# Anaphylaxis & Allergic Reactions – 10.030

# TREATMENT:

- A. Treat per Universal Patient Care.
- B. Remove stinger or source of toxin.
- C. If Resp <10 or >30 oxygen 100% and assist with BVM prn.
- D. If patient exhibits signs of progressive anaphylaxis and/or respiratory distress:
  - 1. Administer 1:1,000 Epinephrine 0.5 mg IM.
  - 2. Administer 2.5 mg Albuterol nebulized if wheezing persists.
  - 3. With diminished perfusion or shock symptoms, consider:
    - a) 1:100,000 Epinephrine 0.5 mg slow IV/IO. Make 1:100,000 by diluting 1 mg 1:1,000 in a 100cc bag of LR or NS. Administer 50cc.
    - **b)** Epinephrine IV should not be given unless signs of cardiovascular collapse or respiratory distress are present.
    - c) Treat with fluid challenge per Shock Protocol.
  - 4. If no improvement noted repeat **Epinephrine** as needed every 5-15 min.
- E. Consider **Diphenhydramine 25-50mg IV/IO/IM**. For itching, flushing or hives.
- F. Consider corticosteroid administration: Dexamethasone 10 mg or Methylprednisolone 125 mg IV/IO/IM.
- G. If unable to secure a protected airway or unable to ventilate with BVM after epinephrine has been administered, a cricothyrotomy may be required.

## **PEDIATRIC PATIENTS:**

- A. If patient exhibits signs of progressive anaphylaxis and/or significant respiratory distress:
  - 1. With normal perfusion, administer **1:1,000 Epinephrine 0.01 mg/kg IM** to a maximum single dose of 0.5 mg IM.
  - 2. With diminished perfusion or shock symptoms administer:
    - a) **1:1,000 Epinephrine 0.01 mg/kg IM** to a maximum of single dose 0.5 mg <u>OR</u>
    - b) 1:100,000 Epinephrine 0.01 mg/kg slow IV/IO. Make 1:100,000 by diluting 1 mg 1:1,000 in 100cc bag of NS or LR. Admin 0.01 mg/kg IV, not to exceed adult dose.
    - c) Epinephrine IV should not be given unless signs of cardiovascular collapse or respiratory distress are present.
    - d) Treat with fluid challenge per Shock Protocol.
      - 1. (Ped fluid bolus 20cc/ kg)
      - 2. Hypotensive systolic B/P 70 +(2 x age)
      - 3. Use caution if more than 2 bolus needed\*\*\*\*
  - 3. If no improvement noted repeat epinephrine every 5 minutes.
- B. Consider **Diphenhydramine 1-2 mg/kg IM** or slow IV/IO to a maximum of 50 mg.
- C. Consider corticosteroid administration: **Dexamethasone 0.6 mg/kg** or **Methylprednisolone 2 mg/kg IV/IO/IM** not to exceed adult dosaging.

### **NOTES & PRECAUTIONS:**

- A. Allergic reactions, even systemic in nature, are not necessarily anaphylaxis. Treatment may not be indicated if only hives and itching are present.
- B. Epinephrine increases cardiac workload and may cause angina or AMI in some individuals. <u>Consider lower dose (0.3 mg) in elderly pts</u>.
- C. Common side effects of Epinephrine include anxiety, tremor, palpitations, tachycardia and headache particularly with IV administration.
- D. Contact Medical control if after Epinephrine administration, anaphylaxis or symptoms persist.

### **KEY CONSIDERATIONS:**

Toxic exposure, insect bites, recent exposure to allergen, dyspnea or hives, abdominal cramps, known allergens, chest or throat tightness, swelling, numbness