Pregnancy and HIV [1]

Submitted on Apr 3, 2014

Table of Contents

The Good News

Due to advances in HIV care and treatment, many women living with HIV (HIV+) are living longer, healthier lives. As HIV+ women think about their futures, some are deciding to have the babies they always wanted.

The good news is that advances in HIV treatment have also greatly lowered the chances that a mother will pass HIV on to her baby (known as the rate of mother-to-child HIV transmission). If the mother takes appropriate medical precautions, the chances of transmission can go down from about one in four (when not taking any HIV drugs) to less than one in 50 (when taking proper HIV drugs). In addition, studies have shown that being pregnant will not make HIV progress faster in the mother.

One way we learn about how HIV drugs affect pregnancy is through the Antiretroviral Pregnancy Registry. HIV+ pregnant women are encouraged to register (through their health care providers) with the Antiretroviral Pregnancy Registry at http://www.APRegistry.com [2].

Before You Get Pregnant

It is important to plan carefully before getting pregnant:

- Discuss your plans with your HIV health care provider to make sure you are on the right treatment plan for your own health and to reduce the risk of transmitting HIV to your baby (more about this in the next sections)
- Find an obstetrician (OB) or midwife who is familiar with HIV care. He or she can explain your options for getting pregnant with as little risk to your partner as possible.
- Ask your HIV health care provider and your OB or midwife to talk with each other and coordinate to make sure you receive appropriate care before and during your pregnancy
- Get screened for sexually transmitted diseases (STDs) [3], hepatitis B [4] and C [5], and tuberculosis [6]
- Do your best to give up smoking [7], drinking, and drugs. All of these can be bad for your health and the health of your baby.
- Start taking pregnancy vitamins ("prenatal" vitamins) that contain folic acid while you are trying to become pregnant. This can reduce the rates of some birth defects.
- If friends and family do not support your decision to have a child, put together a support network of people who are caring, non-judgmental, and well educated about HIV and pregnancy. Your network can include medical providers, counselors, and other HIV+ women who are considering pregnancy or have had children.

If you are an HIV+ woman or HIV+ man looking for more information on getting pregnant or having a child, please go to: Getting Pregnant and HIV [8]

The Pregnancy Guidelines

Several groups of experts on pregnancy in HIV+ women have developed guidelines that provide information about appropriate care and treatment for HIV+ women who are, or may become, pregnant.

As a first step, the pregnancy guidelines issued by the US Department of Health and Human Services (DHHS) recommend a thorough check up, including a number of blood tests, to find out about your health and the status of your HIV infection. A resistance test (see The Well Project's article on resistance [9] for info about this test) should be included if you:

- Are starting HIV drugs
- Are taking HIV drugs and have a detectable viral load (500 ? 1,000 copies or more)

The results of a resistance test can help you and your health care provider choose the best drugs to take.

HIV drugs can reduce the risk of transmitting HIV from mother to baby. For this reason, HIV drugs are recommended for all pregnant women regardless of CD4 count and viral load. Even if the mother does not need HIV treatment for her own health, it is important for her to take HIV drugs to lower the risk of mother-to-child transmission. The drugs need to be taken just as they are prescribed to have the best chance of working (see The Well Project's article on adherence [10] for more info). Also, if an HIV+ woman takes HIV drugs and gets her viral load very low, she reduces the chances of spreading HIV to her sexual partner.

According to the DHHS, there are certain HIV drugs that should be avoided or used with caution because of possible side effects in the mother or the developing baby. Some examples are the combination of Videx (didanosine, ddI) and Zerit (stavudine, d4T) or the combination of Zerit and Retrovir (zidovudine or AZT). Viramune (nevirapine) should not be started in HIV+ women with CD4 cell counts over 250.

It is important that you discuss the risks and benefits of the HIV drugs with your health care provider so that you can decide which treatments are best for you and your baby. In the US, your health care provider can call the National Perinatal HIV Hotline at 1-888-448-8765 for free, expert advice on all aspects of caring for HIV+ pregnant women.

