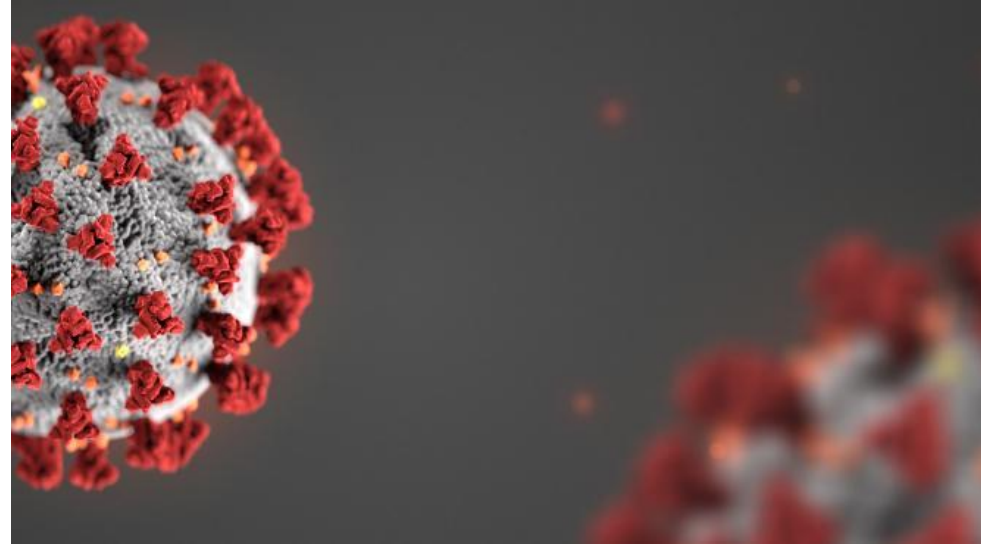




RUTGERS

Robert Wood Johnson  
Medical School



Ask the Docs  
Webinar on COVID-19 – April 8, 2020

# Presenter:

## Shilpa Pai, MD

- Pediatrician- Eric B. Chandler Health Center
- Director, Resident Education in Advocacy & Community Health
- Co-Director, NJ Pediatric Residency Advocacy Collaborative
- Associate Professor of Pediatrics
- Rutgers-Robert Wood Johnson Medical School
- New Brunswick, NJ



# Disclaimer

- New and updated information on COVID-19 is being published on a near constant basis
- Best websites for up to date information include CDC and WHO:
  - Centers for Disease Control and Prevention (CDC):
    - [www.cdc.gov/coronavirus/2019-cov/index.html](https://www.cdc.gov/coronavirus/2019-cov/index.html)
  - The World Health Organization (WHO)
    - [www.who.int/emergencies/diseases/novel-coronavirus-2019](https://www.who.int/emergencies/diseases/novel-coronavirus-2019)



# What is COVID-19?

- New (novel) coronavirus that has not been previously identified in humans.
- Not the same as Coronaviruses that commonly circulate among humans and cause mild illness, like the common cold.
- Why is it called COVID-19?
  - ‘CO’ stands for ‘corona,’
  - ‘VI’ for ‘virus,’
  - ‘D’ for disease.



# Droplet vs. Airborne Transmission

## ▪ DROPLET:

- Droplet particles > 5-10 micrometers in size
- Close contact
- Coughing/sneezing produce droplets
- Droplets then enter another person's mouth, nose, eyes



## • AIRBORNE:

- Airborne particles are <5 micrometers in size
- Spread through the air from person to person

COVID-19 is spread via droplet NOT AIRBORNE transmission in most situations

COVID-19 may become airborne in specific conditions such as intubation, resuscitation (CPR), tracheostomy, etc.

# COVID-19 Symptoms

# WHO IS CONSIDERED AT RISK?

## **High-risk for severe illness from COVID-19:**

- 65 years and older
- Living in a nursing home
- Chronic lung disease
- Moderate to severe asthma
- Serious heart conditions
- Immunocompromised
  - Cancer treatment
  - Bone marrow/organ transplant recipients
  - Poorly controlled HIV or AIDS
  - Prolonged steroid use

## **Additional Risks:**

- Severe obesity
- Diabetes
- Renal failure
- Liver disease

## **Unknown:**

- Pregnant women
  - To date, not increased risk

# COVID-19 Symptoms



Range from mild to severe

Overlap significantly with influenza.

Symptoms appear 2-14 days after exposure

Common symptoms include:

Fever, Cough, Shortness of breath

Other symptoms include:

Headache, stomach upset (vomiting/diarrhea), muscle aches



# What is Coronavirus?

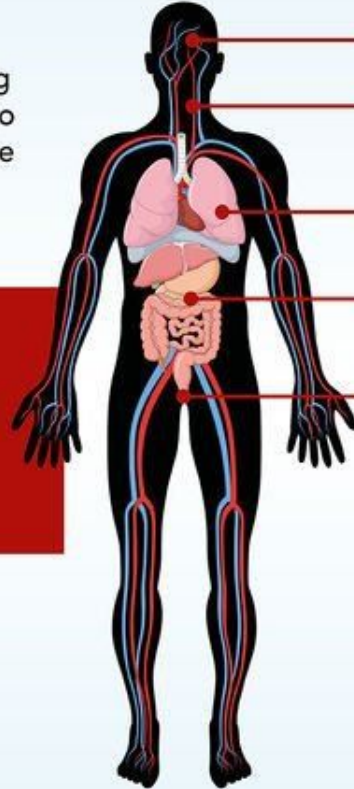
Coronaviruses are a large family of viruses that cause illness ranging from the common cold to more severe diseases like pneumonia, MERS and SARS

## SEVERE SYMPTOMS

- High Fever (100.4°F or higher)
- Pneumonia
- Kidney failure
- Death

## TRANSMISSION

Coughs or sneezes from infected person or touching contaminated objects



## COMMON SYMPTOMS

- Fever
- After 2 to 7 days develop a dry cough
- Mild breathing difficulties at the outset
- Gastrointestinal issues
- Diarrhea
- General body aches

\* Source: Centers for Disease Control and Prevention/ USA Today

EXPRESS

## When I should go to the hospital?

- Persistent fever
- Persistent and worsening cough
- Trouble breathing
- Bluish lips or face
- Tightness and pain in the chest
- Other symptoms include:
  - Diarrhea
  - Abdominal discomfort

# COVID-19 Emergency Warning Signs

- Emergency warning signs include\*:
- Trouble breathing
- Persistent pain or pressure in the chest
- New confusion or inability to arouse
- Bluish lips or face



# Does everyone need to be hospitalized who has COVID-19?



- NO!!!

