

# THE POWER OF UNDETECTABLE

What you need to know about HIV treatment as prevention



 **CATIE**

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# TREATMENT AS PREVENTION

We now know that medications that *treat* HIV can also *prevent* HIV transmission: If you are HIV-positive and take HIV treatment that suppresses your virus to undetectable levels (you have an undetectable viral load), you will not pass HIV to the people you have sex with. In other words, undetectable HIV is sexually untransmittable.

Effective treatment can also prevent HIV transmission to a baby during pregnancy and birth, if the pregnant person maintains an undetectable viral load while pregnant. Finally, research shows that effective treatment greatly reduces the risk of HIV transmission between people who share drug equipment.

In short, effective HIV treatment not only *treats* HIV but it can also *prevent* HIV. Hence the term *treatment as prevention* (TasP).



## If you have HIV, take HIV treatment and maintain an undetectable viral load...

when you have sex	→	you will not pass HIV to your sex partners
during pregnancy and delivery	→	you will not pass HIV to your fetus or baby
if you use injection drugs and share needles or other equipment	→	you greatly reduce the risk of transmission (we don't know by how much)

The World Health Organization has said, "It is certain that TasP needs to be considered as a key element of combination HIV prevention and as a major part of the solution to ending the HIV epidemic." If you want to know more about this way of preventing HIV and how you can make it work for you, read on.

## FIRST, A FEW BASICS:

### What is an undetectable viral load?

HIV viral load refers to the amount of HIV in the blood of a person living with HIV. If you take HIV treatment consistently, you can reduce the viral load to a level too low to be detected by a blood test. Once your viral load has fallen below this level, it is said to be undetectable. For most people, this occurs after taking HIV treatment consistently for 3 to 6 months. Having an undetectable viral load is good for your immune system and for your long-term health.

Having an undetectable viral load does not mean you are cured of HIV. The virus is still in the body. If you stop taking HIV treatment or miss too many doses, your viral load will once again become detectable.

### How do I know if I'm undetectable?

The only way to know is to have a blood test, called a viral load test, regularly. (You and your doctor will decide how often you should get tested, probably every 3 to 6 months.) If your viral load becomes detectable again, there may be a risk of HIV transmission.

Some people see occasional blips in their viral load. A blip is when your viral load becomes detectable at a very low level on one test and then becomes undetectable again on the next test. A single blip is not cause for alarm, but if you have two detectable results in a row, talk to your doctor.

### How can I make treatment as prevention work for me?

You can make this prevention strategy work for you by taking your HIV medications as prescribed and by seeing your doctor regularly. Your ongoing healthcare should include viral load blood tests.

Wait until you've had at least 2 undetectable results in a row over a 6-month period before depending on this strategy.

To make this strategy keep working for you, adherence is key. This means taking your HIV meds every day, as prescribed.

### I need some help taking my meds on time.

To help you stay on top of your pill-taking schedule, you can:

- set an alarm on your cell phone or watch to remind you that it's time to take your pills
- use a dosette to organize your pills
- ask your pharmacist to package your pills in blister packs
- if you have a smartphone, download a free adherence app

If you're having trouble taking your drugs as prescribed, talk to your doctor, nurse, pharmacist and/or local HIV organization.



# SAFER SEX

When you maintain an undetectable viral load, you cannot pass HIV to the people you have sex with. This is true for oral sex, vaginal sex and anal sex. It is true for sex with a condom and sex without a condom.

We can say with confidence that **undetectable** HIV is sexually **untransmittable: U=U**.

Studies show that a person will not transmit HIV sexually if their viral load is below 200 copies/ml; however, the ideal treatment outcome for a person's long-term health is to maintain an undetectable viral load (usually 50 copies/ml or less).

## How do we know this?

Large international studies have confirmed that when an HIV-positive person who has an undetectable viral load has sex with an HIV-negative person, they do not pass HIV. The evidence is clear.

## What about STIs?

When you have an undetectable viral load, you can still give and get other STIs (sexually transmitted infections), such as chlamydia, herpes, gonorrhea and syphilis. However, condoms can reduce the risk of many STIs, so you might want to double up and use HIV treatment *and* condoms.

