Aerosol-generating procedures: Applies to all patients during the COVID19 pandemic

General Guidance

- Limit aerosol-generating procedures as much as possible
- Aerosol-generating procedures may occur in a regular patient/exam room
- Follow guidance below for room closure after procedure. The space in which the procedure is performed is contaminated with particles in the air until air exchanges have occurred*
- See guidance below on requirement for respiratory protection (i.e. N95 respirator, PAPR, CAPR)

**HIGHEST RISK** of generating aerosols

N95 + eye protection/PAPR always required during procedure and for duration of room closure* after procedure performed

- Sputum induction
- Endotracheal intubation and extubation
- Bronchoscopy
- Bag mask ventilation
- CPR (Cardiopulmonary resuscitation)
- Any open tracheal suctioning (e.g. nasal, oral, stoma) which could generate a strong cough
- Airway procedures (e.g. nasopharyngeal endoscopy, surgical airway, tracheostomy)
- Esophageal procedures (e.g. Upper GI endoscopy, TEE) in a non-intubated patient

Medium Risk of aerosol generation

Does not require N95/PAPR or room closure if there is NO clinical suspicion (e.g. fever/new respiratory deterioration) of COVID 19 AND a negative COVID test in the prior 3 days

- Insertion of a gastric tube (e.g. NG, OG) which could generate a strong cough
- Nebulizer treatment which could generate a strong cough
- High flow oxygen delivered via OptiFlow, VapoTherm
- Positive airway pressure therapy (e.g. BPAP, CPAP) when a viral filter is in place
- Dysphagia evaluation
- Esophageal procedures (e.g. Upper GI endoscopy, TEE) in an intubated patient
Lowest risk of generating aerosols
N95/PAPR and room closure NOT recommended

- Low flow nasal cannula (<6L/min) or closed face mask (CFM) oxygen
- Closed circuit mechanical ventilation with no disconnection or breaking of circuit
- Brief (less than 1 minute) mechanical ventilator circuit interruption
- Physiologic (non-induced) coughing
- Nasopharyngeal swab collection
- Closed tracheal suctioning
- Thoracentesis and paracentesis
- CT guided needle biopsies (e.g. lung biopsies)

For questions, contact Critical Care in your region.

The NICU/Neonatal practice is excluded from these guidelines. For Neonatal guidance please see "Neonatal Action Plan"

* Room closure after an aerosol-generating procedure that required an N95/PAPR:

If your area knows it's air changes per hour (ACH), close the room for the time (mins.) required for removal at 99.9% efficiency, based on this table. If ACH not known use the general guidance below:

- Up to 2 hours for standard patient, exam, and procedure rooms
- Up to 1 hour for negative air rooms
- Door should remain closed and staff wear N95/PAPR if in room