Learning about the COVID-19 Vaccine: Basics and More

Jennifer Hebner, Pharm.D., BCPS
Clinical Pharmacist
St. Peter's Hospital







Office of Addiction Services and Supports

Slide set courtesy of Sarah Kuriakose, PhD, BCBA-D,

State-wide Director of Psychology Services, NYS Office of Mental Health

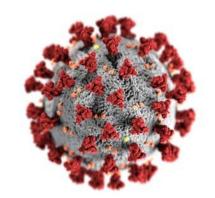


Today's Presentation

- Why Take the Vaccine?
- Getting the Vaccine
- Can I Get Vaccinated If....?
- Vaccine FAQs
- Additional Resources



Why Take the Vaccine?



The COVID-19 vaccines are safe and effective tools in the fight against COVID-19.

COVID-19 is very serious and can cause severe and potentially long-lasting medical complications.



The COVID-19 Vaccine Protects YOU

The vaccine helps your immune system build up its natural defenses against coronavirus.

If you get exposed to COVID-19 after you are fully vaccinated, your immune system is ready to protect you.





The COVID-19 Vaccine Protect OTHERS



- When enough people get vaccinated, COVID-19 will not be able to spread.
- This means that overall rates of infection will go down and the pandemic will end. By getting vaccinated, you are protecting your community.

The COVID-19 Vaccine Protects EVERYONE

- When enough people get vaccinated, COVID-19 will stop mutating as quickly.
- This means we will see fewer new strains.





Getting to a Post-Pandemic World

Taking the vaccine is the best long-term way to get to a postpandemic world. If enough people do not get vaccinated, we will continue to have surges, restrictions, and lockdowns periodically for years and years.

We are in control of how long it takes to get there.

Our actions make a difference.



Getting the Vaccine

Am I Eligible?

Go to https://am-i-eligible.covid19vaccine.health.ny.gov/ to find out if you are eligible to get the vaccine and where you can get it. Statewide and resident-specific locations available.

See if you may be Eligible to Receive the COVID-19 Vaccine

The Federal Government determines how much vaccine New York State receives and has given New York approximately 250,000 vaccines/week for over 7 million people who are eligible – as a result supply is very limited. Vaccines are available at pharmacies, hospitals and through local health departments - please contact the provider of your choice to schedule a vaccine appointment.

You can use this tool to determine eligibility and to schedule an appointment at a New York State-run vaccination site. If eligible, you will see all available appointments at New York State-run vaccination sites. **AN APPOINTMENT IS REQUIRED. IF YOU VISIT A LOCATION WITHOUT AN APPOINTMENT YOU WILL NOT RECEIVE A VACCINE.** To find out if you may be eligible, click Get Started below.

List of New York State-operated vaccination locations and availability through April 16th:

Location Name Location Address Appointments Available



The Day Of Vaccine Administration

- You should not take pain medication (like acetaminophen or ibuprofen or naproxen) prior, though you can take it after if you are in pain.
- You will wear your mask while getting vaccinated.
- You will receive an injection in your upper arm. You can choose which arm.
- After getting vaccinated, you will be observed for at least* 15 minutes for any side effects.



Your Vaccine

Three vaccines are approved in the United States.

Pfizer/BioNTech	2 doses	3 weeks apart*
Moderna	2 doses	4 weeks apart*
Johnson & Johnson/Janssen	1 dose	

- *At your first appointment, you will be scheduled for your second dose. If you
 miss your second appointment, it is important to reschedule with the provider
 as soon as you can. This will give you the maximum amount of protection from
 contracting COVID-19.
- The vaccines are not interchangeable. You cannot start with one and get a second dose of the other.



Side Effects



Some people report mild or moderate reactions after getting the vaccine.

These reactions do NOT mean you are sick with COVID-19. These are signs of your immune system getting the body ready to fight COVID-19.



Side Effects

In people who have side effects, some of the common reactions are:

- arm soreness or swelling
- fever or chills
- tiredness
- headache

Reported side effects are similar for all three vaccines.



Two-Dose Vaccine Side Effects

Some people may experience a delayed reaction (redness, itching, swelling) a few days after the first dose. This does NOT mean they cannot get the second dose.

Some people have reported that side effects are more common after the second dose. These side effects typically go away within 24-72 hours. It may be helpful to try to schedule some time to rest after your second dose, in case you do feel a strong immune response.