- Most people do fine and recover



# Can I have COVID-19 and not have any symptoms?

- PRE-SYMPTOMATIC: WITHOUT symptoms, and later develop symptoms
- ASYMPTOMATIC: mild to no symptoms.

# How do I know if it's COVID-19 or Seasonal Allergies: Signs/symptoms

## **Most common:**

- sneezing
- runny or stuffy nose
- watery and itchy eyes
- ear congestion
- Post-nasal drip



## **Less common:**

- headache
- shortness of breath
- wheezing
- coughing



# Are there any medications I should stay away from during this time?

- No clear evidence to avoid NSAIDs (Ibuprofen, Advil, etc.)
- Some are recommending to use acetaminophen (Tylenol) for fever, pain, etc.



Are there any supplements that will help to boost my,  
immune system?

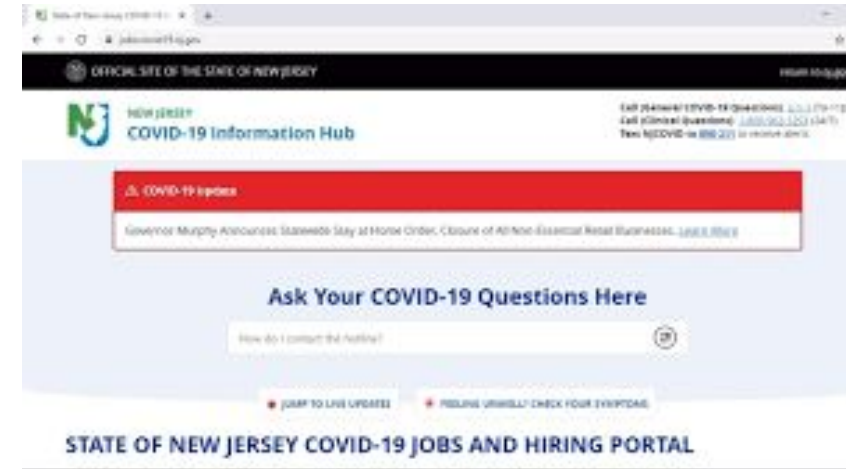
- General vitamin supplements
- Some are recommending Vitamin D and Vitamin C



# Testing for COVID-19

# Is there specific criteria I need to meet to be eligible for COVID-19 testing?

- Exposure to a known patient
- Symptoms:
  - Fever
  - sore throat,
  - worsening cough



**What if I haven't had direct contact with someone who has the virus, but I have been out in public and now have symptoms?  
Can I get tested?**

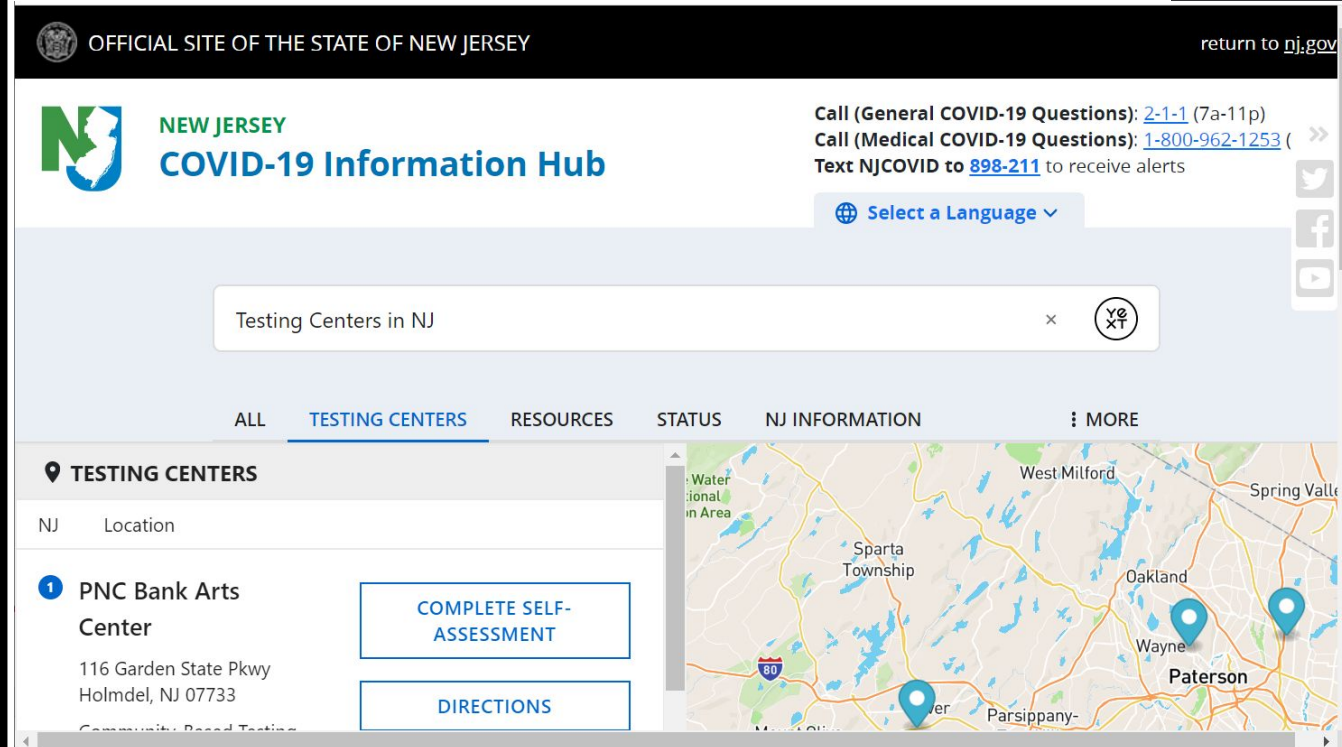
- If you have symptoms:
  - Call your doctor or health center
  - Get an appointment
  - You will be brought in with a proper mask
  - health care provider will also be using protective equipment.
- If you are severely sick then you must go to the nearest hospital.





