

## ***As of March 13, 2020***

The 101 on COVID-19 for the orthopedic surgeon

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In December 2019, an outbreak of coronavirus disease 2019 (COVID-19), caused by the virus SARS-CoV-2, began in Wuhan, China. The SARS-CoV-2 virus is a betacoronavirus, like MERS-CoV and SARS-CoV. All three of these viruses have their origins in bats. Early on, patients at the epicenter of the outbreak in Wuhan, Hubei Province, China had some link to a large seafood and live animal market, suggesting animal-to-person spread. On January 30, 2020, the International Health Regulations Emergency Committee of the World Health Organization (WHO) declared the outbreak a “public health emergency of international concern” (PHEIC). On March 11, 2020 the WHO publicly characterized COVID-19 as a global pandemic.

### COVID-19 Facts (*As of 3/13/2020*)

- 1,629 cases in the US across 47 jurisdictions (46 states and District of Columbia) with 41 deaths
- 125,048 cases worldwide across 118 countries with 4613 deaths
- Confirmed case numbers are rising as local and state agencies get access to more testing kits
  - o 79 state and local public health labs in 50 states and the District of Columbia have successfully verified and are currently using COVID-19 diagnostic tests.
  - o Quest and LabCorp began rolling out their own commercial tests to doctors and medical providers
  - o Current turn around for results is 24h with the CDC
- Highly contagious based close contact between people
  - o Close contact defined as within 6 feet.
  - o Spread through viral particles in air via cough or sneeze.
- Most infected people will not report a serious illness
  - o 80% of cases in China were mild.
  - o 15-20% of cases in China reported serious illness.
- Vulnerable populations who may become seriously affected:
  - o Older patients: 60 years and older are at greater risk, 80 years and older are at significant risk.
  - o Pregnant women.
  - o Immunocompromised patients.
  - o Patients with preexisting health conditions, ex/ diabetes, cardiovascular disease, respiratory illnesses.
- Symptoms are flu-like and may present as fever, cough, and shortness of breath 2-14 days after exposure to the virus.
- Best practices for general prevention include: avoiding contact with sick people, washing hands with soap and water for 20 seconds, avoiding touching face, cleaning and disinfecting frequently touched objects.
- The virus may survive for hours to days on various surfaces. The CDC recommends routinely cleaning (removing dirt) and disinfecting (killing germs) frequently touched surfaces.

As sports medicine physicians, much of our focus lies on protecting our athletes and teams. In the highly anticipated year of 2020, boundaries are not a viable option for our teams that are scheduled to compete around the world. How do we balance the athletic demands on our athletes with our responsibility to keep them safe?

In many sport organizations, we must be the voice of reason when deciding what safety measures need to be in place to protect the athletes, staff, and fans. As we've seen in Italy, the country who is experiencing the largest COVID-19 outbreak outside of China, the Italian Olympic Committee has suspended all sporting events until at least April 3<sup>rd</sup>. The NBA suspended play as of March 11, 2020 after a player preliminarily tested positive for COVID-19 and the NCAA said it would restrict attendance at the upcoming March Madness basketball tournaments to staff and family.

We can begin by educating our athletes and team staff on the precautions they must take such as adopting foot-shakes instead of handshakes and improving personal hygienic practices. More importantly, athletes should be self-isolating when they are sick and not returning to team activities until they have been fully healthy for at least two days. At this time, it is not recommended to test all asymptomatic people due to the sensitivity of the test and the current limitations on tests.

We must keep our athlete's first, despite financial pressures from governing organizations. Events will be canceled, medals and trophies will not be won, and money will be lost – but our athlete's, and the fans', health is our primary concern. Events may need to be cancelled 60-90 days in advance to decrease the financial loss.

The CDC guidelines for mass gatherings recommends drafting emergency plans with the venue, having supplies and staff prepared, and promoting community health awareness by telling any sick spectators to stay home. Understand that there may be a legal risk for organizations if spectators contract COVID-19, present these facts to your general counsel in advance.

Have a plan in place with your teams on what to do if it is suspected that they've been exposed to the virus. Do they have a person who can care for them if they must be self-isolated at home? The CDC has guidelines for those who are performing home care on sick people, and also guidelines for those who are low and high risk for contracting the disease. Those at a lower risk should check their temperature morning and night and monitor for respiratory symptoms. Higher risk individuals should be quarantined for 14 days.

Remember that your team's health is the primary concern during this uncertain time. Ease the ensuing panic with facts and emphasizing the precautionary measures that everyone can take to protect themselves and their communities.

5 ways to keep your team safe as COVID-19 evolves:

1. Instruct your athletes to be vigilant with their hand hygiene, avoid touching their face at all times, and perform foot-shakes instead of handshakes.
2. Require self-isolation for athletes who are sick until they are fully healthy for 2 days.
3. Pay extra attention, and recommend isolation at your discretion, to at risk populations surrounding your team: older, immunocompromised or pregnant coaches, officials, referees, and administration staff.
4. Assess the health and safety risks of upcoming team travel.

5. Stay up to date on CDC guidelines for mass gatherings; connect with local public health departments to customize your events and develop risk mitigation strategies. Cancel/postpone/suspend events if necessary.

CDC mass gatherings guidelines: <https://www.cdc.gov/coronavirus/2019-ncov/community/large-events/mass-gatherings-ready-for-covid-19.html>

CDC COVID-19 disinfectant recommendations: <https://www.cdc.gov/coronavirus/2019-ncov/community/home/cleaning-disinfection.html>

### **References**

Center for Disease Control

World Health Organization