Can I Get Vaccinated If...?



Allergies

I have previously had an allergic reaction to a vaccine or injectable medication I've gotten in the past?	There have been some very, very rare cases of allergic reactions to the vaccine. If you have had an allergic reaction to a vaccine in the past, talk to your doctor before getting vaccinated.
I have other allergies, including severe allergies, such as to oral medications or environmental allergens (food, pets, etc.)?	Yes, you can get vaccinated!
I have an allergy to a component of the vaccine?	No, you should not get vaccinated. The ingredients can be found on the CDC site.



Co-Occurring Conditions

I have a physical co-occurring condition, including a high-risk condition or an autoimmune disorder?

I am immunocompromised, including HIV-positive?

Yes, you can get vaccinated!

You are at higher risk of complications from COVID-19, so you will be prioritized for vaccination.



COVID-19

I have previously had COVID-19? If I have antibodies?	Yes, you can get vaccinated! Research indicates that the immune response from the vaccine is stronger than from the infection and is more protective against new variants.
I currently have COVID-19?	Yes, you can get vaccinated as soon as you are out of your isolation period.
I got COVID-19 between my two doses?	Yes, you can get vaccinated as soon as you are out of your isolation period! It is okay if you get your second shot late.



Age

I am an older adult?	Yes, you can get vaccinated! You are at higher risk of complications from COVID-19 so you will be prioritized for vaccination.
I am below 18?	Currently, the Pfizer vaccine is approved for 16+, and the Moderna and J&J for 18+.





Pregnancy/Lactation

I am planning or trying to become pregnant?	Yes, you can get vaccinated!
I am currently pregnant or lactating/breastfeeding?	The vaccine trials did not specifically include people in these groups. The American College of Obstetrics and Gynecology recommends that vaccines are not withheld from this group. Talk to your doctor before getting vaccinated. Pregnant people are at higher risk of complications from COVID-19. You will be prioritized for vaccination if you choose.



How effective are the vaccines?

All vaccines approved have been shown to cut rates of infection by over 50% (72-95% range) and to completely prevent hospitalization and death.

If you are one of the rare individuals who is infected after vaccination, your chance of serious illness or death is virtually zero.



Is one of the vaccines better for me?

The effectiveness rates of the vaccines cannot be compared directly with one another because the trials were conducted at different times, in different locations, against different strains of the virus. **ALL of the vaccines are effective at eliminating serious illness, hospitalization, and death.**

Most of the time, you will not have a choice about which vaccine you get. It depends on what the site has, which is usually based on their refrigeration and storage capacity.



Is one of the vaccines better for me?

Getting the vaccine as early as possible is better for you (to protect against COVID-19) and better for the community (to get to herd immunity). When offered the vaccine, **do not wait**.

Exceptions:

- If you have an allergy to an ingredient in one of the vaccines, wait for another.
- If you are 16 or 17 years old, you can only get the Pfizer vaccine.
- If you are in a situation where you are not able to schedule safely the second dose (e.g. experiencing homelessness, experiencing intimate partner violence and unable to travel freely, migrant worker), a 1-dose vaccine may be recommended for you.



Vaccine FAQs

How do vaccines work?

The vaccine contains a message to your immune system:

"Hey, coronavirus is out there. It looks like this. You need to start making some antibodies that can fight it."

 The body can start to make antibodies without ever being exposed to COVID-19.





How did the vaccines get developed so quickly?

- No shortcuts were taken in testing the vaccine.
- Medical innovation was possible due to several factors
 - Use of existing technology
 - More money
 - More volunteers
 - Prioritized for review



How safe are the vaccines?

- Over 110,000 people volunteered to be in the trials.
- Serious side effects from vaccines (such as serious allergic reactions, seizure, development of autoimmune disorders, death) are usually seen within 4-6 weeks.
 - Safety data found no serious side effects in the trials (past 4-6 weeks to several months).
- As millions have been vaccinated worldwide, as expected, some serious reactions have been seen.
 - A handful of anaphylactic reactions (approximately 4.5 reactions per million vaccines) have been observed.



