

HEALTHEAST MEDICAL TRANSPORTATION  
MEDICAL OPERATIONS MANUAL

**EPINEPHRINE (ADRENALIN) 1:10,000**

**Drug Classification: Adrenergic agent, inotrope**

**BACKGROUND**

**Pharmacodynamics**

This medication binds strongly with alpha and beta-receptors, producing increased blood pressure, increased heart rate, and bronchodilation.

**Indications**

- PEA/Asystole Arrest
- Anaphylaxis unresponsive to **1:1,000 epinephrine (Adrenalin)** IM and fluids.

**Contraindications**

- None in the emergency setting

**Cautions**

- May precipitate with sodium bicarbonate if tubing is not flushed well between administrations.
- May induce or exacerbate ventricular ectopy, especially in patients receiving dialysis.

**DOSAGE and ADMINISTRATION**

ADULT	PEDIATRICS (less than 60 kg)
<p><b><u>PEA/Asystole Arrest</u></b></p> <ol style="list-style-type: none"><li>1. Administer 1 mg IV/IO.<sup>1</sup></li><li>2. Repeat dose every 3-5 minutes</li></ol> <p><b><u>Anaphylaxis</u></b></p> <ol style="list-style-type: none"><li>1. Administer 0.3 mg IV/IO over 2 minutes.</li><li>2. May repeat in 10 minutes if needed.</li></ol>	<p><b><u>PEA/Asystole Arrest</u></b></p> <ol style="list-style-type: none"><li>1. Administer 0.01 mg/kg IV/IO.<sup>1</sup></li><li>2. Repeat dose every 3-5 minutes</li></ol> <p><b><u>Anaphylaxis</u></b></p> <ol style="list-style-type: none"><li>1. Administer 0.01 mg/kg (up to 0.3 mg) IV/IO over 2 minutes.</li><li>2. May repeat in 10 minutes if needed.</li></ol>

**ADVERSE REACTIONS/SIDE EFFECTS**

- Anxiety, tremors, headache, nausea, vomiting
- Hypertension, chest pain, cardiac arrhythmias

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**NOTES**

<sup>1</sup> Epinephrine in the 1:10,000 concentration should not be administered ET. If a patient requires ET administration of epinephrine, use the 1:1,000 concentration.

**REFERENCE GUIDELINE:**

**2D PEA/Asystole**

**5A Allergic Reaction/Anaphylaxis**

**6C Neonatal Resuscitation**