

## Frequently Asked Questions from Henry Ford Health System Team Members about Fertility, Pregnancy and COVID-19 Vaccines

## Information provided by:

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To learn more about this topic:

- <u>Watch the April 29 Webinar</u> where these questions were asked.
- <u>Read more</u>

What if a woman had COVID during early pregnancy? Wouldn't it be more effective to pass along natural antibodies? We know the vaccines are highly effective for at least six months – most likely longer – but six months is farthest data go back right now. Research tells us natural antibodies are present five to seven months after a COVID-19 infection, but drop off sharply after three months. However, their effectiveness can vary from person to person. Even if you had COVID-19 in the past, it is advised to get vaccinated during pregnancy. Preliminary data suggests the antibodies produced after vaccination last longer than those from natural infection.

How can I feel comfortable getting pregnant if there are no long-term outcomes on this vaccine? Is there any speculation on long term effects on fertility? My daughters are 16 and 19, with no short-term plans to be pregnant, but maybe they will be as adults.

There is no evidence that the vaccine can lead to loss of fertility. While fertility was not specifically studied in the clinical trials of the vaccine, no loss of fertility has been reported among trial participants or among the millions who have received the vaccines. In fact, 25 women became pregnant after receiving the vaccine in the Phase 3 clinical trial for the Pfizer vaccine. Loss of fertility is scientifically unlikely.

**Is it safe to get the vaccine in the 1st trimester? I'm seeing mixed information.** Yes, it is safe to get the vaccine in the first, second or third trimester. In fact, getting vaccinated as soon as you can, whether it's before you become pregnant or during your pregnancy, will protect you and your baby from the virus. We need to protect mom so that we can protect baby from the negative effects of COVID-19.

**Can the vaccine cause a miscarriage?** There is no evidence that the vaccines cause miscarriage. In studies, the number of women who had miscarriages after vaccination is not higher than the number of women who have miscarriages in the general population.

If you've had the first dose and then come down with COVID before your second dose, when should you get the second dose? Should you delay, and if so, for how long? What could be the risks, if any, for pregnant women getting the second dose after catching the virus? This unique situation means you may need to postpone the second shot, but it's okay to space it out a little longer. Currently a second dose of Pfizer is recommended 21 days later, and a second dose of Moderna is recommended 28 days later. There is no need to repeat the first shot. There are no special precautions for pregnant women when it comes to getting the second dose, even if they had COVID-19. If you have questions about getting your second shot after getting COVID-19 or being exposed, please call your doctor, who can advise you based on your personal health and situation. Below are a few scenarios and guidelines for all people, including pregnant women, for timing the second shot if you get COVID-19 or are exposed after the first dose: If you have COVID-19 with symptoms:

Wait until 10 days have passed since your symptoms started, AND

Wait until you haven't had a fever for at least 24 hours and your other symptoms have improved.

If you have severe symptoms, wait until you are feeling better and talk to your doctor about timing for the second shot.

**If you have COVID-19 without symptoms** (you had a positive COVID-19 test, but you don't feel sick):

You can stop isolation 10 days after your first positive COVID-19 test, and schedule an appointment after this 10-day time is over.

**If you've been exposed to COVID-19** (you had close contact with someone who got COVID): Quarantine for 14 days and monitor your symptoms. If you have a negative COVID test, you can end quarantine and get your second shot if the test was five days after you were exposed.

I know we are still waiting for more info about long-term effects. If we were to guess, what might some long-term effects be? To baby and mom. Based on other, similar vaccines to the COVID-19 vaccines, we do not expect to see other long-term effects from the COVID-19 vaccines.

What is the risk of maternal reaction COVID19 vaccine causing preterm birth? Can you make the scientific journal articles on this topic available along with the presentation? Although not directly comparable, the proportions of fetal loss, preterm birth, small birth size, birth defects, and neonatal death among pregnant women who received the vaccine appear to be similar to the published incidences in pregnant persons studied before the Covid-19 pandemic. *New England Journal of Medicine:* <u>https://www.nejm.org/doi/full/10.1056/NEJMoa2104983</u>

I personally experienced side effects with both vaccines. My daughter is in her 3rd trimester, is it safe for her to get the vaccine? Yes, it is considered safe for women at any stage of pregnancy to get the vaccine. For most people, side effects are mild to moderate and resolve within one or two days. According to a peer-reviewed study published in The New England Journal of Medicine, pregnant women reported more pain at their injection site than nonpregnant women, but they also reported fewer symptoms of headache, myalgia, chills and fever. Your daughter could take one or two days off work after vaccination or plan to "lay low" if she is worried about side effects. Pregnant women can take Tylenol after vaccination to help with side effects. Encourage her to talk to her OB/GYN if she has concerns about how to manage side effects.

Are there any concerns about the baby's developmental growth, specifically during the 1st trimester if received vaccine before or during that 1st trimester? The vaccine can be given at any time during pregnancy. There is no evidence that the vaccines have any effect on developmental growth of the baby at any time during pregnancy.

