Providing Nutrition to Critically Ill Obese Patients
Susan Smith, MS, RN, CNS
Texas Health Presbyterian Hospital Plano
Kathleen A. Fedyszen

Problem
More than 60 million adult Americans are now obese. While malnutrition is a known phenomenon in hospitalized patients, it is surprisingly common in obese patients.

Evidence
Obese patients are at greater risk when under stress to develop protein-energy malnutrition than non-obese patients. Critically ill obese patients that do not receive adequate nutrition are at increased risk for nosocomial infections, delayed wound healing, and hospital mortality.

Strategy
The goals for nutritional therapy are to lessen the metabolic response to stress, prevent oxidative cellular injury, and promote favorable modulation of the immune response preferably through early enteral nutrition. Strategies should be individualized to the patient's needs.

Practice Change
After reviewing recommended practice changes we decided to adopt several that would bring benefit to our patients. These included a closed unit design, daily multi-disciplinary rounding and several glycemic control strategies including an intensive insulin protocol to meet our patient's nutritional and metabolic needs.

Evaluation
Data is collected at the bedside during multidisciplinary rounds, through sporadic chart reviews and at the corporate level. Bedside data and chart review include date feedings are implemented, time to achievement of goal, daily caloric intake, labs reflecting nutrition status, glycemic control, weight changes, and modality of feeding used. Bedside and corporate data includes glycemic control, TPN utilization, ICU LOS, hospital LOS and incidence of infection including VAP, CLABSI, and CAUTI.

Results
It is interesting to compare our ongoing bedside results with corporate data that has been collected retroactively particularly in regards to glycemic control. We did experience an increase in hypoglycemic events when a corporate computerized physician orderset was implemented. We have had no VAPs in 14 months.

Recommendations/Lessons Learned
Adoption of evidence-based practices is an ongoing process that requires review of outcomes once changes have been implemented. We have decided to return to our own initial intensive insulin protocol to prevent incidence of hypoglycemic events.
**Bibliography**


