

# Relevance and application of clinical practice guidelines in different settings

In clinical practice, we are inundated with many guidelines from various parts of the world. Well-constructed practice guidelines are supposed to be formulated according to rigorous standard operating procedures, employing evidence-based principles throughout.<sup>[1]</sup> In the context of clinical nutrition, the European Society for Clinical Nutrition and Metabolism (ESPEN) is active in releasing relevant guidelines (<https://www.espen.org/guidelines-home/espen-guidelines/>), whereas the American Society for Parenteral and Enteral Nutrition (ASPEN) also contributes to the pool of resources (<https://www.nutritioncare.org/clinicalguidelines/>). The most recent guidelines for nutrition support in the intensive care unit were published by ESPEN in 2023 and ASPEN in 2022.<sup>[2,3]</sup> A systematic review evaluating agreement between various practice guidelines for ICU nutrition reports an agreement frequency varying between 11% and 100%, depending on individual components.<sup>[4]</sup> It is therefore important to evaluate the context and clinical relevance of any guidelines before it is implemented in your unit, since societal guidelines are designed with a specific region in mind. Components to consider include your unique patient profile, ICU set-up, staff knowledge and training, available resources in terms of equipment, budget and nutrition support products.

This leads to the question – Does it matter what and how much we feed our patients? The answer is a definite yes. Adequate nutrition support is associated with successful weaning, reduced mortality, reduced re-admissions and fewer discharges to rehabilitation units.<sup>[5,6]</sup> This is especially relevant to malnourished patients.<sup>[7,8]</sup> However, it is important that nutritional requirements are met. Nutritional intake is suboptimal in many situations, with an average percentage of energy targets met through enteral nutrition in the region of 56<sup>[6]</sup> - 71%<sup>[9]</sup> and through parenteral nutrition, around 83%.<sup>[5]</sup> Reaching at least 80% of energy adequacy was associated with better survival outcomes.<sup>[6]</sup> The target for nutrition adequacy advised by ESPEN is between 70 - 100% of measured energy expenditure.<sup>[2]</sup> Cost-effectiveness of providing adequate nutrition support was studied by modelling Brazilian hospital data. Providing early nutrition support (day 1 of hospitalisation), compared to day 7 or day 14, resulted in 420 658 avoided days of hospitalisation, 20 996 avoided readmissions, and 10 491 deaths prevented. The biggest contributing factor to the cost-saving was the reduction in length of hospital stay.<sup>[10]</sup>

The study by Anku et al.<sup>[11]</sup> on page 5 of this issue of the SAJCC, investigated the nutrition support practices and self-reported skills of healthcare practitioners working in the critical care environment in a Ghanaian hospital. Lack of standardisation in the application and interpretation of the feeding protocol currently in use in the unit was reported. This referred to all aspects from nutrition status assessment to implementation of nutritional prescriptions and monitoring of patient tolerance. In many cases, clinical judgement overruled evidence-based practices and although the value of clinical decision-making cannot be ignored, in this case, the application was not consistent and resulted in differences in responses between doctors and nurses. Another point of concern stated by the authors was that close to one-third of respondents were not aware of the availability of a feeding protocol in the unit.

In the general literature, there is no consensus about the value of feeding protocols. Implementing a feeding protocol resulted in earlier nutrition support administration, improved nutrition adequacy and fewer gastrointestinal side-effects related to enteral nutrition.<sup>[12]</sup> Others have

reported no improvement in clinical outcomes or feeding effectiveness after implementing a feeding protocol.<sup>[13]</sup> Debating this discrepancy, and taking into consideration the current focus on personalized nutrition, one can argue that protocolized feeding can be regarded as the first step to ensure a standardized approach. However, as no two patients are the same, the protocol needs to be “personalised” and adapted to the needs of each individual patient. Although this approach requires a good skill set, adequate time and resources, as well as a multidisciplinary approach, it can be effectively implemented with good results.<sup>[14]</sup>

It is important to implement nutrition support early, and to aim for nutrition adequacy of at least 70 - 80% to ensure that requirements are met. It is equally important to practice and adhere to the latest updated guidelines, however, these guidelines cannot be followed blindly and must be adapted to suit specific environments. The purpose of the Ghanaian study was not to determine nutrition adequacy, but to identify components that influence the practice of optimal nutrition. They report a lack of routine to ensure optimising enteral nutrition. However, in the process they identified various components that require attention and can be addressed. I support their statement that lack of a sophisticated environment or unavailability of special equipment, should not be excuses for suboptimal nutritional care. I therefore commend them on conducting the study and for sharing the results and their future action plans.

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