MUSIC CLASS & PERFORMANCE: IN A COVID-19 ENVIRONMENT

Background information

With the advent of the re-commencement of school in the COVID-19 environment, several questions are being raised with reference to safety measures for students, teachers and parents. More specifically the field of music education and performance attracts several concerns as it relates to the delivery of music lessons for instrumental performance and singing. Instruments vary in nature and as such the risks associated in this unusual circumstance vary as well.

The release of aerosols would be one of the major concerns as it relates to instrumental learning. The transmission path via aerosols has become increasingly significantin recent weeks (Morawska & Cao 2020; Miller et al. 2020;Morawska &Milton 2020).

It does not seem that aerosols escape directly from the mouth when playing wind instruments, except for the flute. Aerosols enter the environment via the body of the instrument and through open keys and/or the bell. Studies suggest that a tightly woven covering over the bell of wind instruments could reduce the risk of entry of aerosols into the environment. Further consideration must be given on the recepient side where an understanding of the extent to which virus loaded aerosols are inhaled due to deep and rapid inhalations when playing wind instruments. The extent of the invasion of the respiratory system is unknown to this point.

AEROSOL TRANSMISSION PATHWAYS

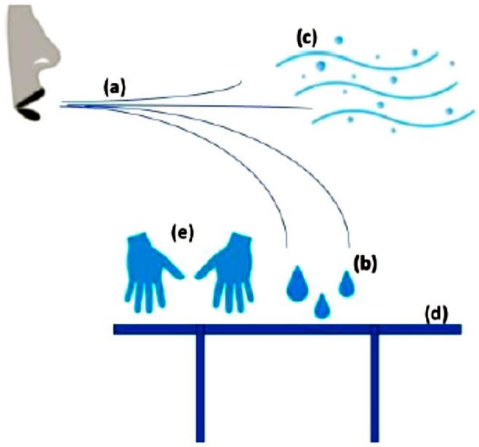
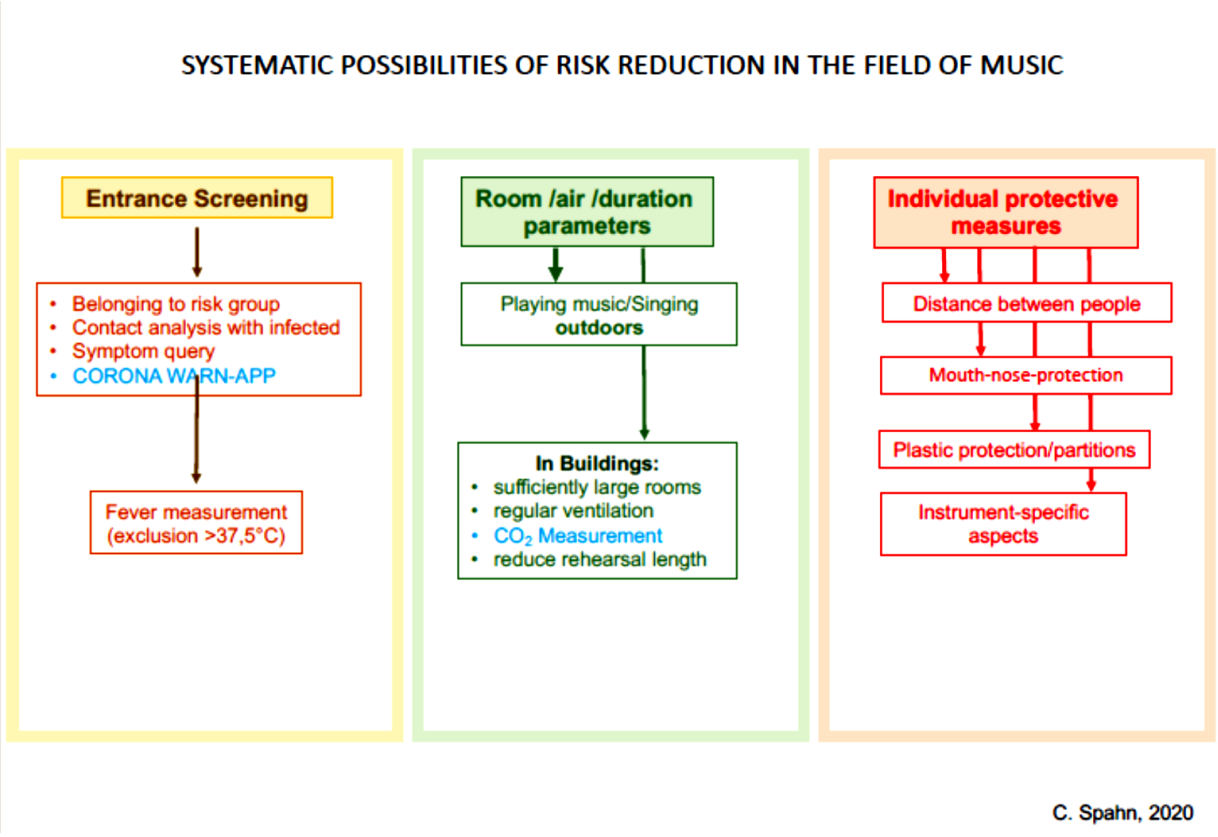


