AAP: Clearance for sports after COVID-19 should include cardiac screening
by Alyson Sulaski Wyckoff, Associate Editor

Editor's note: This guidance has been updated since this story was published. Please visit https://bit.ly/3itYJgQ. AAP interim guidance is based on current evidence and best data at the time of publication. Updates are provided to reflect changes in knowledge about the impact of the disease on children and adolescents. For the latest news on COVID-19, visit http://bit.ly/AAPNewsCOVID19.

Youths who have recovered from COVID-19 should be cleared for a return to sports by their physician and undergo evaluation for cardiac symptoms such as chest pain, shortness of breath, fatigue, palpitations or syncope.

A positive cardiac screen or other concerning findings should prompt an electrocardiogram (EKG) and potential referral to a pediatric cardiologist, according to AAP recommendations in "COVID-19 Interim Guidance: Return to Sports."

The guidance, updated from July 22, covers resting periods, risk mitigation and other questions families may ask their pediatricians on youth sports participation amid the pandemic.

Athletes and COVID-19

The updated guidance provides more details on the care of youths who have had COVID-19, with a focus on cardiac evaluation, due to the growing literature about the relationship between COVID-19 and myocarditis.

All patients who have been infected with SARS-CoV-2 or with exposure to SARS-CoV-2, regardless of symptoms, require a minimum 14-day resting period and must be completely asymptomatic for greater than 14 days before returning to exercise and/or competition. They also should be cleared for participation by their primary care physician. Any COVID-19-positive individual who has a history of or current cardiac symptoms or has any cardiac findings on examination is recommended to seek cardiac clearance by the primary care physician, who is encouraged to collaborate with a pediatric cardiologist as necessary prior to participation.
Children and adolescents with severe presentations (hypotension, arrhythmias, conditions requiring intubation or extracorporeal membrane oxygenation support, or kidney or cardiac failure) or who have multisystem inflammatory syndrome in children must be treated as though they have myocarditis and restricted from exercise and participation for three to six months. They must be cleared to return to sports by their pediatrician and/or pediatric medical subspecialist, preferably in consultation with a pediatric cardiologist. Results from cardiac testing (EKG, echocardiogram, 24-hour Holter monitor, exercise stress test and, if warranted, cardiac resonance imaging) need to have returned to normal before the athlete can resume activity.

Primary care physicians with questions about patients’ readiness to return to competition “should not hesitate to refer them to the appropriate pediatric medical subspecialist,” the guidance states.

General testing of athletes

Testing for SARS-CoV-2 is discouraged for athletes unless they are symptomatic or have been exposed to someone infected with SARS-CoV-2. Antibody testing is not recommended (see AAP testing guidance).

Reporting cases

Parents need to report if their athlete or a household contact is exhibiting signs or symptoms of COVID-19 or tests positive for SARS-CoV-2, even if asymptomatic. They should follow the CDC-recommended isolation or quarantine period. When someone tests positive, they should notify team officials and the health department so contact tracing and quarantining can follow (see CDC when to quarantine guidelines).

Reducing risk

Policymakers and school administrators must consider the mounting evidence on COVID-19, including the role youths may play in transmission of the infection. Although children and adolescents play a major role in amplifying influenza outbreaks, this does not appear to apply to SARS-CoV-2.

While questions remain, most evidence shows children under age 10 years may be less likely to become infected with SARS-CoV-2 and pass it to others. Those older than 10 years, however, seem to spread it as efficiently as adults, which should be considered in determining how to safely and effectively open schools. Prolonged, close contact with an infected person is the main driver of transmission.

When weighing return to sports, factors that likely influence risk of infection are the sport itself (number of players, spacing, and frequency and duration of contact), and the setting (indoor vs. outdoor, size and ventilation of facility). As SARS-CoV-2 can be transmitted on surfaces, sports with shared equipment, facilities or common surfaces may pose additional risk.

Other considerations are local disease activity and individual circumstances such as underlying health conditions that place the athlete or household contacts at risk (see list of high-risk conditions from the CDC).

Any modifications to sports practices and competitions should consider CDC recommendations as well as state regulations and guidance. Examples of risk reduction in sports include prioritizing noncontact activity, reinforcing hygiene and respiratory etiquette, minimizing travel and cleaning/disinfecting frequently touched surfaces.

As in previous guidance, all children should have an annual health supervision visit that ideally incorporates the sports preparticipation physical evaluation.

Wearing face coverings
When nonvigorous exercise is being performed and physical distancing is not possible, a cloth face covering should be worn. Cloth face coverings also should be worn by coaches, officials, spectators and volunteers, and by everyone arriving at and departing from an athletic facility/setting or on the sidelines. The World Health Organization does not recommend cloth face coverings during vigorous exercise, and the CDC cautions that some people in high-intensity activity may be unable to wear a cloth face covering.

**Other options for sports participation**

When school districts find they are unable to operate sports programs due to the safety recommendations or other reasons, families may seek out other options (see AAP clinical report *Organized Sports for Children, Preadolescents, and Adolescents*).

The AAP encourages pediatricians to become familiar with these local programs, including those with mechanisms for children to play for a reduced fee or parent volunteering in exchange for lowered fees.

**Supporting athletes**

Disruptions, prolonged breaks from sports participation and cancellation of milestone events can have a significant impact on some youths. Children and teens should be monitored for signs and symptoms of depression and anxiety.

**Resources**

- Information about COVID from the AAP
- American College of Cardiology: "Returning to Play After Coronavirus Infection: Pediatric Cardiologists' Perspective"
- Information for parents from HealthyChildren.org on cloth face coverings during sports
- HealthyChildren.org article "Youth Sports & COVID-19: Understanding the Risks"
- HealthyChildren.org article "Youth Sports Participation During COVID-19: A Safety Checklist"