HIV Drugs and Pregnancy

Deciding when to start treatment depends on your own health and when you find out you are pregnant. The DHHS's pregnancy guidelines make the following recommendations:

For HIV+ Women Not Taking HIV Drugs

1. When HIV treatment is needed for the health of the woman, she should receive a combination of HIV drugs based on treatment guidelines for non-pregnant adults. Treatment should include at least one nucleoside/nucleotide reverse transcriptase

inhibitor (NRTI) that can pass through the placenta (the organ that nourishes the baby in the womb). HIV treatment should start as soon as possible, including in the first trimester (three months) of pregnancy.
2. When HIV treatment is not needed for the health of the woman: she should also receive combination HIV treatment to prevent mother-to-child transmission. At least one NRTI drug that can pass through the placenta should be included in the combination. Women in the first trimester may consider waiting to start the HIV drugs until after the first 10?12 weeks (first trimester) of pregnancy.

Deciding whether to start taking HIV drugs during the first trimester will depend on several factors, including a woman's CD4 count, viral load, and medical conditions (e.g., nausea and vomiting). While starting HIV treatment earlier may be more effective for reducing transmission, it is important to weigh this against potential effects of exposing the developing baby to HIV drugs during the first trimester.

It is important that HIV drug treatment continue during labor and delivery. Women with viral loads of 1000 or more should receive intravenous (IV) administration of Retrovir, regardless of her HIV drug regimen during pregnancy or her mode of delivery. Women with a viral load of less than 1000 do not need to receive intravenous Retrovir.

After delivery, the baby should receive liquid Retrovir for six weeks. When the mother has received HIV drugs and remained virally suppressed, health care providers may consider giving the baby four weeks of liquid Retrovir.

After the birth of the baby, it is important for the mother to talk with her health care provider about the risks and benefits of continuing her own HIV treatment. The DHHS recommends that all adults, including new mothers, receive HIV drugs regardless of CD4 count. In the US, decisions about continuing HIV drugs after delivery should take into account current recommendations for starting drugs, current and lowest CD4 counts and viral load levels, adherence issues, whether a woman has an HIV-uninfected sexual partner, and the woman's preference.

The British HIV Association suggests that women who began taking HIV drugs while they were pregnant to prevent mother-to-child transmission (and not for their health; those with CD4 counts > 500) can stop taking antiretroviral therapy after their babies are born.

The World Health Organization's (WHO) 2013 guidelines recommend that all pregnant and breastfeeding women take antiretroviral therapy for as long as there is a risk of spreading HIV to the baby (through pregnancy and breastfeeding, if applicable). The WHO further recommends that all pregnant and breastfeeding women should continue to take HIV drugs for the duration of their lives in areas where there is a high rate of HIV in the general population.

For HIV+ Women Already Taking HIV Drugs

Women in this situation should continue taking their current HIV drugs if they are working well to control the virus and have not been show to harm the pregnant mother or developing baby. Unnecessary switching of HIV drugs can lead to loss of viral control and thus increase the risk of passing HIV to the developing baby.

If a viral load test shows that the drugs are not working, switch to a more effective

combination. The drugs should be continued during labor and delivery, during which time IV Retrovir should also be given to the mother if she has a viral load of 1000 or more. Women with a viral load of less than 1000 can continue to take their current regimen. After delivery, the baby should receive liquid Retrovir for four or six weeks.

For HIV+ Pregnant Women in Labor Who Have Not Taken HIV Drugs

A woman in labor who has not taken HIV drugs can still reduce the risk of infecting her baby by using HIV drugs during labor and delivery and to treat the baby for a short time after birth. The DHHS guidelines recommend the following:

- IV Retrovir for the mother during labor and a combination of six weeks of Retrovir plus three doses of Viramune in the first week of life (at birth, 48 hours after birth, and 96 hours after the second dose) for the baby

After the baby is born, it is recommended that the mother be evaluated to determine whether HIV treatment is recommended for her.

For Babies Born to HIV+ Women Who Have Not Taken HIV Drugs Before or During Labor

The baby can still receive treatment to reduce the risk of transmission. The DHHS guidelines recommend the following:

- A combination of six weeks of Retrovir plus three doses of Viramune in the first week of life (at birth, 48 hours after birth, and 96 hours after the second dose)

After the baby is born, it is recommended that the mother be evaluated to determine whether HIV treatment is recommended for her.

Tests, Procedures, and Delivery

There are a number of invasive prenatal tests, such as amniocentesis, chorionic villus sampling (CVS), and percutaneous umbilical blood sampling, that may increase the risk of HIV transmission to the baby. Talk to your health care provider if you need these tests. Certain procedures during delivery, such as invasive monitoring and forceps- or vacuum-assisted delivery, should be avoided if possible.

