

Possible Displaced / Blocked Tracheostomy?

Signs of a potential tracheostomy problem:

1. Change in ETCO₂ trace
2. Hypoxia, CVS instability, failure to achieve set pressure/ventilation
3. Patient talking despite tracheostomy cuff inflated
4. Audible cuff leak despite appropriate cuff pressures (22-28 cmH₂O)

**Call for help—bed space alarm and call Dr's (bleep 1113/1480 initially)
100% Oxygen via face mask and tracheostomy
Check the capnograph (ETCO₂) – If not on; put it on via HME filter
Call for difficult airway trolley**

Attach Water's Circuit / Ambubag to tracheostomy (with capnograph)

**WILL A SUCTION CATHETER PASS?
MAXIMUM 2 CAREFUL MANUAL VENTILATIONS
Allow 5s for capnograph trace to appear**
Is there a good capnograph trace and is ventilation easy?

YES

**Other cause likely-
Consider**

- Pneumothorax
- Bronchospasm
- Equipment failure

Assess breathing and circulation.
ALS algorithms if necessary

**SURGICAL EMPHYSEMA/SWELLING IN NECK?
If so, extreme caution with further ventilation**

NO

YES

PROBLEM WITH TRACHEOSTOMY TUBE

- **BLOCKED?** Replace inner tube
- **HERNIATED CUFF?** Deflate and reinflate cuff
- **DISPLACED?** Bronchoscopy if time and skill allow

**DEFLATE CUFF; VENTILATE VIA FACE MASK with
TRACHEOSTOMY TUBE COVERED OR CAPPED
CALL FOR MORE HELP—
Bleep 1220, THEATRE ODP and/or MAX-FAC**

If in
doubt
and pt
stable

**Single attempt at
bronchoscopy via
tracheostomy (senior
help):**

- Look for tracheal rings and trachea
- Consider advancing/reinsertion of tracheostomy over bronchoscope (extreme care if tracheostomy <7 days old)

If still problematic

- Contact maxillo-facial surgeons
- Consider RSI and oral reintubation

If tracheostomy definitely displaced or if patient deteriorating and unable to ventilate

REMOVE TRACHEOSTOMY TUBE

- Cover tracheostomy site
- Ventilate using face mask and 100% oxygen
- Consider LMA

REINTUBATE ORALLY when personnel available

If successful reintubation doesn't allow easy ventilation consider:

- Tracheal obstruction – secretions, blood, foreign body, bronchoscopy +/- lavage
- Tracheal false passage – Maxillo-facial surgeons +/- reintubation with manual guidance
- Pneumothorax – bilateral thoracostomies if in doubt