

EMS System for Metropolitan Oklahoma City and Tulsa 2025 Medical Control Board Treatment Protocols

EMERGENCY
MEDICINE
UNIVERSITY OF OKLAHOMA

EMS SECTION

Approved 9/04/24, Effective 1/15/25, replaces all prior versions

9E – DIALYSIS-RELATED ISSUES ADULT & PEDIATRIC

TREATMENT PRIORITIES:

- 1. Circulatory support
- External bleeding control
- Hypotension treatment with fluids and/or vasopressors
- If hyperkalemia, calcium chloride first medication
- Vascular access precaution: avoid fistulas/graft/shunt
- 2. Hypoglycemia care

EMD

CPR BY EMD INSTRUCTION (if applicable)
CONTROL ANY BLEEDING
WITH DIRECT PRESSURE
ADVISE REST

EMERGENCY MEDICAL DISPATCHER

EMERGENCY MEDICAL RESPONDER

EMT

EMT-INTERMEDIATE 85

ADVANCED EMT

PARAMEDIC

EMR EMT

GENERAL SUPPORTIVE CARE OBTAIN VS

DIALYSIS PORT/CATHETER/FISTULA BLEEDING? DIRECT PRESSURE

HEMOSTATIC AGENT TOURNIQUET PROXIMAL TO FISTULA IF BLEEDING SEVERE & UNCONTROLLABLE ON EXTREMITY

ADULT & PEDIATRIC WEIGHT ≥25 kg HYPOGLYCEMIA CARE:

IF GLUCOSE <50 mg/dL, 1 tube ORAL GLUCOSE (15 grams) PO PEDIATRIC WEIGHT <25 kg HYPOGLYCEMIA CARE:

IF GLUCOSE <50 mg/dL, ½ tube ORAL GLUCOSE (7.5 grams) PO

EMT - 185 AEMT

VASCULAR ACCESS?

IN MANY SITUATIONS, DIALYSIS PROFESSIONALS WILL LEAVE CATHETER IN PLACE TO USE AS IV PRN DO NOT INITIATE IV USING EMS CATHETERS IN FISTULA/GRAFT/SHUNT – VASCULAR DAMAGE CAN OCCUR USE IO ACCESS IF IV ACCESS UNOBTAINABLE

SYMPTOMATIC HYPOTENSION?

ADULT & PEDIATRIC: 10 mL/kg (MAX OF 500 mL IF ANURIC) NS IV/IO BOLUS IF NO SIGNS OF PULMONARY EDEMA

 $\textbf{HYPOGLYCEMIA} \hspace{0.1cm} (\texttt{GLUCOSE} \hspace{0.1cm} < \hspace{0.1cm} 50 \hspace{0.1cm} \texttt{mg/dL}) \hspace{0.1cm} \textbf{-} \hspace{0.1cm} \textbf{ADULT} \hspace{0.1cm} \textbf{\&} \hspace{0.1cm} \textbf{PEDIATRIC}$

D10 5 mL/kg IVPB WIDE OPEN UP TO 250 mL OR

D25 2 mL/kg IV/IO UP TO 100 mL (must be \geq 1 year of age) OR D50 1 mL/kg IV/IO UP TO 50 mL (must be \geq 25 kg) IF NO VASCULAR ACCESS OBTAINED & IF IO SEEMS EXCESSIVE TO CLINICAL STATUS: GLUCAGON: IF PT WT \geq 25 kg, 1mg IM; <25 kg, 0.5 mg IM

ADULT & PEDIATRIC: REPEAT DETERMINATION OF BLOOD GLUCOSE POST-HYPOGLYCEMIA TREATMENT

PARAMEDIC

CARDIAC ARREST OR VENTRICULAR DYSRHYTHMIA FROM KNOWN/SUSPECTED HYPERKALEMIA?

ADULT/PEDIATRIC: CALCIUM CHLORIDE 10 mg/kg IVP/IOP (MAX 1 gram) & SODIUM BICARBONATE 1 mEq/kg IVP/IOP (MAX 50 mEq)

CARDIAC ARREST FROM PRE-EXISTING METABOLIC ACIDOSIS?

ADULT/PEDIATRIC: SODIUM BICARBONATE 1 mEq/kg IVP/IOP (MAX 50 mEq)

SYMPTOMATIC HYPOTENSION WITHOUT IMPROVEMENT AFTER 10 mL/kg IVF (MAX 500 mL IF ANURIC)?

ADULT: PHARMACOLOGIC TREATMENT IF SYS BP < 100 mmHg:

NOREPINEPHRINE 2-4 mcg/min TITRATE to SYS ≥ 100 mmHg **OR**DOPAMINE 5-20 mcg/kg/min TITRATE TO SYS BP ≥ 100 mmHg **PEDIATRIC:** OLMC CONSULT FOR PHARMACOLOGIC TREATMENT

CONTINUOUS ASSESSMENT & TREATMENT PER APPLICABLE PROTOCOL(S)