



PREHOSPITAL TRAUMA TRIAGE

Effective: January 1, 2024
Replaces: January 1, 2022

I. Purpose

The purpose of this policy is to provide standard criteria for the prehospital triage of trauma and burn patients in Santa Clara County.

II. Trauma Alert Patient

- A. Trauma alert patients are injured patients who meet ACS National Guidelines for Field Triage Criteria.
- B. Adult trauma alert patients are to be transported expeditiously to the closest Trauma Center.
- C. Pediatric trauma alert patients under the age of fifteen (15) years old are to be transported to the closest pediatric trauma center (Stanford Hospital or Santa Clara Valley Medical Center).
- D. Pregnant trauma alert patients more than twenty (20) weeks gestation are to be transported to the closest trauma center with an approved Level III Neonatal ICU (Stanford Hospital or Santa Clara Valley Medical Center).
- E. Injured patients are to be identified as a trauma alert if one or more of the criteria below are met:

High Risk Injury Pattern (Red Criteria):

- A. Penetrating injuries to head, neck, torso, and proximal extremities
- B. Skull deformity, suspected skull fracture
- C. Suspected spinal injury with new motor or sensory loss
- D. Chest wall instability, deformity, or suspected flail chest
- E. Suspected pelvic fracture
- F. Suspected fracture of two or more proximal long bones
- G. Crushed, degloved, mangled, or pulseless extremity
- H. Amputation proximal to wrist or ankle
- I. Active bleeding requiring a tourniquet or wound packing with continuous pressure

Mental Status and Vital Signs (Red Criteria):

- J. Unable to follow commands (motor GCS <6)
- K. Respiratory rate less than 10 or greater than 29 breaths per minute
- L. Respiratory distress or need for respiratory support
- M. Room-air pulse oximetry less than 90%
- N. Vital signs below the following parameters:
 - 1. Age 0-9 years: Systolic BP less than 70 mmHg + 2x age years
 - 2. Age 10-64 years: Systolic BP less than 90 mmHg
 - 3. Age older than 65 years: Systolic BP is less than 110 mmHg
 - 4. Age 10 and older: Heart rate is greater than Systolic BP.

Moderate Risk Mechanism of Injury (Yellow Criteria):

- O. Auto crash with partial or complete ejection
- P. Auto crash with intrusion > 12 inches occupant site, > 18 inches any site, or need for extrication
- Q. Death in passenger compartment
- R. Child (age 0-9) unrestrained or in unsecure child safety seat
- S. Vehicle telemetry data consistent with severe injury
- T. Rider separated from transport vehicle with significant impact (eg. Motorcycle, ATV, horse etc.)
- U. Rollover with unrestrained occupant
- V. Pedestrian/bicycle rider thrown, run over, or with significant impact
- W. Fall from height > 10 feet (all ages)

Special Considerations (EMS Judgement):

- X. There are other factors that might influence destination which patients should be treated in Trauma Centers. The following should be considered in prehospital trauma triage when a traumatic injury is also present:

1. Patients with minor traumatic injuries also on anti-coagulants or with bleeding disorders
2. Time-sensitive extremity injury
3. EMS provider judgment to transport patient to a trauma center
4. Hanging/mechanical asphyxiation in cardiac arrest with suspected head or neck injury
5. Unwitnessed drowning with suspected head or neck injury
6. Low-level falls with significant head impact
7. Any pregnant patient beyond 20 weeks gestation (uterine fundus palpated at or above the umbilicus) in cardiac arrest, that does not meet obvious death criteria

II. Trauma Alert – Ambulance Transport

- A. Transport all Trauma Alerts to a designated Trauma Center.
- B. Patients who are not deemed Trauma Alerts according to the criteria established herein should be transported to an appropriate acute care hospital with emergency services.
- C. Pediatric patients who are not deemed Trauma Alerts according to the criteria established herein should be transported to the appropriate Pediatric Receiving Center established in Policy 602

III. Major Burn Criteria

- A. Patients with burn injuries are to be identified as major burn criteria if any of the following are present:
 1. Partial-thickness burns greater than 10% of the total body surface area
 2. Burns that include the face, hands, feet, genitalia, perineum, or major joints
 3. Full thickness burns
 4. Electrical burns, including high voltage (1,000v) and lightning injury
 5. Chemical burns
 6. Inhalation injury

7. Burn injury in patients with pre-existing medical disorders that could complicate management, prolong recovery, or affect mortality
- B. Transport all identified major burn patients to a designated burn center.
 - C. Patients who do not meet major burn criteria should be transported to an appropriate acute care hospital with emergency services.
 - D. Patients who meet the major burn criteria and who also meet trauma alert criteria and the traumatic injuries poses a greater risk of morbidity or mortality shall be transported to: (1) the closest trauma center to the incident location by total emergency ambulance transport time: and (2) that is accepting emergency ambulance patients.