# How do I get tested? Where can I get tested?

- hospitals testing based on criteria
- Community health centers are currently not testing
- Without known exposure and illness symptoms, stay home and stay safe with good hand hygiene
- Some NJ testing sites:
  - PNC Bank Arts Center
  - NJ MVC Kilmer Inspection Center
  - [covid19.nj.gov](https://covid19.nj.gov) website:
  - <https://covid19.nj.gov/search.html?query=Testing+Centers+in+NJ>
  - using same criteria as hospitals for testing





Example of a swab used by providers



Example of a CDC diagnostic panel

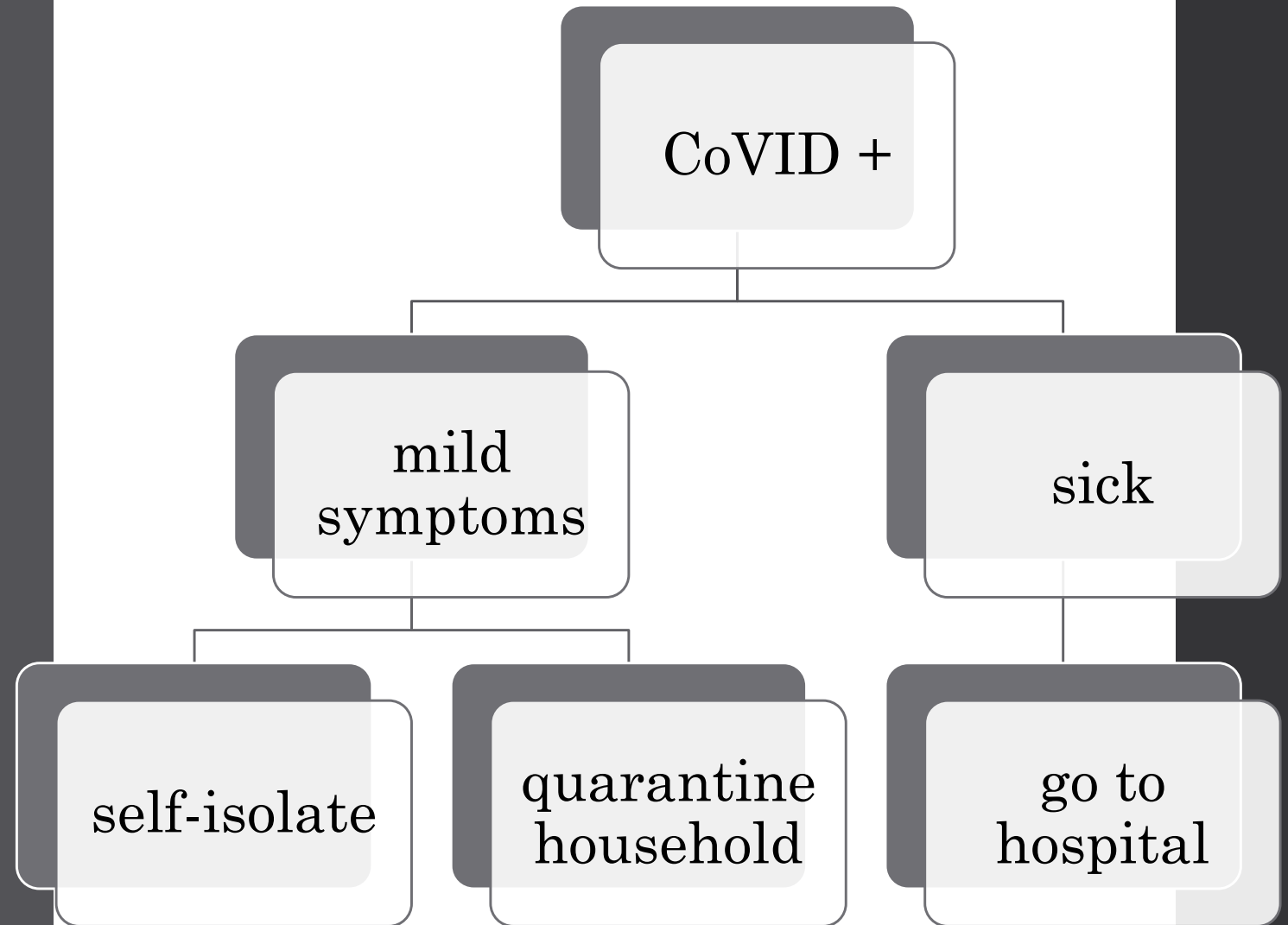
## If I need to get tested for COVID-19, is it painful? How do they test for the virus?

- Test is simple and similar to strep throat test.
- A swab is taken from your nose and put in a small container of liquid.
- Based on the technique, it could take anywhere from 1 hour to 3 days for the result.



