



**Non-Traumatic Pulseless Arrest**

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Approval: John Poland – Executive Director

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**MANUAL CHEST COMPRESSIONS**

**MECHANICAL CHEST COMPRESSION DEVICES**

- Rate: 100-120/min
- Depth: 2 inches – allow full chest recoil
- Minimize interruptions (≤10 secs)
- Rotate compressors every 2 mins
- Perform CPR during AED/defibrillator charging
- Resume CPR immediately after shock

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| <p><b>Indications</b></p> <ul style="list-style-type: none"> <li>• Adult pt (≥15 yo)</li> </ul> <p>① Use in accordance with manufacturer indications/contraindications</p> <p>① Apply following completion of at least one manual CPR cycle, or at the end of a subsequent cycle</p> | <p><b>Contraindications</b></p> <ul style="list-style-type: none"> <li>• Pt does not fit in the device</li> <li>• 3<sup>rd</sup> trimester pregnancy</li> </ul> |
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**DEFIBRILLATION & GENERAL PT MANAGEMENT**

**ADVANCED AIRWAY MANAGEMENT**

- Analyze rhythm/check pulse after every 2 min CPR cycle
- Biphasic manual defibrillation detail (**AEMT II**):
  - Follow manufacturer recommendations
  - If unknown, start at 200 J (subsequent doses should be equivalent or higher)
- Movement of pt may interrupt CPR or prevent adequate depth and rate of compressions
- Consider resuscitation on scene up to 20 mins
- Go to ROSC protocol (C-2) if ROSC is obtained

- Consider/establish advanced airway at appropriate time during resuscitation
- Do not interrupt chest compressions to establish an advanced airway
- Waveform capnography (if available) shall be used on all pts with an advanced airway in place
  - An abrupt increase in PETCO<sub>2</sub> is indicative of ROSC
  - Persistently low PETCO<sub>2</sub> levels (<10 mmHG) suggest ROSC is unlikely

**TREAT REVERSIBLE CAUSES**

**TERMINATION OF RESUSCITATION**

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| <ul style="list-style-type: none"> <li>• Hypovolemia</li> <li>• Hypoxia</li> <li>• Hydrogen Ion (acidosis)</li> <li>• Hypo-/hyperkalemia</li> <li>• Hypothermia</li> </ul> | <ul style="list-style-type: none"> <li>• Tamponade, cardiac</li> <li>• Tension pneumothorax</li> <li>• Thrombosis, pulmonary</li> <li>• Thrombosis, cardiac</li> <li>• Toxins</li> </ul> |
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- ① Refer to Hypothermia & Avalanche/Snow Immersion Suffocation Resuscitation Protocol (E-2 - LALS) or Traumatic Pulseless Arrest Protocol (T-6 – LALS) as appropriate
- ① Contact the base/modified base hospital for consultation & orders as appropriate
- ① Consider early transport of pts who have reversible causes that cannot be adequately treated in the prehospital setting

**Base/Modified Base Hospital Physician Order\*\***

- If resuscitation attempts do not obtain ROSC, consider termination of resuscitation efforts
- BLS termination of resuscitation criteria (all):
  - (1) Arrest not witnessed by EMS
  - (2) No AED shocks delivered
  - (3) No ROSC after 3 rounds of CPR/AED analysis
- LALS Termination of Resuscitation Criteria (all):
  - (1) Arrest not witnessed by EMS
  - (2) No effective bystander CPR was provided, or effective CPR cannot be maintained
  - (3) No AED shocks or defibrillations delivered
  - (4) No ROSC after full ALS care

\*\*In the event of communication failure, EMS personnel may terminate resuscitation without a base/modified base hospital physician order on a pt who meets LALS termination of resuscitation criteria.

**SEE PAGE 2 FOR TREATMENT ALGORITHM**



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