Nebraska Trauma Registry Data Dictionary 2019-Revised 2021

State Trauma Data/QA Committee Nebraska Trauma Program



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DEPT. OF HEALTH AND HUMAN SERVICES

Nebraska State Trauma Registry

Nebraska state trauma registry serves as a tool for trauma data that evaluates the continuum of trauma care from the prehospital environment through rehabilitation. Successful development of trauma care systems, which includes the use of trauma registries, has played an essential role in the significant decline in death and disability rates from injuries for our citizens in America. A trauma registry provides a means of collecting and analyzing pertinent injury epidemiologic data that can be used for the purposes of performance improvement, research, injury prevention and planning. The trauma registry includes detailed information about the cause, nature, and severity of the injury. These data elements can be evaluated, trended and linked to outcomes.

With respect to trauma care, continuous, measurable improvement of the care given to the injured patient is the goal of any hospital's performance improvement system. A trauma registry is a timely, accurate, and comprehensive data source which allows for continuous monitoring of aspects of injury care provided. Trauma registry data elements have been developed through the National Trauma Data Standards to provide a consistent national database. Additional data elements may be required from state or regional trauma boards or be hospital specific. It provides information that can be used to evaluate timeliness, appropriateness, and quality of patient care.

In the U.S. there are numerous states that have trauma systems and maintain a trauma registry that include data on patients treated within trauma centers from comprehensive (Level 1) to basic (Level 4) levels. Pooling of multi-center trauma data can be utilized for multiple purposes ranging from epidemiologic reports to comparisons of trauma centers' effectiveness and evaluation of performance improvement indicators.

The American College of Surgeons Committee on Trauma has established the National Trauma Data Bank (NTDB), which collates trauma registry data from trauma centers and trauma systems in the U.S. The NTDB has the largest collection of trauma registry data ever compiled and contains over two million records from U.S trauma centers. The information contained in the NTDB has become a powerful instrument in advancing trauma care in such areas as epidemiology, injury control, research, education, acute care, and resource allocation. The goal of the NTDB is to inform the medical community, the public, and decision makers about a wide variety of issues that characterize the current state of care for injured persons.

Included in this data dictionary are data elements that are required by the state and NTDB. Elements required by the State of Nebraska are designated in the upper right corner as a STATE ELEMENT. If the data element is required by both the state and the NTDB, then the element is designated as a STATE/NATIONAL ELEMENT.

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NATIONAL TRAUMA DATA STANDARD (NTDS) PATIENT INCLUSION CRITERIA

To ensure consistent data collection across State and into the National Trauma Data Standard, a trauma patient is defined as a patient sustaining a traumatic injury within 14 days of initial hospital encounter and meeting the following criteria*:

At least **ONE** of the following injury diagnostic codes defined as follows: International Classification of Diseases, Tenth Revision (ICD-10-CM):

- S00-S99 with 7th character modifiers of A, B, or C ONLY. (Injuries to specific body parts—initial encounter)
- T07 (Unspecified multiple injuries)
- T14 (injury of unspecified body region)
- T20-T28 with 7th character modifier of A ONLY (Burns by specific body parts- initial encounter)
- T71.1 with 7th character modifier of A ONLY (Asphyxiation or Strangulation)
- T75.1 with 7th character modifier of A ONLY (Drowning)
- T75.4 with 7th character modifier of A ONLY (Electrocution)
- T79.A1-T79.A9 with 7th character modifier of A ONLY (Traumatic Compartment Syndrome—initial encounter)

EXCLUDING the following isolated injuries:

ICD-10-CM:

- S00 (Superficial injuries of the head)
- S10 (Superficial injuries of the neck)
- S20 (Superficial injuries of the thorax)
- S30 (Superficial injuries of the abdomen, pelvis, lower back and external genitals)
- S40 (Superficial injuries of shoulder and upper arm)
- S50 (Superficial injuries of elbow and forearm)
- S60 (Superficial injuries of wrist, hand and fingers)
- S70 (Superficial injuries of hip and thigh)
- S80 (Superficial injuries of knee and lower leg)
- S90 (Superficial injuries of ankle, foot and toes)

Late effect codes, which are represented using the same range of injury diagnosis codes but with the 7th digit modifier code of D through S, are also excluded.

AND MUST INCLUDE ONE OF THE FOLLOWING IN ADDITION TO (ICD-10-CM S00-S99, T07, T14, and T79.A1-T79.A9):

Death resulting from the traumatic injury (independent of hospital admission or hospital transfer status); OR

Patient transfer from one acute care hospital** to another acute care hospital;

ΟR

Patients directly admitted to your hospital (exclude patients with isolated injuries admitted for elective and/or planned surgical intervention);

OR •

Patients who were an in-patient admission and/or observed.

These values are to be used with each element described in this document which have been defined to accept the Null Values.

Field Values

1 Not Applicable

2 Not Known/Not Recorded

Additional Information

- Not Applicable: This null value code applies if, at the time of patient care documentation, the information
 requested was "Not Applicable" to the patient, the hospitalization or the patient care event. For example,
 variables documenting EMS care would be "Not Applicable" if a patient self-transports to the hospital (-5
 NTRACS value).
- Not Known/Not Recorded: This null value applies if, at the time of patient care documentation, information was "Not Known" (to the patient, family, health care provider) or no value for the element was recorded for the patient. This documents that there was an attempt to obtain information but it was unknown by all parties or the information was missing at the time of documentation. For example, injury date and time may be documented in the hospital patient care report as "Unknown". Another example, Not Known/Not Recorded should also be coded when documentation was expected, but none was provided (i.e., no EMS run sheet in the hospital record for patient transported by EMS).
 - For any collection of data to be of value and reliably represent what was intended, a strong commitment must be made to ensure the correct documentation of incomplete data.

Demographic Information

Obtained by patient or family report, EMS record or patient record. If name unknown at time of admission and identified at later time, enter name at that time. Unknown names are usually identified at a later date.

Field Values

Relevant value for data element

Additional Information

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

Obtained by patient or family report, EMS record or patient record. If name unknown at time of admission and identified at later time, enter name at that time. Unknown names are usually identified at a later date.

Field Values

Relevant value for data element

Additional Information

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

Obtained by patient or family report, EMS record or patient record. If name unknown at time of admission and identified at later time, enter name at that time. Unknown names are usually identified at a later date.

Field Values

Relevant value for data element

Additional Information

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

The patient's home ZIP/Postal code of primary residence.

Field Values

Relevant value for data element

Additional Information

- Can be stored as a 5- or 9-digit code (XXXXX-XXXX).
- May require adherence to HIPAA regulations.
- If zip code is "Not Applicable," complete variable: Alternate Home Residence.
- If zip code is "Not Recorded/Not Known," complete variables: Patient's Home Country, Patient's Home State, Patient's Home County and Patient's Home City.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

PATIENT'S HOME COUNTRY

Definition

The country where the patient resides.

Field Values

• Relevant value for data element (two digit alpha country code)

Additional Information

- Only completed when ZIP code is "Not Recorded/Not Known."
- Values are two character fields representing a country (e.g., US).
- If country outside of US then select "Not Applicable", and complete variable: Alternate Home Residence

Data Source Hierarchy

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

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The state (territory, province, or District of Columbia) where the patient resides.

Field Values

• Relevant value for data element

Additional Information

• Only completed when ZIP code is "Not Recorded/Not Known."

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

PATIENT'S HOME COUNTY

Definition

The patient's county (or parish) of residence.

Field Values

• Relevant value for data element

Additional Information

• Only completed when ZIP code is "Not Recorded/Not Known."

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

The patient's city (or township, or village) of residence.

Field Values

• Relevant value for data element

Additional Information

• Only completed when ZIP code is "Not Recorded/Not Known."

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

The number and street name where the patient most often resides.

Field Values

Appropriate values for this field

Additional Information

• If unknown leave blank. Can lookup cities and zip codes. If city and state known, but specific zip not known, use zip code from city list. If incident location resides outside of formal city boundaries, report nearest city/town.

Data Source Hierarchy

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

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ALTERNATE HOME RESIDENCE

Definition

Documentation of the type of patient without a home zip code.

Field Values

1. Homeless 3. Migrant Worker

2. Undocumented Citizen 4. Foreign Visitor

Additional Information

- Only completed when ZIP code is "Not Applicable."
- Homeless is defined as a person who lacks housing. The definition also includes a person living in transitional housing or a supervised public or private facility providing temporary living quarters.
- Undocumented Citizen is defined as a national of another country who has entered or stayed in another country without permission.
- Migrant Worker is defined as a person who temporarily leaves his/her principal place of residence within
 a country in order to accept seasonal employment in the same or different country.
- Foreign Visitor is defined as any person legally visiting a country other than his/her usual place of residence for any reason.

Data Source Hierarchy

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)
- 4. EMS Run Form

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The patient's date of birth. Usually obtained by patient or family report, EMS record or patient record.

Field Values

Relevant value for data element

Additional Information

- If unknown at time of admission and identified later, enter then.
- Collected as MM-DD-YYYY.
- If age is less than 24 hours, complete variables: Age and; Age Units.
- If "Not Recorded/Not Known" complete variables: Age and; Age Units.
- Used to calculate patient age in days, months, or years.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

The patient's age at the time of injury (best approximation).

Field Values

• Relevant value for data element (range 0-120).

Additional Information

- Used to calculate patient age in hours, days, months, or years.
- Automatically calculated if enter injury date and DOB. If DOB is unknown; enter an estimated age (best approximation) 0-120. Usually obtained by patient or family report, EMS record or patient record.
- If DOB is unknown; enter an estimated age (best approximation)
- Must also complete variable: Age Units

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

The units used to document the patient's age (Hours, Days, Months, and Years).

Field Values

1. Hours 3. Months

2. Days 4. Years

Additional Information

- Default is Years.
- Used to calculate patient age in hours, days, or months.
- Only completed when age is less than 1 year or "Not Recorded/Not Known."
 Must also complete variable: Age.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

The patient's race.

Field Values

1. Asian 4. American Indian

2. Native Hawaiian or Other Pacific Islander 5. Black or African American

3. Other Race 6. White

Additional Information

- Patient race should be based upon self-report or identified by a family member.
- The maximum number of races that may be reported for an individual patient is 2.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

The patient's ethnicity.

Field Values

1. Hispanic or Latino

2. Not Hispanic or Latino

Additional Information

- Patient ethnicity should be based upon self-report or identified by a family member.
- The maximum number of ethnicities that may be reported for an individual patient is 1.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

The patient's sex.

Field Values

1. Male 2. Female

3. Non-binary

Additional Information

• Patients who have undergone a surgical and/or hormonal sex/gender reassignment should be coded using the current assignment.

- 1. Patient Information / Face Sheet
- 2. Admission Form
- 3. Referring Hospital Record (first, second, and third referring hospital)

First recorded height within 24 hours or less of ED/Hospital arrival.

Field Values

• Relevant Value for data element

Additional Information

- Recorded in centimeters.
- May be based on family or self-report.
- Please note that first recorded/hospital vitals do not need to be from the same assessment.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. History and Physical

First recorded weight within 24 hours or less of ED/Hospital arrival.

Field Values

• Relevant Value for data element

Additional Information

- Recorded in kilograms.
- May be based on family or self-report.
- Please note that first recorded/hospital vitals do not need to be from the same assessment.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. History and Physical

Injury Information

The date the injury occurred.

Field Values

Relevant value for data element.

Additional Information

- Collected as MM-DD-YYYY.
- Estimates of date of injury should be based upon report by patient, witness, family, or health care provider. Other proxy measures (e.g., 911 call time) should not be used.
- Usually obtained by patient or family report, EMS record or patient record.
- If an exact date is unknown, but patient gives an estimate of # days, # weeks or # months; then subtract that from present date.
- This date is used to calculate age at time of injury once you enter DOB. If injury date is unknown or not
 entered, must manually enter patient's age.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The time the injury occurred.

Field Values

Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Usually provided by patient or witness report, EMS record or patient record. Time may be an approximate (30 minutes, 3 hours, etc.).
- If injury occurred just prior to EMS activation, use time (5 minutes) prior to EMS unit notified.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

External cause code used to describe the mechanism (or external factor) that caused the injury event.

Field Values

Relevant ICD-10-CM code value for injury event.

Additional Information

- External cause codes for child and adult abuse take priority over all other external cause codes.
- The primary external cause code should describe the main reason a patient is admitted to the hospital.
- ICD-10-CM codes are accepted for this data element. Activity codes are not collected under the NTDS and should not be reported in this field.
- Multiple Cause Coding Hierarchy: If two or more events cause separate injuries, an external
 cause code should be assigned for each cause. The first-listed external cause code will be
 selected in the following order:
 - External cause codes for child and adult abuse take priority over all other external cause codes.
 - External cause codes for terrorism events take priority over all other external cause codes except child and adult abuse.
 - External cause codes for cataclysmic events take priority over all other external cause codes except child and adult abuse, and terrorism.
 - External cause codes for transport accidents take priority over all other external cause codes except cataclysmic events, and child and adult abuse, and terrorism.
 - The first listed external cause code should correspond to the cause of the most serious Diagnosis due to an assault, accident or self-harm, following the order of hierarchy listed above.

Data Source Hierarchy

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

Other Associated Elements

- 1. Field cannot be blank
- 2. Should not be Y92.XYY92.XXYY92.XXX (where X is A-Z or 0-9) (ICD-10-CM only)
- ICD-10 External Cause Code should not be Y93.X/Y93.XX (where X is A-Z or 0-9) (ICD-10 CM only)

Place of occurrence external cause code used to describe the place/site/location of the injury event (Y92.x).

Field Values

Relevant ICD-10-CM code value for injury event

Y92.X/Y92.XX/Y92.XXX (where X is A-Z[excluding I, O] or 0-9) (ICD-10 CM only)

Additional Information

• Only ICD-10-CM codes will be accepted for ICD-10 Place of Occurrence External Cause Code.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

Additional External Cause Code used in conjunction with the Primary External Cause Code if multiple external cause codes are required to describe the injury event.

