Infectious Disease Preparedness and Response Plan

During the 2023-2024 Academic Year

The policy and procedures outlined below provide the detailed steps the Grand Valley State University (GVSU) Simulation Center will take to reduce the risk of individual exposure to respiratory pathogens.

Event Scheduling

Unless mandated otherwise by the State of Michigan or the University, events scheduled in the Simulation Center will be scheduled in accordance with the room capacities determined by the Fire Marshall.

Prior to Arrival on Campus

Prior to arriving on the Health Campus for Simulation Center events, if an individual has any symptoms of illness, the individual should inform their professor or supervisor of the situation. If a student will not be able to attend a high-fidelity patient simulator or standardized patient event, faculty should notify the simulation team member responsible for the event of the student's absence, so that staff may make the necessary changes/adjustments to the event and/or recording schedule.

Ventilation Rates

Building ventilation rates on the GVSU Health Campus are based on occupancy. At a minimum they are set at seven (7) air exchanges per hour in classrooms and ten (10) air exchanges in labs. The air in the buildings on the GVSU Health Campus is not recirculated.

Event Personal Protection Equipment Procedures

The Centers for Disease Control and Prevention (2022) states preventive actions like face masks may be implemented as a strategy to limit exposure to respiratory pathogens. Current practice throughout most the region's healthcare facilities has made face masks optional. A goal of simulation in the education of healthcare professionals is for learners to practice real-world current patient care protocols. For this reason, the use of face masks is optional in all Simulation Center events on GVSU's Health Campus.

Three-ply procedure face masks will be available in every Simulation Center event setting. If utilized, the 3-ply procedure face masks should only be worn for the day of the event and must be thrown away after use. The 3-ply procedure face masks are not effective if they become saturated. If saturated, the 3-ply procedure face masks need to be replaced with a new one. Individuals may choose to wear an N95 face mask without the respiratory valve or KN95 face mask in place of a 3-ply procedural face mask. N95 face masks or KN95 face masks should not be used with any type of second mask on top or underneath (Brooks et al., 2021). For certain Communication Sciences and Disorder events, single use transparent face masks will be made available for optional use.

For events requiring close contact, in addition to choosing to use a 3-ply procedure or transparent face mask, students, and faculty may request from the Simulation Central storage area in the Cook DeVos Center for Health Sciences, CHS 343 or the Raleigh Finkelstein Hall, RFH 021 a face shield or goggles, based on their preference. The face shields and goggles will have to be cleaned and reused throughout the remainder of the semester. Individuals will be responsible for cleaning their face shields/goggles and bringing them to subsequent events. Cleaning solutions will be available throughout the Simulation Center staff allowing for face shields/goggles to be cleaned with disinfecting products prior to individuals leaving the event setting. Individuals using these cleaning products are required to use gloves while cleaning and to wash their hands or use hand sanitizer afterwards.

Hand Hygiene

Handwashing or the use of hand sanitizer is required before and after close contact with individuals. Gloves are not required for those circumstances where touching another individual is required for physical exam. However, if an individual being examined asks that the examiner put gloves on, that request must be honored.

Exam gloves will be available in every Simulation Center event setting.

Gowns

The use of patient gowns is permitted. All used cloth patient gowns will need to be placed in a laundry hamper when finished. Used paper gowns will need to be placed in the trash.

Laptops and Headphones

Students and faculty should try to limit bringing any non-essential items into Simulation Center, i.e. coats, bags, etc. These items can be stored in lockers, if available, throughout the buildings. Students may bring their own laptops into Simulation Center events. Many simulation events require students to observe one another using designated GVSU computers. Students may bring their own headphones to use in the Simulation Center with the GVSU computers. The computers in the Simulation Center do not have Bluetooth capabilities. For students that chose to use the headphones provided by the Simulation Center, after use, the students will be responsible for disinfecting the headphones with the provided cleaning solution.

Paper and Linen

The transmission of respiratory pathogens from touching paper or linen is minimal (Ren, et. al, 2020). In fact, absorbent materials like cotton are safer than non-absorptive materials like isolation gowns (Ren et. al, 2020). All used linens will need to be placed in a laundry hamper when finished.

