



Special Edition

COVID-19 and You



Presenter

**Dr. Vandana
Ahluwalia**

Rheumatologist
Brampton, Ontario

Moderator

Dr. Siân Bevan

Chief Science Officer
Arthritis Society



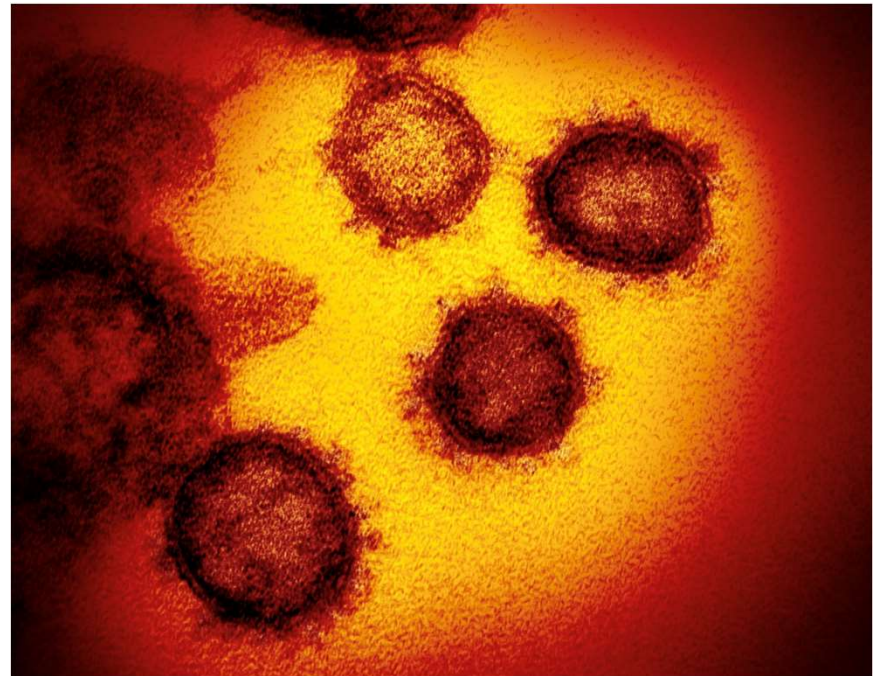
Overview

- ▼ What is COVID-19?
- ▼ What are the symptoms and how can we stop the spread?
- ▼ Commonly asked questions by people with rheumatic diseases/arthritis
- ▼ What you should do over the next 2 weeks



What is a coronavirus?

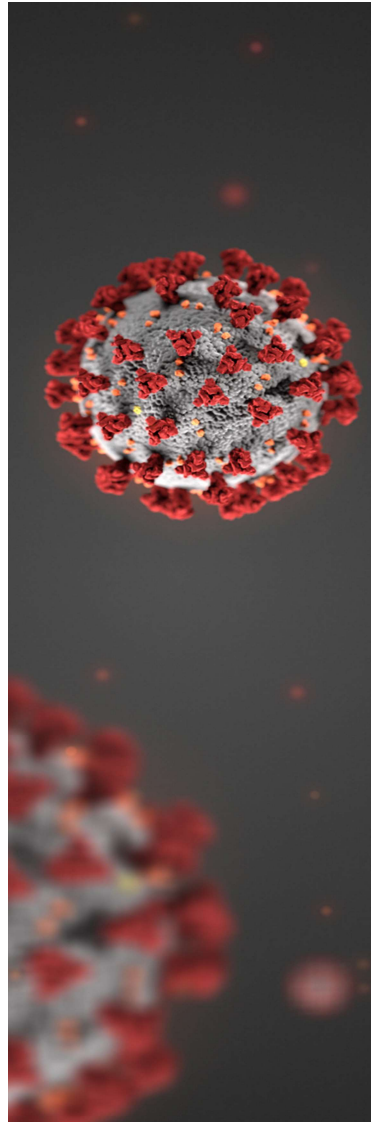
- ▼ SARS CoV-2: Virus
- ▼ COVID-19: Disease





Pandemic: What does that mean?

- ▼ A pandemic is the “worldwide spread of a new disease,” according to the WHO.
- ▼ There’s no cut-and-dry criteria for what reaches the level of pandemic and what does not, and there is no threshold of cases or deaths that triggers the definition.



History and background

Pandemic Coronavirus (COVID-19)

On Dec. 31, 2019, the World Health Organization (WHO) China Country Office was informed of cases of pneumonia of unknown etiology in Wuhan City, Hubei Province of China. The outbreak began in a seafood and poultry market in Wuhan, a city of 11 million in central China. Like SARS and MERS-CoV, the newly detected coronavirus has a zoonotic source. However, human-to-human transmission has been confirmed.



Researchers think the new coronavirus originated in bats, then jumped to an intermediary species — most likely [pangolins](#), pigs or civets — that passed it to people. It can be spread among humans via respiratory droplets within [six feet](#).



On Jan. 30, 2020, the WHO declared the 2019-nCoV outbreak a Public Health Emergency of International Concern.

On Feb. 11, 2020, the WHO announced a name for the disease: COVID-19.

On Mar. 11, 2020, the WHO declared COVID-19 a pandemic.

