

# POST CARDIAC ARREST RETURN OF SPONTANEOUS CIRCULATION (ROSC)

UPDATED 12/2024

## ALL PROVIDERS / EMT

- Treatment Plan
  - Focused history and physical exam
    - Blood glucose assessment.
    - Continuous ECG, ETCO<sub>2</sub>, and pulse oximetry monitoring.
  - Assist ventilations to maintain ETCO<sub>2</sub> 35-45mmHg.
  - Document blood pressure and acquire 12 lead EKG immediately after establishing ROSC.
  - Prepare for transport while maintaining monitoring and re-checking for pulse periodically.
  - Acquire and transmit post-ROSC 12 lead EKG as well as a second 12 lead EKG 10 minutes post-ROSC.
  - Consider placing mechanical CPR device for transport, if available, in case of re-arrest.
  - Consider fluid resuscitation up to 1L NS/LR for target MAP >65 and/or SBP 90
    - Pediatric lowest acceptable systolic blood pressures are:
      - Birth to 1 month = 60mmHg
      - 1 month to 1 year = 70mmHg
      - 1 year to 10 years is = 70mmHg + (age x 2)
      - Over 10 years = 90mmHg
  - Emergent transport to a STEMI/PCI receiving center.

## ADULT

## PEDIATRIC

Pediatric dose should NOT EXCEED adult dose

### AEMT

- Supraglottic airway, vascular access and fluid therapy.
- Administer crystalloid to achieve a goal of SBP of 90 mmHg or MAP of 65.

### AEMT

- Supraglottic airway, vascular access and fluid therapy.
- Administer crystalloid to achieve a goal of SBP appropriate for age listed above.

### PARAMEDIC

- Epinephrine drip - 2-10mcg/min IV/IO. Titrate to maintain SBP of 90mmHg or MAP of 65.
- Push Dose Epinephrine – 10mcg as needed to maintain SBP 90mmHg or MAP of 65
- Norepinephrine – 0.1-0.5mcg/kg/min IV/IO infusion. Titrate up to 30mcg/min to maintain SBP 90mmHg or MAP of 65
- For patients with an advanced airway already in place and the return of a gag reflex with:
  - ET intubated PTs
    - Fentanyl – 50-100mcg IV/IO
  - AND
  - Midazolam – 2.5mg IV/IO
  - Supraglottic airway PTs
    - Fentanyl – 50mcg IV/IO

### PARAMEDIC

- Epinephrine drip - 0.1-1 mcg/kg/min IV/IO. Titrate to maintain an appropriate SBP as indicated above
- Push Dose Epinephrine – 0.1-1mcg/kg/min Titrate to maintain appropriate SBP as indicated above
- Norepinephrine – 0.05-2mcg/kg/min IV/IO infusion. Titrate to maintain appropriate SBP
- For patients with an advanced airway already in place and return of a gag reflex with:
  - ET intubated PTs
    - Fentanyl – 1mcg/kg IV/IO
  - AND
  - Midazolam – 0.1mg/kg IV/IO
  - Supraglottic Airway
    - Fentanyl – 0.5mcg/kg IV/IO