

TACHYCARDIA (With a Pulse)

ALL PROVIDERS

- ☐ Focused history and physical exam
 - Assess blood glucose level
- ☐ Continuous ECG, ETCO₂, blood pressure, and pulse oximetry monitoring when available
- ☐ Acquire and transmit a 12L EKG if possible.
- ☐ **Key Considerations**
 - Pregnancy >20 weeks gestation - Place wedge-shaped cushion or multiple pillows under patient's right hip.
 - 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) and over 10 years = 90mmHg.

ADULT

AEMT

- ☐ Vascular access and fluid therapy.
- Supraventricular Tachycardia (SVT)**
- ☐ Obtain a 12 Lead EKG, if possible
 - ☐ Maneuvers to increase vagal tone: Valsalva, ice pack to face, Trendelenburg, urination, etc.)

PEDIATRIC (<15 years of Age)

NOTE: Pediatric weight based dosing should not exceed Adult dosing.

AEMT

- ☐ Vascular access and fluid therapy.
- Supraventricular Tachycardia (SVT)**
- Infants: rate usually greater than 220 bpm with no variation
 - Children: rate usually greater than 180 bpm with no variation
 - ☐ Obtain a 12 Lead EKG is possible, if possible
 - ☐ Maneuvers to increase vagal tone: Valsalva, ice pack to face, Trendelenburg, urination, etc.)

PARAMEDIC

Supraventricular Tachycardia (SVT)

- ❑ Adenosine
 - Initial dose: 6 mg IV
 - May repeat once: 12mg IV

Stable Wide Complex (QRS > 120 msec) Tachycardia

- ❑ Transport to ED with IV in place and careful monitoring

Unstable Tachycardia – Synchronized Cardioversion

Signs/Symptoms of Unstable Tachycardia

- Acute cardiac chest pain
- Acute congestive heart failure / pulmonary edema
- Altered mental status
- SBP <90 mm Hg
- Signs of shock:
 - Cool, clammy, or pale skin
 - Weak or thready pulse

Synchronized Cardioversion

- *Indicated for unstable patients*
- These are initial doses:
 - Narrow Regular: 50-100J (mono- or bi-phasic)
 - Narrow Irregular: 120-200J biphasic and 200J monophasic
 - Wide Regular: 100J (mono- or bi-phasic)
 - Wide Irregular: defibrillate without synchronization
- Consider Procedural related anxiety management (refer to the **Pain/Anxiety Management Protocol**)

PARAMEDIC

Supraventricular Tachycardia (SVT)

- ❑ Adenosine
 - Initial dose: 0.1mg/kg IV (to max 6mg)
 - May repeat once: 0.2mg/kg IV (to max 12mg)

Stable Wide Complex (QRS > 120 msec) Tachycardia

- ❑ Transport to ED with IV in place and careful monitoring

Unstable Tachycardia – Synchronized Cardioversion

Signs/Symptoms of Unstable Tachycardia

- Acute congestive heart failure / pulmonary edema
- Altered mental status
- Low BP for age
- Signs of shock:
 - Cool, clammy, or pale skin
 - Weak or thready pulse

Synchronized Cardioversion

- Indicated for unstable patients
- Initial energy dose is 0.5-1 J/kg
- If no response, double energy dose to 2 J/kg
- Consider Procedural related anxiety management (refer to the **Pain/Anxiety Management Protocol**)