80%: Mild illness

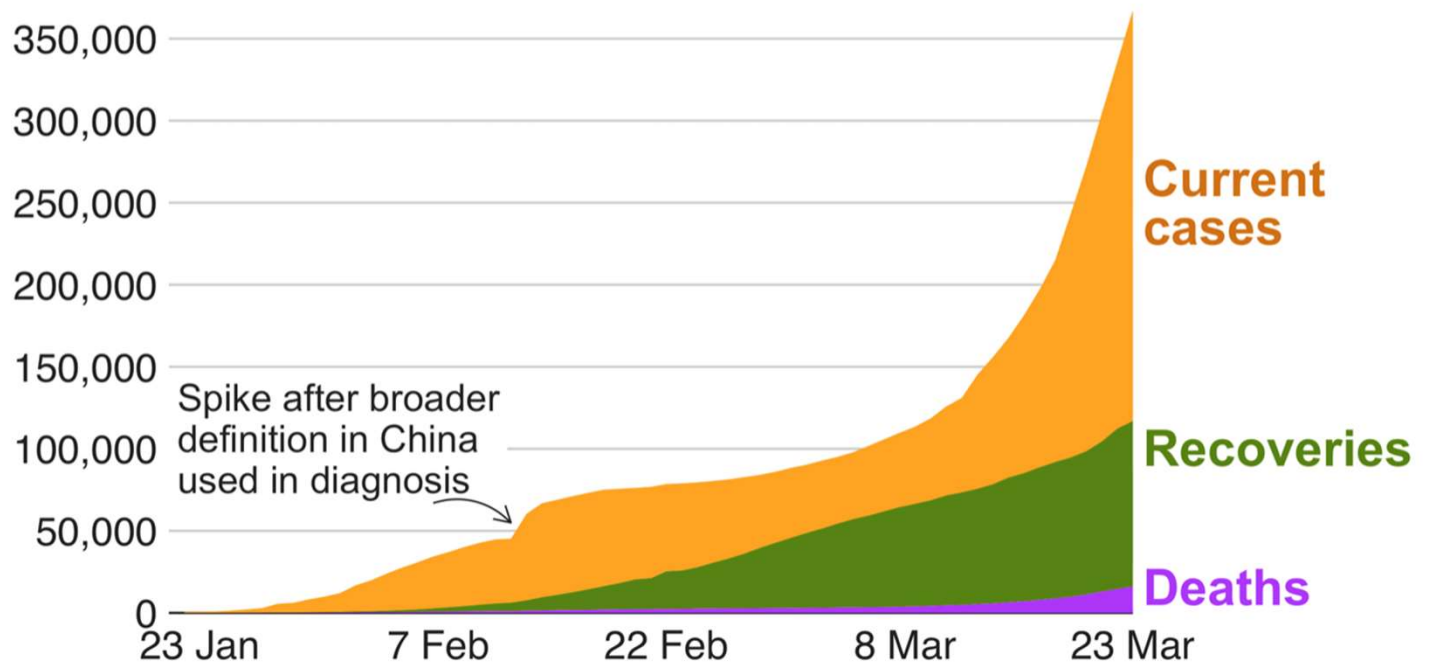
15%:
Hospitalized

5%: Intensive
care

1-3%: Mortality

Coronavirus cases, recoveries and deaths

Of the 367,000 confirmed coronavirus cases globally, there have been 101,000 recoveries and 16,100 deaths



Source: Johns Hopkins University, updated: 23 Mar 17:00 GMT

BBC



Coronavirus COVID-19 Global Cases by the Center for Systems Science and Engineering (CSSE) at Johns Hopkins U...



Total Confirmed

470,973

Confirmed Cases by
Country/Region/Sovereignty

81,667 China
74,386 Italy
68,572 US
49,515 Spain
37,323 Germany
27,017 Iran
25,600 France
10,897 Switzerland
9,640 United Kingdom
9,137 Korea, South
6,440 Netherlands
5,588 Austria

Admin1

Last Updated at (M/D/YYYY)
3/25/2020, 9:52:13 PM

Cumulative Confirmed Cases

Active Cases

173

countries/regions

Lancet Inf Dis Article: [Here](#). Mobile Version: [Here](#). Visualization: JHU CSSE. Automation Support: Esri Living Atlas team and JHU APL. Contact US. FAQ.
Data sources: WHO, CDC, ECDC, NHC, DXY, 1point3acres, Worldometers.info, BNO, state and national government health departments, and local media reports. Read more in this [blog](#).



Esri, FAO, NOAA

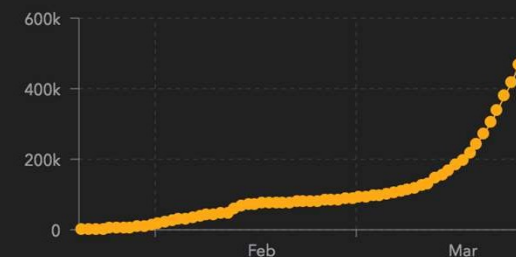
Total Deaths

21,276

7,503 deaths
Italy3,647 deaths
Spain3,163 deaths
Hubei China2,077 deaths
Iran1,331 deaths
France465 deaths
United Kingdom356 deaths
Netherlands

Total Recovered

114,012

60,811 recovered
Hubei China9,625 recovered
Iran9,362 recovered
Italy5,367 recovered
Spain3,900 recovered
France3,730 recovered
Korea, South3,547 recovered
Germany

Confirmed

Daily Increase

As of Mar. 21, 2020, 4:13 p.m.



2,814	Austria
2,118	Norway
1,763	Sweden
1,420	Denmark
1,280	Portugal
1,183	Malaysia
1,137	Canada
1,071	Australia
1,021	Brazil
1,007	Japan
925	Czechia
883	Israel
730	Pakistan
Country/Regio...	

As of Mar. 25, 2020, 9:52 p.m.

