Questions?

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*References available