Field Values

Relevant ICD-10-CM code value for injury event

Additional Information

- Only ICD-10-CM codes will be accepted for ICD-10 Additional External Cause Code. Follow the coding hierarchy: 1) Cataclysmic events such as blizzards and hurricanes take precedence over the other causes of injury. 2) Transport accidents take precedence except for cataclysmic events.
- Only ICD-10-CM codes will be accepted for ICD-10 Additional External Cause Code.
- Activity codes are not collected under the NTDS and should not be reported in this field.
- The null value "Not Applicable" is reported if no additional external cause codes are documented.
- Multiple Cause Coding Hierarchy: If two or more events cause separate injuries, an external cause code should be assigned for each cause. The first-listed external cause code will be selected in the following order:
 - External cause codes for child and adult abuse take priority over all other external cause codes.
 - External cause codes for terrorism events take priority over all other external cause codes except child and adult abuse.
 - External cause codes for cataclysmic events take priority over all other external cause codes except child and adult abuse, and terrorism.
 - External cause codes for transport accidents take priority over all other external cause codes except cataclysmic events, and child and adult abuse, and terrorism.
 - The first listed external cause code should correspond to the cause of the most serious
 Diagnosis due to an assault, accident or self-harm, following the order of hierarchy listed above

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The ZIP code of the incident location.

Field Values

Relevant value for data element

Additional Information

- Can be stored as a 5 or 9 digit code (XXXXX-XXXX).
- If private residence (Y92.009) listed as location site. Can lookup city and zip codes. If city and state known, but specific zip not known, use zip code from city list.
- If incident location resides outside of formal city boundaries, report nearest city/town.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The country where the patient was found or to which the unit responded (or best approximation).

Field Values

• Relevant value for data element (two digit alpha country code)

Additional Information

- Only completed when Incident Location ZIP code is "Not Applicable" or "Not Recorded/Not Known."
- Values are two character fields representing a country (e.g., US).

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The state, territory, or province where the patient was found or to which the unit responded (or best approximation).

Field Values

Relevant value for data element

Additional Information

• Only completed when Incident Location ZIP code is "Not Applicable" or "Not Recorded/Not Known."

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The county or parish where the patient was found or to which the unit responded (or best approximation).

Field Values

Relevant value for data element

Additional Information

• Only completed when Incident Location ZIP code is "Not Applicable" or "Not Recorded/Not Known."

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

The city or township where the patient was found or to which the unit responded.

Field Values

Relevant value for data element

Additional Information

- Only completed when Incident Location ZIP code is "Not Applicable" or "Not Recorded/Not Known."
- If incident location resides outside of formal city boundaries, report nearest city/town.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

Protective devices (safety equipment) in use or worn by the patient at the time of the injury.

Field Values

1 None 6 Child Restraint (booster seat or child car seat)

2 Lap Belt 7 Helmet (e.g., bicycle, skiing, motorcycle)

3 Personal Floatation Device 8 Airbag Present

4 Protective Non-Clothing Gear (e.g., shin guard) 9 Protective Clothing (e.g., padded leather pants)

5 Eye Protection 10 Shoulder Belt

11 Other

Additional Information

Check all that apply.

- For each element select yes or no, maybe required to completed additional details if yes is selected.
- If "Child Restraint" is present, complete variable "Child Specific Restraint."
- If "Airbag" is present, complete variable "Airbag Deployment."
- Lap Belt should be used to include those patients that are restrained, but not further specified.
- If chart indicates "3 point restraint" choose 2 and 10.
- This may be by self / witness or EMS record used for the source of information.
- Not Applicable is default since many causes of injury do not have applicable protective equipment.

Data Source Hierarchy

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

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Protective child restraint devices used by patient at the time of injury.

Field Values

1 Child Car Seat

3 Child Booster Seat

2 Infant Car Seat

Additional Information

• This may be by self/witness or EMS record used for the source of information.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

Indication of airbag deployment during a motor vehicle crash.

Field Values

1 Airbag Not Deployed

2 Airbag Deployed Front

3 Airbag Deployed Side

4 Airbag Deployed Other (knee, air belt, curtain, etc.)

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Trauma Triage Flow Sheets
- 4. Hospital ED nursing notes
- 5. Hospital History & Physical

Pre-hospital Information

The location the patient arrived from.

Field Values

- Clinic/MD office
- Home
- Jail

- Nursing home
- Referring hospital
- Scene

Additional Information

• Use scene unless the patient left the accident location and was transported from another location.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Triage Trauma Flow Sheets
- 4. Hospital ED Nurses' notes
- 5. Hospital History and Physical

The mode of transport delivering the patient to your hospital.

Field Values

1 Ground Ambulance 4 Private/Public Vehicle/Walk-in

2 Helicopter Ambulance 5 Police

3 Fixed-wing Ambulance 6 Other

Additional Information

• When tiered response is used, you may have more than one EMS provider to enter.

• The transport mode delivering the patient to your hospital-ambulance, helicopter, or fixed-wing.

• If 'other' field value is selected, a text box will appear where a description of the transport mode can be typed.

- EMS Form if Present from scene; the first ambulance; not transferring EMS unit
- 2. First Referring Facility (if applicable)
- 3. Triage Trauma Flow Sheets
- 4. Hospital ED Nurses' Notes
- 5. Hospital History and Physical

EMS PATIENT CARE REPORT UNIVERSALLY UNIQUE IDENTIFIER (UUID)

Required National Element

Definition

The patient's universally unique identifier (UUID) as assigned by the emergency medical service (EMS) agency transporting the patient from the scene of injury to your hospital.

Field Values

- Relevant value for data element
- Must be represented in canonical form, matching the following regular expression:
 [a-fA-F0-9]{8}-[a-fA-F0-9]{4}-[1-5][a-fA-F0-9]{3}-[89abAB][a-fA-F0-9]{3}-[a-fA-F0-9]{12}

Additional Information

- A sample UUID is: e48cd734-01cc-4da4-ae6a-915b0b1290f6
- Automated abstraction technology provided by registry providers/vendors must be used for this data element. In the absence of automated technology, report the null value "Not Known/Not Recorded."
- Assigned by the transporting EMS agency in accordance with the IETF RFC 4122 standard
- The null value "Not Applicable" must be reported for all patients where Inter-facility Transfer is Element Value "Yes".
- The null value "Not Known/Not Recorded" must be reported if the UUID is not documented on the EMS Run Report. The UUID will not be documented on the EMS Run Reports until NEMSIS version 3.5.0 is released. In collaboration with NEMSIS, the ACS will communicate when NEMSIS 3.5.0 is released.
- The null value "Not Applicable" must be reported for all patients where Transport Mode is Element Values "Private/Public Vehicle/Walk-in", "Police", "Other" or if patient is not transported from the scene of injury by EMS.
- For patients with multiple modes of transport from the scene of injury, report the UUID assigned by the EMS agency that delivered the patient to your hospital.
- Consistent with NEMSIS v3.5.0.
- If Transport Mode is Ground Ambulance, Helicopter or Fixed Wing Ambulance but he patient was not transported from the scene of injury, report the null value "Not Known/Not Recorded."

Data	Source Hierarchy	

1. EMS Run Report

Was the patient transferred to your facility from another acute care facility?

Field Values

Yes No

Additional Information

- Patients transferred from a private doctor's office or, stand-alone ambulatory surgery center are not considered an inter-facility transfers.
- Outlying facilities purporting to provide emergency care services or utilized to stabilize a patient are considered acute care facilities.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Hospital ED Nurses' Notes
- 4. Hospital History and Physical

Legal name of EMS service provider who transported patient.

Field Values

• Relevant value for data element.

Additional Information

• EMS listings are maintained by the State.

- 1. EMS Form
- 2. First Referring Facility (if applicable)
- 3. Triage Trauma Flow Sheets
- 4. Hospital ED Nurses' Notes
- 5. Hospital History & Physical

The date the unit *transporting to your hospital* was notified by dispatch.

- For inter facility transfer patients, this is the date on which the unit transporting the patient to your facility from the transferring facility was notified by dispatch or assigned to this transport.
- For patients transported from the scene of injury to your hospital, this is the date on which the unit transporting the patient to your facility from the scene was dispatched.

Field Values

Relevant value for data element.

- Collected as MM-DD-YYYY.
- Used to auto-generate an additional calculated field: Total EMS Time (elapsed time from EMS dispatch to hospital arrival).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data Source Hierarchy	
1. EMS Form	

EMS DISPATCH TIME Required State

Definition

The time the unit *transporting to your hospital* was notified by dispatch.

• For inter facility transfer patients, this is the time at which the unit transporting the patient to your facility from the transferring facility was notified by dispatch.

• For patients transported from the scene of injury to your hospital, this is the time at which the unit transporting the patient to your facility from the scene was dispatched.

Field Values

Relevant value for data element.

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Used to auto-generate an additional calculated field: Total ÉMS Time (elapsed time from EMS dispatch to hospital arrival).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data S	Source Hierarchy
1.	EMS Form

The date the unit <u>transporting to your hospital</u> arrived on the scene/transferring facility (the time the vehicle stopped moving).

- For inter facility transfer patients, this is the date on which the unit transporting the patient to your facility from the transferring facility arrived at the transferring facility (arrival is defined at date/time when the vehicle stopped moving).
- For patients transported from the scene of injury to your hospital, this is the date on which the unit transporting the patient to your facility from the scene arrived at the scene (arrival is defined at date/time when the vehicle stopped moving).

Field Values

• Relevant value for data element.

- Collected as MM-DD-YYYY
- Used to auto-generate two additional calculated fields: Total EMS Response Time (elapsed time from EMS dispatch to scene arrival) & Total EMS Scene Time (elapsed time from EMS scene arrival to scene departure).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data Source Hierarchy	
1. EMS	Form

The time the unit transporting to your hospital arrived on the scene (the time the vehicle stopped moving).

- For inter facility transfer patients, this is the time at which the unit transporting the patient to your facility from the transferring facility arrived at the transferring facility (arrival is defined at date/time when the vehicle stopped moving).
- For patients transported from the scene of injury to your hospital, this is the time at which the unit transporting the patient to your facility from the scene arrived at the scene (arrival is defined at date/time when the vehicle stopped moving).

Field Values

• Relevant value for data element.

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Used to auto-generate two additional calculated fields: Total EMS Response Time (elapsed time from EMS dispatch to scene arrival) & Total EMS Scene Time (elapsed time from EMS scene arrival to scene departure).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data Source Hierarchy	
1. EMS Form	

The date the unit transporting to your hospital left the scene (the time the vehicle started moving).

- For inter facility transfer patients, this is the date on which the unit transporting the patient to your facility from the transferring facility departed from the transferring facility (departure is defined at date/time when the vehicle started moving).
- For patients transported from the scene of injury to your hospital, this is the date on which the unit transporting the patient to your facility from the scene departed from the scene (arrival is defined at date/time when the vehicle started moving).

Field Values

• Relevant value for data element.

- Collected as MM-DD-YYYY.
- Used to auto-generate an additional calculated field: Total EMS Scene Time (elapsed time from EMS scene arrival to scene departure).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data Source Hierarchy
1. EMS Form

The time the unit transporting to your hospital left the scene (the time the vehicle started moving).

- For inter facility transfer patients, this is the time at which the unit transporting the patient to your facility from the transferring facility departed from the transferring facility (departure is defined at date/time when the vehicle started moving).
- For patients transported from the scene of injury to your hospital, this is the time at which the unit transporting the patient to your facility from the scene departed from the scene (arrival is defined at date/time when the vehicle started moving).

Field Values

Relevant value for data element.

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Used to auto-generate an additional calculated field: Total ÉMS Scene Time (elapsed time from EMS scene arrival to scene departure).
- The null value "Not Applicable" is reported for patients who were not transported by EMS.

Data Source Hierarchy	1
1. EMS Form	

First recorded systolic blood pressure

Field Values

• Relevant value for data element range (0-299).

Additional Information

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- Additional systolic BP optional but may be used if have dramatic decrease or increase from first reading.

Data Source Hierarch	1V
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First recorded pulse (palpated or auscultated), expressed as a number per minute.

Field Values

• Relevant value for data element. Range (0-299)

Additional Information

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- Additional pulse rate optional but may be useful if have dramatic decrease or increase from first reading.

Data	Source	Hierarchy

First recorded respiratory rate (expressed as a number per minute).

Field Values

• Relevant value for data element.Range 0-99.

Additional Information

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as Not Known/Not Recorded.
- Additional respiratory rate optional but may be useful if have dramatic decrease or increase from first reading.

Data Source Hierarchy

First recorded oxygen saturation measured in the pre-hospital setting (expressed as a percentage).

Field Values

• Relevant value for data element.(Range 0-100)

Additional Information

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- Value should be based upon assessment before administration of supplemental oxygen.
- Additional oxygen saturations may be useful if have dramatic decrease or increase from first reading.

Data Source Hierarchy

First recorded Glasgow Coma Score (Eye)

Field Values

1 No eye movement when assessed 3 Opens e

3 Opens eyes in response to verbal stimulation

2 Opens eyes in response to painful stimulation

4 Opens eyes spontaneously

Additional Information

• Used to calculate Overall GCS - EMS Score.

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as Not Known/Not Recorded.
- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient withdraws from a painful stimulus," a Motor GCS of 4 may be recorded, IF there is no other contradicting documentation.

Data Source Hierarchy

First recorded Glasgow Coma Score (Verbal)

Field Values

Pediatric (≤ 2 years):

1 No vocal response 4 Cries but is consolable, inappropriate interactions

2 Inconsolable, agitated 5 Smiles, oriented to sounds, follows objects, Interacts

3 Inconsistently consolable, moaning

Adult:

1 No verbal response 4 Confused 2 Incomprehensible sounds 5 Oriented

3 Inappropriate words

Additional Information

- Used to calculate Overall GCS EMS Score.
- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient withdraws from a painful stimulus," a Motor GCS of 4 may be recorded, IF there is no other contradicting documentation.

Data Source Hierarchy

First recorded Glasgow Coma Score (Motor)

Field Values

Pediatric (≤ 2 years):

1 No motor response 4 Withdrawal from pain

2 Extension to pain 5 Localizing pain

3 Flexion to pain 6 Appropriate response to stimulation

Adult:

1 No motor response 4 Withdrawal from pain

2 Extension to pain3 Flexion to pain5 Localizing pain6 Obeys commands

Additional Information

- Used to calculate Overall GCS EMS Score.
- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient withdraws from a painful stimulus," a Motor GCS of 4 may be recorded, IF there is no other contradicting documentation.

Data Source Hierarchy

First recorded Glasgow Coma Score (total) measured in the pre-hospital setting.

Field Values

• Relevant value for data element (3-15).

Additional Information

- Utilize only if total score is available without component scores.
- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- Many times GCS total will be recorded without components (eye, verbal, motor) i.e. GCS-11.