Testing Positive for  
COVID-19

If someone in  
my household  
tests positive,  
should I get  
tested?



# Are telehealth services available instead of in-person visits in the event we get sick with a fever or other symptoms?



- Many offices offering telehealth services now
- If telehealth not available (video, etc.), many are screening via phone to decide if patient needs to be seen in person



# • Self-Quarantine vs Self-Isolation?

## • SELF-QUARANTINE

- shelter in place
- avoid going to stores or interacting with the public
- Stay away from household members, as much as possible
- sleep in separate space from family members
- ***Who should do this?***
  - Anyone who does not have symptoms, but who had close contact with someone who later became infected
  - Living with someone who is in self-isolation

## SELF-ISOLATION

- confined to a separate room + no or minimal contact with household members (including pets)
- Use separate bathroom if possible or sanitize shared bathroom
- pick up food trays left at door
- Who should do this?
- confirmed case of Covid-19
- person waiting for test results
- person with obvious symptoms, still waiting to be tested



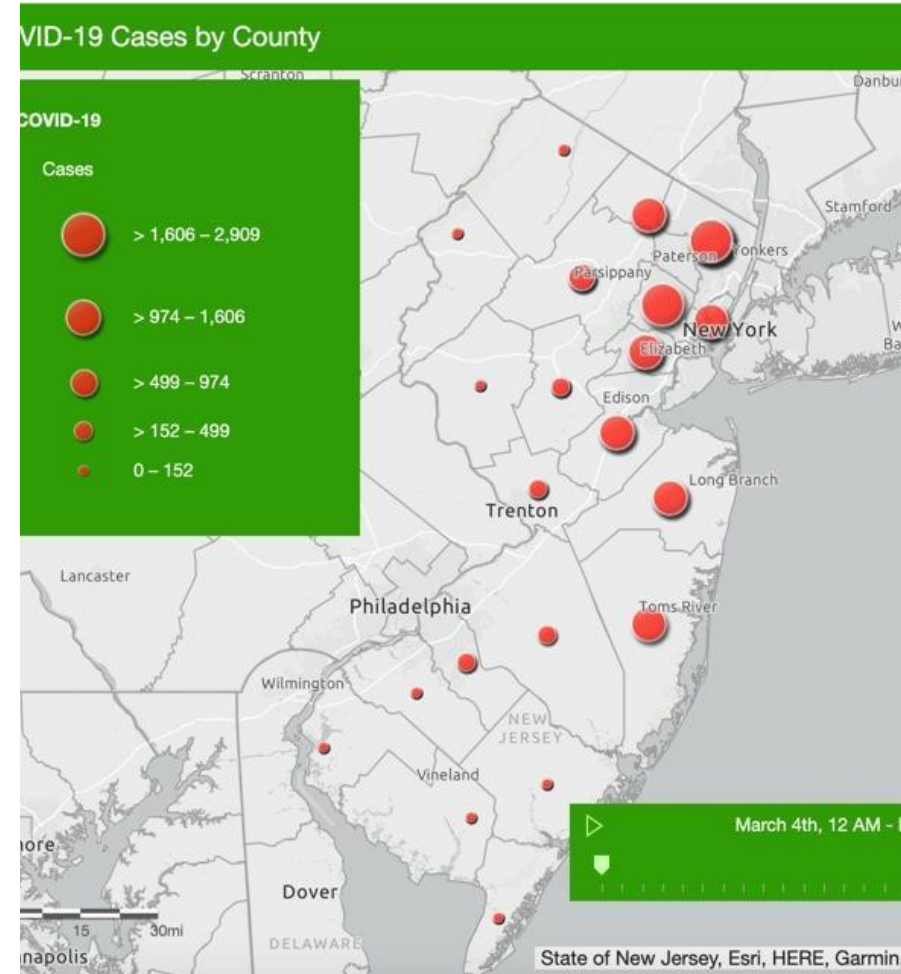
## Why 14 Days?



- 14 days = incubation period
- Johns Hopkins study:
  - 97% of people who develop symptoms of CoVID19 infection will do so within 11.5 days of exposure

# Where have people in New Jersey tested positive for COVID-19?

- In New Jersey, patients are being treated in hospitals
- If feeling better or have no symptoms □ sent home
  - quarantine



**If I tested positive for COVID-19, will I have to get tested again to find out if I still have it?  
If not, how will I know it's gone?**

In asymptomatic patient retesting is no going to be done due to resource limitation.



If you remain asymptomatic for 14 days after being positive, it is likely that you are not going to become symptomatic.

# After recovering from COVID-19, can I...

## Spread to others?

- ❖ may still have some virus shedding but you have developed immunity
- ❖ shedding from a well person is less likely.

