Weill Cornell Medicine



# Vaccine Education Ambassador Training:

Training for Informed Vaccine Decision Making



Dr. Susana Morales, Dr. Marcus Lambert, Dr. Linnie Golightly, Dr. Kevin Holcomb, and Dr. Avelino Amado

1.18.21

### **Presentation Overview**

- Please remain on mute, unless asked to join in Q&A
- Submit questions through the chat
- Webinar recording and slides will be emailed to participants
- We have no relevant disclosers.

#### Topics:

- Who we are and today's purpose
- Vaccine hesitancy
- The Vaccines: what you need to know
- Strategies for talking with others about COVID-19 vaccine
- Q&A



### Who we are:







W. Marcus Lambert, Ph.D.



Linnie Golightly, M.D.



Kevin Holcomb, M.D.



Avelino Amado, Ph.D.

- Susana Morales, M.D. Internal Medicine Physician & Director of the Diversity Center of Excellence
- W. Marcus Lambert, Ph.D. Biomedical and Social Science Researcher & Asst. Dean of Diversity
- Linnie Golightly, M.D. Infectious Disease Physician-Scientist & Associate Dean of Diversity & Inclusion
- Kevin Holcomb, M.D. Obstetrician-Gynecologist, Vice Chair of Gynecology, & Associate Dean of Admissions
- Avelino Amado, Ph.D. Kinesiology Researcher & Data Scientist

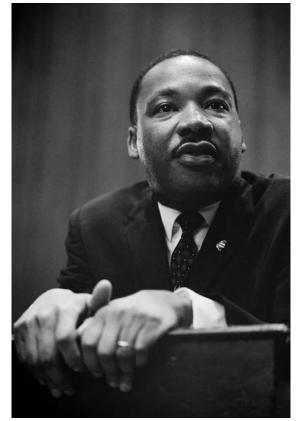
## Why we are here:

"Of all the forms of inequality, injustice in health is the most shocking and the most inhuman because it often results in physical death."

- Dr. Martin Luther King Jr.

**Goal:** To offer tips and tools for helping others make an informed decision about COVID-19 vaccination.

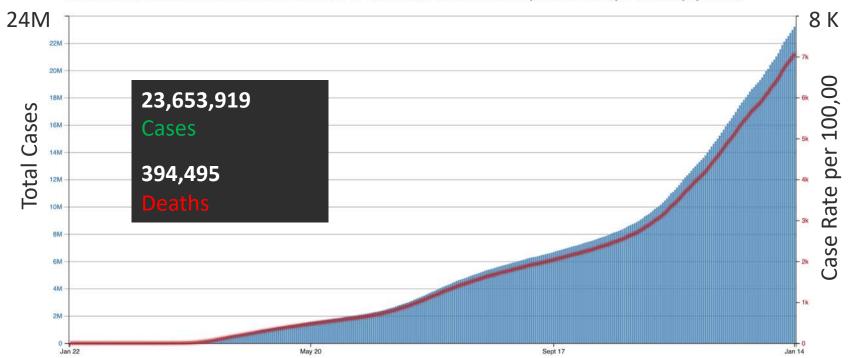
Dr. Martin Luther King, Jr. *National Day of Service* 



Photographed by Marion S. Trikosko, 1964. LC-DIG-ppmsc-01269 Source: Library of Congress

## U.S. COVID-19 update: Jan 18, 2021

Trends in Total and Cumulative Incidence Rate of COVID-19 Cases in the United States Reported to CDC, per 100,000 population