- EMS Form if Present from scene; the first ambulance; not transferring EMS unit
- 2. First Referring Facility (if applicable)
- 3. Hospital ED Nurses' Notes
- 4. Hospital History and Physical

INITIAL GCS ASSESSMENT QUALIFIERS

Definition

First recorded Glasgow Coma Score factors potentially affecting the first GCS assessment. .

Field Values

1 Patient Chemically Sedated 3 Patient Intubated

2 Obstruction to the Patient's Eye 4 Valid GCS: Patient was not sedated, not intubated,

and did not have obstruction to eye

Additional Information

• Identifies treatments given to the patient that may affect the first assessment of GCS. This field does not apply to self-medications the patient may administer (i.e., ETOH, prescriptions, etc.).

Data Source Hierarchy	
No hierarchy	

EMS AIRWAY MANAGEMENT

Definition

Device used to assist intubation of airway.

Field Values

- Bag and Mask
- Combitube
- Crico
- LMA
- Nasal ETT
- Oral Airway
- Oral ETT
- Trach

- King Airway
- Nasal Trumpet

Additional Information

- If the patient is transferred to your facility with no EMS run sheet from the scene of injury, record as *Not Known/Not Recorded*.
- If not performed, use dropdown menu for choices.

- 1. EMS Form
- 2. First Referring Facility (if applicable)

Reason for transporting to hospital.

Field Values

- Closest facility
- Diversion
- Hospital of choice
- On-line medical direction
- Other
- Specialty resource center (trauma center or burn center)
- Not transported (tiered-response)
- Not known.

Additional Information

- When a tiered-response is used, you may have more than one EMS provider to enter.
- Enter all available data elements but indicate destination determination for transporting service (ambulance or helicopter).
- For EMS providers that do not transport patient to the hospital, enter not transported (tiered response) for destination determination. i.e., Fire Department Ambulance is first responder but determine that helicopter is needed for patient.
- Helicopter service transports patient from the scene to trauma center.
- Fire Department Ambulance service destination determination would be not transported (tiered-response).
- Helicopter service destination determination would be specialty resource center.

- 1. EMS Form
- 2. First Referring Facility (if applicable)

Referring Hospital Information

The name of the referring hospital.

Field Values

Relevant value for data element.

Additional Information

- Patient's transferred from a private doctor's office, stand-alone ambulatory surgery center are not considered an inter-facility transfer.
- Outlying facilities purporting to provide emergency care services or utilized to stabilize a patient are considered acute care facilities.

- Referring Facility (if applicable), last referring hospital first
- 2. Transfer Form
- 3. History and Physical
- 4. Inter-facility EMS Transfer Forms

The date the patient arrived at the referring hospital including the Emergency Department.

Field Values

Relevant value for data element.

Additional Information

- If the patient was brought to the ED, enter date patient arrived at ED. If patient was directly admitted to the hospital, enter date patient was admitted to the hospital.
- Collected as MM-DD-YYYY.

- Referring Facility (if applicable), last referring hospital first
- 2. Transfer Form
- 3. History and Physical

The time the patient arrived to the referring hospital including Emergency Department.

Field Values

Relevant value for data element.

Additional Information

- If the patient was brought to the ED, enter time patient arrived at ED. If patient was directly admitted to the hospital, enter time patient was admitted to the hospital.
- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).

- Referring Facility (if applicable), last referring hospital first
- 2. Transfer Form
- 3. History and Physical

The mode of transport delivering the patient to the transferred hospital

Field Values

- EMS
- Fixed-wing Ambulance
- Ground Ambulance
- Helicopter Ambulance

- Other
- Police
- Private/Public Vehicle/Walk-in

Additional Information

- The transport mode delivering the patient to your hospital-ambulance, helicopter, or fixed-wing.
- In NE, ALS providers have EMS service # in 5000 range; BLS providers have EMS # in 1000 range.

- 1. EMS Form
- 2. Referring Facility (if applicable), last referring hospital first
- 3. Transfer Form
- 4. History and Physical

First recorded systolic blood pressure in the referring hospital.

Field Values

• Relevant value for data element (range 0-299).

Additional Information

 Additional systolic BP optional but may be useful if there is a dramatic decrease or increase from the first reading.

Data Source Hierarchy

First recorded pulse in the referring hospital (palpated or auscultated), expressed as a number per minute.

Field Values

• Relevant value for data element (range 0-299).

Additional Information

• Additional vitals optional but may be useful if have a dramatic decrease or increase from first reading.

Data Source Hierarchy

First recorded temperature (in degrees Celsius or Fahrenheit) in the referring hospital.

Field Values

• Relevant value for data element (Celsius 0-45 or Fahrenheit 0-120).

Additional Information

 Additional temperature is optional but may be useful if there is a dramatic decrease or increase from the first reading.

Data Source Hierarchy

First recorded respiratory rate in the referring hospital setting (expressed as a number per minute).

Field Values

• Relevant value for data element (range 0-99).

Additional Information

 Additional rate optional but may be useful if there is a dramatic decrease or increase from the first reading.

Data Source Hierarchy

First recorded oxygen saturation in the referring hospital setting (expressed as a percentage).

Field Values

• Relevant value for data element (0-100).

Additional Information

Data Source Hierarchy

Devise used to assist intubation of airway.

Field Values

- Bag and Mask Combitube
- Crico
- LMA
- Nasal ETT
- Oral AirwayOral ETT
- Trach

- King Airway Nasal Trumpet

Additional Information

Data Source Hierarchy

First recorded Glasgow Coma Score (Eye) in the referring ED/hospital.

Field Values

1 No eye movement when assessed

3 Opens eyes in response to verbal stimulation

2 Opens eyes in response to painful stimulation

4 Opens eyes spontaneously

Additional Information

• Used to calculate Overall GCS - ED Score.

Data Source Hierarchy

First recorded Glasgow Coma Score (Verbal) in the referring ED/hospital.

Field Values

Pediatric (≤ 2 years):

1 No vocal response 4 Cries but is consolable, inappropriate interactions

2 Inconsolable, agitated 5 Smiles, oriented to sounds, follows objects, interacts

3 Inconsistently consolable, moaning

Adult:

1 No verbal response 4 Confused

2 Incomprehensible sounds 5 Oriented

3 Inappropriate words

Additional Information

• Used to calculate Overall GCS - ED Score.

Data Source Hierarchy

First recorded Glasgow Coma Score (Motor) in the referring ED/hospital.

Field Values

Pediatric (≤ 2 years):

1 No motor response 4 Withdrawal from pain

2 Extension to pain 5 Localizing pain

3 Flexion to pain 6 Appropriate response to stimulation

Adult:

1 No motor response 4 Withdrawal from pain

2 Extension to pain 5 Localizing pain

3 Flexion to pain 6 Obeys commands

Additional Information

• Used to calculate Overall GCS - ED Score.

Data Source Hierarchy

First recorded Glasgow Coma Score (total) in the referring ED/hospital.

Field Values

• Relevant value for data element.

Additional Information

- Auto calculates if eye, verbal and motor components of GCS entered (3-15).
- Additional GCS total optional but may be useful if have dramatic decrease or increase from first reading.

Data Source Hierarchy

The date the patient was discharged from the referring hospital.

Field Values

• Relevant value for data element.

Additional Information

• Collected as MM-DD-YYYY.

- 1. Referring Facility (if applicable)
- 2. Transfer Form
- 3. History and Physical Form
- 4. Interfacility EMS Transfer Form

The time the patient was discharged from the referring hospital.

Field Values

Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- This may be found on transporting service form as time of departure, time on nurse's notes as time of departure or time on transfer forms.

- 1. Referring Facility (if applicable)
- 2. Transfer Form
- 3. History and Physical Form
- 4. Interfacility EMS Transfer Form

Emergency Department Information

Was patient was directly admitted to the facility?

Field Values

- Yes
- No

Additional Information

- No is default
- If yes, ED discharge date & time are not entered since they are not applicable for direct admit.

- 1. Hospital History and Physical
- 2. Physician Progress Notes
- 3. Discharge Summary
- 4. Hospital Nurses Notes
- 5. Hospital Transfer Form

The date the patient arrived to the ED/ hospital.

Field Values

Relevant value for data element.

Additional Information

- If the patient was brought to the ED, enter date patient arrived at ED. If patient was directly admitted to the hospital, enter date patient was admitted to the hospital.
- Collected as MM-DD-YYYY.
 Used to auto-generate two additional calculated fields: Total EMS Time: (elapsed time from EMS dispatch to hospital arrival) and Total Length of Hospital Stay (elapsed time from ED/Hospital Arrival to ED/Hospital Discharge).

- 1. Trauma Flow Sheet
- 2. ED Record
- 3. EMS (if available)
- 4. Physician progress record
- 5. Hospital Nurses Notes

The time the patient arrived to the ED/ hospital.

Field Values

• Relevant value for data element.

Additional Information

- If the patient was brought to the ED, enter time patient arrived at ED. If patient was directly admitted to the hospital, enter time patient was admitted to the hospital.
- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).

- 1. Trauma Flow Sheet
- 2. EMS (if available)
- 3. Physician progress record
- 4. Hospital Nurses Notes

The date the patient was discharged from the ED.

Field Values

• Relevant value for data element.

Additional Information

- Collected as MM-DD-YYYY.
- Used to auto-generate an additional calculated field: Total ED Time (ED Length of stay): elapsed time from ED admit to ED discharge.
- If the patient is directly admitted to the hospital, code as Not Applicable

Data Source Hierarchy

- 1. ED Record
- 2. ED Nursing Notes

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The time the patient was discharged from the ED.

Field Values

Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Used to auto-generate an additional calculated field: Total ED Time (ED Length of stay): elapsed time from ED admit to ED discharge.
- If the patient is directly admitted to the hospital, code as Not Applicable

- 1. ED Record
- 2. ED Nursing Notes

The time the physician or Advanced Practice Provider decided to transfer the patient.

Field Values

• Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).

- 1. Trauma Team Flow Sheet
- 2. Acute care transfer form
- 3. ED Physician notes
- 4. ED Nursing Notes

The disposition of the patient at the time of discharge from the ED.

Field Values

- 1 Floor bed (general admission, non-specialty unit bed) 7 Operating Room
- 2 Observation unit (unit that provides < 24 hour stays) 8 Intensive Care Unit (ICU)
- 3 Telemetry/step-down unit (less acuity than ICU) 9 Home without services
- 4 Home with services 10 Left against medical advice
- 5 Died 11 Transferred to another hospital
- 6 Other (jail, institutional care, mental health, etc.) 12 Burn Center / Burn Hospital

Additional Information

• The null value "Not Applicable" is used if the patient is directly admitted to the hospital.

- 1. ED Nursing Notes
- 2. ED Record
- 3. History and Physical Form

Select all transfer delay reasons that apply.

Field Values

- Delayed identification that the patient needed trauma center resources
- EMS Issue
- Equipment Issue
- High ED census at transferring hospital/busy
- High ED census at receiving hospital/busy
- In-house imaging delay
- Late requesting transporting EMS unit
- Low patient acuity
- Patient status change/complication
- Referring Hospital CT Scan
- Receiving Hospital Issue
- Referring Hospital Issue
- Referring Physician Decision Making
- Referring Hospital Radiology
- Weather or Natural Factors
- Other

Additional Information

Use Referring Hospital-Radiology, when waiting for results of X-rays caused delay in transfer Use Referring Hosp—CT scan, when CT scan and results of CT caused delay in transfer

Data Source Hierarchy

- 1. ED Nursing Notes
- 2. ED Physician Notes
- 3. Peer Review/ Performance

Improvement Documentation

If the trauma team was activated.

Field Values

- Not activated
- Level 1 (highest level of activation which includes more team members or if only have one level of trauma team activation).
- Level 2 (next level of activation if have fewer team members for stable patients),
- Level 3 (consult of trauma or general surgery).

Additional Information

Revised Trauma Activation Level

- 1. Trauma team activation form
- 2. History and Physical
- 3. Electronic ED Record
- 4. EMS

The time the Trauma team was called.

Field Values

• Appropriate value for this field, format (HH:MM).

Additional Information

- Revised Trauma Team activation time
- Enter in military time format

- 1. Trauma team activation form
- ED Nursing Notes History and Physical

The time each trauma team staff member arrived in the Emergency Department.

Field Values

• Appropriate value for this field, format (HH:MM).

Additional Information

- Actual arrival time
- Enter in military time format

- 1. Trauma team activation form
- 2. ED Nursing Notes
- 3. History and Physical

The time the Trauma team physician was called.

Field Values

• Appropriate value for this field, format (HH:MM).

Additional Information

• Enter in military time format

- 1. Trauma team activation form/pack
- 2. ED Nursing Notes
- 3. History and Physical

Patient received the highest level of trauma activation at your hospital.

2. No

Field Values

1.Yes

Additional Information

- Highest level of activation is defined by your hospital's criteria.
- INCLUDE: patients who received the highest level of trauma activation initiated by emergency medical services (EMS) or by emergency department (ED) personnel at your hospital.
- INCLUDE: patients who received the highest level of trauma activation initiated by emergency medical services (EMS) or by emergency department (ED) personnel at your hospital and were downgraded after arrival to your center.
- INCLUDE: patients who received a lower level of trauma activation initiated by emergency
 medical services (EMS) or by emergency department (ED) personnel at your hospital and
 were upgraded to the highest level of trauma activation.
 EXCLUDE: patients who received the highest level of trauma activation after emergency department
 (ED) discharge.

- 1. Triage/Trauma Flow Sheet
- 2. ED Record
- 3. History & Physical
- 4. Physician Notes
- 5. Discharge Summary

The date the first trauma physician arrived at the patient's bedside.

Field Values

Relevant value for data element.

Additional Information

- Collected as YYYY-MM-DD.
- Limit reporting to the 24 hours after ED/Hospital arrival.
- The trauma surgeon leads the trauma team and is responsible for the overall care of trauma patient, including coordinating care with other specialties and maintaining continuity of care.
- The null value "Not Applicable" is reported for those patients who were not evaluated by a trauma surgeon within 24 hours of ED/Hospital arrival.
- The null value "Not Applicable" is reported if the data element Highest Activation is reported as Element Value "2. No."

- 1. Triage/Trauma Flow Sheet
- 2. History & Physical
- 3. Physician Notes
- 4. Nursing Notes

The TIME the first trauma physician arrived at the patient's bedside.

