Belgian Society for GERONTOLOGY and GERIATRICS

RECOMMENDATIONS

Sarcopenia Guideline 2018-2019

BVGG - SBGG

ASSESSMENT

RISK FACTORS

Cigarette smoking as an isolated factor may contribute to the development of sarcopenia and can be identified as a possible risk factor (odds ratios = 1.12(95 % CI 1.03-1.21)). Alcohol consumption and osteoarthritis are not considered as a possible risk factor.

MUSCLE MASS

For estimating the muscle mass in the context of sarcopenia, we recommend to use **relative indices** (height, body weight); e.g. appendicular lean mass (ALM, assessed by DXA or BIA) corrected by height² or BMI. We recommend the use of **cut-off values for relative muscle mass** that are proposed by the **international working groups on sarcopenia** (EWGSOP, FNIH, IWGS).

MUSCLE STRENGTH

We recommend **maximum handgrip strength** of the **dominant** hand to assess general muscle strength. We recommend categorising patients according to the **normative values for healthy young people**.

PHYSICAL PERFORMANCE

At this moment, best evidence is available for using **gait speed** to appraise physical performance in a clinical setting. We recommend categorizing subjects according to the **normative values for healthy young people** as presented in the recommendation by using the **4m usual gait speed** protocol.

INTERVENTION

PHARMACOLOGY

We recommend **vitamin D supplementation** to improve muscle strength and physical performance in older people, especially women, with low baseline serum levels. **Testosterone supplementation** may be considered in older men with serum levels < 200–300 ng/dl and clinical muscle weakness, to improve muscle mass and muscle strength.

EXERCISE

We recommend **resistance training and multimodal exercise** to improve muscle strength, muscle mass and physical performance for healthy, pre-sarcopenic or sarcopenic older people since evidence shows a significant and positive effect. We recommend **occlusion training** at a low intensity under supervision of a trained exercise coach to improve muscle strength.

NUTRITION

At this moment best evidence is available to recommend **leucine** supplementation since is has a significant effect on muscle mass in persons with sarcopenia.
Protein supplementation on top of resistance training is recommended to increase muscle mass and muscle strength. This supplementation is particularely advised for persons with obesitas and should be performed at least for 24 weeks to achieve optimal results.