**Can women develop a blood clot disorder?** Women younger than 50 years old should be aware of a rare but increased risk of cerebral venous sinus thrombosis (CVST) with the Johnson & Johnson vaccine, and that there are other COVID-19 vaccine options available for which this risk has not been seen. Now that we know more about this disorder, people who are vaccinated with the Johnson & Johnson vaccine will receive information so they know the signs of this very rare disorder and can seek medical attention if they experience symptoms. To learn more: <a href="https://www.cdc.gov/coronavirus/2019-ncov/vaccines/safety/JJUpdate.html">https://www.cdc.gov/coronavirus/2019-ncov/vaccines/safety/JJUpdate.html</a>

## Is there any difference between Pfizer, Moderna, Johnson & Johnson? Is one more indicated in pregnant patients that the other? Do they all have the same adverse reaction rates? There

is no difference between the vaccines when it comes to one being preferred for pregnant women. Young women may feel more comfortable choosing Pfizer or Moderna, due to the very rare cases of blood clotting recently seen with the Johnson & Johnson vaccine. All the vaccines are safe and highly effective at preventing COVID-19. Adverse reactions are extremely rare with all the vaccines. The only consideration when choosing between the vaccines would come if you are allergic to any of the ingredients:

**Moderna vaccine ingredients:** messenger ribonucleic acid (mRNA),lipids (SM-102,polyethylene glycol [PEG]2000dimyristoylglycerol [DMG], cholesterol, and 1,2-distearoyl-sn-glycero-3-phosphocholine [DSPC]), tromethamine, tromethamine hydrochloride, acetic acid, sodium acetate, and sucrose.

**Pfizer vaccine ingredients:** mRNA, lipids ((4-hydroxybutyl)azanediyl)bis(hexane-6,1-diyl)bis(2-hexyldecanoate), 2 [(polyethylene glycol)-2000]-N,N-ditetradecylacetamide, 1,2-Distearoyl-sn-glycero-3- phosphocholine, and cholesterol), potassium chloride, monobasic potassium phosphate, sodium chloride, dibasic sodium phosphate dihydrate, and sucrose.

Johnson & Johnson vaccine ingredients: recombinant, replication-incompetent adenovirus

type 26 expressing the SARS-CoV-2 spike protein, citric acid monohydrate, trisodium citrate dihydrate, ethanol, 2-hydroxypropyl-β-cyclodextrin (HBCD), polysorbate-80, sodium chloride.

Is there a certain amount of time a woman should wait after receiving the vaccination before beginning to try to get pregnant? A woman does not need to wait to become pregnant after receiving the vaccine.

Are monoclonal antibodies recommended for pregnant and breastfeeding women? Anti-SARS-CoV-2 monoclonal antibodies should not be withheld from a pregnant or breastfeeding individual with COVID-19 who has a condition that poses a high risk of progression to severe COVID-19. The patient and provider should determine, based on the patient's individual health and situation, whether the potential benefit of the drug outweighs the potential risk.

What if a woman had COVID during early pregnancy? Wouldn't it be more effective to pass along natural/real antibodies to than baby than be coerced into injecting this with fetal tissue and chemicals? There are no fetal cells or tissues in any COVID-19 vaccine. Concern comes from the use of fetal cell lines in development of the vaccines. The lines involved in the COVID-19 vaccines started with two aborted fetuses from 1973 and 1985. Since then, these cells have been multiplied millions of times, which is where we get the term "fetal cell lines." Pfizer and Moderna used fetal cell lines to test that the vaccines worked in the laboratory. Johnson & Johnson confirmed that it used the 1985 cell line in the production process of their single-dose COVID-19 vaccine. The scientists used the fetal cell lines to grow the adenovirus needed to make this vaccine, but by the time the vaccine goes into the vial, the cells from the fetal cell lines have been filtered out.

We know the vaccines are highly effective for at least six months – most likely longer – but six months is farthest data go back right now. Research tells us natural antibodies are present five to seven months after a COVID-19 infection. However, their effectiveness can vary from person to person. Even if a woman had COVID-19 early in her pregnancy, it is advised to get vaccinated.

**If your baby might have a birth defect, should you still think about getting the vaccine?** Yes, there is no reason not to receive the vaccine if your baby may have a birth defect. To be sure baby is as healthy as possible, it is important to be sure Mom is healthy. Vaccination will protect Mom and her baby from COVID-19 infection, which is a health concern for both.

**Can the vaccine cause a birth defect in an unborn child?** There is no evidence of the vaccines causing a birth defect in an unborn child.

Have there been any studies or information released regarding male fertility and the vaccine? There is no evidence that the vaccines affect male fertility.

**Is the vaccine discouraged in pregnant women who are age 40 plus?** No, the vaccine is encouraged for all pregnant women, including women who are over 40 and expecting.

I may have misheard but I thought one of the doctors said that there is information that having COVID can affect pregnancy; but we aren't concerned that COVID mRNA could affect pregnancy? The mRNA COVID-19 vaccines do not contain COVID-19 mRNA that would affect pregnancy. The vaccine contains a few mRNA building "blocks" that enter the mother's cell's to cause the immune response. COVID-19 infection during pregnancy, however, is associated with increased serious complications.

Blood clots and blood mutations are a big cause of miscarriages. Is there current testing to see if pregnant women have those genes before receiving the vaccine? There is no increased risk of miscarriage for women who have received a COVID-19 vaccine.

What if a patient has endometriosis or polycystic ovary syndrome? Women with these conditions may receive the vaccine.

I've heard the vaccine is affecting women's periods and ovulation. This is a concern for me. Why is this happening?

There is no evidence that the COVID-19 vaccines cause irregular periods or disrupt the timing of ovulation

**Any comparison with Zika in terms of risk in pregnancy?** The rate of COVID-19 infection in infants prior to birth from COVID-19 infected mothers is less than 3% with no reports of fetal birth defects attributed to COVID-19. Infants born from pregnant individuals with confirmed Zika infection have a 5-10% chance of birth defects.

Do you believe that health systems will "require" the vaccine for all workers? I do know there are a few guidelines that make it so that a workplace cannot require a vaccine. While we can't predict what health systems will do, at some point in the future, the COVID-19 vaccine could be required for employment by many health systems. Currently, the flu vaccine is required by many hospitals and health systems.