Tracheotomy Guidelines
Prolonged Respiratory Failure

COVID-19 Related

Candidates for Ventilator Wean with failed extubation attempts

Perform COVID-19 Testing

Positive (+)
- Only proceed if deemed mandatory*; Utilize FULL PPE Precautions
- Double Negative (-)
  - Proceed utilizing Universal Precautions

Negative (-)
- Follow Guidelines for COVID-19 related prolonged respiratory failure

Positive (+)
- Delay Trach One (1) Week and reassess
- Consider Tracheotomy at 3 weeks post-intubation**

Non COVID-19 Related

Anticipated Continued Mechanical Ventilation

Perform COVID-19 Testing

Positive (+)
- Balance Need for Proceeding (ICU Room, ventilator vs. PPE required)
- Follow Guidelines for COVID-19 related prolonged respiratory failure

Negative (-)
- Proceed utilizing Universal Precautions

Double Negative (-)
- Delay Trach One (1) Week and reassess

**No need for routine trach at 7-10 days after intubation

*Attending to Attending Discussion Required

**No need for routine trach at 7-10 days after intubation
Non COVID-19
Tracheotomy Guidelines

Emergently Secure the Airway

Utilize Full PPE if COVID-19 Status Unknown, PUI, or Positive (+)

Routine intra-operative management (e.g. cancer cases)

Preoperative COVID-19 Testing

Positive (+)  Consider Delay

Delay? Universal Precautions when two Negative (-) Results

Proceeding? Utilize Full PPE

Negative (-) Proceed utilizing Universal Precautions
UAB Guidelines for Tracheotomy during the COVID 19 pandemic

The chronic respiratory failure associated with COVID 19 is expected to result in a large number of patients requiring chronic ventilator support who may be candidates for tracheotomy. National and international experience with COVID 19 and the previous SARS epidemic has shown high rates of hospital wide viral spread and infection of health care workers with aerosol generating procedures, particularly procedures involving the airway.

The purpose of this document is to provide consensus guidelines for tracheotomy at UAB during the pandemic. These guidelines were drafted by representatives of Medical and Surgical Critical Care, Anesthesia, ACS and ENT

Priorities for guidelines
  1. Optimal patient care
  2. Safety of medical staff
  3. Maintaining resources (ICU beds, ventilators, PPE)

Indications for tracheotomy:
  1. To emergently secure the airway
    a. When less invasive methods are not effective (Trauma, obstructing laryngeal tumor, acute inflammation / infection)
  2. As routine part of intra-operative management (eg cancer cases)
    a. Testing for COVID 19 strongly recommended pre-op. If (+), consider delay.
  3. For prolonged respiratory failure (COVID related)
    a. For patients with respiratory parameters suggesting successful vent wean but who have failed extubation attempts, trach should be considered:
      i. COVID testing double negative: (nasal and tracheal aspirate -)
         1. proceed with universal precautions
      ii. COVID status (+) or unknown, proceed only if mandatory and with full PPE
         1. Attending to Attending discussion needed
    b. For patients with anticipated continued mechanical ventilation:
      i. Consider trach at 3 weeks post intubation
      ii. Proceed with trach if doubly COVID (-)
      iii. Delay trach additional week and reassess if COVID (+)
      iv. No need for routine trach at 7-10 days after intubation
  4. For prolonged respiratory failure (non COVID related)
    a. Balance need for resources (ICU room, ventilator vs PPE required for procedure)
    b. Negative COVID testing prior to proceeding

Who should perform tracheotomy
  1. Most capable provider available
  2. Minimize number of medical staff involved
**Where should tracheotomy be performed**
1. In ICU if feasible
2. Negative pressure room, or HEPA filtered

**What is appropriate PPE? (OR desk or ICU to make available for all participants)**
If COVID (+) or unknown:
   - N95 mask, full face shield, gown gloves for all in attendance
   - PAPR or ortho Stryker suit if available
   - Full PPE for postop nursing care
If proven COVID (-):
   - universal precautions

**Post op care of tracheotomy**
1. For COVID (+) patients or COVID unknown:
   a. Enhanced droplet precautions as is standard for all COVID patients (N95, face mask, gown, gloves)
   b. Cuff inflated
   c. Closed system suctioning
   d. Delay first tracheotomy change to 3-4 weeks
   e. Minimize opening of closed ventilatory circuit
2. For COVID (-) patients
   a. PPE for all tracheostomy care should include surgical mask, face shield, gown, gloves
   b. Patient location and timing of trach change as per usual
References:


See Also:
American College of Surgeons:
Guidance for Surgical Tracheostomy and Tracheostomy Tube Change during the COVID-19 Pandemic

American Academy of Otolaryngology:
Tracheotomy Recommendations During the COVID-19 Pandemic (3-27-20)