Fig. 1: Schematic representation of the possible transmission pathways. With exhaled air (a), droplets (b) and aerosols (c) are released into the environment. The droplets can land on surfaces, e.g., a table (d). From there they can be picked up by hands (e). If the hands then come into contact with the mouth, nose, or eye, a contact transmission (smear infection) can occur.

REDUCING THE RISK



Suggested safety guidelines for face-to-face music instruction and instrumental performance

(The following general safety guidelines are suggested for all music educators and are based on the standards set by the National Association For Music Educators- *USA*)

Guidance for classroom preparation, instrumental, vocal and Personal Hygiene:

- Training and proper personal protective equipment (PPE) must be provided to those who are responsible for cleaning.
- Appropriate cleaners per the recommended guidelines from the research, and based on the total number of students
- Instruments should not be shared. However, if shared, cleaning should occur between each use.
- Percussion students **must not** share mallets without properly disinfecting them--or students can wear gloves.
- Wind instrument students should have masks with slits at the mouth to fit mouthpieces for playing their instruments only. At all other times when not playing, the students should wear a well-fitted mask that covers nose and mouth.
- Choral students should have their own well-fitted masks which allow for proper vowel formation while keeping the mouth and nose covered.
- When using recorders, each student must have their own instrument. Recorders must not be kept in a common storage area in the classroom.
- Bell covers should be used for recorders, wind and brass instruments.
- General music teachers should consider providing each student with a personal music kit that includes common classroom instruments (rhythm sticks, mallets, etc.)
- Appropriate air exchange (ACH) for the music rehearsal and classrooms, with at least 3 ACH's per hour minimum.

Guidance for music ensemble classroom:

- Measure classrooms to determine the best setup for each class to adhere to social distancing requirements. Straight rows in all music classrooms will allow for more space between students than the traditional arch shape.
- Suggested 6X6 feet for all music students; 9X6 feet for trombone players.
- Consider use of larger facilities as available, and measure and pre-set these spaces as well.

- Create a template of the desired length that will meet Ministry of Health, and national guidelines for social distancing, and mark spaces on your floor where chairs and stands will be placed.
- Create a procedure for students entering and exiting the classroom and accessing materials such as instruments, sheet music, and stands. Proper planning can help reduce person to person contact and follow the recommended social distancing guidelines.
- Students **must not** share music stands.
- Students **must not** share sheet music. Additional sheet music may need to be purchased to ensure all students have their own copies.