Field Values

Relevant value for data element.

Additional Information

- Collected as HHMM military time.
- Limit reporting to the 24 hours after ED/Hospital arrival.
- The trauma surgeon leads the trauma team and is responsible for the overall care of trauma patient, including coordinating care with other specialties and maintaining continuity of care.
- The null value "Not Applicable" is reported for those patients who were not evaluated by a trauma surgeon within 24 hours of ED/Hospital arrival.
- The null value "Not Applicable" is reported if the data element Highest Activation is reported as Element Value "2. No."

- 1. Triage/Trauma Flow Sheet
- 2. History & Physical
- 3. Physician Notes
- 4. Nursing Notes

The service, to which the patient is designated upon admission to your hospital.

Field Values

• Relevant value for data element.

Additional Information

- Medicine (includes Internal Medicine, Family Medicine, Pediatrics and all medical sub specialists)
- Neurosurgery
- Orthopedics
- Pediatric Surgery
- Surgical Subspecialty
- Trauma (includes General Surgery)

- 1. Trauma History and Physical
- 2. ED Record
- 3. Patient Encounter Information Form

Initial Assessment

First recorded systolic blood pressure in the ED/hospital within 30 minutes or less of ED/hospital arrival.

Field Values

• Relevant value for data element (range 0-300).

Additional Information

- Please note that first recorded hospital vitals do not need to be from the same assessment.
- Measurement recorded must be without the assistance of CPR or any type of mechanical chest compression device. For those patients who are receiving CPR or any type of mechanical chest compressions, report the value obtained while compressions are paused.
- Used to auto-generate an additional calculated field: Revised Trauma Score ED (adult & pediatric).
- Additional systolic BP optional but may be useful if there is a dramatic decrease or increase from the first reading.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded pulse in the ED/hospital (palpated or auscultated) within 30 minutes or less of ED/hospital arrival (expressed as a number per minute).

Field Values

- Relevant value for data element (range 0-300).
- Additional vitals optional but may be useful if have a dramatic decrease or increase from first reading.

Additional Information

- Please note that first recorded hospital vitals do not need to be from the same assessment.
- Measurement recorded must be without the assistance of CPR or any type of mechanical chest compression device. For those patients who are receiving CPR or any type of mechanical chest compressions, report the value obtained while compressions are paused.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded temperature (in degrees Celsius [centigrade]) in the ED/hospital within 30 minutes or less of ED/hospital arrival.

Field Values

• Relevant value for data element (Celsius 20-42)

Additional Information

- Please note that first recorded hospital vitals do not need to be from the same assessment
- Additional temperature is optional but may be useful if there is a dramatic decrease or increase from the first reading.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded respiratory rate in the ED/hospital within 30 minutes or less of ED/hospital arrival (expressed as a number per minute).

Field Values

Relevant value for data element (range 0-100).

Additional Information

- If recorded, complete additional field: "Initial ED/Hospital Respiratory Assistance."
- Please note that first recorded hospital vitals do not need to be from the same assessment
- Used to auto-generate an additional calculated field: Revised Trauma Score ED (adult & pediatric).
- Additional rate optional but may be useful if there is a dramatic decrease or increase from the first reading.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

Determination of respiratory assistance associated with the initial ED/hospital respiratory rate within 30 minutes or less of ED/hospital arrival.

Field Values

1. Unassisted Respiratory Rate

2. Assisted Respiratory Rate

Additional Information

- Only completed if a value is provided for Initial ED/Hospital Respiratory Rate.
- Respiratory Assistance is defined as mechanical and/or external support of respiration.
- Please note that first recorded hospital vitals do not need to be from the same assessment.
- The null value "Not Applicable" is used if "Initial ED/Hospital Respiratory Rate" is "Not Known/Not Recorded."

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded oxygen saturation in the ED/hospital within 30 minutes or less of ED/ hospital arrival (expressed as a percentage).

Field Values

• Relevant value for data element (0-100).

Additional Information

- If available, complete additional field: "Initial ED/Hospital Supplemental Oxygen."
- Please note that first recorded hospital vitals do not need to be from the same assessment.
- Additional vitals optional but may be useful if have dramatic decrease or increase from first reading.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

Determination of the presence of supplemental oxygen during assessment of initial ED/hospital oxygen saturation level within 30 minutes or less of ED/ hospital arrival.

Field Values

1. No Supplemental Oxygen

2. Supplemental Oxygen

Additional Information

- Only completed if a value is reported for Initial ED/Hospital Oxygen Saturation, otherwise report as "Not Applicable".
- Please note that first recorded hospital vitals do not need to be from the same assessment.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded Glasgow Coma Score (Eye) within 30 minutes or less of ED/hospital arrival.

Field Values

1. No eye movement when assessed

- 3. Opens eyes in response to verbal stimulation
- 2. Opens eyes in response to painful stimulation
- 4. Opens eyes spontaneously

Additional Information

- Used to calculate Overall GCS ED Score.
- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient's pupils are PERRL," an Eye GCS of 4 may be recorded, IF there is no other contradicting documentation.
- Please note that first recorded hospital vitals do not need to be from the same assessment.
- The null value "Not Known/Not Recorded" is reported if Initial ED/Hospital GCS 40 Eye is reported.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded Glasgow Coma Score (Verbal) within 30 minutes or less of ED/hospital arrival.

Field Values

Pediatric (≤ 2 years):

1 No vocal response 4 Cries but is consolable, inappropriate interactions

2 Inconsolable, agitated 5 Smiles, oriented to sounds, follows objects, interacts

3 Inconsistently consolable, moaning

Adult:

1 No verbal response 4 Confused

2 Incomprehensible sounds 5 Oriented

3 Inappropriate words

Additional Information

- Used to calculate Overall GCS ED Score.
- If patient is intubated then the GCS Verbal score is equal to 1.
- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient is oriented to person place and time," a Verbal GCS of 5 may be recorded, IF there is no other contradicting documentation.
- Please note that first recorded hospital vitals do not need to be from the same assessment.
- The null value "Not Known/Not Recorded" is reported if Initial ED/Hospital GCS 40 Verbal is reported.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded Glasgow Coma Score (Motor) within 30 minutes or less of ED/hospital arrival.

Field Values

Pediatric (≤ 2 years):

1 No motor response 4 Withdrawal from pain

2 Extension to pain 5 Localizing pain

3 Flexion to pain 6 Appropriate response to stimulation

Adult:

1 No motor response 4 Withdrawal from pain

2 Extension to pain 5 Localizing pain

3 Flexion to pain 6 Obeys commands

Additional Information

Used to calculate Overall GCS - ED Score.

- If a patient does not have a numeric GCS score recorded, but written documentation closely (or directly) relates to verbiage describing a specific level of functioning within the GCS scale, the appropriate numeric score may be listed. E.g. the chart indicates: "patient withdraws from a painful stimulus," a Motor GCS of 4 may be recorded, IF there is no other contradicting documentation.
- Please note that first recorded/hospital vitals do not need to be from the same assessment.
- The null value "Not Known/Not Recorded" is reported if Initial ED/Hospital GCS 40 Motor is reported.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

First recorded Glasgow Coma Score (total) within 30 minutes or less of ED/hospital arrival.

Field Values

Relevant value for data element.

Additional Information

- Auto calculates if eye, verbal and motor components of GCS entered (3-15).
- If a patient does not have a numeric GCS recorded, but there is documentation related to their level of consciousness such as "AAOx3," "awake alert and oriented," or "patient with normal mental status," interpret this as GCS of 15 IF there is no other contradicting documentation.
- Please note that first recorded/hospital vitals do not need to be from the same assessment.
- Additional GCS total optional but may be useful if have dramatic decrease or increase from first reading.
- Used to auto-generate an additional calculated field: Revised Trauma Score ED (adult & pediatric).
- The null value "Not Known/Not Recorded" is reported if Initial ED/Hospital GCS 40 is recorded.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

Documentation of factors potentially affecting the first assessment of GCS within 30 minutes or less of ED/hospital arrival.

Field Values

1 Patient Chemically Sedated or Paralyzed 3 Patient Intubated

2 Obstruction to the Patient's Eye 4 Valid GCS: Patient was not sedated, not intubated,

and did not have obstruction to eye

Additional Information

• Identifies treatments given to the patient that may affect the first assessment of GCS. This field does not apply to self-medications the patient may administer (i.e., ETOH, prescriptions, etc.).

- If an intubated patient has recently received an agent that results in neuromuscular blockade such that
 a motor or eye response is not possible, then the patient should be considered to have an exam that is
 not reflective of their neurologic status and the chemical sedation modifier should be selected.
- Neuromuscular blockade is typically induced following the administration of agent like succinylcholine, mivacurium, rocuronium, (cis)atracurium, vecuronium, or pancuronium. While these are the most common agents, please review what might be typically used in your center so it can be identified in the medical record.
- Each of these agents has a slightly different duration of action, so their effect on the GCS depends on when they were given. For example, succinylcholine's effects last for only 5-10 minutes.
- Please note that first recorded/hospital vitals do not need to be from the same assessment.
- Check all that apply.

- 1. Trauma Team Flow Sheet
- 2. ED Record
- 3. Hospital History and Physical
- 4. Nursing Notes

ED AIRWAY MANAGEMENT

Definition

Devise used to assist intubation of airway.

Field Values

- Bag & Mask
- Combitube
- Crico
- LMA
- Nasal ETT

- Oral Airway
- Oral ETT
- Trach
- King Airway
- Nasal Trumpet

Additional Information

- 1. Trauma Team Flow Sheet
- 2. Nursing notes
- 3. History and Physical
- 4. Respiratory Notes/ Flow Sheet
- 5. EMS Report

Head - Portion of the body, which contains the brain and organs of sight, smell, hearing, and taste. CT Scan (Computerized Axial Tomography) - a diagnostic procedure that utilizes a computer to analyze x-ray data.

Field Values

- Relevant value for data element.
- Not performed is default (Image Trend).
- Not available is default (NTRACS).

Additional Information

- Cervical CT, Abd/pelvis CT, Chest CT, Abdominal Ultrasound, Arteriogram, Aortogram not applicable
 or not performed as default; use dropdown menu if performed for choices.
- Date can be pulled from ED/acute care arrival date by clicking green arrow.
- Date & time of CT and ultrasound is optional
- For positive results, use the following descriptions:
- Head CT positive significant positive findings showing actual injury to brain, not to include the bony structures or face
- <u>Abdominal CT positive</u> significant positive findings showing injury to abdominal organs, not to include the bony structures
- <u>Chest CT positive</u> significant positive findings showing actual injury to chest organ only, not to include the bony structure
- Abdominal Ultrasound positive significant positive finding showing fluid in abdomen
- Aortogram positive aorta has identifiable injuries
- Arteriogram positive arteries have identifiable injuries

- 1. Radiology CT of Head
- 2. Neurosurgery Consultation report
- 3. History and Physical

A blood alcohol concentration (BAC) test was performed on the patient within 24 hours after first hospital encounter.

Field Values

1. Yes 2 No

Additional Information

• Alcohol screen may be administered at any facility, unit, or setting treating this patient event.

First recorded blood alcohol concentration (BAC) results within 24 hours after first hospital encounter

Field Values

• Relevant value for data element.

Additional Information

- If tested, enter results of blood alcohol content in mg/dl i.e. BAL of 0.08 is 80mg/dl.
- Collect as X.XX standard lab value (e.g. 0.08).
- Record BAC results within 24 hours after first hospital encounter, at either your facility or the transferring facility.
- To convert XXX % BSAC to mg/dl, multiply by 1000 (e.g. 0.08% BSAC = 80 mg/dl)

- 1. Laboratory Results
- 2. Hospital History and Physical
- 3. Nursing Notes
- 4. ED Record

DRUG USE INDICATOR Required State

Definition

Use of drugs by the patient.

Field Values

1 No (not tested) 3 Yes (confirmed by test [prescription drug])

2 No (confirmed by test) 4 Yes (confirmed by test [illegal use drug])

Additional Information

- Drug use may be documented at any facility (or setting) treating this patient event.
- "Illegal use drug" includes illegal use of prescription drugs.
- If drug use is suspected, but not confirmed by test, record null value "Not Known/Not Recorded."
- This data element refers to drug use by the patient and does not include medical treatment.
- "No" is reported for patients whose only positive results are due to drugs administered at any facility (or setting) treating this patient event.
- Check for medications administered to patient by EMS providers or hospital before drug screen is completed.

- 1. Laboratory Results
- 2. Hospital History and Physical
- 3. Nursing Notes
- 4. ED Record
- 5. EMS Record

First recorded positive drug screen results within 24 hours after first hospital encounter (select all that apply).

Field Values

- AMP (Amphetamine)
- BAR (Barbiturate)
- BZO (Benzodiazepines)
- COC (Cocaine)
- mAMP (Methamphetamine)
- MDMA (Ecstasy)
- MTD (Methadone)

- OPI (Opioid)
- OXY (Oxycodone)
- PCP (Phencyclidine)
- TCA (Tricyclic Antidepressant)
- THC (Cannabinoid)
- Other
- None
- Not Tested

Additional Information

- Record positive drug screen results within 24 hours after first hospital encounter, at either your facility or the transferring facility.
- "None" is reported for patients whose only positive results are due to drugs administered at any facility (or setting) treating this patient event, or for patients who were tested and had no positive results.
- If multiple drugs are detected, only report drugs that were not administered at any facility (or setting) treating this patient event.

- 1. Laboratory Results
- 2. Hospital History and Physical
- 3. Nursing Notes
- 4. ED Record

Hospital Procedure Information

Operative and selected non-operative procedures conducted during hospital stay. Operative and selected non-operative procedures are those that were essential to the diagnosis, stabilization, or treatment of the patient's specific injuries or complications. The list of procedures below should be used as a guide to non-operative procedures that should be provided to NTDB.

Field Values

- Major and minor procedure ICD-10 PCS procedure codes.
- The maximum number of procedures that may be reported for a patient is 200.

Additional Information

- Include only procedures performed at your institution.
- Report all procedures performed in the operating room.
- Report all procedures in the ED, ICU, ward, or radiology department that were essential to the diagnosis, stabilization, or treatment of the patient's specific injuries or their complications.
- Procedures with an asterisk have the potential to be performed multiple times during one episode of
 hospitalization. In this case, capture only the first event. If there is no asterisk, capture each event even
 if there is more than one.