Confirmed Cases by Country/Region/Sovereignty	
5,588	Austria
4,937	Belgium
3,400	Canada
3,084	Norway
2,995	Portugal
2,554	Brazil
2,526	Sweden
2,433	Turkey
2,369	Israel
2,364	Australia
1,862	Denmark
1,796	Malaysia

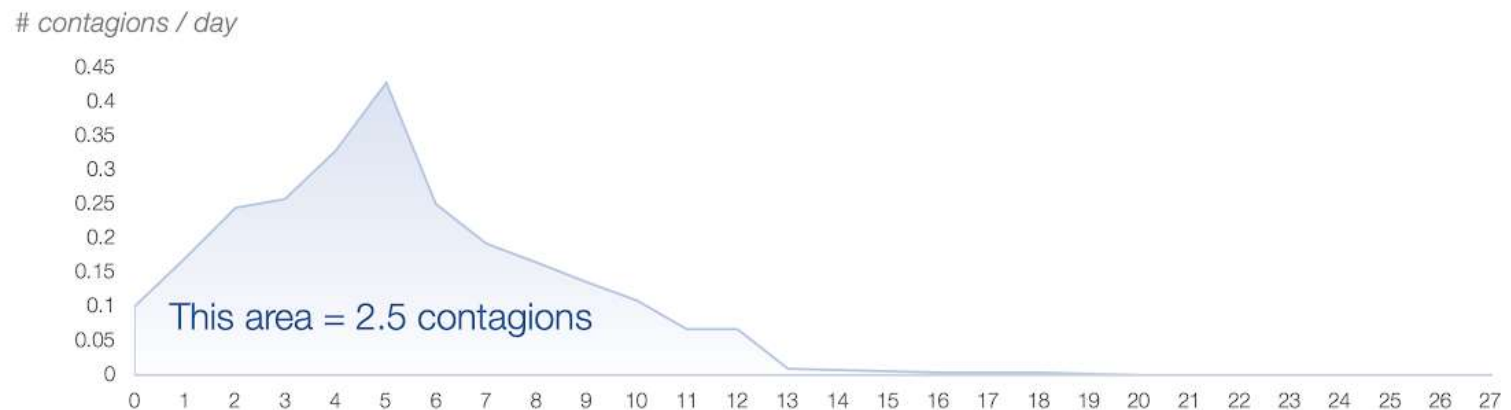
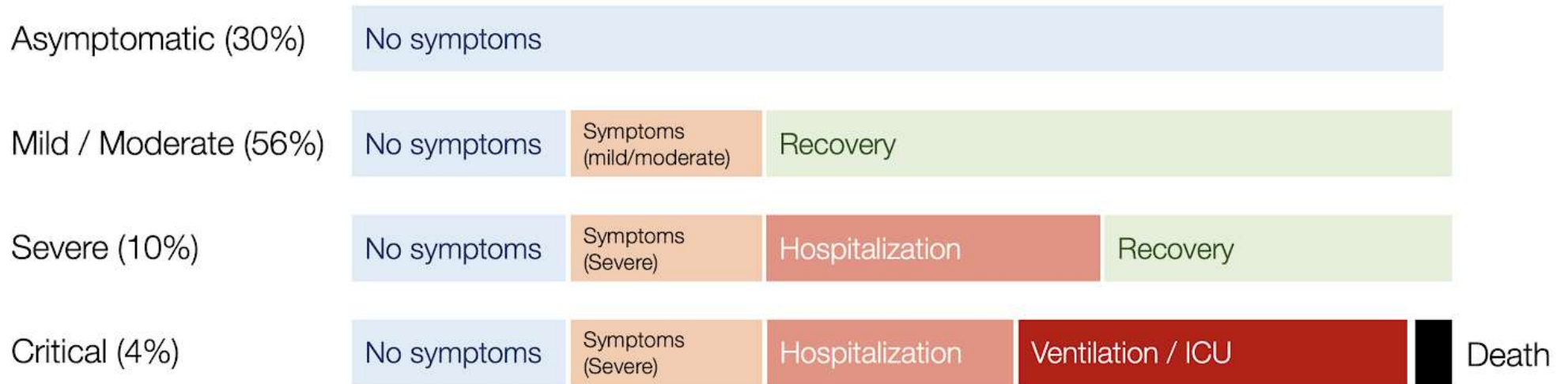


Know How it Spreads



- There is currently no vaccine to prevent coronavirus disease 2019 (COVID-19).
- **The best way to prevent illness is to avoid being exposed to this virus.**
- The virus is thought to spread mainly from person-to-person.
 - Between people who are in close contact with one another (within about 6 feet).
 - Through respiratory droplets produced when an infected person coughs or sneezes.
- These droplets can land in the mouths or noses of people who are nearby or possibly be inhaled into the lungs.

Chart 14: Transmission Rate during Coronavirus Stages in Patients



Source: Tomas Pueyo, John Hsu, WHO, Eurosurveillance, Medrxiv, ECDC, The Lancet, Impact of non-pharmaceutical interventions (NPIs) to reduce COVID19 mortality and

To prevent COVID-19 it is safest to avoid physical contact when greeting. Safe greetings include a wave, a nod, or a bow.

How should I greet another person to avoid catching the new coronavirus?







Wear a facemask if you are sick

- **If you are sick:** You should wear a facemask when you are around other people (e.g., sharing a room or vehicle) and before you enter a healthcare provider's office. If you are not able to wear a facemask (for example, because it causes trouble breathing), then you should do your best to cover your coughs and sneezes, and people who are caring for you should wear a facemask if they enter your room. [Learn what to do if you are sick.](#)
- **If you are NOT sick:** You do not need to wear a facemask unless you are caring for someone who is sick (and they are not able to wear a facemask). Facemasks may be in short supply and they should be saved for caregivers.