	Immediate Risks	Long-Term Risks
Serious effects of COVID- 19	 More than 514K people have died from COVID-19 in the US and 2.5M+ worldwide. US deaths ~ 171 "9/11s", or "9/11" every day for 6 months in a row. US deaths > WW1 + WW2 + Vietnam War casualties combined. 120 people in New York City died of COVID on Christmas Day. 	 Up to 10% of COVID-19 survivors, including with mild COVID, have "long-haul" symptoms lasting weeks to months after the virus is out of the system. Fatigue, shortness of breath, pain, "brain fog", headache, depression. More rarely, some people experience serious long-term heart, lung, kidney, or brain complications.
Serious side effects of vaccines	 ~4.5 persons/million people have had a serious vaccine side effect. You are 336x more likely win an Olympic Gold, 666x more likely to get struck by lightning in your lifetime, and 1000x more likely to date a millionaire than to have a serious vaccine side effect. 	 Studies show no long-term side effects of the vaccine in the period in which vaccines typically show serious side effects (4-6 weeks).
		ST PETER'S HEALTH PARTNERS

What is in the vaccine?

- None of the vaccines contain coronavirus. You cannot get COVID-19 or any other illness from getting the vaccination.
- None of the vaccines can affect your DNA at all.
- None of vaccines contain any chips or tracers.
- The Pfizer and mRNA vaccines contain the messenger RNA code.
- The J&J vaccine uses a virus (modified so it cannot make you sick) to carry a gene.



Can I transmit COVID-19 after vaccination?

While the vaccine is extremely effective in protecting the person who receives it, it **may** be possible for people to become infected with asymptomatic COVID-19 and spread it to others.

Preliminary data shows that asymptomatic transmission is reduced in those vaccinated. Research is ongoing.



Will the vaccine protect me against new strains?

- So far, the vaccines approved in the U.S. have been shown to be protective against new strains. The vaccines may be less protective against some strains, but some protection is better than no protection (for the unvaccinated).
- Vaccine companies are also studying whether booster shots might be helpful for new strains.
- The more people take the vaccines, the slower new strains will arise.



Will I need a yearly COVID-19 shot?

We don't know yet. It is possible the COVID-19 vaccine might be a one-time shot, might require boosters, or might require annual injections like the flu.

The more COVID-19 mutates, the more likely it is that we may need seasonal shots. The faster people get vaccinated, the less likely it is COVID-19 will mutate.



What precautions should I take after vaccination?



Take standard precautions like handwashing, physical distancing, and masking, especially around individuals who are not vaccinated.

What is the safety of the vaccine in the long run?

After a vaccine is authorized or approved for use, many vaccine safety monitoring systems watch for adverse events (possible side effects). This continued monitoring can pick up on adverse events that may not have been seen in clinical trials.

If an unexpected adverse event is seen, experts quickly study it further to assess whether it is a true safety concern. Experts then decide whether changes are needed in U.S. vaccine recommendations.

This monitoring is critical to help ensure that the benefits continue to outweigh the risks for people who receive vaccines.

https://www.cdc.gov/coronavirus/2019-ncov/vaccines/keythingstoknow.html



What is the best guidance for clients that have young children who cannot be vaccinated?

We know that there is something called "Herd Immunity."

Herd immunity means that enough people in a community are protected from getting a disease because they've already had the disease or because they've been vaccinated.

Herd immunity makes it hard for the disease to spread from person to person.

It even protects those who cannot be vaccinated, like newborns or people who are allergic to the vaccine.

https://www.cdc.gov/coronavirus/2019-ncov/vaccines/keythingstoknow.html



THANK YOU FOR YOUR ATTENTION!

ANY QUESTIONS?

Resources

- https://www.allhealthpolicy.org/covid-19-webinar-series-page/
- https://www.cdc.gov/vaccines/covid-19/hcp/engaging-patients.html
- https://www.cdc.gov/vaccines/covid-19/hcp/answering-questions.html
- https://omh.ny.gov/omhweb/covid-19-resources.html
- https://practiceinnovations.org/
- https://www.health.harvard.edu/diseases-and-conditions/covid-19-basics
- Moderna COVID-19 Vaccine EUA Fact Sheet for Recipients and Caregivers (https://www.fda.gov/media/144638/download)
- <u>Pfizer-BioNTech COVID-19 Vaccine EUA Fact Sheet for Recipients and Caregivers</u> (https://www.fda.gov/media/144414/download)
- https://am-i-eligible.covid19vaccine.health.ny.gov/