DIAGNOSTIC AND THERAPEUTIC IMAGING

- Computerized tomographic Head *
- Computerized tomographic Chest *
- Computerized tomographic Abdomen *
- Computerized tomographic Pelvis *
- Computerized tomographic C-Spine *
- Computerized tomographic T-Spine *
- Computerized tomographic L-Spine *
- Doppler ultrasound of extremities *
- Diagnostic ultrasound (includes FAST) *
- Angioembolization
- Angiography
- IVC filter
- REBOA

CARDIOVASCULAR

- Open cardiac massage
- CPR

CNS

- Insertion of ICP monitor *
- Ventriculostomy
- Cerebral oxygen monitoring *

GENITOURINARY

- Ureteric catheterization (i.e. Ureteric stent)
- Suprapubic cystostomy

MUSCULOSKETETAL

- Soft tissue/bony debridement *
- Closed reduction of fractures
- Skeletal and halo traction
- Fasciotomy

TRANSFUSION

- Transfusion of red cells * (only report first 24 hours after hospital arrival)
- Transfusion of platelets * (only report first 24 hours after hospital arrival)

• Transfusion of plasma * (only report first 24 hours after hospital arrival)

RESPIRATORY

- Insertion of endotracheal tube * (exclude
- intubations performed in the OR)
- Continuous mechanical ventilation *
- Chest tube *
- Bronchoscopy *
- Tracheostomy

• GASTROINTESTINAL

- Endoscopy (includes gastroscopy, sigmoidoscopy, colonoscopy)
- Gastrostomy/jejunostomy (percutaneous or endoscopic)
- Percutaneous (endoscopic)
- Gastrojejunoscopy
- Note that the hospital may capture additional procedures.

- 1. Operative Record
- 2. Hospital Discharge Summary
- 3. Anesthesia Form
- 4. Billing Sheet/Medical Records

The date operative and selected non-operative procedures were performed.

Field Values

• Relevant value for data element.

Additional Information

• Collected as MM-DD-YYYY.

- 1. Anesthesia Form
- 2. Operative Record
- 3. OR Nurses Notes
- 4. Charting if ED or ICU procedures
- 5. Physicians Progress Notes if ED or ICU procedures

The time operative and selected non-operative procedures were performed.

Field Values

Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Procedure start time is defined as the time the incision was made (or the procedure started).

- 1. Anesthesia Form
- 2. Operative Record
- 3. OR Nurses Notes
- 4. Charting if ED or ICU procedures
- Physicians Progress Notes if ED or ICU procedures

Pre-Existing Conditions

Pre-existing co-morbid factors.

Field Values

- Alcoholism Alcohol Use Disorder
- Angina Pectoris
- Anticoagulant Therapy
- Ascites within 30 days
- Attention Deficit Disorder/Attention Deficit Hyperactivity Disorder (ADD/ADHD)
- Bleeding disorder
- Chemotherapy for cancer within 30 days
 Currently Receiving Chemotherapy for Cancer
- Cirrhosis
- Congenital Anomalies
- Congestive heart failure
- Current smoker
- Currently requiring or on dialysis Chronic Renal Failure
- CVA/residual neurological deficit Cerebrovasculasteroid Use Accident (CVA)
 Substance /
- Dementia

- Diabetes mellitus
- Disseminated cancer
- Do Not Resuscitate (DNR) status Advanced Directive Limiting Care
- Functionally Dependent Health Status
- History of myocardial infarction within past 6 months
- Hypertension requiring medication
 Mental/Personality Disorder
- Other
- Peripheral Arterial Disease (PAD)
- Pregnancy
- Prematurity
- Respiratory Disease Chronic Obstructive Pulmonary Disease (COPD)
- Substance Abuse Disorder

Additional Information

See Appendix A

- 1. History and Physical
- 2. Consults Report
- 3. Billing Sheet
- 4. Discharge Summary
- 5. Referring Hospital (if applicable)

Diagnosis Information

Diagnoses related to all identified injuries.

Field Values

- Refer to Nebraska Trauma Data Standard Inclusion Criteria in page 7
- The maximum number of diagnoses that may be reported for an individual patient is 50.

Additional Information

• ICD-10-CM codes pertaining to other medical conditions (e.g., CVA, MI, comorbidities, etc.) may also be included in this field.

- 1. Autopsy
- 2. Operative Reports
- 3. Radiology Reports
- 4. Physician Notes
- 5. Trauma Flow Sheet
- 6. History and Physical
- 7. Nurse Notes/Flow sheets
- 8. Progress Notes
- 9. Discharge Summary

The Abbreviated Injury Scale (AIS) severity codes that reflect the patient's injuries.

Additional Information

- Each AIS regions has subcategories for whole area, vessels, nerves, internal organs, and skeletal. Extremity regions also include muscles, tendons ligaments and joints. External regions has external, burns, and other. Spine is also subcategorized by cervical, thoracic and lumbar regions.
- AIS allow data to be used to characterize patients and hospital outcomes based upon the presence, severity and type of injury.
- The pre-dot code is the 6 digits preceding the decimal point in an associated AIS code.
- 9 should rarely be used as post-dot code. Using a.9 documents the occurrence of an injury but not the specify severity of injury and therefore cannot be used to calculate Injury Severity Score (ISS)
- AIS-05 codes can be looked up three ways (historical data which is what other users have entered for ICD9-diagnosis codes, search codes and words, and browse codes

- 1. AIS 05 Coding Manual
- 2. Autopsy
- 3. Operative Reports
- 4. Radiology Reports
- 5. Physician Notes
- 6. Trauma Flow Sheet
- 7. History and Physical
- 8. Nurse Notes/Flow sheets
- 9. Progress Notes
- 10. Discharge Summary

Outcome Information

Auto calculated based on ED/acute care admit date and hospital discharge date

Field Values

- Relevant value for data element.
- Default is zero.

Additional Information

- Recorded in full day increments with any partial day listed as a full day.
- If ED disposition is left AMA, transfer, home, died, then hospital LOS is zero. If ED disposition is OR and OR disposition is died, hospital LOS is zero.

Data Source Hierarchy	
Auto calculated	

The total number of patient days in the ICU. Each partial or full day should be measured as one calendar day.

Field Values

- Relevant value for data element.
- Default is zero.

Additional Information

- Recorded in full day increments with any partial day listed as a full calendar day.
- If patient has multiple ICU episodes on the same calendar day, count that day as one calendar day.
- At no time should the ICU LOS exceed the Hospital LOS.

- 1. ICU Nursing Notes
- 2. Physician Progress Notes/ Orders
- 3. Nursing Progress Notes
- 4. Hospital Specific
- 5. Verbal Report

Example#	Start Date	Start Time	Stop Date	Stop Time	LOS
A.	01/01/11	01:00	01/01/11	04:00	1 day (one calendar day)
В.	01/01/11	01:00	01/01/11	04:00	
	01/01/11	16:00	01/01/11	18.00	1 day (2 episodes within one calendar day)
C.	01/01/11	01:00	01/01/11	04:00	
	01/02/11	16:00	01/02/11	1800	2 days (episodes on 2 separate calendar days)
D.	01/01/11	01:00	01/01/11	16:00	
	01/02/11	09:00	01/02/11	18:00	2 days (episodes on 2 separate calendar days)
E.	01/01/11	01:00	01/01/11	16:00	
	01/02/11	09:00	01/02/11	21:00	2 days (episodes on 2 separate calendar days)
F.	01/01/11	Unknown	01/01/11	16:00	1 day
G.	01/01/11	Unknown	01/02/11	16:00	2 days (patient was in ICU on 2 separate calendar days)
Н.	01/01/11	Unknown	01/02/11	16:00	
	01/02/11	18:00	01/02/11	Unknown	2 days (patient was in ICU on 2 separate calendar days)
l.	01/01/11	Unknown	01/02/11	16:00	
	01/02/11	18:00	01/02/11	20:00	2 days (patient was in ICU on 2 separate calendar days)
J.	01/01/11	Unknown	01/02/11	16:00	
	01/03/11	18:00	01/03/11	20:00	3 days (patient was in ICU on 3 separate calendar days)
K.	Unknown	Unknown	01/02/11	16:00	
	01/03/11	18:00	01/03/11	20:00	Unknown (can't compute total)

The cumulative amount of time spent on the ventilator. Each partial or full day should be measured as one calendar day.

Field Values

Relevant value for data element.

Additional Information

- Excludes mechanical ventilation time associated with OR procedures.
- Non-invasive means of ventilator support (CPAP or BIPAP) should not be considered in the calculation of ventilator days.
- Recorded in full day increments with any partial calendar day counted as a full calendar day.
- The calculation assumes that the date and time of starting and stopping Ventilator episode are recorded in the patient's chart.
- At no time should the Total Vent Days exceed the Hospital LOS.

Example#	Start Date	Start Time	Stop Date	Stop Time	LOS
A.	01/01/11	01:00	01/01/11	04:00	1 day (one calendar day)
B.	01/01/11	01:00	01/01/11	04:00	
	01/01/11	16:00	01/01/11	18.00	1 day (2 episodes within one calendar day)
C.	01/01/11	01:00	01/01/11	04:00	
	01/02/11	16:00	01/02/11	1800	2 days (episodes on 2 separate calendar days)
D.	01/01/11	01:00	01/01/11	16:00	
	01/02/11	09:00	01/02/11	18:00	2 days (episodes on 2 separate calendar days)
E.	01/01/11	01:00	01/01/11	16:00	
	01/02/11	09:00	01/02/11	21:00	2 days (episodes on 2 separate calendar days)
F.	01/01/11	Unknown	01/01/11	16:00	1 day
G.	01/01/11	Unknown	01/02/11	16:00	2 days (patient was on Vent on 2 separate calendar days)
H.	01/01/11	Unknown	01/02/11	16:00	
	01/02/11	18:00	01/02/11	Unknown	2 days (patient was on Vent on 2 separate calendar days)
I.	01/01/11	Unknown	01/02/11	16:00	
	01/02/11	18:00	01/02/11	20:00	2 days (patient was in on Vent on 2 separate calendar days)
Example#	Start Date	Start Time	Stop Date	Stop Time	LOS
J.	01/01/11	Unknown	01/02/11	16:00	
	01/03/11	18:00	01/03/11	20:00	3 days (patient was on Vent on 3 separate calendar days)

- 1. Respiratory Therapy Notes
- 2. Nursing Notes
- 3. Physician's Progress Notes
- 4. Verbal Report

The date the patient was discharged from the hospital.

Field Values

• Relevant value for data element.

Additional Information

- Collected as MM-DD-YYYY.
- Used to auto-generate an additional calculated field: Total Length of Hospital Stay (elapsed time from ED/hospital arrival to hospital discharge).

- 1. Physician Orders
- 2. Discharge Instructions
- 3. Nurses Notes
- 4. Case Management/Social Service Notes
- 5. Discharge Summary

The time the patient was discharged from the hospital.

Field Values

Relevant value for data element.

Additional Information

- Collected as HH:MM.
- HH:MM should be collected as military time (00:00 23:59).
- Used to auto-generate an additional calculated field: Total Length of Hospital Stay (elapsed time from ED/hospital arrival to hospital discharge).

- 1. Physician Orders
- 2. Discharge Instructions
- 3. Nurses Notes
- Case Management/Social Service Notes
- 5. Discharge Summary

The disposition of the patient when discharged from the hospital.

Field Values

- 1 Discharged/Transferred to a short-term general hospital for inpatient care
- 2 Discharged/Transferred to an Intermediate Care Facility (ICF)
- 3 Discharge/Transferred to home under care of organized home health service
- 4 Left against medical advice or discontinued care
- 5 Deceased/Expired
- 6 Discharged home or self-care (routine discharge)
- 7 Discharged/Transferred to Skilled Nursing Facility (SNF)

- 8 Discharged/ Transferred to hospice care
- 10 Discharged/ Transferred to court/ law enforcement
- 11 Discharged/ Transferred to inpatient rehab or designated unit
- 12 Discharged/ Transferred to Long Term Care Hospital (LTCH)
- 13 Discharged/ Transferred to a psychiatric hospital or psychiatric distinct unit of a hospital
- 14 Discharged/ Transferred to another type of institution not defined elsewhere

Additional Information

- List of rosters of facilities and services can be found on the Departments Licensure Website
- Facilities as defined in the Nebraska Health Care Facility Licensure Act; Intermediate Care Facility, Home Health Service, Hospice and Skilled Nursing Care
- If patient expired than additional information required (i.e. Date/Time of death, Death Circumstances, Organ Donation, Autopsy Performed, Advanced Directive)
- Field value = 6, "Home" refers to the patient's current place of residence (e.g., Prison, Child Protective Services etc.)
- Disposition to any other non-medical facility should be coded as 6.
- Disposition to any other medical facility should be coded as 14.
- The null value "Not Applicable" is used if ED Discharge Disposition = 4, 5, 6, 9, 10, or 11.

- 1. Physician Orders
- 2. Discharge Instructions
- 3. Nurses Notes
- Case Management/Social Service Notes
- 5. Discharge Summary

The occupational industry associated with the patient's work environment.

Field Values

1 Finance, Insurance, and Real Estate 8 Construction 2 Manufacturing 9 Government

3 Retail Trade 10 Natural Resources and Mining

4 Transportation and Public Utilities 11 Information Services

5 Agriculture, Forestry, Fishing 12 Wholesale Trade

6 Professional and Business Services 13 Leisure and Hospitality

7 Education and Health Services 14 Other Services

Additional Information

• If work related, also complete Patient's Occupation.

• Based upon US Bureau of Labor Statistics Industry Classification.

- 1. Admission Face Sheet
- 2. Referring Facility Chart (if applicable)
- 3. ED Nursing Notes
- 4. History and Physical
- 5. EMS

The occupation of the patient.

Field Values

- 1 Business and Financial Operations Occupations
- 2 Architecture and Engineering Occupations
- 3 Community and Social Services Occupations
- 4 Education, Training, and Library Occupations
- 5 Healthcare Practitioners and Technical Occupations
- 6 Protective Service Occupations
- 7 Building and Grounds Cleaning and Maintenance
- 8 Sales and Related Occupations
- 9 Farming, Fishing, and Forestry Occupations
- 10 Installation, Maintenance, and Repair Occupations
- 11 Transportation and Material Moving Occupations
- 12 Management Occupations

- 13 Computer and Mathematical Occupations
- 14 Life, Physical, and Social Science Occupations
- 15 Legal Occupations
- 16 Arts, Design, Entertainment, Sports, and Media
- 17 Healthcare Support Occupations
- 18 Food Preparation and Serving Related
- 19 Personal Care and Service Occupations
- 20 Office and Administrative Support Occupations
- 21 Construction and Extraction Occupations
- 22 Production Occupations
- 23 Military Specific Occupations

Additional Information

- Only completed if injury is work-related.
- If work related, also complete Patient's Occupational Industry.
- Based upon 1999 US Bureau of Labor Statistics Standard Occupational Classification (SOC).

