

PINC55: Appropriate Documentation of a Malnutrition Diagnosis

Description: Percentage of patients age 18 years and older who are found to be moderately or severely malnourished based on a nutrition assessment that have appropriate documentation in the medical record of a malnutrition diagnosis.

National Quality Strategy Domain: Effective Clinical Care

Measure Type: Process

Meaningful Measure Area: Transfer of Health Information and Interoperability

Type of Measure: Process

Improvement Noted As: An increase in rate

Numerator: Patients in the denominator with a documented diagnosis of malnutrition.

Included Populations: Patients in the denominator with a documented diagnosis of malnutrition as defined by value set OID: 2.16.840.1.113762.1.4.1095.55

Excluded Populations: None

Data Elements:

1. *Malnutrition Diagnosis*

Denominator: All patients age 18 years and older on the date of the encounter with a completed nutrition assessment that resulted in findings of moderate or severe malnutrition.

Included Populations: Patients age 18 years and older who have documented findings of moderate or severe malnutrition from a completed nutrition assessment as defined by value set OIDs:

- Severe malnutrition: 2.16.840.1.113762.1.4.1095.43
- Moderate malnutrition: 2.16.840.1.113762.1.4.1095.47

Excluded Populations: None

Data Elements:

2. *Birthdate*
3. *Encounter Type*
4. *Encounter Date Time*
5. *Nutrition Assessment Completed*
6. *Nutritional Status Severely Malnourished*
7. *Nutritional Status Moderately Malnourished*

Clinical Recommendation Statement: This measure is supported by multiple clinical guidelines that recommend the identification, diagnosis, and treatment of malnutrition in at-risk and malnourished patients. The current evidence base supports the early and rapid identification of malnutrition in order to allow for timely treatment of malnutrition in the hospital. Part of the recommended process for implementing nutrition care is appropriate recognition, diagnosis, and documentation of the nutrition status of a patient in order to address their condition with an appropriate plan of care and communicate patient needs to other care providers. Identifying and addressing malnutrition early in the episode of care is associated with reduced lengths of stay, 30-day readmission rates, hospital-acquired conditions, and overall healthcare costs.

A.S.P.E.N. recommends the completion of a nutrition assessment as a comprehensive approach to diagnosing nutrition problems such as malnutrition in order to form the basis for an appropriate nutrition intervention.

Mueller C, Compher C & Druyan ME and the American Society for Parenteral and Enteral Nutrition (A.S.P.E.N.) Board of Directors. A.S.P.E.N. Clinical Guidelines: Nutrition Screening, Assessment, and Intervention in Adults. *J Parenter Enteral Nutr.* 2011;35: 16-24.

A consensus statement from the Academy of Nutrition and Dietetics states that the registered dietitian nutritionist's (RDN's) assessment of critically ill adults should include, but not be limited to, the following: Food and Nutrition-Related History, Anthropometric Measurements, Biochemical Data, Medical Tests and Procedures, Nutrition-Focused Physical Findings, Client History. Assessment of the above factors is needed to correctly diagnose nutrition problems and plan nutrition interventions. Inability to achieve optimal nutrient intake may contribute to poor outcomes.

Academy of Nutrition & Dietetics. CI: Nutrition Assessment of Critically Ill Adults 2012. Academy of Nutrition & Dietetics Evidence Analysis Library. Published 2012. Retrieved from: <http://www.andeal.org/topic.cfm?menu=4800>.

The British Association for Parenteral and Enteral Nutrition recommends the maintenance of documentation for all individuals including results of nutritional screening and assessments (which include malnutrition findings), along with consequent action plans and treatment goals. If the patient is transferred to another care setting, this information should be readily available to all new carers to ensure continuity of care.

British Association for Parenteral and Enteral Nutrition. Malnutrition Matters, A Toolkit for Clinical Commissioning Groups and providers in England. Published 2012. Retrieved from: http://www.bapen.org.uk/pdfs/bapen_pubs/bapen-toolkit-for-commissioners-and-providers.pdf.

Rationale: Recent evidence finds that older adult patients' prevalence of malnutrition ranging from 5.8 - 30% in the community (Snider, 2014) and more specifically, risk of malnutrition is more prevalent in communities facing health disparities (Sheean, 2019). Data analyzed from the Healthcare Cost and Utilization Project (HCUP), a nationally representative data set describing U.S. hospital discharges, indicated that approximately 8% of hospital discharges included malnutrition as a diagnosis in 2016 (Barrett, 2018). However, as this same research article reported, past studies have used validated screening tools to indicate a substantially higher prevalence of malnutrition that has gone undiagnosed in the hospital ranging from 33% (Robinson, 2003) to 78% (Lew, 2017, Somanchi, 2011). Patients who are malnourished while in the hospital have been associated with important negative outcomes such as increased risk of complications, readmissions, and length of stay. Malnutrition is also associated with many adverse outcomes including depression of the immune system, impaired wound healing, muscle wasting, and increased mortality. Referral rates for dietetic assessment and treatment of malnourished patients have proven to be suboptimal, thereby increasing the likelihood of developing such complications (Corkins, 2014, Barker et al., 2011, Amaral, et al., 2007, Kruiženga et al., 2005).

Gap in Care: Nutritional status and progress are often not adequately documented in the medical record. It can be difficult to tell when (or if) patients are consuming food and supplements. In addition, nutritional procedures and EHR-triggered care are often lacking in the hospital (Corkins, 2014). The current evidence supports the early and rapid identification of malnutrition status in order to allow for timely treatment of malnutrition in the hospital. Part of the recommended process for implementing nutrition care is appropriate recognition of the nutrition status, diagnosis, and documentation of that status and diagnosis to address their condition with an appropriate plan of care and communicate patient needs to other care providers. Identifying and addressing malnutrition early in the episode of care is associated with reduced lengths of stay, 30-day readmission rates, hospital-acquired conditions, and overall

healthcare costs (Lew, 2017, Meehan, 2016, Fry, 2010). A study of 105 prominent academic medical centers during a 2-year period demonstrated a need for quality improvement efforts aimed at improved structure and process to better improve the identification of malnutrition (Tobert, 2018).

A randomized controlled trial of 652 hospitalized, malnourished older adults aged 65 years and older evaluated the use of a high-protein oral nutritional supplements for its impact on patient outcomes. The study reported a significant reduction of 90-day mortality ($p = 0.018$) (Deutz, 2016). Additionally, a nutrition support intervention in patients identified by screening and assessment as at risk for malnutrition or malnourished may improve clinical outcomes (Mueller, 2011). Several research studies associated early nutritional care after risk identification with improved outcomes such as reduced length of stay, reduced risk of readmissions, and lower cost of care (Deutz, 2016, Lew, 2017, Meehan, 2016, Milne, 2009, Kruizenga, 2005).

Risk Adjustment: No

Sampling: None

Data Reported As: Aggregated rate generated from count data reported as a proportion (numerator/denominator)

References:

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