Surgical mask:

Used to prevent transmission of the virus by people who may be infected or are infected

N95 mask/ respirator:

Used by HCP doing high risk procedures on people who may be infected

Must fit properly

Do NOT buy for personal use!



N95 mask



Surgical mask





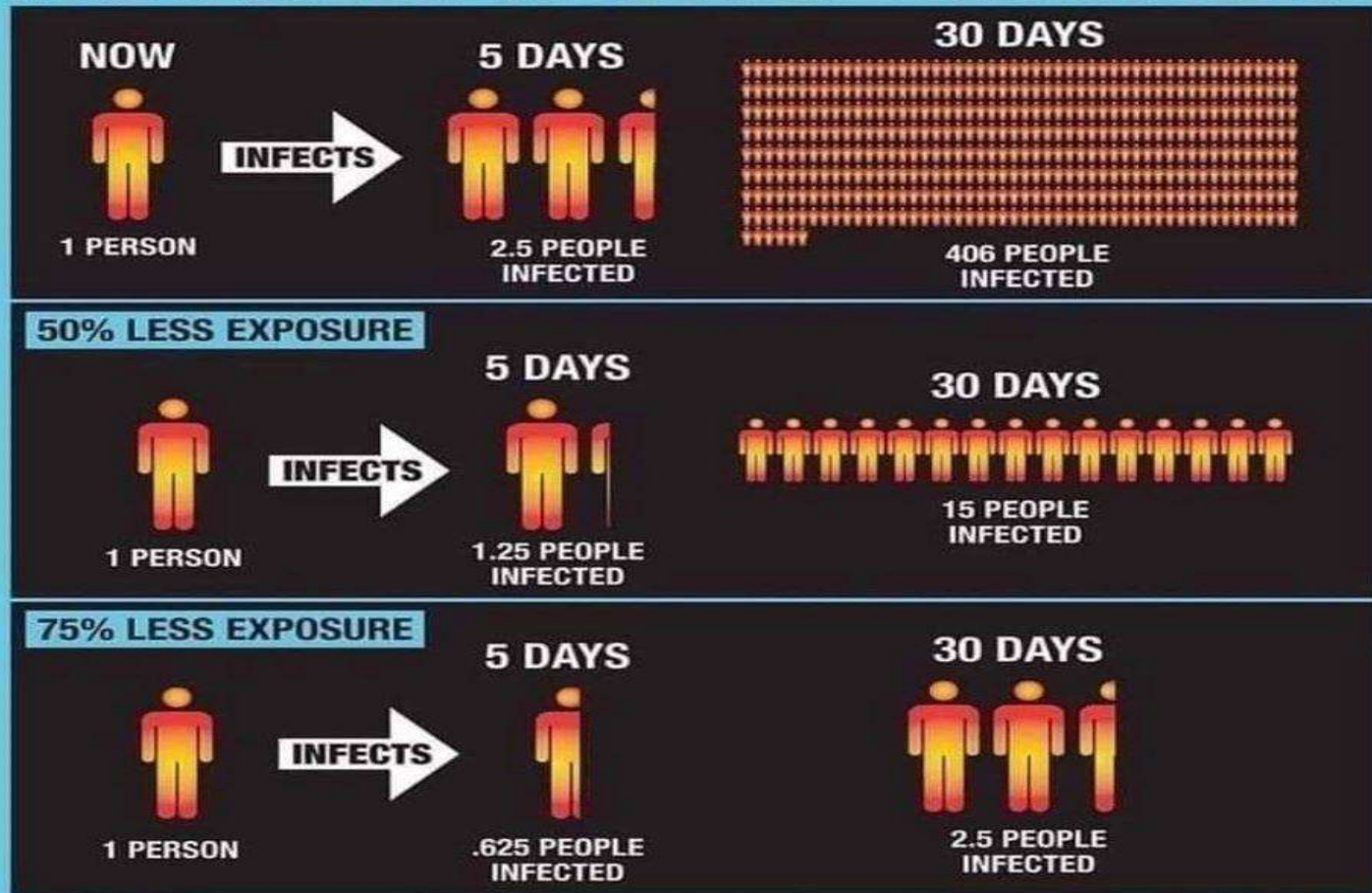
Let's see how social and physical distancing can help