## Return to work?

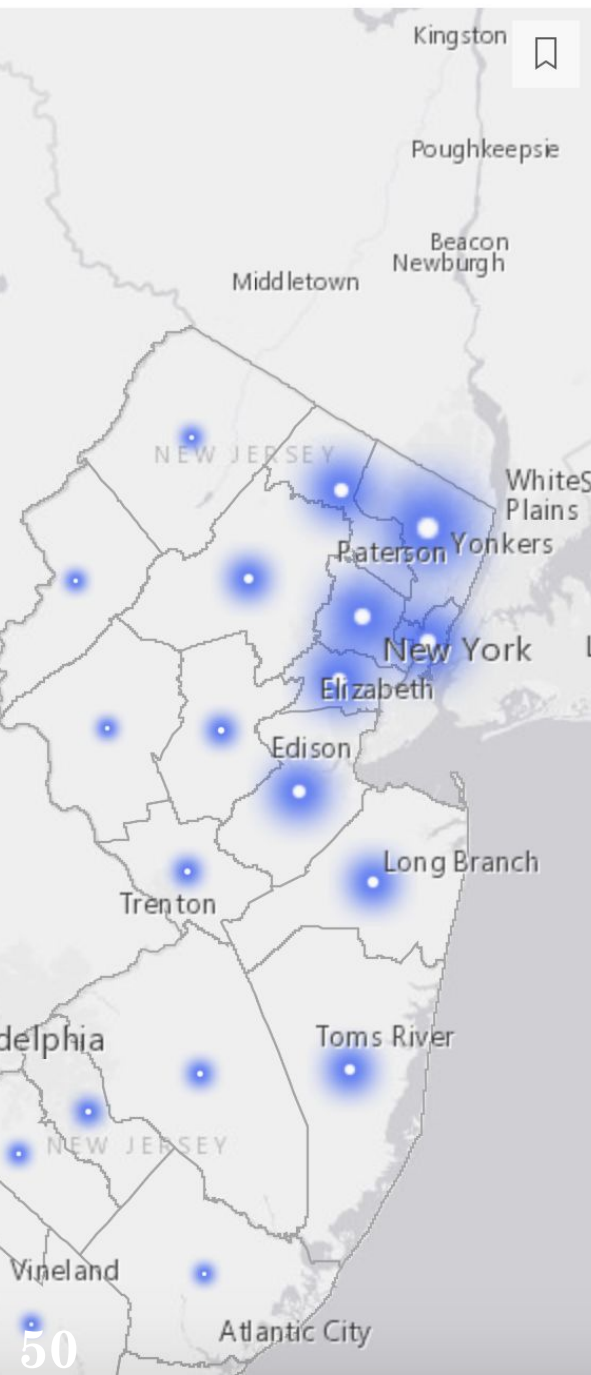
- ❖ If no symptoms
- ❖ dependent on your employer.



# COVID-19 Prevention Strategies

- COVID-19 is now widespread through most communities in NJ/NY
- Self-monitor for symptoms
- Do NOT recommend travel
- Practice physical distancing





Positive

41,090

47,942

Negative

This figure includes data reported to the state by the state lab plus seven private laboratory

Deaths

1,003

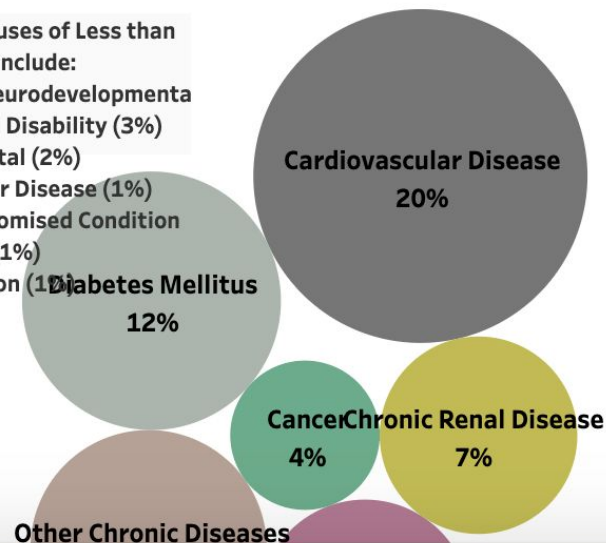
What is community spread?  
What are your top recommendations to avoid community spread?

- **Community spread:**
  - ❖ people infected with the virus in an area
  - ❖ including some who are not sure how/where they became infected

### Underlying Conditions

(64%, 542 of 846 Currently Unknown)

Underlying Causes of Less than 3% Include:  
Neurological/Neurodevelopmental/Intellectual Disability (3%)  
Mental (2%)  
Chronic Liver Disease (1%)  
Immunocompromised Condition (1%)  
Vision (1%)



# What is Social Distancing?

- Creating physical distance between people who don't live together
- Community level:
  - closing schools/workplaces
  - canceling events like concerts
- Individuals
  - keeping six feet of distance between you and others while in public
  - avoiding physical contact with people who do not share your home.
- **Everyone** should limit close contact (indoors and outdoors) to family members only
  - NO dinner parties, NO play dates, NO birthday parties with a few friends

## How can I help slow the spread of the virus?



**Stay at home**  
no unnecessary journeys  
or social contact



Only leave home for  
**essential shopping**  
or **medical needs**



You can also go out to  
**exercise** once a day



Travel to and from work only if  
**absolutely necessary**



Public gatherings of  
**more than two people are banned** -  
excluding people you live with



**Police could fine you**  
if you don't follow the rules



If I am in close contact with someone and <6 feet away, can I get the virus?

- Spreads between people in close contact with one another (<6 feet)
  - Infected person coughs or sneezes □ releases respiratory droplets
  - Droplets land in mouths/noses of nearby people □
  - Droplets inhaled into the lungs
- Can someone spread the virus without being sick?
  - People most contagious when they are most symptomatic (the sickest)
  - Some spread possible before people show symptoms
  - Spread from contact with contaminated surfaces or objects □
  - touch their own mouth, nose, or possibly their eyes



# How long does this virus last on various surfaces?

- ❑ Virus may last few hours to few days on surfaces
- ❑ **Clean and disinfect high-touch surfaces daily in household common areas**
  - ❑ e.g. tables, hard-backed chairs, doorknobs, light switches, remotes, handles, desks, toilets, sinks
- ❑ Isolate sick persons in a specific room if possible
- ❑ Reduce cleaning frequency to as-needed (e.g., soiled items and surfaces) to avoid unnecessary contact with the ill person
- ❑ If a separate bathroom is not available, the bathroom should be cleaned and disinfected after each use by an ill person.





# How many times should I be washing my hands each day?

## How long should I wash my hands for?

- Wash hands often
  - At least 20 seconds (soap and water)
    - Sing a fun song while you are washing your hands with your children
    - “Happy Birthday” Song twice
  - Hand sanitizer (at least 60% alcohol)
- Avoid touching your eyes, nose, mouth

### CLEAN HANDS ARE SAFER HANDS

FOLLOW THESE 4 STEPS TO MAKE SURE YOUR HANDS ARE SAFE.



