## Etiquette

- Thank you for joining us!!
- Please mute your microphone
- Please post questions during the presentation in the chat
- Questions will be sorted for addressing at the end in the Q&A
- Any unanswered questions can be followed up after the session
- If video connections become unstable, we may request participants to turn off their video









volleyball alberta

## COVID Safety, Mask Wearing & Training

Wednesday, November 18



volleyball alberta

## Introductions

Laurie Eisler – Head Coach, University of Alberta Pandas Volleyball Kerry MacDonald – Director, Sport Science, Medicine & Innovation Brock Davidiuk – Head Coach, University of Alberta Golden Bears Volleyball



## Agenda

- 1. State of the Union
- 2. Risk Mitigation
- 3. COVID Safety & Training
- 4. Questions & Answers





## State of the Union

- Alberta New Cases (September 1: 166, November 17: 773)
- Two-week suspension on indoor team sports November 13-27!
- ASAA cancelled 2020-21 Provincial Championship
- Cohort programs should still maintain best practices & physical distancing
- Include additional safety measures when possible
- Promote a safe environment!





**COVID Safety & Mask Wearing** 



volleyball alberta



## Volleyball & COVID-19

Risk Mitigation Refresh

Dr. Kerry MacDonald
Director of Sport Science, Medicine and Innovation

## Volleyball & COVID



- Volleyball as a sport requires participants to breach physical distancing guidelines
   (2m) for competition <->
- It requires the sharing of equipment



Risk of COVID-19 cannot be completely eliminated



- We have documented cases of COVID-19 transmission within sport and within volleyball
- Regional allowable gathering sizes and physical distancing requirements will set the parameters for what is possible

### Risk Assessment Scale





Higher Risk
Indoor Activity
High Number of Participants
Longer Duration in Confined Space
More common contact surfaces
Less frequent sanitation
More frequent and longer breaches of Physical Distancing
Less Mask Use

## Mask Use in Sport



- There is overwhelming evidence that inhalation of severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) represents a major transmission route for coronavirus disease 2019 (COVID-19).<sup>1</sup>
- Current evidence for the effectiveness of mask use at reducing transmission of COVID-19 is strong.<sup>2</sup>



- Prather, K.A., et al., Airborne transmission of SARS-CoV-2. Science, 2020. 370(6514): p. 303.
- Chu, D.K.; Akl, E.A.; Duda, S.; Solo, K.; Yaacoub, S.; Schünemann, H.J.; COVID-19 Systematic Urgent Review Group Effort (SURGE) Study Authors. Physical Distancing, Face Masks, and Eye Protection to Prevent Person-to-Person Transmission of SARS-CoV-2 and COVID-19: A Systematic Review and Meta-Analysis. Lancet 2020, 395, 1973–1987.

## Mask Use in Sport



- Research suggests that facemasks, including N95 respirators, surgical masks and cloth facemasks may increase dyspnea (shortness of breath), but have small and often difficult to detect effects on working breath, blood gases and other physiological parameters during physical activity, even with heavy/maximal exercise.<sup>1,2,3</sup>
- Not all masks are the same: CBC Marketplace report

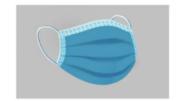
#### **Top performers**

3-laver masks

These consumer masks performed as well as the medical N95 masks at filtering particles.



White cotton with inner layer melt-blown non-woven polypropylene



Blue surgical-type

- Hopkins, S.R., et al., Facemasks and the Cardiorespiratory Response to Physical Activity in Health and Disease. Annals of the American Thoracic Society. 0(ja): p. null
- Shaw, K.; Butcher, S.; Ko, J.; Zello, G.A.; Chilibeck, P.D. Wearing of Cloth or Disposable Surgical Face Masks has no Effect on Vigorous Exercise Performance in Healthy Individuals. *Int. J. Environ. Res. Public Health* 2020, 17, 8110.
- Epstein, D, Korytny, A, Isenberg, Y, et al. Return to training in the COVID-19 era: The physiological effects of face masks during exercise. Scand. J. Med. Sci. Sports. 2020; 00: 1–6.