•

@SIOUXSIEW @XTOTL thespinoff.co.nz

CC-BY-SA

THE POWER OF SOCIAL DISTANCING

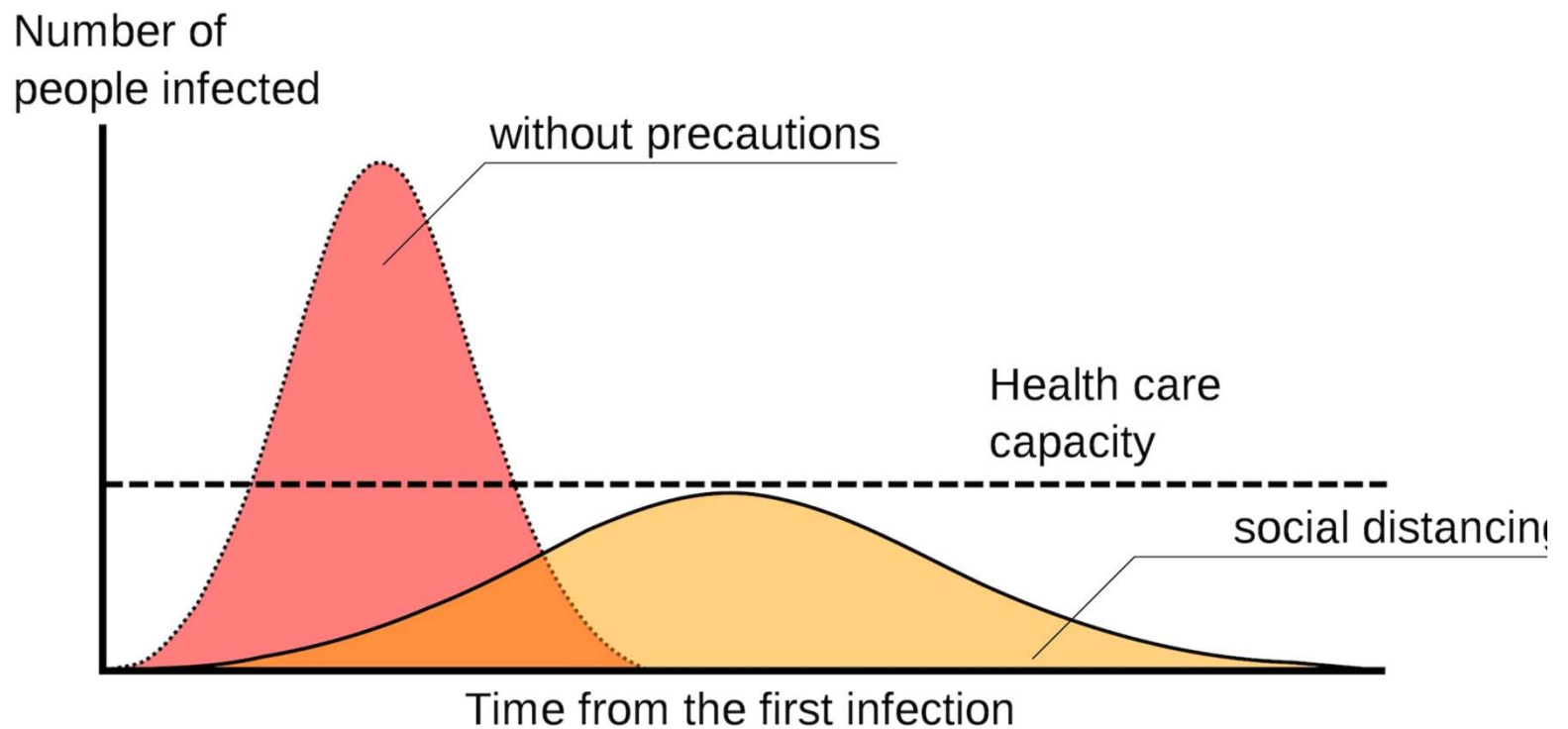


@SignerLab

@garywarshaw



What is “flattening the curve” and will it work?





COVID-19 | **STOP** the spread

HOW TO PROTECT YOURSELF AND OTHERS

- **WASH** your hands often with soap and water (for at least 20 seconds)
- **AVOID** touching your face
- **STOP** greeting people by shaking hands, hugging or kissing
- **LIMIT** your contact with groups and close contact with people, especially those who are sick (at least 2 meters)
- **CANCEL** all non-essential and international travel
- **CLEAN** high-touch objects and surfaces often

SYMPTOMS TO LOOK FOR



FEVER



COUGH



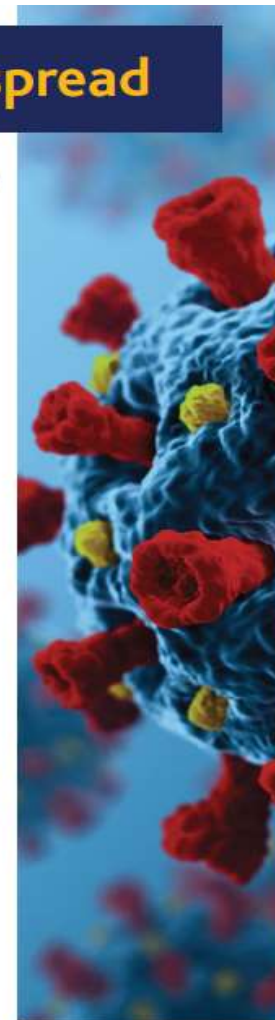
SORE
THROAT



SHORTNESS
OF BREATH

IF YOU ARE SICK

- **STAY** home (even if symptoms are mild)
- **COVER** coughs and sneezes with your elbow
- **DO NOT** visit without **CALLING** first



Stay home, stop the spread
To learn more, visit canada.ca/coronavirus

ASSOCIATION
MÉDICALE
CANADIENNE



CANADIAN
MEDICAL
ASSOCIATION



Government
of Canada

Gouvernement
du Canada

COVID-19 Symptom Self-Assessment Tool

Outil d'auto-évaluation des symptômes COVID-19

Powered by
Réalisé avec  thrive health

Select a language/sélectionnez une langue:

English

français

Which Province or Territory are you currently located in?

Select

Required



When should I seek treatment if I develop symptoms?