The DHHS recommends that women have their CD4 counts checked every three months during pregnancy. However, women whose viral loads remain consistently low can get their CD4 counts checked every six months during pregnancy.

There are 2 types of delivery, cesarean (C-section) and vaginal delivery:

C-section

Elective or planned C-sections are done before labor begins and before the mother's "water" (sac of fluid that surrounds the baby) breaks. This reduces the baby's contact with the mother's blood and may reduce the risk of transmission in certain cases. Since C-sections require surgery, they carry some risks. Women who have C-sections are more likely to get infections than those who give birth vaginally. C-sections are recommended for HIV+ pregnant

women who:

- Have an unknown viral load
- Have a viral load greater than 1,000 copies at 36 weeks of pregnancy

Vaginal delivery

For a woman on combination HIV treatment with a low viral load (less than 1,000), a C-section is not likely to further reduce her already low risk of transmitting HIV.

The decision of which type of delivery is best for you should be discussed with your health care provider early in your pregnancy.

After the Baby Is Born

During the first four or six weeks, the baby will need to take Retrovir (and possibly other HIV drugs). A blood test called a complete blood count (CBC) should be performed on the newborn baby as a baseline. The baby will also need to take medication to prevent pneumonia after finishing Retrovir, unless there is adequate information to confirm that the infant does not have HIV. Taking these medications does not mean the baby is sick; it is just a precaution to decrease the chances of getting HIV and other illnesses.

The baby will receive several HIV tests to determine if he or she is infected. An HIV polymerase chain reaction (PCR) test should be used. These tests look for the HIV virus, rather than HIV antibodies. HIV antibody tests, which are commonly used to determine HIV infection in adults, should not be used in newborns since babies carry their mother's antibodies for 12 to 18 months.

HIV virus testing should be done when the baby is 14 to 21 days old, one to two months old, and four to six months old. A positive HIV virus test should be confirmed with a second test. Two positive HIV virus tests mean that the baby has HIV infection. If the baby has two or more negative tests with one at one month and another at four months or later, when the mother is not breast-feeding, then she or he does not have HIV infection. Many experts confirm that the baby does not have HIV by doing an HIV antibody test when the baby is 12 to 18 months old.

Since a baby can be infected with HIV through breast milk, in the US and other high-resource countries where water is safe and formula is available and affordable, it is strongly advised that you not breastfeed. You can still have a strong bond with your child even if you bottle feed.

If you live where safe water is not easy to get, the risk to your baby of life-threatening conditions from formula feeding with unsafe water may be higher than the risk of HIV infection through breastfeeding. In some areas, formula may also be too expensive or not regularly available. If you are in either of these situations, it is better to feed your baby on breast milk alone while continuing to take your HIV drugs.

The good news is that breast milk contains many important antibodies to keep your baby healthy and has been found to have a protein Tenascin-C that helps neutralize the HIV virus. While it is still possible to spread HIV from mother to child through breastfeeding, the chances are less than originally thought.

Mixed feeding, in which a baby is given breast milk as well as other liquids (e.g., formula, sugar water, gripe water), is not recommended. It is currently thought that mixed feeding may damage the lining of babies' stomachs and make them more likely to get HIV when exposed to it in breast milk. If, for whatever reason, you cannot feed your baby exclusively on formula, it is recommended that you take HIV drugs and feed with breast milk alone.

The WHO recommends that if you breastfeed, breast milk should be the only source of food for your baby for the first six months of life. Between months six and 12, it recommends that the baby be introduced slowly to other complementary foods until it is weaned from breast milk at 12 months (assuming the baby is receiving proper nutrition from regular food at that point). While breastfeeding, it is important that the mother continue to take her HIV drugs to limit the chances of passing HIV to her baby.

It is also important **not** to feed your baby food that has been chewed by someone who is HIV+ (pre-masticated). This can spread HIV to your child.

In Conclusion

Deciding to have a baby is a big step for any woman, but for an HIV+ woman, it is even more complicated. Talk to your HIV health care provider and OB or midwife before you start trying to get pregnant. If you plan ahead, there are many things you can do to protect your health and the health of your new baby.