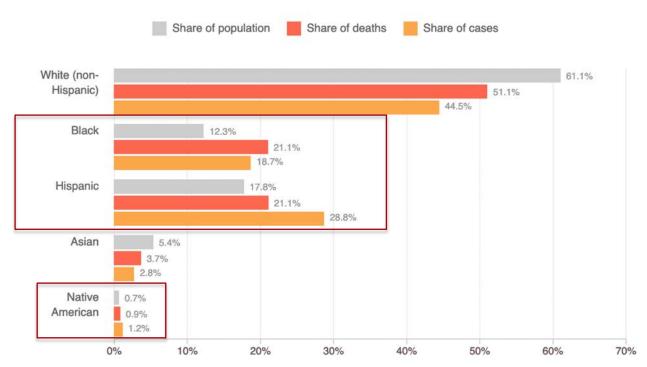


## New U.S. cases per day

Daily Trends in Number of COVID-19 Cases in the United States Reported to CDC



## Black, Hispanic and Native American cases and deaths exceed their % of the population

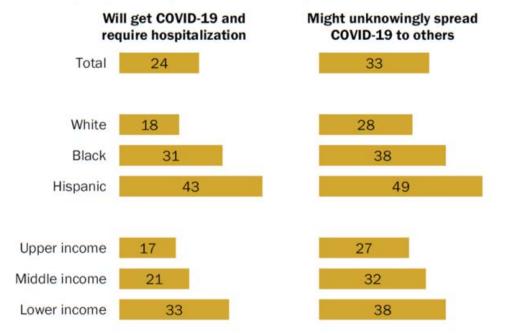


Sept. 23, 2020

Source: COVID Tracking Project; 2018 American Community Survey five-

## Racial and income differences in concerns over contracting COVID-19, spreading it to others

% who say they are very concerned that they ...

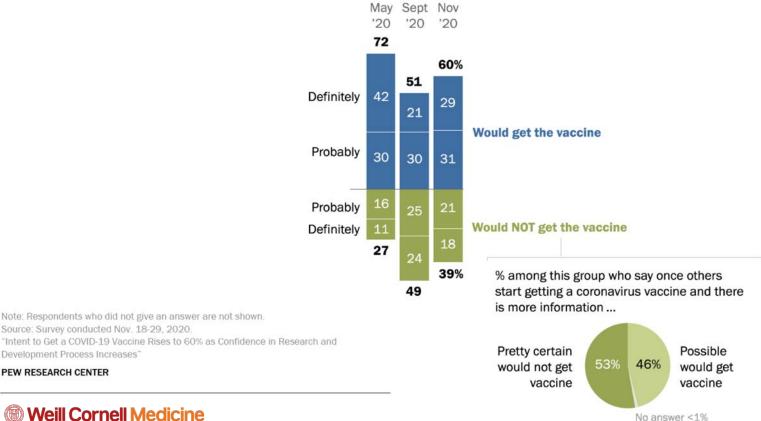


Notes: Whites and blacks include only those who are not Hispanic; Hispanics are of any race. Family incomes are based on 2018 earnings and adjusted for differences in purchasing power by geographic region and for household size. Source: Survey of U.S. adults conducted April 7-12, 2020.



#### Majority of Americans now say they would get a vaccine for the coronavirus

% of U.S. adults who say if a vaccine to prevent COVID-19 were available today, they ...



**PEW RESEARCH CENTER** 

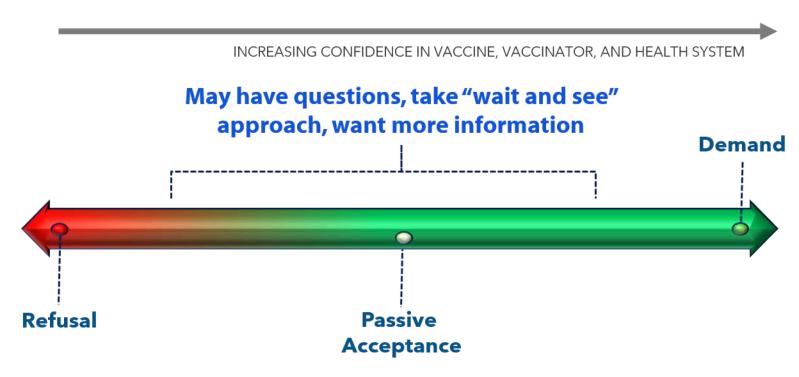
Development Process Increases"

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Source: Survey conducted Nov. 18-29, 2020.

Note: Respondents who did not give an answer are not shown.

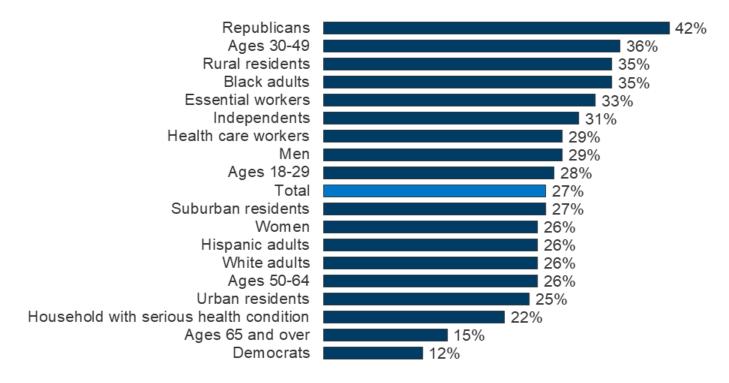
### Willingness to accept a vaccine falls on a continuum





