

Measure Set: Hospital Inpatient Acute Pancreatitis

Measure ID#:

Setting: Hospital Inpatient

Performance Measure Name: Parenteral Nutrition

Description: Percentage of patients aged 18 years and older with a diagnosis of acute pancreatitis who receive parenteral nutrition during their hospitalization.

Rationale: Acute pancreatitis is a common gastrointestinal condition that is associated with substantial suffering, morbidity, and cost to the healthcare system. In the US, AP is a leading cause of inpatient care among gastrointestinal conditions: over 275,000 patients are hospitalized for AP annually, at an aggregate cost of over \$2.6 billion per year. The incidence of AP ranges from 5 to 30 cases per 100,000, and there is evidence that the incidence is rising in recent years. The overall case fatality rate for AP is roughly 5% and is expectedly higher for more severe disease. Historically, the initial management of nutrition in patients with acute pancreatitis (mild, predicted severe and/or necrotizing) has been to keep them NPO. The hypothesis was that decreasing stimulation of the pancreas would thereby decrease pancreatic secretion and lead to less enzyme induced inflammation. However, there is now data supporting enteral feeding via its beneficial effect of the gut mucosal barrier. Enteral feeding is associated with lower rates of infected pancreatic necrosis (as well as lower rates of intervention for necrosis), multi-organ failure, and decreased length of stay with no difference in overall mortality.

Type of Measure: Process

Improvement Noted as: A decrease in rate

Numerator Statement: Hospitalized patients with acute pancreatitis who receive parenteral nutrition during their hospitalization

Included populations: Not applicable

Excluded populations: None

Data Elements:

- Parenteral nutrition received

Denominator Statement: Hospitalized patients with acute pancreatitis

Included Populations: Principal discharge diagnosis of acute pancreatitis

- Encounter dates MM-DD-YYYY through MM-DD-YYYY, AND
- Patients discharged from an acute care hospital for inpatient care, AND
- A principal discharge diagnosis related group (DRG) equal to 438, 439, or 440, AND
- An ICD-10-CM principal diagnosis code for acute pancreatitis defined as ICD-10-CM equal to K85.X

Excluded Populations:

- Patients less than 18 years of age
- Patients transferred from another healthcare facility
- Patients discharged against medical advice (AMA)

- Patients with another gastrointestinal medical condition that precludes enteral feeding (gastrointestinal obstruction, ileus, short bowel syndrome, abdominal compartment syndrome)

Data Elements:

- Admission Date
- Admission Type
- Birthdate
- Discharge Date
- Discharge Status
- DRG discharge code
- ICD-10-CM other diagnosis codes
- ICD-10-CM principal diagnosis code

Risk Adjustment: No

Data Collection Approach: Retrospective data sources for required data elements include administrative data and medical records. Some facilities may prefer to gather data concurrently by identifying patients in the population of interest. This approach provides opportunity for improvement at the point of care/service. However, complete documentation includes the ICD-10 and DRG codes, which requires retrospective data entry.

Data Accuracy: Variation may exist in the assignment of ICD-10 and DRG codes; therefore, coding practices may require evaluation to ensure consistency.

Measure Analysis Suggestions: The measure rate for early oral feeding within 24 hours of hospital admission should be analyzed in conjunction with the measure rate of enteral instead of parenteral nutrition (measure XYZ). These measures, used together, will assist in understanding the number of acute pancreatitis patients that receive nutrition through oral or feeding tube methods. This will identify the hospital's rate of patients receiving no nutrition and/or parenteral nutrition and identify potential opportunities to improve the rate of inappropriate nutritional care in patients with acute pancreatitis.

Sampling:

Data Reported As: Aggregate rate generated from count data reported as a proportion.

Selected References: