

adult population; therefore, it is necessary to evaluate BMI as a separate anthropometric parameter. The ideal (protective) BMI for the elderly population is in the range of 24.0 to 30.9 kg/m². The threshold value at which the risk of malnutrition is shown in patients older than 70 years is a BMI of 22 kg/m², while a patient with a BMI of 20 kg/m² is already considered malnourished (17), which was also confirmed in our group. Regardless of the BMI value, malnutrition occurs in geriatric patients during hospitalization also due to irregular food intake (for example, due to diagnostic or therapeutic procedures) in combination with reduced appetite, reduced ability to chew or swallow (18). Therefore, when using anthropometric indices to detect the nutritional status of a geriatric patient, it is necessary to include a physical examination in a comprehensive examination and evaluate laboratory findings (14). Older age (> 65 years) is one of the main risk factors for the onset and development of polymorbidity, and geriatric patients are particularly susceptible to weight loss associated with chronic diseases. Weight loss ultimately leads to the development of malnutrition, which can fundamentally affect the course of diseases and clinical outcomes (19). Subsequent changes in body composition due to malnutrition have a negative impact on the recovery of muscle mass (20). In patients with signs of developed catabolism, laboratory diagnostics is essential and includes complex parameters on energy need, mineral and protein turnover, nitrogen balance, ion balance. Basic laboratory parameters for assessing nutritional status include total protein, albumin, transferrin, cholesterol, haemoglobin, and absolute lymphocyte count (21). Haemoglobin values below the reference norm generally have a negative impact on nutritional status, the progression of malnutrition, an increase in the number of comorbidities, and on mental and functional capacity (22). Due to the high prevalence of malnutrition in hospitalized patients in internal wards (up to 70%), quick and simple recognition of the given condition is essential (23). A physician, nurse, or nutritional therapist is competent to administer a measurement tool to assess nutritional status as part of the geriatric screening (24). When choosing an appropriate tool, it is important to identify for which patient population (e.g., age category, specific disease) and for which environment (e.g., hospital, long-term care facility, community care) the tool has been validated (25). The European Society for Clinical Nutrition and Metabolism (ESPEN) recommends the use of the MNA[®] tool (26) to assess nutritional status in hospitalized adult/geriatric patients.

The MNA[®]-FF version achieves 96 % sensitivity and 98 % specificity with a positive predictive value of 97 %. The diagnostic accuracy of the MNA[®]-SF version is even higher, reaching 98 % sensitivity, 100 % specificity, with a diagnostic accuracy of 99 % for the screening of malnutrition risk (11).

In Slovakia, in the care of elderly patients, complex geriatric assessment is considered the gold standard as a multidimensional, multidisciplinary procedure to diagnose somatic and mental health of older people, psychosocial status and functional abilities (or limitations), especially in frail or otherwise at-risk older people, and the MNA[®] tool is part of this diagnosis. Personalized medicine in this way is especially beneficial in the case of polymorbidity in conjunction with geriatric syndromes (such as malnutrition), when the priority of solutions may not always be clear and unambiguous (27). Nutritional screening should become a routine part of clinical practice, because MNA[®] is described as an effective, valid tool, applicable to the elderly population and geriatric patients.

Moreover, it is reliable, inexpensive, does not require laboratory investigation, and is used in all settings. It is also able to detect risks of malnutrition before the severe change in individuals' weight or serum albumin occurs, reports also indicated that it predicts mortality and length of stay in hospital. At least 22 expert groups included the MNA[®] in new clinical practice guidelines, national or international registries. MNA[®]-FF provides guidance for nutritional intervention; elderly with malnutrition or at risk of malnutrition should have a nutritional intervention with a multidisciplinary team to support adequate dietary intake, maintain or increase body weight and/or improve functional and clinical outcomes (28).

Conclusions

Hospitalized geriatric patients are at increased risk of malnutrition or already present malnutrition. Nutritional status is relatively easy to detect using standard methods within the competence of health professionals. Implementing of recommendations and standards into clinical practice will strengthen the early identification of nutritional status disorders. A comprehensive screening and assessment of the state of nutrition should already be carried out when a geriatric patient is admitted to the hospital, so that it is possible to plan and implement a targeted individual nutritional intervention in time.

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