- 1. Admission Face Sheet
- 2. Referring Facility Chart (if applicable)
- 3. ED Nursing Notes
- 4. History and Physical
- 5. EMS

Financial Information

Primary source of payment for hospital care.

Field Values

1 Medicaid 6 Medicare

2 Not Billed (for any reason) 7 Other Government

3 Self Pay

4 Private/Commercial Insurance

10 Other

Additional Information

• No Fault Automobile, Workers Compensation, and Blue Cross/Blue Shield should be captured as "4. Private/Commercial Insurance"

- 1. Patient Information/ Face Sheet
- 2. Billing Sheet

Indication of whether the injury occurred during paid employment.

Field Values

1 Yes 2 No

Additional Information

• If entered Yes, then two additional data fields must be completed: Patient's Occupational Industry and Patient's Occupation.

- 1. Scene EMS Report
- 2. Referring Facility Chart (if applicable)
- 3. Trauma Flow Sheet
- 4. History and Physical
- 5. ED Nursing Notes

Quality Assurance Information

Any medical complication that occurred during the patient's stay at your hospital.

Field Values

NTDS complication list

- 1. Other
- 4. Acute Kidney Injury
- 5. Acute Respiratory Distress Syndrome (ARDS)
- 8. Cardiac Arrest with CPR
- 12. Deep Surgical Site Infection
- 14. Deep Vein Thrombosis (DVT)
- 18. Myocardial Infarction
- 19. Organ/Space Surgical Site Infection
- 21. Pulmonary Embolism
- 22. Stroke / CVA
- 25. Unplanned Intubation
- 26. Unplanned Readmission within 30 days

related to prior admission

- 29. Osteomyelitis
- 30. Unplanned Return to the OR
- 31. Unplanned Admission to the ICU
- 32. Severe Sepsis
- 33. Catheter-Associated Urinary Tract Infection

(CAUTI)

34. Central Line-Associated Bloodstream Infection

(CLABSI)

35. Ventilator-Associated Pneumonia (VAP)

36. Alcohol Withdrawal Syndrome

37. Pressure Ulcer

38. Superficial Incisional Surgical Site Infection

Additional Information

- The value "No Complications" should be used for patients with no complications.
- Hospital complications which were removed from the NTDS are not listed, which is why there are numbering gaps.
- Additional information can be found in the NTDB Data Dictionary

- 1. History and Physical
- 2. Physician Notes
- 3. Progress Notes
- 4. Social/Case Management Notes
- 5. Nursing Notes/Flow Sheets
- 6. Triage/Trauma Flow Sheet
- 7. Discharge Summary

Rehabilitation

GLASGOW OUTCOMES SCALE AT 6 MONTHS POST DISCHARGE FROM ACUTE REHAB HOSPITAL/UNIT

Required State Element

Definition

The Glasgow Outcome Scale (GOS) is a global scale for functional outcome that rates patient status into one of five categories: Dead, Vegetative State, Severe Disability, Moderate Disability or Good Recovery.

Field Values

- 1 Death D
- 2 Vegetative state VS
- 3 Lower severe disability SD -
- 4 Upper severe disability SD +
- 5 Lower moderate disability MD -
- 6 Upper moderate disability MD +
- 7 Lower good recovery GR -
- 8 Upper good recovery GR +

Definition

The patient's living setting when discharged.

Field Values

- 01- Home (private home/apt., board/care, assisted living, group home, transitional living)
- 02- Short-term General Hospital
- 03 Skilled Nursing Facility (SNF)
- 04 Intermediate care
- 06 Home under care of organized home health service organization
- 50 Hospice (home)
- 51 Hospice (institutional facility)
- 61 Swing bed
- 62 Another Inpatient Rehabilitation Facility
- 63 Long-Term Care Hospital (LTCH)
- 64 Medicaid Nursing Facility
- 65 Inpatient Psychiatric Facility
- 66 Critical Access Hospital
- 99 Not Listed

Definition

The Ranchos Los Amigos Scale measures the levels of awareness, cognition, behavior and interaction with the environment.

Field Values

Level I: No Response

Level II: Generalized Response Level III: Localized Response Level IV: Confused-agitated Level V: Confused-inappropriate Level VII: Automatic-appropriate Level VIII: Purposeful-appropriate

APPENDIX A: PRE-EXISTING CONDITIONS

ADVANCE DIRECTIVE LIMITING CARE

Definition

The patient had a written request limiting life sustaining therapy, or similar advanced directive.

Field Values

1. Yes 2. No

Additional Information

- Present prior to arrival at your center.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
16001	1	Value is not a valid menu option
16003	2	Field cannot be blank
16004	2	Field cannot be "Not Applicable"
16040	1	Single Entry Max exceeded

ALCOHOL USE DISORDER

Definition

Descriptors documented in the medical record consistent with the diagnostic criteria of alcohol use disorder OR a diagnosis of alcohol use disorder documented in the patient's medical record.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Consistent with American Psychiatric Association (APA) DSM 5, 2013.
- A diagnosis of Alcohol Use Disorder must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
16101	1	Value is not a valid menu option
16103	2	Field cannot be blank
16104	2	Field cannot be "Not Applicable"
16140	1	Single Entry Max exceeded

ANGINA PECTORIS

Definition

Chest pain or discomfort due to coronary heart disease. Usually causes uncomfortable pressure, fullness, squeezing or pain in the center of the chest. Patient may also feel the discomfort in the neck, jaw, shoulder, back or arm. Symptoms may be different in women than men.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of Angina or Chest Pain must be documented in the patient's medical record.
- Consistent with American Heart Association (AHA), May 2015.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

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ANTICOAGULANT THERAPY

Definition

Documentation in the medical record of the administration of medication (anticoagulants, antiplatelet agents, thrombin inhibitors, thrombolytic agents) that interferes with blood clotting.

ANTICOAGULANTS	ANTIPLATELET	THROMBIN	THROMBOLYTIC
	AGENTS	INHIBITORS	AGENTS
Fondaparinux	Tirofiban	Bevalirudin	Alteplase
Warfarin	Dipyridamole	Argatroban	Reteplase
Dalteparin	Anagrelide	Lepirudin, Hirudin	Tenacteplase
Lovenox	Eptifibatide	Drotrecogin alpha	kabikinase
Pentasaccaride	Dipyridamole	Dabigatran	tPA
APC	Clopidogrel		
Ximelagatran	Cilostazol		
Pentoxifylline	Abciximab		
Rivaroxaban	Ticlopidine		
Apixaban	Prasugrel		
Heparin	Ticagrelor		

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Exclude patients whose only anticoagulant therapy is chronic Aspirin.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
16301	1	Value is not a valid menu option
16303	2	Field cannot be blank
16304	2	Field cannot be "Not Applicable"
16340	1	Single Entry Max exceeded

ATTENTION DEFICIT DISORDER/ATTENTION DEFICIT HYPERACTIVITY DISORDER (ADD/ADHD)

Definition

A disorder involving inattention, hyperactivity, or impulsivity requiring medication for treatment.

Field Values

1. Yes 2. No

Additional Information

- Present prior to ED/Hospital arrival.
- A diagnosis of ADD/ADHD must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
16401	1	Value is not a valid menu option
16403	2	Field cannot be blank
16404	2	Field cannot be "Not Applicable"
16440	1	Single Entry Max exceeded

BLEEDING DISORDER

Definition

A group of conditions that result when the blood cannot clot properly.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A Bleeding Disorder diagnosis must be documented in the patient's medical record (e.g. Hemophilia, von Willenbrand Disease, Factor V Leiden).
- Consistent with American Society of Hematology, 2015.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
16501	1	Value is not a valid menu option
16503	2	Field cannot be blank
16504	2	Field cannot be "Not Applicable"
16540	1	Single Entry Max exceeded

CEREBRAL VASCULAR ACCIDENT (CVA)

Definition

A history prior to injury of a cerebrovascular accident (embolic, thrombotic, or hemorrhagic) with persistent residual motor sensory or cognitive dysfunction (e.g., hemiplegia, hemiparesis, aphasia, sensory deficit, impaired memory).

Field Values

1. Yes 2. No

CATHETER-RELATED BLOOD Additional Information

- Present prior to injury.
- A diagnosis of CVA must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
16601	1	Value is not a valid menu option
16603	2	Field cannot be blank
16604	2	Field cannot be "Not Applicable"
16640	1	Single Entry Max exceeded

CHRONIC OBSTRUCTIVE PULMONARY DISEASE (COPD)

Definition

Lung ailment that is characterized by a persistent blockage of airflow from the lungs. It is not one single disease but an umbrella term used to describe chronic lung diseases that cause limitations in lung airflow. The more familiar terms "chronic bronchitis" and "emphysema" are no longer used, but are now included within the COPD diagnosis and result in any one or more of the following:

- Functional disability from COPD (e.g., dyspnea, inability to perform activities of daily living [ADLs]).
- Hospitalization in the past for treatment of COPD.
- Requires chronic bronchodilator therapy with oral or inhaled agents.
- A Forced Expiratory Volume in 1 second (FEV1) of < 75% or predicted on pulmonary function testing.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of COPD must be documented in the patient's medical record.
- Do not include patients whose only pulmonary disease is acute asthma.
- Do not include patients with diffuse interstitial fibrosis or sarcoidosis.
- Consistent with World Health Organization (WHO), 2015.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
16701	1	Value is not a valid menu option
16703	2	Field cannot be blank
16704	2	Field cannot be "Not Applicable"
16740	1	Single Entry Max exceeded

CHRONIC RENAL FAILURE

Definition

Chronic renal failure prior to injury that was requiring periodic peritoneal dialysis, hemodialysis, hemodialitration, or hemodialitration.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of Chronic Renal Failure must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
16801	1	Value is not a valid menu option
16803	2	Field cannot be blank
16804	2	Field cannot be "Not Applicable"
16840	1	Single Entry Max exceeded

CIRRHOSIS

Definition

Documentation in the medical record of cirrhosis, which might also be referred to as end stage liver disease.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- If there is documentation of prior or present esophageal or gastric varices, portal hypertension, previous hepatic encephalopathy, or ascites with notation of liver disease, then cirrhosis should be considered present.
- A diagnosis of Cirrhosis, or documentation of Cirrhosis by diagnostic imaging studies or a slaparotomy/laparoscopy, must be in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
16901	1	Value is not a valid menu option
16903	2	Field cannot be blank
16904	2	Field cannot be "Not Applicable"
16940	1	Single Entry Max exceeded

CONGENITAL ANOMALIES

Definition

Documentation of a cardiac, pulmonary, body wall, CNS/spinal, GI, renal, orthopedic, or metabolic anomaly.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of a Congenital Anomaly must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule	ID	Level Message
17001	1	Value is not a valid menu option
17003	2	Field cannot be blank
17004	2	Field cannot be "Not Applicable"
17040	1	Single Entry Max exceeded

CONGESTIVE HEART FAILURE (CHF)

Definition

The 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.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of CHF must be documented in the patient's medical record.
- To be included, this condition must be noted in the medical record as CHF, congestive heart failure, or pulmonary edema with onset of increasing symptoms within 30 days prior to injury.
- Common manifestations are:
 - o Abnormal limitation in exercise tolerance due to dyspnea or fatigue
 - o Orthopnea (dyspnea or lying supine)
 - o Paroxysmal nocturnal dyspnea (awakening from sleep with dyspnea)
 - o Increased jugular venous pressure
 - o Pulmonary rales on physical examination
 - o Cardiomegaly
 - o Pulmonary vascular engorgement
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17101	1	Value is not a valid menu option
17103	2	Field cannot be blank
17104	2	Field cannot be "Not Applicable"
17140	1	Single Entry Max exceeded

CURRENT SMOKER

Definition

A patient who reports smoking cigarettes every day or some days within the last 12 months.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Exclude patients who report smoke cigars or pipes or smokeless tobacco (chewing tobacco or snuff).
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17201	1	Value is not a valid menu option
17203	2	Field cannot be blank
17204	2	Field cannot be "Not Applicable"
17240	1	Single Entry Max exceeded

CURRENTLY RECEIVING CHEMOTHERAPY FOR CANCER

Definition

A patient who is currently receiving any chemotherapy treatment for cancer prior to injury.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Chemotherapy may include, but is not restricted to, oral and parenteral treatment with chemotherapeutic agents for malignancies such as colon, breast, lung, head and neck, and gastrointestinal solid tumors as well as lymphatic and hematopoietic malignancies such as lymphoma, leukemia, and multiple myeloma.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17301	1	Value is not a valid menu option
17303	2	Field cannot be blank
17304	2	Field cannot be "Not Applicable"
17340	1	Single Entry Max exceeded

DEMENTIA

Definition

Documentation in the patient's medical record of dementia including senile or vascular dementia (e.g., Alzheimer's).

Field Values

1. Yes . No

Additional Information

- Present prior to injury.
- A diagnosis of Dementia must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17401	1	Value is not a valid menu option
17403	2	Field cannot be blank
17404	2	Field cannot be "Not Applicable"
17440	1	Single Entry Max exceeded

DIABETES MELLITUS

Definition

Diabetes mellitus that requires exogenous parenteral insulin or an oral hypoglycemic agent.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of Diabetes Mellitus must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Prógress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17501	1	Value is not a valid menu option
17503	2	Field cannot be blank
17504	2	Field cannot be "Not Applicable"
17540	1	Single Entry Max exceeded

DISSEMINATED CANCER

Definition

Patients who have cancer that has spread to one or more sites in addition to the primary site AND in whom the presence of multiple metastases indicates the cancer is widespread, fulminant, or near terminal.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Other terms describing disseminated cancer include: "diffuse", "widely metastatic", "widespread", or "carcinomatosis."
- Common sites of metastases include major organs, (e.g., brain, lung, liver, meninges, abdomen, peritoneum, pleura, bone).
- A diagnosis of Cancer that has spread to one or more sites must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17601	1	Value is not a valid menu option
17603	2	Field cannot be blank
17604	2	Field cannot be "Not Applicable"
17640	1	Single Entry Max exceeded

FUNCTIONALLY DEPENDENT HEALTH STATUS

Definition

Pre-injury functional status may be represented by the ability of the patient to complete age appropriate activities of daily living (ADL).