Tags:

- HIV and pregnant [11]
- pregnancy HIV [12]
- HIV+ pregnant [13]
- can I have a baby if i am HIV+ [14]
- women HIV [15]
- HIV women [16]
- women and HIV in pregnancy [17]
- women and HIV pregnancy [18]
- pregnancy and HIV and AIDS [19]
- HIV in pregnancy [20]
- HIV pregnancy [21]
- mother-to-child transmission [22]
- PMTCT [23]

Additional Resources

Select the links below for additional material related to pregnancy and HIV. The National Perinatal HIV Hotline is 1-888-448-8765.
HIV and Breastfeeding (Avert) [24]
Breastfeeding for HIV+ Mothers in the US (BAPAC) [25]
Breast Milk Protein May Be Key to Protecting Babies from HIV Infection (Duke) [26]
UK Guidelines on Treatment of HIV in Pregnancy Give Green Light to Efavirenz (AIDSmap) [27]

March 2014 Supplement to the 2013 Consolidated Guidelines (WHO) [28]
US HIV Pregnancy Guidelines (AIDSinfo) [29]
Getting Pregnant and HIV [8]
HIV During Pregnancy, Labor and Delivery, and After Birth (PDF) (NIH) [30]
Pregnancy and HIV (AIDS InfoNet) [31]
HIV/AIDS and Pregnancy (AVERT) [32]
Preventing Mother-to-Child Transmission of HIV During Breastfeeding (WHO) [33]
What Is the Antiretroviral Pregnancy Registry? [34]
Bay Area Perinatal AIDS Center [35]
FAQ (ACOG) [36]
Illinois Perinatal HIV Hotline [37]

Source URL: http://www.thewellproject.org/hiv-information/pregnancy-and-hiv

Links:
[1] http://www.thewellproject.org/hiv-information/pregnancy-and-hiv
[2] http://www.apregistry.com/
[3] http://www.thewellproject.org/hiv-information/sexually-transmitted-diseases-stds
[4] http://www.thewellproject.org/hiv-information/hepatitis-b
[5] http://www.thewellproject.org/hiv-information/hepatitis-c-hcv
[6] http://www.thewellproject.org/hiv-information/tuberculosis
[7] http://www.thewellproject.org/hiv-information/smoking-and-tobacco-use
[8] http://www.thewellproject.org/hiv-information/getting-pregnant-and-hiv
[9] http://www.thewellproject.org/hiv-information/resistance
[10] http://www.thewellproject.org/hiv-information/adherence-0
[11] http://www.thewellproject.org/tags/hiv-and-pregnant
[12] http://www.thewellproject.org/tags/pregnancy-hiv
[13] http://www.thewellproject.org/tags/hiv-pregnant
[14] http://www.thewellproject.org/tags/can-i-have-baby-if-i-am-hiv
[15] http://www.thewellproject.org/tags/women-hiv
[16] http://www.thewellproject.org/tags/hiv-women
[17] http://www.thewellproject.org/tags/women-and-hiv-pregnancy
[18] http://www.thewellproject.org/tags/women-and-hiv-pregnancy-0
[19] http://www.thewellproject.org/tags/pregnancy-and-hiv-and-aids

[20] http://www.thewellproject.org/tags/hiv-pregnancy-0
[21] http://www.thewellproject.org/tags/hiv-pregnancy
[22] http://www.thewellproject.org/tags/mother-child-transmission
[23] http://www.thewellproject.org/tags/pmtct
[24] http://www.avert.org/hiv-and-breastfeeding.htm
[25] http://hiv.ucsf.edu/care/perinatal/forpatients/breastfeeding-waldron.pdf
[26] http://www.dukehealth.org/health_library/news/breast-milk-protein-may-be-key-to-protecting-babies-from-hiv-infection
[27] http://www.aidsmap.com/page/2253665/
[28] http://apps.who.int/iris/bitstream/10665/104264/1/9789241506830_eng.pdf?ua=1
[29] http://www.aidsinfo.nih.gov/guidelines/html/3/perinatal-guidelines/0/
[30] http://aidsinfo.nih.gov/ContentFiles/Perinatal_FS_en.pdf
[31] http://www.aidsinfonet.org/fact_sheets/view/611
[32] http://www.avert.org/pregnancy.htm
[33] http://www.who.int/reproductivehealth/publications/rtis/rhr_11_01/en/
[34] http://www.apregistry.com/patient.htm
[35] http://sfghf.net/programs/bapac.html
[36] http://www.acog.org/~/media/For%20Patients/faq113.pdf?dmc=1&ts=20140424T1004301178
[37] http://www.hivpregnancyhotline.org/