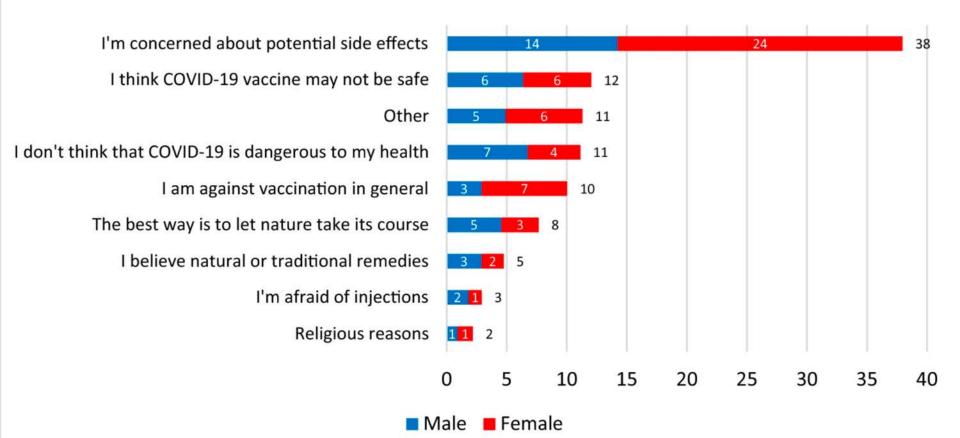
### Which Groups Are Most Likely To Be COVID-19 Vaccine Hesitant?

Percent within each group who say, if a COVID-19 vaccine was determined to be safe by scientists and available for free to everyone who wanted it, they would **probably not get it** or **definitely not get it**:





### Reasons for not wanting to be vaccinated against COVID-19



### Causes of COVID-19 vaccine hesitancy vary

- Personal or group experiences of racism, mistreatment and abuse, including in healthcare
- Politicization of vaccines and COVID-19
- Anti-vaccine advocacy
- Suspicion regarding pharmaceutical industry motivations, history of abuses by pharmaceutical industry
- Mistrust of government authorities, science, health care industry

## Prepare for COVID-19 vaccine conversations



Make your own decision about vaccination



**Start conversations today** 



**Engage in effective conversations** 



Be prepared for questions



### How do vaccines work?

A vaccine works by showing your immune system what a piece of the corona virus looks like, essentially a "<u>mug shot</u>" of the coronavirus, so that if the real corona virus ever tries to enter your body it will be recognized and attacked by immune cells and antibodies.









#### Clinical trials test whether vaccines are safe and effective

#### Phase 1 20-100 Healthy Volunteers



#### Researchers try to answer these questions:

- Is this vaccine safe?
- Are there any serious side effects?
- How does the vaccine dose relate to any side effects?
- Is the vaccine causing an immune response?

#### Phase 2 Several Hundred Volunteers



#### Researchers try to answer these questions:

- What are the most common short-term side effects?
- What's the body's immune response?
- Are there signs that the vaccine is protective?

#### Phase 3 1000+ Volunteers



#### Researchers try to answer these questions:

- How do disease rates compare between people who get the vaccine and those who do not?
- How well can the vaccine protect people from disease?

#### Phase 4 Vaccine is Approved



#### Researchers try to answer these questions:

- FDA approves a vaccine only if it's safe, effective, and benefits outweigh the risks.
- Researchers continue to collect data on the vaccine's long-term benefits and side effects.