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Activities of Daily Living include: bathing, feeding, dressing, toileting, and walking.
- Include patients whom prior to injury, and as a result of cognitive or physical limitations relating to a pre-existing medical condition, was partially dependent or completely dependent upon equipment, devices or another person to complete some or all activities of daily living.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17701	1	Value is not a valid menu option
17703	2	Field cannot be blank
17704	2	Field cannot be "Not Applicable"
17740	1	Single Entry Max exceeded

HYPERTENSION

Definition

History of persistent elevated blood pressure requiring medical therapy.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of Hypertension must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17801	1	Value is not a valid menu option
17803	2	Field cannot be blank
17804	2	Field cannot be "Not Applicable"
17840	1	Single Entry Max exceeded

MENTAL/PERSONALITY DISORDERS

Definition

History of a diagnosis and/or treatment for the following disorder(s) documented in the patient's medical record:

- Schizophrenia
- Bipolar Disorder
- Major Depressive Disorder
- Social Anxiety Disorder
- Posttraumatic Stress Disorder
- Antisocial Personality Disorder

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of Mental/Personality Disorder must be documented in the patient's medical record.
- Consistent with American Psychiatric Association (APA) DSM 5, 2013.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
17901	1	Value is not a valid menu option
17903	2	Field cannot be blank
17904	2	Field cannot be "Not Applicable"
17940	1	Single Entry Max exceeded

MYOCARDIAL INFARCTION (MI)

Definition

History of a MI in the six months prior to injury.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- A diagnosis of MI must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
18001	1	Value is not a valid menu option
18003	2	Field cannot be blank
18004	2	Field cannot be "Not Applicable"
18040	1	Single Entry Max exceeded

PERIPHERAL ARTERIAL DISEASE (PAD)

Definition

The narrowing or blockage of the 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 it is more common in the legs than the arms.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Consistent with Centers for Disease Control, 2014 Fact Sheet.
- A diagnosis of PAD must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
18101	1	Value is not a valid menu option
18103	2	Field cannot be blank
18104	2	Field cannot be "Not Applicable"
18140	1	Single Entry Max exceeded

STEROID USE

Definition

Patients that require the regular administration of oral or parenteral corticosteroid medications within 30 days prior to injury for a chronic medical condition.

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Examples of oral or parenteral corticosteroid medications are: prednisone and dexamethasone.
- Examples of chronic medical conditions are: COPD, asthma, rheumatologic disease, rheumatoid arthritis, and inflammatory bowel disease.
- Exclude topical corticosteroids applied to the skin, and corticosteroids administered by inhalation or rectally.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
18301	1	Value is not a valid menu option
18303	2	Field cannot be blank
18304	2	Field cannot be "Not Applicable"
18340	1	Single Entry Max exceeded

SUBSTANCE ABUSE DISORDER

Definition

Descriptors documented in the patient's medical record consistent with the diagnostic criteria of substance use disorders specifically cannabis, hallucinogens, inhalants, opioids, sedative/hypnotics, and stimulants (e.g. patient has a history of drug use; patient has a history of opioid use) OR diagnosis of any of the following documented in the patient's medical record:

- Cannabis Use Disorder; Other Cannabis-Induced Disorder; Unspecified Cannabis-Related Disorder
- Phencyclidine Use Disorder; Other Hallucinogen Use Disorder; Hallucinogen Persisting Perception Disorder; Other Phencyclidine-Induced Disorder; Other Hallucinogen-Induced Disorder; Unspecified Phencyclidine-Related Disorder; Unspecified Hallucinogen-Related Disorder
- Inhalant Use Disorder; Other Inhalant-Induced Disorder; Unspecified Inhalant-Related Disorder
- Opioid Use Disorder; Other Opioid-Induced Disorder; Unspecified Opioid-Related Disorder
- Sedative, Hypnotic, or Anxiolytic Use Disorder; Other Sedative, Hypnotic, or Anxiolytic-Induced Disorder; Unspecified Sedative, Hypnotic, or Anxiolytic-Related Disorder
- Stimulant Use Disorder; Other Stimulant-Induced Disorder; Unspecified Stimulant-Related Disorder

Field Values

1. Yes 2. No

Additional Information

- Present prior to injury.
- Consistent with the American Psychiatric Association (APA) DSM 5, 2013.
- A diagnosis of Substance Abuse Disorder must be documented in the patient's medical record.
- The null value "Not Known/Not Recorded" is only reported if no past medical history is available.
- EXCLUDE: Tobacco Use Disorder and Alcohol Use Disorder

Data Source Hierarchy Guide

- 1. History & Physical
- 2. Physician's Notes
- 3. Progress Notes
- 4. Case Management/Social Services
- 5. Nursing Notes/Flow Sheet
- 6. Triage / Trauma Flow Sheet
- 7. Discharge Summary

Rule ID	Level	Message
18401	1	Value is not a valid menu option
18403	2	Field cannot be blank
18404	2	Field cannot be "Not Applicable"
18440	1	Single Entry Max exceeded

APPENDIX B: HOSPITAL EVENTS

ACUTE KIDNEY INJURY (AKI)

Description

Acute Kidney Injury, AKI (stage 3), is an abrupt decrease in kidney function.

KDIGO Staging of AKI Table:

STAGE SERUM CREATININE
3 3.0 times baseline

OR

Increase in serum creatinine to ≥ 4.0mg/dl (≥353.6µmol/l)

OR

Initiation of renal replacement therapy OR, in patients < 18 years, decrease in eGFR to

< 35ml/min per 1.73 m2

URINE OUTPUT

 $< 0.3 \text{ ml/kg/h for} \ge 24 \text{ hours}$

OR

Anuria for ≥ 12 hours

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of acute kidney injury (AKI) must be documented in the patient's medical record.
- If the patient or family refuses treatment (e.g., dialysis,) the condition is still considered to be present if a combination of oliguria and creatinine are present.
- EXCLUDE patients with renal failure that were requiring chronic renal replacement therapy such as periodic peritoneal dialysis, hemodialysis, hemofiltration, or hemodiafiltration prior to injury.
- Consistent with the March 2012 Kidney Disease Improving Global Outcome (KDIGO)
 Guideline.

ACUTE RESPIRATORY DISTRESS SYNDROME (ARDS)

Description

Timing: Within 1 week of known clinical insult or new or worsening respiratory symptoms.

Chest imaging: Bilateral opacities - not fully explained by effusions, lobar/lung collapse, or nodules

Origin of edema: Respiratory failure not fully explained by cardiac failure of fluid overload. Need objective

assessment (e.g., echocardiography) to exclude hydrostatic edema if no risk factor

present

Oxygenation:

Mild 200 mm Hg < PaO2/FIO2 < 300 mm Hg With PEEP or CPAP ≥ = 5 cm H2Oc

Moderate 100 mm Hg < PaO2/FIO2 < 200 mm Hg With PEEP >5 cm H2O

Severe PaO2/FIO2 < 100 mm Hg With PEEP or CPAP ≥ 5 cm H2O

Additional Information

• Onset of symptoms began after arrival to your ED/hospital.

• A diagnosis of ARDS must be documented in the patient's medical record.

• Consistent with the 2012 New Berlin Definition.

ALCOHOL WITHDRAWAL SYNDROME

Description

Characterized by tremor, sweating, anxiety, agitation, depression, nausea, and malaise. It occurs 6-48 hours after cessation of alcohol consumption and, when uncomplicated, abates after 2-5 days. It may be complicated by grand mal seizures and may progress to delirium (known as delirium tremens).

- Onset of symptoms began after arrival to your ED/hospital.
- Documentation of alcohol withdrawal must be in the patient's medical record.
- Consistent with the 2019 World Health Organization (WHO) definition of Alcohol Withdrawal Syndrome.

CARDIAC ARREST WITH CPR

Description

Cardiac arrest is the sudden cessation of cardiac activity after hospital arrival. The patient becomes unresponsive with no normal breathing and no signs of circulation. If corrective measures are not taken rapidly, this condition progresses to sudden death.

- Onset of symptoms began after arrival to your ED/hospital.
- Cardiac arrest must be documented in the patient's medical record.
- EXCLUDE patients whose ONLY episode of cardiac arrest with CPR was on arrival to your hospital.
- INCLUDE patients who, after arrival at your hospital, have had an episode of cardiac arrest evaluated by hospital personnel, and received compressions or defibrillation or cardioversion or cardiac pacing to restore circulation.

CATHETER-ASSOCIATED URINARY TRACT INFECTION (CAUTI)

Description

A urinary tract infection (UTI) where an indwelling urinary catheter was in place for > 2 calendar days on the date of event, with day of device placement being Day 1,

AND

An indwelling urinary catheter was in place on the date of event or the day before. If an indwelling urinary catheter was in place for more than 2 consecutive days in an inpatient location and then removed, the date of event for the UTI must be the day of device discontinuation or the next day for the UTI to be catheter-associated.

January 2019 CDC CAUTI Criterion SUTI 1a:

Patient must meet 1, 2, and 3 below:

- 1. Patient had an indwelling urinary catheter that had been in place for more than 2 consecutive days in an inpatient location on the date of event AND was either:
 - Present for any portion of the calendar day on the date of event,

OR

- Removed the day before the date of event
- 2. Patient has at least one of the following signs or symptoms:
 - Fever (>38°C): Reminder: To use fever in a patient >65 years of age, the IUC needs to be in place for more than 2 consecutive days in an inpatient location on date of event and is either still in place OR was removed the day before the DOE.
 - Suprapubic tenderness
 - · Costovertebral angle pain or tenderness
 - Urinary urgency
 - Urinary frequency
 - Dysuria
- 3. Patient has a urine culture with no more than two species of organisms identified, at least one of which is a bacterium >10⁵ CFU/ml.

January 2019 CDC CAUTI Criterion SUTI 2:

Patient must meet 1, 2 and 3 below:

- 1. Patient is ≤1 year of age
- 2. Patient has at least one of the following signs or symptoms:
 - fever (>38.0°C)
 - hypothermia (<36.0°C)
 - apnea
 - bradycardia
 - lethargy
 - vomiting
 - suprapubic tenderness
- 3. Patient has a urine culture with no more than two species of organisms, at least one of which is a bacterium of ≥10⁵ CFU/ml.

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of UTI must be documented in the patient's medical record.
- Consistent with the January 2019 CDC defined CAUTI.

CENTRAL LINE-ASSOCIATED BLOODSTREAM INFECTION (CLABSI)

Description

A laboratory-confirmed bloodstream infection (LCBI) where central line (CL) or umbilical catheter (UC) was in place for > 2 calendar days on the date of event, with day of device placement being Day 1,

AND

The line was also in place on the date of event or the day before. If a CL or UC was in place for > 2 calendar days and then removed, the date of event of the LCBI must be the day of discontinuation or the next day to be a CLABSI. If the patient is admitted or transferred into a facility with an implanted central line (port) in place, and that is the patient's only central line, day of first access in an inpatient location is considered Day 1. "Access" is defined as line placement, infusion or withdrawal through the line. Such lines continue to be eligible for CLABSI once they are accessed until they are either discontinued or the day after patient discharge (as per the Transfer Rule.) Note that the "de-access" of a port does not result in the patient's removal from CLABSI surveillance.

January 2016 CDC Criterion LCBI 1:

Patient has a recognized pathogen identified from one or more blood specimens by a culture or non-culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST).

AND

Organism(s) identified in blood is not related to an infection at another site.

OR

January 2016 CDC Criterion LCBI 2:

Patient has at least one of the following signs or symptoms: fever (>38°C), chills, or hypotension.

AND

Organism(s) identified from blood is not related to an infection at another site.

AND

The same common commensal (i.e., diphtheroids [Corynebacterium spp. not C. diphtheriae], Bacillus spp. [not B. anthracis], Propionibacterium spp., coagulase-negative staphylococci [including S. epidermidis], viridans group streptococci, Aerococcus spp., and Micrococcus spp.) is identified from two or more blood specimens drawn on separate occasions, by a culture or non- culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST). Criterion elements must occur within the Infection Window Period, the 7-day time period which includes the collection date of the positive blood, the 3 calendar days before and the 3 calendar days after.

OR

January 2016 CDC Criterion LCBI 3:

Patient ≤ 1 year of age has at least one of the following signs or symptoms: fever (>38° C), hypothermia (<36°C), apnea, or bradycardia

AND

Organism(s) identified from blood is not related to an infection at another site

The same common commensal (i.e., diphtheroids [Corynebacterium spp. not C. diphtheriae], Bacillus spp. [not B. anthracis], Propionibacterium spp., coagulase-negative staphylococci [including S. epidermidis], viridans group streptococci, Aerococcus spp., Micrococcus spp.) is identified from two or more blood specimens drawn on separate occasions, by a culture or non-culture base microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST). Criterion elements must occur within the Infection Window Period, the 7-day time period which includes the collection date of the positive blood, the 3 calendar days before and the 3 calendar days after.

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of CLABSI must be documented in the patient's medical record.
- Consistent with the January 2016 CDC defined CLABSI.

DEEP SURGICAL SITE INFECTION

Description

Must meet the following criteria:

Infection occurs within 30 or 90 days after the NHSN operative procedure (where day 1 = the procedure date) According to list in Table 2

AND

Involves deep soft tissues of the incision (e.g., fascial and muscle layers)

AND

Patient has at least one of the following:

- a. Purulent drainage from the deep incision.
- b. A deep incision that spontaneously dehisces, or is deliberately opened or aspirated by a surgeon, attending physician** or other designee and organism is identified by a culture or non-culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST) or culture or non-culture based microbiologic testing method is not performed.

AND

Organism(s) identified from the deep soft tissues of the incision by culture or non-culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (for example, not Active Surveillance Culture/Testing (ASC/AST) or culture or non-culture based microbiologic testing method is not performed. A culture or non-culture based test from the deep soft tissues of the incision that has a negative finding does not meet this criterion.

AND

Patient has at least one of the following signs or symptoms: fever (>38°C); localized pain or tenderness. A culture or non-culture based test that has a negative finding does not meet this criterion.

c. An abscess or other evidence of infection involving the deep incision that is detected on gross anatomical or histopathologic exam, or imaging test

* The term attending physician for the purposes of application of the NHSN SSI criteria may be interpreted to mean the surgeon(s), infectious disease, other physician on the case, emergency physician, or physician's designee (nurse practitioner or physician's assistant).