#### WET

Use warm or cold running water.



#### LATHER & SCRUB

Get the backs of your hands, between fingers and under nails. (Scrub long enough to hum “Happy Birthday” twice)



#### RINSE

Use clean water, warm or cold.



#### DRY

Use a clean towel or air dry.


\*Information taken from the CDC. <https://www.cdc.gov/handwashing/when-how-handwashing.html>

**What surfaces in my home are most likely to carry the virus? I'm changing and washing our sheets daily, is this necessary?**


- **Bedsheets:** if no one is sick at home, do not need to wash daily
- 
- **For clothing, towels, linens:**
  - Do not shake dirty laundry.
  - Wash per manufacturer's instructions
  - Use warmest appropriate water setting
  - dry items completely
  - Dirty laundry from an ill person can be washed with others'

## CLEANING FOR COVID-19

COVID-19 (novel coronavirus 2019) is a respiratory illness that primarily spreads through the air and through personal contact with surfaces and infected people. COVID-19 is an enveloped virus, meaning it is easily compromised by proper cleaning and sanitizing. It is unknown how long COVID-19 can survive on surfaces, but it is recommended to clean and sanitize high contact surfaces at home, school, and the work place.




Remove visible soil and dirt from surfaces using soap and water.




Apply an EPA registered disinfectant to kill pathogens, including COVID-19. Common cleaners include:

- Clorox Disinfecting Wipes
- Lysol Brand Bleach Multi-Purpose Cleaner
- Purell Multi Surface Disinfectant



For effective sanitizing, wait the proper contact time as indicated on the product label.



**CLEAN  
SANITIZE  
WAIT**

# What items should I keep in my home in case I develop symptoms?

- Stay informed
  - CDC has great resources
- Stay in touch
  - Create an emergency contact list
- Prepare for possible illness
  - If possible, have a room designated where sick individuals can be separated from others.

Clean and disinfect frequently touched objects and surfaces

Cleaning products

Use EPA-registered disinfectants

<https://www.epa.gov/pesticide-registration/list-n-disinfectants-use-against-sars-cov-2>

Supportive care:

Tylenol

Fluids

# Do I need to wear gloves?

No need for gloves  
at home

Practice frequent  
handwashing/hand  
sanitizer

However, if you do  
use them, they  
**CANNOT** be used  
over and over  
again.

Best to instead  
wash hands  
frequently and/or  
use hand sanitizer



# Do I need to wear a mask?

- cloth face coverings in public settings (e.g., grocery stores and pharmacies)
  - fashioned from household items
  - voluntary public health measure
  - **especially** in areas of significant community-based transmission
  - slows spread of the virus
  - help people who may be infected and not know it from transmitting it to others
- Continue 6-feet social distancing remains important to slowing the spread of the virus
- Cloth face coverings not surgical masks or N-95 respirators.

## HOW TO PUT ON, USE, TAKE OFF AND DISPOSE OF A MASK

To remove the mask: **remove it from behind** (do not touch the front of mask); **discard immediately in a closed bin**; **clean hands with alcohol-based hand rub or soap and water**



Supporting Myself,  
My Family & My  
Community



# CAN I GO OUTDOORS? YES!!!

- Choose parks, open fields, hiking trails
- AVOID playgrounds:
  - More crowded
  - Contaminated surfaces
- SAFE: running, walking, and biking +/- household member
- SAFE to drive



*Wash your hands as soon as you get home!*



## How can I best protect myself when grocery shopping?

- Go during off-peak hours (less crowded)
- Wipe down handles on shopping cart
- Try not to touch your face while shopping
- Wash your hands before and after going
- Maintain a distance of at least 6 feet from others
- After you unpack food at home, wash your hands again

# Can I order take-out or delivery? Is this safe?

## If so, what precautions should I take?

- Main risk from ordering food – get virus from infected delivery person if they sneeze or cough on you (virus spreads mostly by person-to-person contact)
- Less likely to get virus from touching contaminated packing
- No risk of contacting virus by eating it in cooked food
- Small risk by touching raw food that virus was on and then touching your face
- Ordering is generally safer than going to grocery store or restaurant (less contact with people)