## Accelerated vaccine development

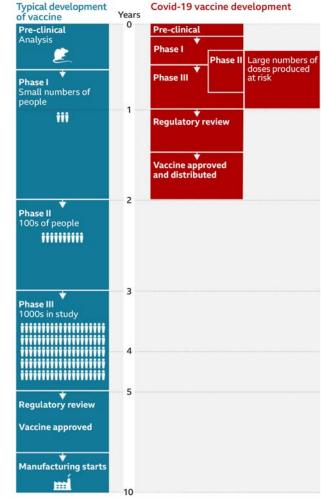
#### Researchers did not start from scratch

 Scientists had existing data on the structure, genome, and life cycle of this type of virus (MERS, SARS)

#### Worldwide sharing of data

- We knew the viral genetic sequence in Jan 2020
- New messenger RNA (mRNA) technology
- Unprecedented financial support
  - Purchased allotments of the vaccines prior to knowing its success

#### Vaccine development



### COVID-19 vaccine trials by the numbers

As of November 20, 2020

As of October 22, 2020

#### Pfizer/BioNTech

- ∼44,000 enrolled
- 150 clinical sites
  - 39 U.S. states
- Racial/ethnic distribution
  - 13% Hispanic (U.S. only)
  - 10% African American
  - 6% Asian
  - 1.3% Native American
- o 39% ages 56-85

#### **Moderna**

- 30,000 enrolled
- 89 clinical sites
  - o 32 U.S. states
- Racial/ethnic distribution
  - 20% Hispanic
  - 10% African American/Black
  - o 4% Asian
  - 3% All others
- 64% ages 45 and older
  - 39% ages 45-64
  - 25% ages 65+



#### Pfizer and Moderna Vaccines Work:

### More than 90% effective at preventing COVID-19 disease

Vaccine	Information	People tested	Does it work?
Pfizer	2 shots, 21 days apart Approved for >16 years old	36,621	<ul><li>95% protection</li><li>170 infections</li><li>162 in placebo</li><li>8 in vaccine group</li></ul>
Moderna	2 shots, 28 days apart Approved for >18 years old	30,000	<ul><li>94.5% protection</li><li>95 infections</li><li>90 in placebo</li><li>5 in vaccine group</li></ul>

Sources: <a href="https://www.pfizer.com/news/press-release/press-release-detail/pfizer-and-biontech-conclude-phase-3-study-covid-19-vaccine-https://investors.modernatx.com/news-releases/news-release-details/modernas-covid-19-vaccine-candidate-meets-its-primary-efficacy.">https://investors.modernatx.com/news-releases/news-release-details/modernas-covid-19-vaccine-candidate-meets-its-primary-efficacy.</a>

### About the COVID-19 mRNA vaccines

- These mRNA vaccines are expected to produce side effects after vaccination, especially after the 2nd dose.
- Side effects may include:
  - injection site pain
  - o **headache**
  - muscle aches
  - fever



- No significant safety concerns were identified in the clinical trials.
- At least 8 weeks of safety data were gathered in the trials. It is unusual for side effects to appear more than 8 weeks after vaccination.

## Vaccination is a safer way to build protection than getting COVID-19

- Getting the virus that causes COVID-19 may offer some natural protection, known as immunity. But experts don't know how long this protection lasts.
- The risk of severe illness and death from COVID-19 far outweighs any benefits of natural immunity.

• COVID-19 vaccination will help protect you by creating an antibody response without the risk of severe illness.





## Know the elements of effective vaccine conversations

- Start from a place of <u>respect</u>, <u>empathy</u> and understanding.
- Address misinformation by sharing key facts.
- Listen to and respond to questions.
- Proactively explain side effects.
- Share your story!



## Speaking with groups about vaccines

- Targeted messaging to the audience and with trusted messengers
- Address questions and concerns
- Negative messages make thing worse important to emphasize safety and effectiveness, not horrible COVID-19 data
- Don't overuse statistics or graphs
- Speak about your personal experience and journey to make your own decision

#### **WHO**

There are many people already in your network who you can talk with about the COVID vaccines:

- ★ Extended family
- ★ Civic organizations
- **★** Colleagues
- **★** Faith communities
- **★** Classmates
- **★** Community leaders
- **★** Online communities

## Know where to go for the latest information about COVID-19 vaccines

- CDC and FDA websites:
  - o www.cdc.gov/covid-19
  - www.fda.gov/emergency-preparedness-and-response/coronavirusdisease-2019-covid-19/covid-19-vaccines
- Your state or local health department
  - https://covid19vaccine.health.ny.gov
- The National Medical Association
  - https://www.nmanet.org/news/544970/NMA-COVID-19-Task-Forceon-Vaccines-and-Therapeutics.htm
- WHO <a href="https://www.who.int/">https://www.who.int/</a>
- GAVI <a href="https://www.gavi.org/">https://www.gavi.org/</a>





