

# Trauma Quality Indicators

## Background:

From the time a trauma patient is picked up by EMS on scene through the patient's initial assessment, hospital course, and discharge, our trauma program is carefully monitoring each patient and collecting data. Data collected includes demographic information, injury information, prehospital and hospital information, past medical history, traumatic injuries, in-hospital events and outcomes. Data is entered into our trauma registry and analyzed regularly through various performance improvement programs to ensure the trauma service is providing high quality care to each patient.

Much of the data collected for the registry is gathered by trauma registrars doing extensive chart reviews and depends greatly on complete and accurate documentation from our trauma providers. While we should be practicing complete and accurate documentation as part of being a good healthcare provider, it is also essential for our trauma program to be able to monitor and analyze the care of our trauma patients to ensure that high quality care is provided and patient outcomes are optimized.

## Pre-Existing Conditions

Several pre-existing conditions are captured in the trauma registry that help us risk stratify patients for observed and expected outcomes. These pre-existing conditions should be documented in the Trauma H&P and/or the Trauma Tertiary Survey as well as added to the patient's problem list in the electronic medical record.

The pre-existing conditions captured in the trauma registry are as follows:

1. Advanced directive limiting care
  - the patient has a written request to limit life-sustaining treatment that restricts the scope of care for the patient during this patient care event signed/dated by patient or designee prior to arrival.
2. Alcohol use disorder
  - can be actual diagnosis OR factors consistent with the diagnosis based on American Psychiatric Association, DSM 5 present prior to injury.
  - only report on patients 15 yrs of age or older.
3. Anticoagulant therapy
  - administration of medication (including anticoagulants, antiplatelet agents, thrombin inhibitors, thrombolytic agents) that interferes with blood clotting.  
Exception: chronic aspirin.
4. Attention deficit disorder/attention deficit hyperactivity disorder (ADD/ADHD)

- a disorder involving inattention, hyperactivity, or impulsivity requiring medication for treatment present prior to injury.
5. Bipolar I/II disorder
    - only report on patients 15 yrs of age or older.
  6. Bleeding disorder
    - any condition that results in the blood not clotting properly (e.g. hemophilia, von Willenbrand disease, Factor V Leiden)
  7. Cerebral vascular accident (CVA)
    - history prior to injury of stroke/CVA (embolic, ischemic, thrombotic, or hemorrhagic) with persistent residual motor, sensory or cognitive dysfunction (e.g., hemiplegia, hemiparesis, aphasia, sensory deficit, impaired memory).
  8. Chronic obstructive pulmonary disease (COPD)
    - lung disease characterized by chronic obstruction of lung airflow that interferes with normal breathing and is not fully reversible. Includes more familiar terms such as "chronic bronchitis" and "emphysema".
    - only report on patients 15 yrs of age or older.
  9. Chronic renal failure
    - chronic renal failure prior to injury that requires periodic peritoneal dialysis, hemodialysis, hemofiltration, or hemodiafiltration.
  10. Cirrhosis
    - replacement of normal liver tissue with non-living scar tissue related to other liver diseases often resulting in hepatic insufficiency/dysfunction and based on diagnostic imaging studies or laparotomy/laparoscopy. May also be referred to as end-stage liver disease.
  11. Congenital anomalies
    - documentation of a pre-existing cardiac, pulmonary, body wall, CNS/Spinal, GI, renal, orthopedic, or metabolic anomaly.
    - only report on patients less than 15 yrs of age
  12. Congestive heart failure (CHF)
    - inability of the heart to pump a sufficient quantity of blood to meet the metabolic needs of the body or can do so only at an increased ventricular filling pressure.
    - condition must be noted in medical record as CHF, congestive heart failure or pulmonary edema with onset of increasing symptoms within 30 days prior to injury.
  13. Current smoker
    - includes patients who report smoking cigarettes every day or some days within the last 12 months.
    - excludes patients who smoke cigars, pipes or smokeless tobacco.
  14. Currently receiving chemotherapy for cancer
    - includes both oral and parenteral treatments
  15. Dementia
    - includes, but not limited to, Alzheimer's, Lewy body dementia, frontotemporal dementia (Pick's disease), and vascular dementia.
  16. Diabetes mellitus