Guidance for school performances:

- If school performances are permitted, they may be streamed online without live audiences.
- Student performers should adhere to instrument and vocal hygiene and social distancing protocols, as directed by local and state health departments.

Guidance for student hydration:

- Water bottles **must not** be shared. Students shall bring their own water bottle.
- Hydration stations (water fountains, etc.) should not be utilized.

Beginner Instrumental Demonstration and Fittings:

Here are suggested ways in which in-person demonstration and fitting can occur, if these fall within the suggested health and safety guidelines of the Ministry of Health:

- Provide detailed information to parents about any potential restrictions regarding entry and participation during instrument demonstrations.
- Host an online pre-screening for students to confirm interest prior to in-person instrument trials.
- Post signage prominently indicating no one should attend or participate if they currently have symptoms or have been in contact with anyone with a confirmed COVID-19 diagnosis in the last 14 days.
- Be prepared to work appropriately with students who have pre-existing health conditions and work with school nurses or other health officials to take additional precautions as needed.
- Suggest masks for all participating in the instrument demonstration. If possible, provide masks with slits for the students trying out instruments.
- When possible, conduct instrument demonstration and fitting outdoors.

- If outdoors is not possible, schedule instrument fittings using 30-60 min sessions with up to 12 students per 60-minute session (one every 5 minutes) per classroom. If possible open windows and use fans to circulate the air.
- If parents and guardians are allowed into the school building and/or the outdoor demonstration area, designate a taped off area 10 feet away from any fitting station for parents to sit and observe the instrument demonstration and fitting. Once the session is concluded the student should walk to the parents' seating area and both the parents and child should vacate the area together.
- No more than 2 seats should be available per student for parents, guardians, and siblings, and these seats must also be properly distanced. In some cases, the students' family may have to wait outside the school building. This expectation should be communicated in advance.
- Clean and sanitize instruments/mouthpieces properly between each student.
- Consider the use of wind instrument trial kits rather than actual instruments when conducting instrument demonstrations and fitting for potential band members. After each instrument fitting, the student should then place the mouthpiece in a tub of hot soapy water. A volunteer should take the mouthpiece out of the water, dry and then spray with a 70% isopropyl alcohol disinfectant and allow to air dry.
- Ensure social distancing is maintained between students as much as possible. This means that students must be separated by at least 6 feet in any small group setting. Teachers should wear a mask if they need to approach the student within that 6-foot setting to facilitate the demonstration.
- Provide hand sanitizer on site. Students and teachers should use hand sanitizer before and after each instrument fitting and/or demonstration. Encourage students to provide their own hand sanitizer to help get into the practice of bringing sanitizer to class.
- Pre-fit all instruments with bell covers lined with MERV 13 filter material prior to beginning instrument demonstrations.

Scheduling considerations for face-to-face or mixed model music instruction:

Music educators' teaching schedules may need modifications due to the impacts of COVID - 19. If this is the case, music teachers should share ideas now that administrators can use to adapt schedules to maintain student safety and support music teaching and learning. Music educators should initiate conversations to:

1) Provide multiple solutions for administrators to consider and be sure to include zero-budget options;
2) Look for ways to maintain in-person learning opportunities for students that include virtual and in-person class structures;
3) Prioritize in-person experiences for students who are in the critical stages of building fundamental skills (Practical Graded examinations)

Additional considerations are provided below:

- If schools stagger student access to buildings (shift system), music educators will need to be prepared to teach both in-person and via distance learning.
- Music educators may need to be prepared, to teach "music on a cart", bringing music education into classrooms to limit student movement throughout the building. It is suggested that music educators have access to a working cart, instruments, technology, portable sound system, small classroom instruments and are provided with sufficient time to travel between classrooms. Cleaning of materials (rhythm sticks, mallets, etc.) may need to be factored into travel time.
- Music educators will need to work with their administration and other leadership to devise cleaning protocols and cleaning schedules between each set of music students using the room.

References

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