## If I have an undetectable viral load, do I still need to tell someone I have sex with that I have HIV?

If you have an undetectable viral load, you are not putting your sex partner at risk for HIV, but Canadian law does require that you tell your sex partner that you have HIV in certain circumstances. For the most up-to-date information on when people living with HIV have a legal duty to disclose their HIV status, contact the HIV/AIDS Legal Network ([www.aidslaw.ca](http://www.aidslaw.ca)).

## What if I have a detectable viral load?

Clearly, achieving an undetectable viral load has numerous benefits: In addition to significant health benefits, it is an effective way to prevent HIV transmission. If your viral load remains detectable, work with your medical team to find a combination of meds that might work better for you.

If you are adherent and you continue to have a detectable viral load, rest assured that there are other things you can do to stay healthy and prevent transmission. Other highly effective ways to prevent HIV include using condoms and (for HIV-negative people) PrEP.

## What is PrEP?

PrEP (pre-exposure prophylaxis) is an effective prevention strategy that involves an HIV-negative person who is at risk for HIV taking a certain kind of HIV medication. Once on PrEP, it is important to take the medication as prescribed and to see a doctor or nurse every three months to get tested for HIV and other STIs and to check for side effects.

## What is PEP?

PEP (post-exposure prophylaxis) involves an HIV-negative person taking HIV medications immediately after being exposed to HIV to reduce their risk of HIV infection. PEP consists of a combination of two to three drugs that should be taken as soon as possible, within 72 hours of being exposed to HIV. These drugs need to be taken every day exactly as prescribed for four full weeks.



# HAVING A HEALTHY BABY

If you are HIV-positive and pregnant, or you want to have a baby, HIV treatment can allow you to have a healthy HIV-negative baby. Since we know that undetectable HIV is sexually untransmittable, it is now easier for couples to *get* pregnant. Effective treatment also helps people with HIV give birth to HIV-negative babies.

If possible, try to find an obstetrician (a doctor who specializes in pregnancy and childbirth) who has experience with HIV care, who will be supportive and respect your choices. If you live in a smaller town or rural

area, it might be harder to find a doctor who is knowledgeable about HIV. In that case, you can help him or her find information about HIV and pregnancy (visit [www.catie.ca](http://www.catie.ca) or call 1-800-263-1638).

Before effective HIV treatment existed, about 1 in 4 babies born to HIV-positive mothers was born HIV-positive. However, we now know that **if a pregnant person starts HIV treatment prior to or very early in pregnancy and maintains an undetectable viral load, they will not transmit HIV to their baby during pregnancy or delivery.**

Canadian guidelines recommend:

- HIV medicine for the mother during pregnancy and labour
- a short course of HIV medication for the baby after birth
- vaginal delivery for most pregnancies; only in a few cases will a C-section (surgery to deliver a baby) be necessary
- feeding the baby formula, and not breastfeeding (because HIV can be passed through breast milk even if the mother is on successful HIV treatment)

Research shows that pregnancy does not make your HIV worse and HIV does not change how your pregnancy proceeds.

# SAFER DRUG USE

HIV-positive people who are on treatment and maintain an undetectable viral load are also considerably less likely to pass HIV through sharing equipment to inject drugs. Research suggests that treatment as prevention can help prevent HIV transmission between people who inject drugs; however, there is not enough evidence to conclude that there is no risk of transmission.