- diabetes mellitus that requires exogenous parenteral insulin or an oral hypoglycemic agent.
17. Disseminated cancer
    - cancer that has spread to one or more sites in addition to the primary site (i.e. metastatic or Stage IV cancer)
  18. Functionally dependent health status
    - patients whom, prior to injury, and as a result of cognitive or physical limitations relating to a pre-existing medical condition, were partially or completely dependent upon equipment, devices or another person to complete some or all activities of daily living.
  19. Hypertension
    - history of persistently elevated blood pressure requiring antihypertensive medication.
  20. Major depressive disorder
    - only report on patients 15 yrs of age and older.
  21. Myocardial infarction (MI)
    - history of MI in the 6 months prior to injury
  22. Other mental/personality disorders
    - a diagnosis of any of the following prior to injury: antisocial personality disorder, avoidant personality disorder, borderline personality disorder, dependent personality disorder, generalized anxiety disorder, histrionic personality disorder, narcissistic personality disorder, obsessive-compulsive disorder, obsessive-compulsive personality disorder, panic disorder, paranoid personality disorder, and schizotypal personality disorder.
    - only report in patients 15 yrs of age and older
  23. Peripheral arterial disease (PAD)
    - narrowing or blockage of vessels that carry blood from the heart to the legs. It is primarily caused by the buildup of fatty plaque in the arteries, which is called atherosclerosis. PAD can occur in any blood vessel but is most commonly found in the legs vs arms.
    - only report in patients age 15 yrs of age or older.
  24. Post-traumatic stress disorder (PTSD)
    - only report on patients 15 yrs of age or older.
  25. Pregnancy
    - pregnancy confirmed by lab, ultrasound or other diagnostic tool OR diagnosis of pregnancy documented in the patient's medical record prior to arrival at your center.
  26. Prematurity
    - babies born before 37 weeks of pregnancy are completed.
    - only report in patients less than 15 years of age.
  27. Schizoaffective disorder
    - only report on patients 15 yrs of age or older
  28. Schizophrenia
    - only report on patients 15 yr of age or older
  29. Steroid use

- regular administration of oral or parenteral corticosteroid medications within 30 days prior to injury for a chronic medical condition.
  - excludes topical, inhaled, or rectally administered corticosteroids
30. Substance use disorder
- diagnosis or symptoms/patient factors consistent with American Psychiatric Association, DSM 5 present prior to injury.
  - only report on patients 15 yrs of age or older.

## Hospital Events

Events reviewed through our performance improvement program include the following:

1. Acute Kidney Injury (AKI)
2. Acute Respiratory Distress Syndrome (ARDS)
3. Alcohol withdrawal syndrome
4. Cardiac arrest with CPR
5. Catheter-associated urinary tract infection (CAUTI)
6. Central line-associated blood stream infection (CLABSI)
7. Deep surgical site infection
8. Deep vein thrombosis (DVT)
9. Delirium
10. Myocardial infarction (MI)
11. Organ/space surgical site infection
12. Osteomyelitis
13. Pressure ulcer
14. Pulmonary embolism (PE)
15. Severe sepsis
16. Stroke/CVA
17. Superficial surgical site infection
18. Unplanned admission to the ICU
19. Unplanned intubation
20. Unplanned visit to the operating room
21. Ventilator-associated pneumonia (VAP)

If you are caring for a trauma patient that experiences one of the above stated hospital events, please notify our trauma program/performance improvement coordinators at

[traumapi@nebraskamed.com](mailto:traumapi@nebraskamed.com).

---

Revision #4

Created 13 July 2023 18:19:25 by Emily Cantrell

Updated 12 February 2026 15:49:39 by Emily Cantrell