COMMENTS: There are two specific types of deep incisional SSIs:

- 1. Deep Incisional Primary (DIP) a deep incisional SSI that is identified in a primary incision in a patient that has had an operation with one or more incisions (e.g., C-section incision or chest incision for CBGB).
- 2. Deep Incisional Secondary (DIS) a deep incisional SSI that is identified in the secondary incision in a patient that has had an operation with more than one incision (e.g., donor site incision for CBGB).

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of SSI must be documented in the patient's medical record.
- Consistent with the January 2019 CDC defined SSI.

DEEP VEIN THROMBOSIS (DVT)

Description

The formation, development, or existence of a blood clot or thrombus within the venous system, which may be coupled with inflammation.

- Onset of symptoms began after arrival to your ED/hospital.
- The patient must be treated with anticoagulation therapy and/or placement of a vena cava filter or clipping of the vena cava.
- A diagnosis of deep vein thrombosis (DVT) must be documented in the patient's medical record, which may be confirmed by venogram, ultrasound, or CT.

DELIRIUM

Description

Acute onset of behaviors characterized by restlessness, illusions, and incoherence of thought and speech. Delirium can often be traced to one or more contributing factors, such as a severe or chronic medical illness, changes in your metabolic balance (such as low sodium), medication, infection, surgery, or alcohol or drug withdrawal.

OR

Patient tests positive after using an objective screening tool like the Confusion Assessment Method (CAM) or the Intensive Care Delirium Screening Checklist (ICDSC).

OR

A diagnosis of delirium documented in the patient's medical record.

- Onset of symptoms began after arrival to your ED/hospital.
- EXCLUDE: Patients whose delirium is due to alcohol withdrawal.

MYOCARDIAL INFARCTION (MI)

Description

An acute myocardial infarction must be noted with documentation of ECG changes indicative of an acute myocardial infarction (MI)

AŃD

New elevation in troponin greater than three times upper level of the reference range in the setting of suspected myocardial ischemia

AND

Physician diagnosis of an acute myocardial infarction that occurred subsequent to arrival at your center

Additional Information

• Onset of symptoms began after arrival to your ED/hospital.

ORGAN/SPACE SURGICAL SITE INFECTION

Description

Must meet the following criteria:

Infection occurs within 30 or 90 days after the NHSN operative procedure (where day 1 = the procedure date) according to the list in Table 2

AND

Infection involves any part of the body deeper than the fascial/muscle layers, that is opened or manipulated during the operative procedure

AND

Patient has at least one of the following:

- a. Purulent drainage from a drain that is placed into the organ/space (e.g., closed suction drainage system, open drain, T-tube drain, CT guided drainage).
- b. Organisms are identified from fluid or tissue in the organ/space by a culture or non-culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST).
- c. An abscess or other evidence of infection involving the organ/space that is detected on gross anatomical or histopathologic exam, or imaging test evidence suggestive of infection.

AND

Meets at least one criterion for a specific organ/space infection site listed in Table 3. These criteria are found in the Surveillance Definitions for Specific Types of Infections chapter.

Additional Information

• Onset of symptoms began after arrival to your ED/hospital.

OSTEOMYELITIS

Description

Osteomyelitis must meet at least one of the following criteria:

- 1. Patient has organism(s) identified from bone by culture or non-culture based microbiologic testing method, which is performed for purposes of clinical diagnosis and treatment, for example, not Active Surveillance Culture/Testing (ASC/AST).
- 2. Patient has evidence of osteomyelitis on gross anatomic or histopathologic exam.
- 3. Patient has at least two of the following localized signs or symptoms:
 - Fever (>38.0°C)
 - Swelling*
 - Pain or tenderness*
 - Heat*
 - Drainage*

AND at least one of the following:

- a. Organisms identified from blood by culture or non-culture based microbiologic testing method, which is performed for purposes of clinical diagnosis and treatment, for example, not Active Surveillance Culture/Testing (ASC/AST) AND Imaging test evidence suggestive of infection (for example, x-ray, CT scan, MRI, radiolabel scan [gallium, technetium, etc.]), which if equivocal is supported by clinical correlation, specifically, physician documentation of antimicrobial treatment for osteomyelitis.
- b. Imaging test evidence suggestive of infection (for example, x-ray, CT scan, MRI, radiolabel scan [gallium, technetium, etc.]), which if equivocal is supported by clinical correlation, specifically, physician documentation of antimicrobial treatment for osteomyelitis).
- *With no other recognized cause

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of osteomyelitis must be documented in the patient's medical record.
- Consistent with the January 2020 CDC definition of Bone and Joint Infection.

PULMONARY EMBOLISM (PE)

Description

A lodging of a blood clot in a pulmonary artery with subsequent obstruction of blood supply to the lung parenchyma. The blood clots usually originate from the deep leg veins or the pelvic venous system.

- Onset of symptoms began after arrival to your ED/hospital.
- Consider the condition present if the patient has a V-Q scan interpreted as high probability of pulmonary embolism or a positive pulmonary arteriogram or positive CT angiogram and/or a diagnosis of PE is documented in the patient's medical record.
- Exclude subsegmental PEs.

PRESSURE ULCER

Description

A localized injury to the skin and/or underlying tissue usually over a bony prominence, as a result of pressure, or pressure in combination with shear. A number of contributing or confounding factors are also associated with pressure ulcers; the significance of these factors is yet to be elucidated. Equivalent to NPUAP Stages II-IV, Unstageable/Unclassified, and Suspected Deep Tissue Injury.

- Onset of symptoms began after arrival to your ED/hospital.
- Pressure ulcer documentation must be in the patient's medical record.
- Consistent with the NPUAP 2014.

SEVERE SEPSIS

Description

Severe sepsis: sepsis plus organ dysfunction, hypotension (low blood pressure), or hypoperfusion (insufficient blood flow) to 1 or more organs.

Septic shock: sepsis with persisting arterial hypotension or hypoperfusion despite adequate fluid resuscitation.

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of sepsis must be documented in the patient's medical record.
- Consistent with the American College of Chest Physicians and the Society of Critical Care Medicine October 2010.

STROKE/CVA

Description

A focal or global neurological deficit of rapid onset and NOT present on admission caused by a clot obstructing the flow of blood flow to the brain (ischemic stroke). Or by a blood vessel rupturing and preventing blood flow to the brain (hemorrhagic stroke). Or a transient ischemic attack which is temporary caused by a temporary clot. The patient must have at least one of the following symptoms:

- Change in level of consciousness
- Hemiplegia
- Hemiparesis
- · Numbness or sensory loss affecting on side of the body
- Dysphasia or aphasia
- Hemianopia
- Amaurosis fugax
- Other neurological signs or symptoms consistent with stroke

AND

• Duration of neurological deficit ≥24 h **OR**

 Duration of deficit <24 h, if neuroimaging (MR, CT, or cerebral angiography) documents a new hemorrhage or infarct consistent with stroke, or therapeutic intervention(s) were performed for stroke, or the neurological deficit results in death AND

- No other readily identifiable non-stroke cause, e.g., progression of existing traumatic brain lnjury, seizure, tumor, metabolic or pharmacologic etiologies, is identified AND
- Diagnosis is confirmed by neurology or neurosurgical specialist or neuroimaging procedure (MR, CT, angiography) or lumbar puncture (CSF demonstrating intracranial hemorrhage that was not present on admission)

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of stroke/CVA must be documented in the patient's medical record.
- Although the neurologic deficit must not present on admission, risk factors predisposing to stroke (e.g., blunt cerebrovascular injury, dysrhythmia) may be present on admission.

SUPERFICIAL INCISIONAL SURGICAL SITE INFECTION

Description

Must meet the following criteria:

Infection occurs within 30 days after any NHSN operative procedure (where day 1 = the procedure date)

AND

Involves only skin and subcutaneous tissue of the incision

AND

Patient has at least one of the following:

- a. Purulent drainage from the superficial incision.
- b. Organisms identified from an aseptically-obtained specimen from the superficial incision or sub cutaneous tissue by a culture or non-culture based microbiologic testing method which is performed for purposes of clinical diagnosis or treatment (e.g., not Active Surveillance Culture/Testing (ASC/AST)).
- c. Superficial incision that is deliberately opened by a surgeon, attending physician** or other designee and culture or non-culture based testing is not performed.

Patient has at least one of the following signs or symptoms: pain or tenderness; localized swelling; erythema; or heat. A culture or non-culture based test that has a negative finding does not meet this criterion.

- d. Diagnosis of a superficial incisional SSI by the surgeon or attending physician** or other designee.
- *The term attending physician for the purposes of application of the NHSN SSI criteria may be interpreted to mean the surgeon(s), infectious disease, other physician on the case, emergency physician, or physician's designee (nurse practitioner or physician's assistant).

COMMENTS: There are two specific types of superficial incisional SSIs:

- 1. Superficial Incisional Primary (SIP) a superficial incisional SSI that is identified in the primary incision in a patient that has had an operation with one or more incisions (e.g., C-section incision or chest incision for CBGB)
- 2. Superficial Incisional Secondary (SIS) a superficial incisional SSI that is identified in the secondary incision in a patient that has had an operation with more than one incision (e.g., donor site incision for CBGB)

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of SSI must be documented in the patient's medical record.
- Consistent with the January 2019 CDC defined SSI.

UNPLANNED ADMISSION TO ICU

Description

Patients admitted to the ICU after initial transfer to the floor, and/or patients with an unplanned return to the ICU after initial ICU discharge.

- Must have occurred during the patient's initial stay at your hospital.
- EXCLUDE: Patients with a planned post-operative ICU stay.
 INCLUDE: Patients who required ICU care due to an event that occurred during surgery or in the PACU.

UNPLANNED INTUBATION

Description

Patient requires placement of an endotracheal tube and mechanical or assisted ventilation manifested by severe respiratory distress, hypoxia, hypercarbia, or respiratory acidosis.

- Must have occurred during the patient's initial stay at your hospital.
- For patients who were intubated in the field or emergency department, or those intubated for surgery, an unplanned intubation occurs if they require reintubation > 24 hours after they were extubated.

UNPLANNED VISIT TO THE OPERATING ROOM

Description

Patients with an unplanned operative procedure OR patients returned to the operating room after initial operative management of a related previous procedure.

- Must have occurred during the patient's initial stay at your hospital.
- EXCLUDE: Non-urgent tracheostomy and percutaneous endoscopic gastrostomy.
- EXCLUDE: Pre-planned, staged and/or procedures for incidental findings.
- EXCLUDE: Operative management related to a procedure that was initially performed prior to arrival at your center.

VENTILATOR-ASSOCIATED PNEUMONIA (VAP)

Description

A pneumonia where the patient is on mechanical ventilation for > 2 calendar days on the date of event, with day of ventilator placement being Day 1,

AND

The ventilator was in place on the date of event or the day before.

- Onset of symptoms began after arrival to your ED/hospital.
- A diagnosis of pneumonia must be documented in the patient's medical record.
- Consistent with the January 2019 CDC defined VAP.

APPENDIX C: OTHER TERMS

- **Foreign Visitor** is defined as any person visiting a country other than his/her usual place of residence for any reason without intending to receive earnings in the visited country.
- **Intermediate care facility**: A facility providing a level of medical care that is less than the degree of care and treatment that a hospital or skilled nursing facility is designed to provide but greater than the level of room and board.
- **Home Health Service:** A certified service approved to provide care received at home as part-time skilled nursing care, speech therapy, physical or occupational therapy or part-time services of home health aides
- **Homeless** is defined as a person who lacks housing. The definition also includes a person living in transitional housing or a supervised public or private facility providing temporary living quarters.
- **Hospice**: An organization which is primarily designed to provide pain relief, symptom management and supportive services for the terminally ill and their families.
- **Migrant Worker** is defined as a person who temporarily leaves his/her principal place of residence within a country in order to accept seasonal employment in the same country.
- **Operative and/or essential procedures** is defined as procedures performed in the Operating Room, Emergency Department, or Intensive Care Unit that were essential to the diagnoses, stabilization, or treatment of the patient's specific injuries. Repeated diagnostic procedures (e.g., repeated CT scan) should not be recorded (record only the first procedure).
- **Skilled Nursing Care**: Daily nursing and rehabilitative care that is performed only by or under the supervision of skilled professional or technical personnel. Skilled care includes administering medication, medical diagnosis and minor surgery.
- **Undocumented Citizen** is defined as a national of another country who has entered or stayed in another country without permission.

APPENDIX D: NTDS HOSPITAL PROCEDURES GUIDE

- Procedures with an asterisk have the potential to be performed multiple times during one episode
 of hospitalization. In this case, capture only the first event. If there is no asterisk, capture each
 event even if there is more than one.
- Note that the hospital may capture additional procedures

DIAGNOSTIC AND THERAPEUTIC IMAGING MUSCULOSKELETAL

Computerized tomographic Head * Soft tissue/bony debridement *

Computerized tomographic Chest * Closed reduction of fractures

Computerized tomographic Abdomen * Skeletal and halo traction

Computerized tomographic Pelvis * Fasciotomy

Computerized tomographic C-Spine* TRANSFUSION

Computerized tomographic T-Spine*

Computerized tomographic L-Spine*

Transfusion of red cells * (only capture first 24 hours

after hospital arrival)

Doppler ultrasound of extremities *

Diagnostic ultrasound (includes FAST) *

Transfusion of platelets * (only capture first 24 hours

after hospital arrival)

Angioembolization

Angiography

Transfusion of plasma * (only capture first 24 hours

after hospital arrival)

IVC filter RESPIRATORY

REBOA Insertion of endotracheal tube * (exclude intubations

performed in the OR)

CARDIOVASCULAR Continuous mechanical ventilation *

Open cardiac massage Chest tube *

CPR Bronchoscopy *

CNS

Tracheostomy

Insertion of ICP monitor *

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Ventriculostomy * GASTROINTESTINAL

Cerebral oxygen monitoring * Endoscopy (includes gastroscopy, sigmoidoscopy, colonoscopy)

GENITOURINARY Gastrostomy/jejunostomy (percutaneous or

endoscopic)

Ureteric catheterization (i.e. Ureteric stent) Percutaneous (endoscopic) gastrojejunoscopy

Suprapubic cystostomy