If you develop COVID-19 symptoms, such as fever, cough, difficulty breathing:

▼ **isolate yourself**

AND

Use one of the following options:

- ▼ Self-assessment tools on the Ministry of Health websites in your province or the Government of Canada
- ▼ Call 311 to reach Public Health: You may be directed to a hospital or a regional assessment center
- ▼ Visit your local Emergency Department if you start to experience worsening symptoms such as shortness of breath

KNOW THE DIFFERENCE: SELF-MONITORING, SELF-ISOLATION, AND ISOLATION FOR COVID-19

SYMPTOMS OF COVID-19



FEVER



COUGH



DIFFICULTY
BREATHING

SELF-MONITORING



You have:

- no symptoms

AND

- a history of possible exposure to the novel coronavirus that causes COVID-19, in the last 14 days



SELF-MONITOR means to:

- monitor yourself for 14 days for one or more symptoms of COVID-19
- go about your day but **avoid crowded places** and increase your personal space from others, whenever possible



You need to **self-monitor** if:

- you have reason to believe you have been **exposed to a person** with COVID-19

OR

- you are in **close contact** with older adults or medically vulnerable people

OR

- you have been **advised to self-monitor** for any other reason by your Public Health Authority



If you develop symptoms, **isolate yourself from others immediately** and contact your **Public Health Authority** as soon as possible

SELF-ISOLATION

You have:

- no symptoms

AND

- a history of possible exposure to the novel coronavirus due to travel outside of Canada or close contact with a person diagnosed with COVID-19

SELF-ISOLATE means to:

- stay at home** and monitor yourself for symptoms, even if mild, for 14 days
- avoid contact with other people** to help prevent the spread of disease in your home and in your community in the event you become symptomatic

Self-isolate if:

- you have travelled **outside of Canada** within the last 14 days

OR

- your Public Health Authority has identified you as a **close contact** of someone diagnosed with COVID-19

If you develop symptoms, even if mild, **stay home, avoid other people** and contact your **Public Health Authority** as soon as possible

ISOLATION

You have:

- symptoms, even if mild

AND

- you have been **diagnosed with COVID-19** or are waiting for the results of a lab test for COVID-19

To be **ISOLATED** means to:

- stay at home** until your Public Health Authority advises you that you are no longer at risk of spreading the virus to others
- avoid contact with other people** to help prevent the spread of disease in your home and in your community, particularly people at high risk of severe illness outcomes such as older adults or medically vulnerable people

You need to **isolate** if:

- you have been **diagnosed** with COVID-19

OR

- you are **waiting to hear the results** of a laboratory test for COVID-19

OR

- you have been **advised to isolate at home** for any other reason by your Public Health Authority

If your symptoms get worse, immediately contact your healthcare provider or **Public Health Authority** and follow their instructions

WE CAN ALL DO OUR PART IN PREVENTING THE SPREAD OF COVID-19. FOR MORE INFORMATION:

1-833-784-4397

@ canada.ca/coronavirus



Government
of Canada

Gouvernement
du Canada



Public Health
Agency of Canada
Agence de la santé
publique du Canada

Canada

Vaccine may be at least one year away

There is no evidence yet that the warmer weather will result in less transmission or cases.



More about the virus

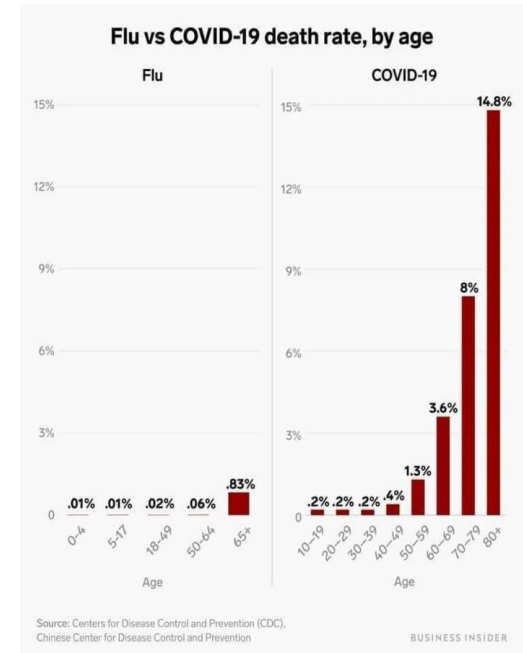
How lethal is this virus?

- ▼ Influenza: 0.1%
- ▼ COVID-19: estimated 0.7 to 4.3% (South Korea)
- ▼ New data China-NEJM-mortality: 0.25 to 3%

Are there effective treatments?

Some are being evaluated:

- ▼ Remdesivir
- ▼ Lopinavir/ Ritonavir
- ▼ Hydroxychloroquine / Chloroquine
- ▼ JAK inhibitors (Baricitinib)
- ▼ IL 6- inhibitors (Sarilumab and Tocilizumab)





What should I expect if I need to see my doctor about my autoimmune or arthritic condition?

Here are a few tips to keep in mind:

- ▼ You will need to call your doctor's office before going in as some offices may be closed or not doing face-to face visits
- ▼ Care may be delivered by phone, video or other virtual means in the upcoming days to weeks

However, until we have more information, people should take Tylenol/acetaminophen to treat the symptoms of coronavirus, unless they have been told by their doctor that it is not suitable for them



Should I stop my NSAIDs?

Ibuprofen or prescription anti-inflammatory medications

- ▼ *UPDATED March 18, 2020 with new information* — The European Medicines Agency says there is currently "no scientific evidence" that nonsteroidal anti-inflammatory drugs (NSAIDs), such as [ibuprofen](#), could worsen coronavirus disease

Endorsed by WHO, FDA (US), NHS (UK)



What about hydroxychloroquine (Plaquenil) and chloroquine?

