Maine Medical Center
MaineHealth

POLICY TITLE: Trauma Team Activation Protocol

Summary: An optimal response to the injured patient/s is best served by a tiered response to information received prior to the patient/s arrival. This information includes physiologic, anatomic, and mechanism of injury criteria.

I. Level 1 (Full Team Response)

- **Activation Criteria:**
  - *Airway:*
    - All Intubated patients (trauma and burn), including both field and transfers patients
    - Any patient receiving manual assisted ventilation
    - GCS < 9 with a mechanism attributable to trauma
  - *Breathing:*
    - Patients with signs of respiratory compromise:
      - Rate <10 or >29 breaths/minute
      - Hypoxia, accessory muscle use or grunting
  - *Circulation:*
    - Confirmed systolic BP < 90 mm Hg – Adults
    - Age-specific hypotension in Children

Age	SBP (mmHg)
<1 year	<60
1-10 years	<70 + 2x age
>10 years	<90

    - Patients requiring blood transfusion to sustain blood pressure
    - Delayed capillary refill (>2 seconds)
  - Anatomic
    - Penetrating injuries to head, neck, torso, or extremities proximal to elbow/knee
    - Open or depressed skull fracture
    - Paralysis or suspected spinal cord injury
    - Flail chest
    - Unstable pelvic fracture
    - Amputation proximal to the wrist or ankle
    - Two or more proximal long bone fractures (humerus or femur)
    - Crushed, degloved, or mangled extremity
    - Blunt abdominal injury with firm or distended abdomen or with seatbelt sign
  - Disability
    - GCS motor score <=5
    - AVPU assessment at the level of P or U (responds only to painful stimuli or unresponsive/unconscious)
  - Other
    - Death in same passenger compartment
    - Decision to upgrade from lower activation level may be done at the discretion of the EMS Provider, REMIS operator, attending, resident or APPs

II. Level 2 (Limited Team Response)

- **Activation Criteria:**
  - Falls:
    - >20ft – Adult
    - >= 10ft or 3x height of Child
    - Fall from any height if age => 65 and anticoagulated, with decline in neurological status
  - Traffic:
    - High-risk auto crash with:
      - Occupant compartment intrusion > 12 inches
      - Ejection from vehicle (partial or complete)
      - Death in same passenger compartment
    - Auto vs pedestrian or cyclist thrown/run over or with significant impact (>20mph).
    - Motorcycle/ATV crash: >20mph OR separation from motorcycle/ATV
  - High-energy dissipation or rapid deceleration
  - Burns:
    - High-energy electrical injury
    - Burns >10% TBSA (partial and full thickness) and/or inhalational injury
  - Blunt abdominal injury with firm or distended abdomen
  - Suspected hypothermia, hanging or drowning
  - Transfers accepted by the trauma attending to the trauma service
  - EMS provider or physician discretion to upgrade to level 2 from lower level

III. Level 3 (Limited Team Response for Transfer Patients ONLY)

- **Activation Criteria:**
  - Reserved for interfacility transfer patients with traumatic or burn related injury that doesn't meet Level 1 or 2 activation criteria but need to be seen by the Trauma Service for evaluation and probable admission.
  - Trauma attending may designate a transfer as a Level 3. These patients are accepted and come to the ED for combined ED/Trauma Team evaluation and are admitted by the Trauma Team.
  - All patient accepted as Level 3 must have been appropriately imaged at the OSH and images/findings discussed with the on-call Trauma Attending.
  - After consultation between the OSF ED and the Trauma Surgeon, some patient may be deemed appropriate for direct ED to ED transfer, without the need for Trauma Team involvement. In these cases the Trauma Surgeon should speak directly with the ED staff to ensure their comfort with this decision. These patients should not be leveled as a Level 3, but rather prioritized according to the ED triaging system as direct ED to ED transfers. After arrival, based on the evaluation by the ED team, the trauma team may be asked to see the patient in consultation. The patient may also be upgraded to a level 1 or level 2 at the discretion of the ED staff based on their presenting situation.

IV. Trauma Consult

- **Activation Criteria**
  - Any patient for which level 1,2 or 3 activation criteria have not been met will be seen by the ER staff and the Trauma Service consulted as needed and/or requested. Upgrading will be facilitated by calling REMIS and requesting the upgrade.

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Revised Date: December, 2016

Committee(s) Approval and Date:

Administrative Approval: _____

Signature **Title** **Date**

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POLICY TITLE: Trauma Team Activation Response Time

NOTE: will be treated as separate policy from protocol

Trauma Team Response Criteria

	Trauma Attending	Trauma APP Team	Trauma Resident Team
Level 1 **FULL Team Response**	**Present on arrival with appropriate notification; within 15 minutes of arrival if pre-arrival notification ≤ 15 minutes.** **Documentation by the Trauma Attending at the time of the visit is expected.**	**Prior to patient arrival with pre-arrival notification >5 minutes.**	**Prior to patient arrival with pre-arrival notification >5 minutes.** **Expected to scrub out of OR cases to respond.**
Level 2 **LIMITED Team Response**	**Present within 30 minutes of patient arrival.** **Documentation by the Trauma Attending at the time of the visit is expected.**	**Prior to patient arrival with pre-arrival notification >5 minutes.**	**Prior to patient arrival with pre-arrival notification >5 minutes.**
Level 3 **To be seen by the Trauma Team and in all likelihood admitted**	**Needs to be seen and note entered into Epic within 8 hours of arrival and admission.**	**To be seen upon arrival by the Trauma Team.**	**To be seen upon arrival by the Trauma Team.**
Trauma Consult **Patient evaluated by ED and trauma team response requested after patient arrived/examined)**	**Trauma Surgeon initiated telephone contact via the service pager with the team within 60 minutes. Bedside evaluation within 8 hours.**	**Bedside response within 30 minutes.** **Trauma Consults that require a <30 minute response should be activated at Level 2**	**Bedside response within 30 minutes.** **Trauma Consults that require a <30 minute response should be activated at Level 2**
Direct ED to ED transfer	**Direct Communication between Trauma Attending and ER Physician at the time of acceptance.** **No physical response by the trauma team.** **After initial ED evaluation if patient requires admission patient should be upgraded through REMIS as a Trauma Consult (see above).**	**No initial response.**	**No initial response**

➡ **This response criterion applies to patients of all ages. Adult Trauma Team members with the**

exception of the trauma attending respond to pediatric trauma activation to support the Pediatric Trauma Team.

- Activations at any level need to go to the full team
- Upgrades should be handled through REMIS by calling 662-2950. When requesting a consult please indicate the level of activation (Level 1, Level 2, or Consult) requested based on the above response criteria.
- All activated trauma patients (traumas and burns) must be seem in the ED. Level 1,2 and 3 patients are expected to be seen in the critical care. The PI program will monitor deviations from this standard. Consults and ED to ED transfers will be roomed in accordance with traditional ED protocols.

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