## **Keeping COVID off the Court**



- Perhaps the single most important step we can take is to ensure that participant behaviors are mitigating their chances of being exposed
  - Small and limited number of bubbles/cohorts. Sub-cohorts
- Continue to enforce the importance of symptom screening
  - Pauci-symptomatic individuals present a great risk of spread
- If in doubt, sit one out
  - While awaiting test results of close contacts

## **Returning from COVID**



- Increased of cardiac arrhythmias from myocarditis
  - One study found as high as 79% of COVID patients with myocarditis.<sup>1</sup>
  - A smaller study found 15% of college athletes had myocarditis.<sup>2</sup>
- Increased risk of blood clots.
  - 1 confirmed death in 20-year old university student.

Puntmann, V.O., et al., Outcomes of Cardiovascular Magnetic Resonance Imaging in Patients Recently Recovered From Coronavirus Disease 2019 (COVID-19). JAMA Cardiology, 2020. 5(11): p. 1265-1273.

Rajpal, S., et al., Cardiovascular Magnetic Resonance Findings in Competitive Athletes Recovering From COVID-19 Infection. JAMA Cardiology, 2020.

## Returning from COVID













GRTP GRADUATED RETURN TO PLAY PROTOCOL

news that

#### GRADUATED RETURN TO PLAY PROTOCOL UNDER MEDICAL SUPERVISION





LIGHT ACTIVITY



FREQUENCY OF TRAINING INCREASES



**DURATION OF** 

(80%)



INTENSITY OF

TRAINING INCREASES



**RESUME NORMAL** 

TRAINING PROGRESSIONS



# COMPETITION

IN SPORT SPECIFIC TIMELINES

9

RETURN



EXERCISE

ALLOWED

% HEART RATE MAX

DURATION



WALKING





€70%

0

<15 MINS

INCREASE HEART



(<80%

<30 MINS

INCREASE LOAD

ANAGE ANY POS

VIRAL FATIGUE **SYMPTOMS** 







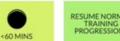
















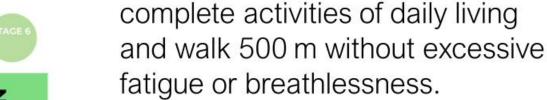












#### They should have at least 10 days' rest and be 7 days symptom-free Experience suggests that some athletes take over 3 weeks to recover

Before considering GRTP:

the athlete must be able to

**OBJECTIVE** 

MONITORING



10 DAYS



SUBJECTIVE



SUBJECTIVE

SUBJECTIVE SYMPTOMS, RESTING HR, I

EXERCISE, COORDINATION

AND SKILLS/TACTICS

SUBJECTIVE SYMPTOMS

RESTORE CONFIDENCE AND

ASSESS FUNCTIONAL SKILLS

RESTING HR.

https://bjsm.bmj.com/content/54/19/1174

## **UofA Experience with Mask Wearing**

#### 1. Mask Choice

- a) Updated guidelines 3 layers
- b) Types of masks

#### 2. Mask Hygiene

- a) Casual mask / training mask
- b) Wash training mask daily
  - "Do you have a clean mask" part of our screen
- a) "Wash" "Mask" "Wash"

#### 3. Mask activities

- a) Start with familiar drills
- b) Monitor exertion levels
- c) Gradually build while monitoring
- d) Replace drills of concern
- e) Coach mask use



#### 4. Regular Reminders

## **COVID Safety and Training**

#### 1. Culture of COVID

- a) Foster honest & proactive communication
- b) Absenteeism

#### 2. Protocols

#### 3. Physical Principles

a) Mask, Distancing, PPE, Cohort

#### 4. Team Orientation

#### 5. Monitoring for symptoms

- a) Pre Activity screen the final check
- b) Symptomatic Athlete
  - Defer to AHS Screen
- c) Keep a Log





## **Question & Answers**

Type questions in the chat

Address question to a specific person(s) if possible





## Thank You!