- ▼ Hydroxychloroquine/chloroquine has been showed to inhibit SARS Cov-2 viral replication
- ▼ There have also been some anecdotal reports from China (in a news release) of chloroquine treatment success and a small study in France using Hydroxychloroquine.
- ▼ There are no clear recommendations that it is to be used in the prevention or treatment of this condition

French study:

20/26 patients

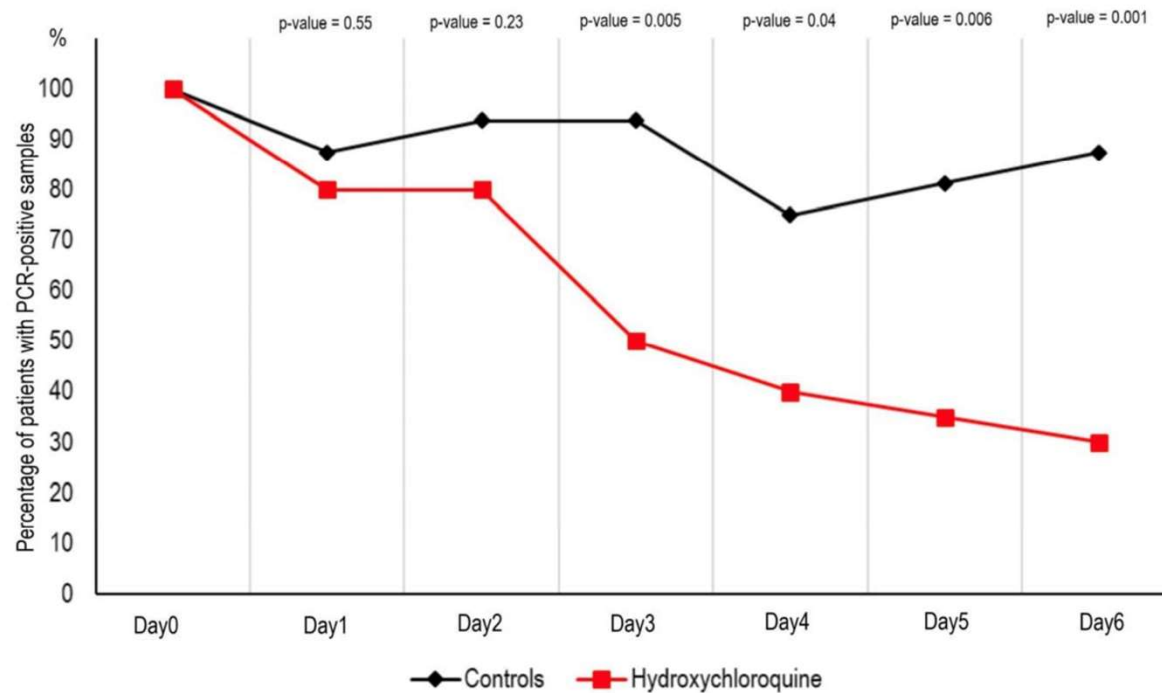
Open-label

After 6 days of treatment with a combination of hydroxychloroquine (200 mg tid) and azithromycin (z pack)

Significantly reduced SARS-CoV-2 viral load

Chinese study has not been published

Figure 1. Percentage of patients with PCR-positive nasopharyngeal samples from inclusion to day6 post-inclusion in COVID-19 patients treated with hydroxychloroquine and in COVID-19 control patients.



Please cite this work as Gautret et al. (2020) Hydroxychloroquine and azithromycin as a treatment of COVID-19: results of an open-label non-randomized clinical trial. International Journal of Antimicrobial Agents – In Press 17 March 2020 – DOI : 10.1016/j.ijantimicag.2020.105949



Ensuring an adequate supply of medications for your rheumatic condition, such as HQ and CQ or biologics

Health Canada Drug Shortage Committee

- ▼ The medications required for patients with specific diseases should be prioritized for them and not be dispensed for prevention purposes until further evidence is available

- ▼ March 23 - OMA OPA and RNOA issued a statement
 - Ethical and professional practice: Need to ensure the safety of medications prescribed, ensure fairness in the use of resources and give medications based on the best available scientific knowledge



Am I at increased risk due to my autoimmune condition or immunosuppression?

We don't know

- ▼ Morbidity is due to immune activation and inflammation.
- ▼ Could you have an increased risk of secondary bacterial infection?
- ▼ Could immunosuppressive medications protect you?
- ▼ Some immunosuppressive therapies are being evaluated in treating serious viral complications.



Should I stop my immunosuppressive therapy at this time to protect me?

- ▼ If you are well – **NO**
- ▼ If you have COVID-19 - we don't know
 - Recommend usual interruption of DMARDs and JAKs or biologics while you are ill

What if you are receiving a biologic at an infusion center?

- ▼ Recommendations are to continue to receive medications as prescribed. Some infused medications have an injectable version which you could be switched to, if requested and appropriate.

Characteristics and outcomes of 21 critically ill patients with COVID-19 - Washington State (March 19)



Table 1. Baseline Characteristics of 21 Patients With Coronavirus Disease 2019 at Presentation to the Intensive Care Unit

Baseline characteristics	No. (%) of patients ^a	Reference range
Preadmission comorbidities		
Asthma	2 (9.1)	
Chronic obstructive pulmonary disease	7 (33.3)	
Congestive heart failure	9 (42.9)	
Diabetes	7 (33.3)	
Rheumatologic disease	1 (4.8)	
Obstructive sleep apnea	6 (28.6)	
Chronic kidney disease	10 (47.6)	
End-stage kidney disease	2 (9.5)	
History of solid organ transplant	2 (9.5)	
Cirrhosis	1 (4.8)	
Immunosuppression ^b	3 (14.3)	
Total with ≥1 comorbidity	18 (85.7)	

Defined as outpatient prescription of greater than 10mg/d of prednisone or an equivalent, use of chemotherapy, or use of immunosuppressive agents for solid organ transplant or for an autoimmune disease.