**SPECIAL SUPERMARKET SHOPPING TIMES**

- THE FRAIL
- PEOPLE WITH SPECIAL NEEDS
- PREGNANT WOMEN
- SENIORS

<b>99 RANCH MARKET</b> 420 GRAND ST. 201-536-8899 <b>10AM-11AM</b>	<b>TWIN CITY SUPERMARKET</b> 216 SIP AVE. 201-946-1694 <b>7AM-8AM</b>	<b>LA CONGA FOOD MARKET</b> 350-352 GROVE ST. 201-985-0382 <b>8AM-9AM</b>
<b>ACME #1083</b> 125 18TH ST. 215-692-2700 <b>6AM-7AM</b>	<b>C-TOWN SUPERMARKET</b> 885 BERGEN AVE. 201-795-1740 <b>7AM-8AM</b>	<b>SHOP RITE SUPERMARKET</b> 400 MARIN BLVD. 201-418-0300 <b>7:30AM-8:30AM</b>
<b>ACME #1092</b> 321 ROUTE 440 201-434-0417 <b>6AM-7AM</b>	<b>TWIN CITY</b> 2-16 GARFIELD AVE. 201-333-8990 <b>7AM-8AM</b>	<b>KEY FOOD FRESH &amp; NATURAL</b> 574 JERSEY AVE. 201-204-4200 <b>8AM-9AM</b>
<b>TARGET # 1886</b> 100 14TH ST. 201-449-0017 <b>8AM-9AM</b>	<b>EXTRA SUPERMARKET</b> 360 MLK DR. 201-435-5562 <b>8AM-9AM</b>	<b>HUDSON GREENE MARKET INC.</b> 77 HUDSON ST. 201-434-2080 <b>8AM-9AM</b>
<b>MORTON WILLIAMS SUPERMARKET</b> 105 RIVER DR. SOUTH 201-626-6566 <b>7AM-8AM</b>	<b>PIONEER SUPERMARKET</b> 320 MLK DR. 201-432-3929 <b>7:30AM-8:30AM</b>	<b>STOP &amp; SHOP SUPERMARKET</b> 232 CENTRAL AVE. 201-653-6508 <b>7AM-8AM</b>
<b>SUPREMO FOOD MART</b> 323 PALISADE AVE. 201-963-7606 <b>7AM-8AM</b>	<b>ASIAN FOOD MARKET OF JC</b> 701 ROUTE 440 201-333-8898 <b>11AM-12PM</b>	<b>BJ'S WHOLESALE CLUB #44</b> 396 MARIN BLVD. 201-798-0500 <b>9AM-10AM</b>
<b>VALUE FRESH MARKET</b> 729 SECAUCUS RD. 201-610-1502 <b>8AM-9AM</b>	<b>EXITO FRESH MARKET</b> 113-115 MONTICELLO AVE. 201-706-4428 <b>8AM-9AM</b>	
<b>C TOWN FRESH</b> 759 WEST SIDE AVE. 201-360-3781 <b>7AM-8AM</b>	<b>BRAVO SUPERMARKET</b> 503 WESTSIDE AVE. 201-433-8517 <b>7AM-8AM</b>	

**201-547-6800**  
[jcnj.org/specialmarkettimes](http://jcnj.org/specialmarkettimes)  
**CITY**  
 ADVISORIES & UPDATES  
[jcnj.org/coronavirus](http://jcnj.org/coronavirus)



Beginning today,  
we are reserving the  
first hour of shopping  
for our elderly and  
high-risk guests.

We appreciate  
your support in helping  
our community.

**KINGS**

How to protect seniors  
+ high risk individuals  
while grocery  
shopping?

- Go during reserved hours
- Shop online:
  - outside pick up service
  - delivery to your door

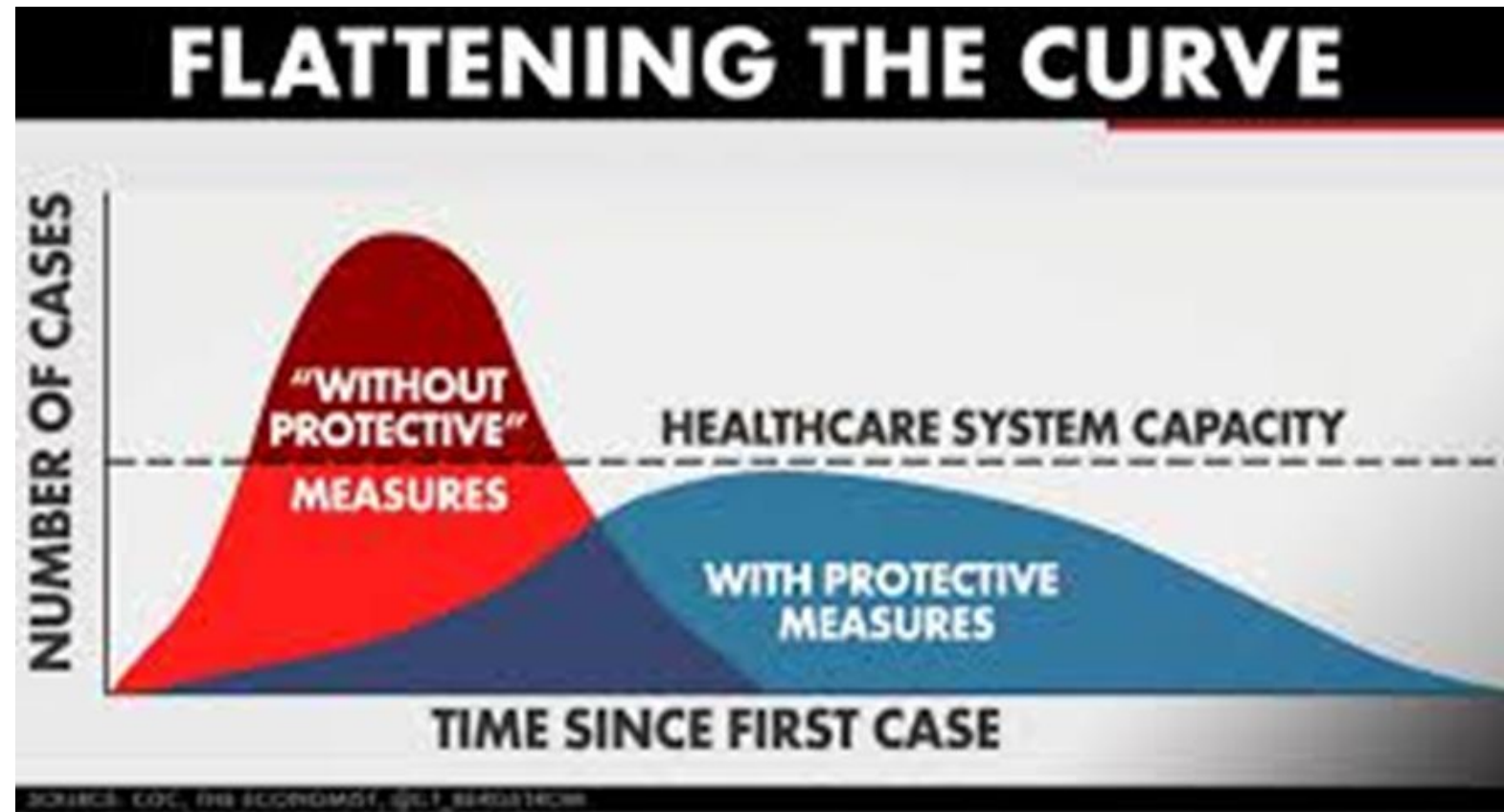
# If I am not exhibiting any symptoms, but I have been out in public, can I be around other people like my grandparents?