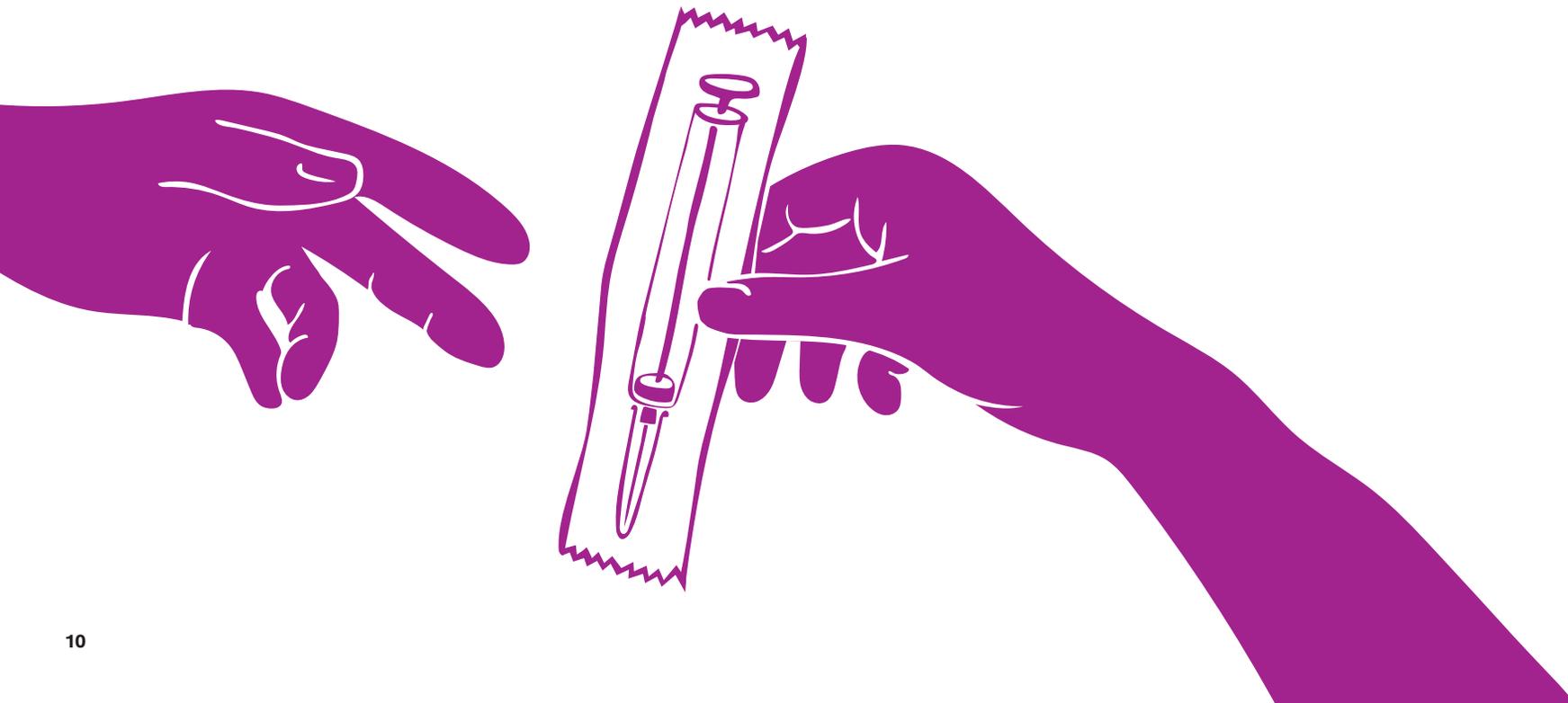
If you use street drugs (or if you inject steroids or hormones), use new needles and other equipment every time to help prevent HIV transmission as well as other blood-borne infections such as hepatitis C. This includes needles, water, spoons, cookers, crack pipes and straws. In many parts of the country, needle/syringe programs and other harm reduction programs distribute these supplies free of charge.

# MORE INFO

To learn more about HIV treatment and how it can prevent HIV transmission, check out these free CATIE resources:

- ***Your Guide to HIV Treatment***
- ***You Can Have a Healthy Pregnancy if You Are Positive***
- **[www.catie.ca](http://www.catie.ca)**

You can also call our toll-free line at **1-800-263-1638** to speak to an educator. All calls are treated as private and confidential. Or you can email us at **[questions@catie.ca](mailto:questions@catie.ca)**.





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## Disclaimer

Decisions about particular medical treatments should always be made in consultation with a qualified medical practitioner knowledgeable about HIV-related illness and the treatments in question.

CATIE provides information resources to help people living with HIV and/or hepatitis C who wish to manage their own healthcare in partnership with their care providers. Information accessed through or published or provided by CATIE, however, is not to be considered medical advice.

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Information on safer drug use is presented as a public health service to help people make healthier choices to reduce the spread of HIV, viral hepatitis and other infections. It is not intended to encourage or promote the use or possession of illegal drugs.

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