- A total of 21 cases were included (**mean age 70**, 52% male) with COVID-19 between Feb. 20 and March 5, 2020
- Comorbidities were identified in 18 cases (86%), with **chronic kidney disease, congestive heart failure, COPD and diabetes** being the most common.
- 17 patients (81%) were admitted to the ICU less than 24 hours after hospital admission.
- Mechanical ventilation was initiated in 15 patients (71%) (Table 2).
- Acute respiratory distress syndrome (ARDS) was observed in 15 of 15 patients (100%) requiring mechanical ventilation and 8 of 15 (53%) developed severe ARDS by 72 hours.



Physician-Entered Registry is Now Available

🕒 March 24, 2020 📁 Announcements

Update March 24, 2020: The **Physician-Entered Registry** is now available!

This registry is for healthcare providers to enter data about their rheumatology patients with COVID-19 infections. It is hosted on the REDCap survey platform at UCSF. If you would like to see what kind of data is being collected, please refer to this [case report form](#).

We are incredibly grateful to all of the people and organizations that have supported this effort. Thank you!

Also, a huge congratulations to the hundreds of people and organizations that came together and worked incredibly hard to make this project in such short time.

Our Mission:

Our mission is to create a secure, de-identified, international case reporting registry and curate and disseminate the outputs from that registry. It is our hope that the information

Contact

Email us: rheum.covid@gmail.com

Twitter: [@rheum_covid](https://twitter.com/rheum_covid)

[Follow @rheum_covid](#)

Official Supporters

[Want to be listed? Click here.](#)

- American College of Rheumatology (ACR)
- European League Against Rheumatism (EULAR)
- International League of Associations for Rheumatology (ILAR)
- British Society of Rheumatology
- Canadian Rheumatology Association (CRA)



What should I do while I am at home?

- ▼ Work from home if you can.
- ▼ Take your medications as prescribed by your doctor.
- ▼ Exercise (you can go for a walk staying away from others) and eat healthy. Some gyms have streaming services for classes on demand and stress relief and meditation
- ▼ Read a new book, watch a movie, take up a new hobby, learn a language. Enjoy time with your family playing board games or cooking together.



What should I do while I am at home?

- ▼ Talk, FaceTime or text with friends and family.
- ▼ Limit exposure to others.
 - Ask a family member or friend to get groceries or medications for you and leave them at the front door or get them delivered
- ▼ Listen to the advice of your Public Health Agency.
- ▼ Check the Arthritis Society website for up-to-date and credible information

www.arthritis.ca/covid19





◀ Coronavirus disease
2019

Advice for public ▾

Situation reports

Media resources ▾

Technical guidance ▾

Travel advice

Donors and
partners ▾

Training ▾

Download

How to cope with stress during 2019-nCoV outbreak

 **Coping with stress during the 2019-nCoV outbreak**

It is normal to feel sad, stressed, confused, scared or angry during a crisis. Talking to people you trust can help. Contact your friends and family.

If you must stay at home, maintain a healthy lifestyle - including proper diet, sleep, exercise and social contacts with loved ones at home and by email and phone with other family and friends.

Don't use smoking, alcohol or other drugs to deal with your emotions. If you feel overwhelmed, talk to a health worker or counsellor. Have a plan, where to go to and how to seek help for physical and mental health needs if required.

Get the facts. Gather information that will help you accurately determine your risk so that you can take reasonable precautions. Find a credible source you can trust such as WHO website or, a local or state public health agency.

Limit worry and agitation by lessening the time you and your family spend watching or listening to media coverage that you perceive as upsetting.

Draw on skills you have used in the past that have helped you to manage previous life's adversities and use those skills to help you manage your emotions during the challenging time of this outbreak.

Download

 **Helping children cope with stress during the 2019-nCoV outbreak**

Children may respond to stress in different ways such as being more clingy, anxious, withdrawing, angry or agitated, bedwetting etc. Respond to your child's reactions in a supportive way, listen to their concerns and give them extra love and attention.

Children need adults' love and attention during difficult times. Give them extra time and attention. Remember to listen to your children, speak kindly and reassure them.

If possible, make opportunities for the child to play and relax.

Try and keep children close to their parents and family and avoid separating children and their caregivers to the extent possible. If separation occurs (e.g. hospitalization) ensure regular contact (e.g. via phone) and re-assurance.

Keep to regular routines and schedules as much as possible, or help create new ones in a new environment, including school/learning as well as time for safely playing and relaxing.

Provide facts about what has happened, explain what is going on now and give them clear information about how to reduce their risk of being infected by the disease in words that they can understand depending on their age. This also includes providing information about what could happen in a re-assuring way (e.g. a family member and/or the child may start not feeling well and may have to go to the hospital for some time so doctors can help them feel better).

Download



Reputable websites for information on COVID-19

- ▼ Public Health (www.canada.ca/en/public-health/services/diseases/2019-novel-coronavirus-infection.html)
- ▼ Government of Canada (Canada.ca)
- ▼ U.S. Centers for Disease Control (CDC.gov)
- ▼ World Health Organization (www.who.int/emergencies/diseases/novel-coronavirus-2019)
- ▼ Arthritis Society (arthritis.ca)
- ▼ Arthritis Consumer Experts (<https://jointhealth.org>)



Stay Home
Stay Healthy
Stay Safe



Questions?



**Help support future information
events**

Visit arthritis.ca