## "The function of education is to teach one to think intensively and to think critically."

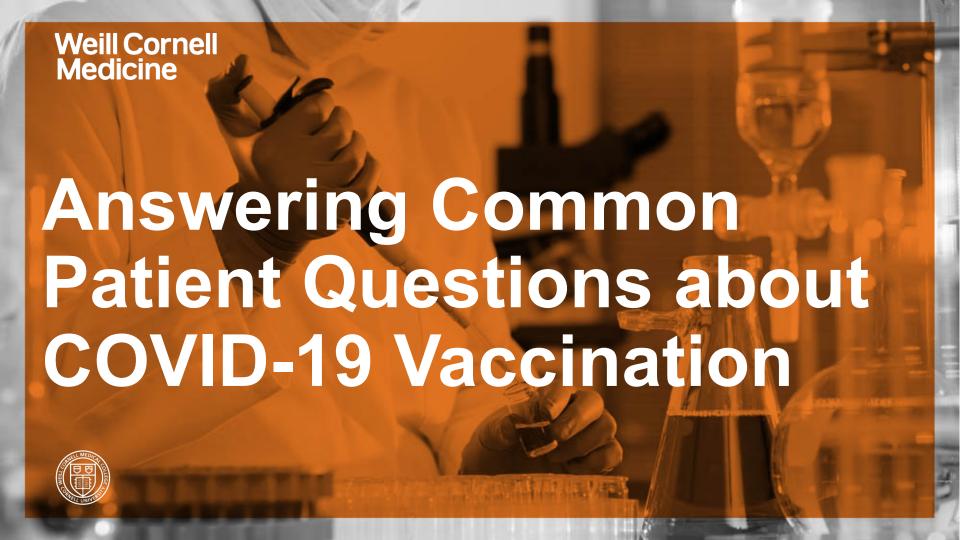
- Dr. Martin Luther King, Jr., from a speech at Morehouse College in 1948



## More resources for COVID-19 vaccine conversations

- <a href="https://www.cdc.gov/vaccines/covid-19/hcp/engaging-patients.html">https://www.cdc.gov/vaccines/covid-19/hcp/engaging-patients.html</a>
- www.cdc.gov/vaccines/hcp/covid-conversations
- NYS: What You Need to Know | COVID-19 Vaccine (ny.gov)
- NYC Health + Hospital: <u>COVID-19 Vaccines at NYC Health + Hospitals | NYC Health + Hospitals (nychealthandhospitals.org)</u>
- NYC Covid19 Vaccine Finder (lists Moderna or vaccine type by location): NYC COVID-19 Vaccine Finder
- Slides and video will be shared!





## Q: How do we know if COVID-19 vaccines are safe?

#### Explain:

- FDA carefully reviews all safety data from clinical trials.
- FDA authorizes emergency vaccine use only when the expected benefits outweigh potential risks.
- Recommended by trusted independent reviewers
  - NMA COVID-19 Task Force

"COVID-19 vaccines were tested in large clinical trials to make sure they meet safety standards. Many people were recruited to participate in these trials to see how the vaccines offer protection to people of different ages, races, and ethnicities, as well as those with different medical conditions."



## Q: Will the shot hurt? Will it make me sick? What about the side effects?

#### Explain:

- Explain that they cannot get COVID-19 from the vaccine.
- Explain what the most common side effects from vaccination are, how severe they
  may be, and that they typically go away on their own within a week.
- Make sure people know that a fever is a potential side effect.

"These side effects are signs that your immune system is doing exactly what it is supposed to do. It is working and building up protection to disease."

"Most people do not have serious problems after getting a vaccine. We will understand more about mild side effects of the COVID-19 vaccine before we start to use it. However, your arm may be sore, red, or warm to the touch. These symptoms usually go away on their own within a week. Some people report getting a headache, fever, fatigue, or body aches after getting a vaccine."



## Q: Who should you call if you experience an allergic reaction?

#### Explain:

- Handouts will be provided that will list a phone number.
- Parents and patients can report severe adverse reactions directly to the CDC's Vaccine Adverse Event Reporting System (VAERS) online at <a href="https://vaers.hhs.gov/reportevent.html">https://vaers.hhs.gov/reportevent.html</a> (preferred) or by calling 1-800-822-7967

The handout provided will also share more details about the V-safe app. V-safe is a smartphone-based tool that uses text messaging and web surveys to provide personalized health check-ins after you receive the COVID-19 vaccination. Depending on your answers, someone from CDC may call to check on you and get more information.