Food and Drinks

Students may eat in designated areas within the buildings on the Health Campus or in outside spaces. No food or drinks will be allowed in the Simulation Center except for labs where food preparation or food for functional physical evaluations and treatment are part of the course objectives.

Cleaning and Disinfection

During the academic year, campus custodial services will take care of the floors and trash within the GVSU Simulation Center spaces, but it is everyone’s responsibility to clean shared surfaces that are dirtied after individual use. GVSU Facilities Services will supply disinfection solutions which will be available throughout the Simulation Center.

Simulation Center staff will be responsible for cleaning all surface tops and equipment frequently used during Simulation Center laboratory events. Cleaning towels will be provided throughout the Simulation Center along with posted directions on how to properly use the cleaning solutions and what cleaning products are safe for specific equipment (see Appendix A). Individuals must wear gloves when using cleaning solutions and wash their hands or use hand sanitizer afterwards. Cleaning towels, once used for cleaning must be placed in the laundry hampers available throughout the Simulation Center. The cleaning towels will be washed by a University contracted service that meets OSHA healthcare standards.

Continuous evaluation of cleaning and sanitation best practices will be monitored by the Simulation Center staff and changes made to cleaning procedures will be updated as needed.

Standardized Patient Events

Wearing a face mask is optional for standardized patients. Three-ply disposable procedure face masks will be provided for use. If they chose, standardized patients may wear an N95 face mask without the respiratory valve or KN95 face mask in place of a 3-ply procedure face mask.

Physical contact for practicing head, eyes, ears, nose & throat (HEENT) physical exams on standardized patients may be performed, if related to the learning objectives of the event.

In-between student encounters, standardized patients will be required to clean surface areas they or the students examining them come in contact with.

High Fidelity Manikin Events

Simulation Center staff members will be responsible for cleaning any surfaces students come in contact with during high fidelity manikin events, including the manikins.

Student or Faculty Led Practice Events

Student or faculty led practice events are allowable when Simulation Center spaces are not in use for scheduled course events. However, the procedures outlined above must be followed.

Post Events

In order to accommodate subsequent Simulation Center events, students and faculty will be asked to leave the Simulation Center after the conclusion of the event's designated timeframe.

Checking-out Materials

Students and faculty may continue to check out equipment from the GVSU Simulation Center. All equipment returned will be subject (when applicable) to cleaning with specific disinfectant solutions. According to a recent study conducted by the REALM Project team (2020), a trace amount of COVID-19 was found on paper products after four (4) days of isolation. Paper items such as physical assessments may also continue to be checked out of the GVSU Simulation Center at everyone's own risk.

References

Brooks, J. T., Beezhold, D. H., Noti, J. D., Coyle, J. P., Derk, R. C., Blachere, F. M., & Lindsley, W. G., (2021). Maximizing fit for cloth and medical procedure masks to improve performance and reduce SARS-CoV-2 Transmission and Exposure, 2021. *Morbidity and Mortality Weekly Report, 70*(7), 254-257. https://www.cdc.gov/mmwr/volumes/70/wr/pdfs/mm7007e1-H.pdf

Centers for Disease Control and Prevention. (2022, August 17). How to Protect Yourself and Others. https://www.cdc.gov/coronavirus/2019-ncov/prevent-getting-sick/prevention.html

REALM Project (2020). Reopening Archives, Libraries and Museums report: *Natural attenuation as a decontamination approach for SARS-CoV-2 on five paper-based library and archives materials.* https://www.webjunction.org/news/webjunction/test2-results.html

Ren, S., Wang, W., Hao, Y., Zhang, H., Wang, Z., Chen, Y., Gao, R., (2020). Stability and infectivity of coronaviruses in inanimate environments. *World Journal of Clinical Cases* 8(8), 1391-1399. https://www.ncbi.nlm.nih.gov/pmc/articles/PMC7190947/pdf/WJCC-8-1391.pdf

Appendix A

Cleaning Solution, Contact Time, Directions, and Approved Use

I. Product: 70% Isopropyl Alcohol/30% Distilled Water Spray

Required Contact Time: Five (5) minutes

Directions:

1. Put on disposable exam gloves.
2. Pre-Clean shield or surfaces of all visible debris with soap and water.
3. Spray Alcohol solution on shield or surfaces. (*Do NOT use on any electronic surfaces not included in the list of approved electronic surfaces below.)*
4. Keep surface wet for five (5) minutes.
5. Let air dry or wipe surface clean with paper towel after five (5) minutes.
6. Remove and discard disposable gloves & thoroughly wash hands with soap and water.

