



## Ingestions &amp; Overdoses

Approval: Troy M. Falck, MD – Medical Director

Effective: 10/01/2025

Approval: John Poland – Executive Director

Next Review: 07/2028

- When possible, contact Poison Control for consultation: (800) 876-4766 or (800) 222-1222.
- Refer to Hazardous Material Exposure Protocol (E-7) if pt externally exposed to organophosphate, carbamate or hydrofluoric acid.
- Oral ingestions of hydrofluoric acid require immediate treatment as it can cause fatal hypocalcemia – early signs of hypocalcemia include:
  - Tingling sensation around mouth, lips, hands or feet
  - Hand or foot spasms
  - QT interval prolongation
- Activated charcoal is an agent used for gastric decontamination following ingestion overdose. Clinical research only supports its use when given early after ingestion. While activated charcoal may be helpful when given rapidly after an overdose, it is very important to avoid administration in cases where potential contraindications exist.

**Activated Charcoal Indications**

- Early administration (within 1 hr of ingestion)
- Potentially deadly agent
- No effective antidote
- Suggested agents where EMS administration of activated charcoal is appropriate:
  - Antidepressants
  - Anticonvulsants
  - Digoxin
  - Calcium channel blockers
  - Beta blockers

**Activated Charcoal Contraindications**

- Obtunded/altered level of consciousness
- Known caustic ingestion (acid or alkali)
- Known hydrocarbon ingestion
- Suspected GI obstruction (vomiting)
- Agents not well absorbed by activated charcoal (relative contraindication), examples include:
  - Lithium
  - Iron
  - Toxic alcohol

**BLS**

- O<sub>2</sub> at appropriate flow rate, manage airway and assist ventilations as necessary
- Assess V/S including SpO<sub>2</sub>
- Identify substance and time of ingestion: bring sample in original container if safe/possible
- Check blood glucose (BG) if able

**Blood glucose  
≤60 mg/dl or  
presentation fits  
hypoglycemia?**

YES

Refer to General Medical  
Treatment Protocol (M-6)

NO

**ALS**

- Cardiac monitor
  - Establish vascular access at appropriate time (may bolus up to 1000 mL NS)
- Consider activated charcoal – (BASE/MODIFIED BASE HOSPITAL PHYSICIAN ORDER ONLY)**
- 50 gm PO routine dose

**SEE PAGE 2 FOR AGENT SPECIFIC TREATMENT**



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## AGENT SPECIFIC TREATMENT

## Beta Blockers

May admin. up to 1000 mL NS bolus if SBP <90

**Atropine 1 mg IV/IO**

- Only if HR <50 and SBP <90 after NS bolus
- May repeat every 5 mins (max total: 3 mg)

**Glucagon 1 mg (1 unit) IV/IO**

- Only if HR <50 and SBP <90
- If no IV/IO, may admin. 1 mg IM/IN

**Push-Dose Epinephrine**

- Only if HR <50 and SBP <90
- Eject 1 mL NS from a 10 mL pre-load syringe
- Draw up 1 mL epinephrine 1:10,000 concentration and gently mix
- Admin. 1 mL IV/IO push every 1 - 5 mins
- Titrate to maintain SBP >90

## Calcium Channel Blockers

May admin. up to 1000 mL NS bolus if SBP <90

**Calcium Chloride 10% 10 mL slow IV/IO**

- Only if SBP <90
- Admin. no faster than 1 mL/min
- May repeat every 5 mins (maximum: 4 total doses)

## Hydrofluoric Acid

**Calcium Chloride 10% 10 mL slow IV/IO**

- Only if signs of hypocalcemia
- Admin. no faster than 1 mL/min

## Narcotics

**Naloxone**

- Only if RR <12 or respiratory efforts inadequate
- Provide BVM ventilation at appropriate rate
- 1-2 mg IV/IO/IM/IN
- May repeat every 2 - 3 mins if improvement inadequate
- Do not admin. if advanced airway in place & pt is being adequately ventilated

## Organophosphate or Carbamate

**Atropine 2 mg IV/IO**

- Only if HR <60
- May repeat every 3 mins – no max dose

## Tricyclic Antidepressants

**Sodium Bicarbonate 1 mEq/kg IV/IO - if any of the following are present:**

- SBP <90
- QRS >0.12 seconds (3 small boxes)
- Seizures