

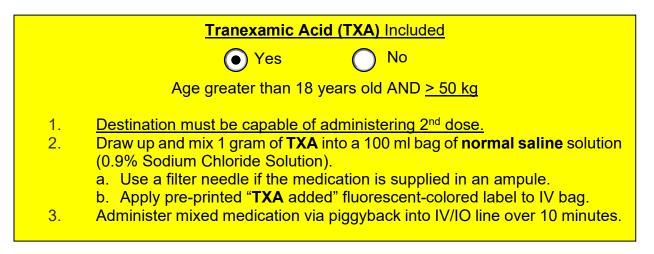
Initial Date: 3/23/2018 Revised Date: 05/23/2023

Michigan Trauma and Environmental HEMORRHAGIC SHOCK

Hemorrhagic Shock

Purpose: To provide treatment for patients displaying signs and symptoms of shock attributed to hemorrhage including trauma and **severe postpartum hemorrhage**.

- 1. Follow General Pre-hospital Care-Treatment Protocol control bleeding according to Bleeding Control (BCON)-Treatment Protocol when applicable.
- 2. Transport according to Adult and Pediatric Trauma Triage-Treatment Protocol and MCA Transport Protocol.
 - 3. No intervention should delay transport.
- § 4. Obtain vascular access.
- 5. For signs of hypotension <u>unaccompanied</u> by moderate to severe head trauma administer NS or LR IV/IO fluid bolus IV/IO (refer to **Vascular Access and IV Fluid Therapy-Procedure Protocol**).
 - a. Adults (> 14 years of age): up to 1 liter
 - b. Pediatrics (<14 years of age): up to 20 mL/kg
- S 6. For signs of hypotension <u>accompanied</u> by moderate to severe head trauma refer to **Head Injury–Treatment Protocol** for fluid administration guidelines.
 - 7. Consider other causes of traumatic hypotension and treat accordingly. (Tension pneumothorax see **Pleural Decompression-Procedure Protocol**, neurogenic shock see **Shock-Treatment Protocol**)
- (S) 8. Hypotensive patients <u>unaccompanied</u> by moderate to severe head trauma should receive additional IV/IO fluid boluses, as indicated by hemodynamic state.
 - a. Adults (\geq 14 years of age): repeat IV/IO fluid bolus to a maximum of 2 liters.
 - b. Pediatrics (< 14 years of age): repeat dose of 20 ml/kg to a maximum of 40 ml/kg.
 - c. Monitor for pulmonary edema.
 - d. If pulmonary edema presents, stop fluids and contact Medical Control for direction.
- 9. Per MCA Selection, if bleeding is uncontrolled and non-compressible, administer Tranexamic Acid (**TXA**)





Initial Date: 3/23/2018 Revised Date: 05/23/2023

Michigan Trauma and Environmental HEMORRHAGIC SHOCK

- a. Hospital Notification and Documentation
 - i. Contact Medical Control the receiving hospital must be verbally notified that **TXA** has been given, prior to arrival.
 - ii. A verbal report that **TXA** was administered must be provided to hospital ED staff (receiving physician preferred) upon hand-off of the patient from EMS.
 - iii. The administration of **TXA** MUST be clearly documented on the EMS patient care record.
- b. Contact Medical Control-Medical Control may order **TXA** for selected patients with suspected compensated shock not meeting the above criteria.

<u>Medication Protocols</u> Tranexamic Acid (TXA)