- Stay away from nursing homes, retirement or long-term care facilities
- Older adults should avoid contact with children
  - minimize risk of child without symptoms passing on disease to their grandparents
- How to help the elderly?
  - virtual visits – set up FaceTime calls
  - care packages for elderly relatives
  - Offer to do their grocery shopping



# How long do you think social distancing will last? How long will it take for the virus to disappear?

- Physical distancing only thing that currently works
- Vaccine?
- Herd Immunity?







Should I go to work if there is an outbreak in my community?

Stay home if you can

Talk to your employer to discuss:

- working from home
- taking leave if you or someone in your household gets sick with CoVID19 symptoms

# Will warm weather stop the outbreak of COVID-19?

**Dr. Anthony S. Fauci** (*director of the National Institute of Allergy and Infectious Diseases - March 24, 2020*):

seasonal cycle to the pandemic is possible

could ease in parts of North America and Europe during the summer months

although it could then come roaring back in the fall

## COUNTRIES AND TERRITORIES WITH CONFIRMED CASES



AS OF MARCH 12, 2020  
SOURCE: Johns Hopkins CSSE

abc NEWS

# Stress & Coping During COVID-19 Pandemic

- Stress during an infectious disease outbreak can include:
- Fear and worry about your own health and the health of your loved ones
- Changes in sleep or eating patterns
- Difficulty sleeping or concentrating
- Worsening of chronic health problems
- Increased use of alcohol, tobacco or drugs

- **Things you can do to support yourself**
- Take breaks from watching, reading, or listening to news stories, including social media
- Connect with others



# High risk for illness + stress:



Older adults and people with disabilities - increased risk for mental health concerns, such as depression.



Mental health problems can present as physical complaints (such as headaches or stomachaches) or cognitive problems (such as having trouble concentrating).



Doctors may miss mental health concerns among:

- disabilities (focus on underlying health condition?)
- older adults (normal aging?)



# What resources for teletherapy are available for mental health needs?

- **American Counseling Association:**
  - o Take Care of Your Emotional Health
- American Psychological Association**
- o Ways to View Coverage of the Coronavirus



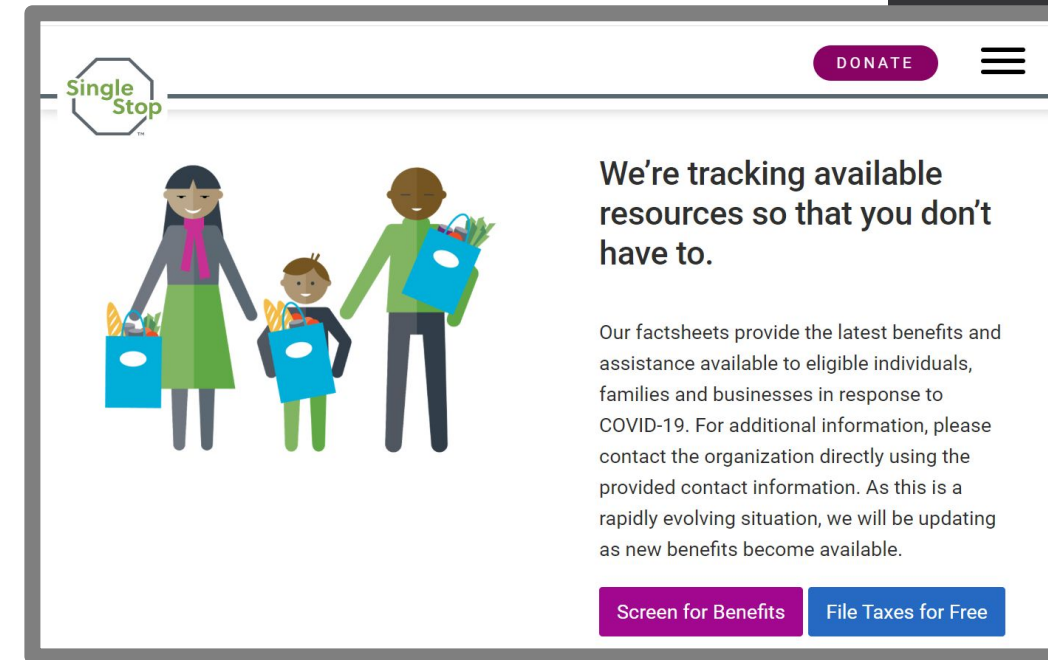
- Anxiety and Depression Association of America
- o Coronavirus Anxiety: Expert Tips and Resources
- Center for Disease Control
  - Stress & Coping
  - Taking Care of Your Emotional Health:
- SAMSHA (Substance Abuse and Mental Health Administration)
  - Tips for Social Distancing, Quarantine, and Isolation: Taking Care of Your Mental Health

<https://www.nj211.org/mental-health-resources>



# COVID-19 Resources for Families

- <https://singlestop.org/covid19/>
  - assistance to eligible individuals, families, businesses in response to COVID-19
  - NJ-specific Factsheet with resources
  - Screening tool for benefits (food, housing, medical, etc.)
  - Search tool for local resources
- NJ211 live assistance info:
  - general information /resources for basic needs, dial 211
  - To speak with a health care professional, call 1-800-962-1253
- Text "NJCOVID" to 898-211 to receive texts regarding updates and alerts as it relates to COVID-19





# RUTGERS

Robert Wood Johnson  
Medical School

# Questions?

Thank you!