TACTICAL COMBAT CASUALTY CARE ALGORITHM

TACTICAL FIELD CARE CONTINUED

In accordance with
CoTCCC Guidelines
As Of: 01 AUG 2018

TENSION PNEUMOTHORAX INDICATORS:
Significant Torso Trauma or Primary Blast Injury and one or more of the following:
- Severe or progressive respiratory distress
- Severe or progressive tachypnea
- Absent or markedly decreased breath sounds on one side of chest
- Hemoglobin oxygen saturation <90% on pulse oximetry
- Shock
- Traumatic cardiac arrest without obviously fatal wounds*

* If not treated promptly, tension pneumothorax may progress from respiratory distress to shock and traumatic cardiac arrest.

Decompression Needle:
14-gauge or 10-gauge, 3.25 inch needle/ catheter unit

Anatomical Sites:
5th Intercostal Space / Anterior Axillary Line (AAL)

2nd Intercostal Space/Midclavicular line (MCL)

Successful NDC Considerations:
- Improvement in respiratory distress
- Obvious hissing or air escaping when NDC is performed (difficult to assess in noisy environments)
- increased SpO2 to at least >90%
- If casualty had no vital signs - return of consciousness and/or radial pulse

Finger Thoracostomy / Chest Tube:
Insert at 5th Intercostal Space / Anterior Axillary Line (AAL)

If Finger Thoracostomy used, note that it may not remain patent and finger decompression through incision may have to be repeated.

RESPIRATION / BREATHING

Assess Respiration / Breathing

Tension Pneumothorax Suspected?
- NO → Open/Sucking Chest Wound?
- YES

If chest seal in place, burp or remove.
Initiate Pulse Oximetry Monitoring.
Place in supine or recovery position.
If conscious, allow positioning to keep airway open

Needle Decompress Chest on injured side. Hold Needle in place for 5-10 seconds, remove needle and leave catheter in place.

Based on MOI and exam, consider NDC on the opposite side of chest if bilateral tension pneumothoraces suspected.

Needle Decompression Successful?
- YES
- NO

Perform second NDC on same side of chest at whichever site was not previously used.

Needle Decompression Successful?
- YES
- NO

CONTINUE TACTICAL FIELD CARE TO CIRCULATION

Continue on to Circulation Assessment as untreated hemorrhage or shock may be the problem. Re-assess for tension pneumothorax if not responding to fluid resuscitation.

Open/Sucking Chest Wound?
- NO
- YES

Apply Vented Chest Seal to all open/ sucking chest wounds

Vented chest seals are preferred over non-vented.

MONITOR FOR TENSION PNEUMOTHORAX

Tension Pneumothorax Suspected?
- NO
- YES

Burp or remove chest seal (if applied). Repeat as necessary.

Chest Seal Burp Successful?
- NO
- YES

If moderate or severe TBI is suspected, provide supplemental O2 if available to maintain SpO2>90%

Reassess and Monitor for Tension Pneumothorax

After assessing circulation/shock, perform repeated NDC as indicated by MOI and exam.

If NDC attempts unsuccessful, consider finger thoracostomy or chest tube insertion for a casualty in refractory shock or traumatic cardiac arrest

CONTINUE TACTICAL FIELD CARE

Indicates All Combatants and Combat Lifesaver capability level skill

Indicates Combat Medic capability level skill

Indicates Combat Paramedic or SOF Medic capability level skill