Approved for:

Face shields/goggles
All manikins
Injection pads
All task trainer models
IV lines
Foley catheters
Chest tubes
Blood pressure cuffs
Thermometers
Pulse oximeters
Demo-dose medication vials
Herman Miller cabinet equipment
Bedrails
Hospital bed control buttons
Laptop external surfaces
Soft sling-backs of wheelchairs
Light switches
Chairs
Tables
Door Knobs
Sinks
Keyboard Covers
Computer mice
VR equipment
Monitors
Headphones
Phones
Walkie-talkies

II. Product: Husky 814 Q/T Tuberculocidal spray

Required Contact Time: One (1) minute

Directions:

1. Put on disposable exam gloves.
2. Pre-Clean surface first by removing visible dirt or debris with soap and water.
3. Spray HUSKY solution on hard, non-porous surfaces. (*Do NOT use on any electronic surfaces).*
4. Surfaces must remain wet for **one (1) minute**.
5. Wipe surface clean after **one (1) minute**.
6. Remove and discard disposable gloves & thoroughly wash hands with soap and water.

Approved for:

Hard, non-porous surfaces
Tables
Non-porous surfaces of wheelchairs
Mat tables
Plinth/Exam tables
Overbed tables
Bedside tables
Exercise equipment
Chairs
Rolling stools
Door knobs
Light switchers

III. Product: Protex Disinfectant Spray

Required Contact Time: One (1) minute

Directions:
1. Put on disposable exam gloves
2. Pre-clean surface first by removing visible dirt or debris with spray and wiping clean, or, *if safe for the equipment,* use soap and water.
3. Spray 6-8" from surface, until surface is thoroughly wet. (*Do NOT us on any electronic surface).*
4. Surfaces must remain wet for **one (1) minute**.
5. Allow surface to Air Dry or Wipe surface clean after **one (1) minute**.
6. Remove and discard disposable gloves & thoroughly wash hands with soap and water.

Approved for:
Hard, non-porous surfaces

Exercise equipment

Ultrasound transducers and probes.

IV. Product: PDI Super Sani Cloth Disposable Wipes

Required Contact Time: One (1) minute

Directions:
1. Put on disposable exam gloves
2. Pre-Clean surface first by removing visible dirt or debris with soap and water or an additional PDI Super Sani Cloth.
3. Wipe entire surface thoroughly with wipe(s).
4. Surfaces must remain wet for **one (1) minute**.
5. Allow surface to Air Dry or Wipe surface clean after the **one (1) minute**.
6. Dispose of wipes in the trash. Then remove and discard disposable gloves & thoroughly wash hands with soap and water.

Approved for:
Hard, non-porous surfaces with relatively small amounts of surface area and Butterfly probes. Use other disinfectants, when possible, as the supply of these wipes is very limited.

V. Product: Bissell Sanitize Spray and Clorox Hydrogen Peroxide Cleaner Disinfectant

Required Contact Time: One (1) minute

Directions:
1. Put on disposable exam gloves
2. Pre-clean surface first by removing visible dirt or debris with spray and wiping clean, or, *if safe for the equipment*, use soap and water.
3. Spray 6-8" from surface, until surface is thoroughly wet. Do NOT spray directly on any electronic surfaces.
4. Surfaces must remain wet for one (1) minute.
5. Allow surface to Air Dry or Wipe surface clean after the one (1) minute.
6. Remove and discard disposable gloves & thoroughly wash hands with soap and water.

Approved for:

Hard, non-porous surfaces

Exercise equipment