Management of male LUTS: how concepts are evolving!

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Lower urinary tract symptoms (LUTS) are a common condition in men. In recent years, it became clear that the spectrum of causes of male LUTS is huge and not always related to purely obstructive BPH. There is growing evidence that not only the prostate, but also other organs, such as the bladder and the kidney can be involved in male LUTS. As the most appropriate choice of treatment depends on the underlying cause of the patient's symptoms (i.e. benign prostatic enlargement, overactive bladder, benign prostatic obstruction (BPO), etc.), proper evaluation and diagnosis is crucial.

Currently, α1-adrenoreceptor (AR) monotherapy is recommended for the treatment of men with moderate to severe LUTS. Antimuscarinic monotherapy has been shown to provide symptom relief in patients with moderate to severe LUTS who have predominantly bladder storage symptoms. The EAU guidelines recommend combination treatment of an α1-AR antagonist with an antimuscarinic agent if symptom relief has been insufficient with either drug alone. In addition, treatment with 5α-reductase inhibitors is an option in male LUTS with an enlarged prostate. Despite concerns about the risk of AUR associated with the use of antimuscarinic drugs, a number of studies have shown that the addition of an antimuscarinic agent does not increase the incidence of AUR or induces clinically meaningful changes in postvoid residual.

Among symptoms, nocturia has been recently more studied as a symptom which could lead to specific diagnosis and management. Many factors can contribute to the development of nocturia, including reduced nocturnal bladder capacity, polyuria, or nocturnal polyuria. Nocturia is strongly related to sleep disorders and a poor quality of sleep, with the efficiency of sleep being inversely related to the number of nocturia episodes. It is not surprising that nocturia negatively affects the patient's quality of life. The bothersomeness of nocturia is not only related to the frequency, but also to the timing of nocturnal voids. Indeed, normal sleep consists of cycles of different stages of non-rapid eye movement (non-REM) sleep alternated with periods of REM sleep. The deepest stages of sleep (phase 3 and 4 of non-REM sleep), predominate during the first 3 hours of the night. Waking up during this sleep is more likely to lead to daytime fatigue than waking up later. Therefore, the hours of undisturbed sleep, i.e. the time between falling asleep and the first awakening to void, can be considered as a measure of quality of sleep.

In conclusion, careful evaluation of symptoms including nocturia and risk factors for progression should lead to an appropriate treatment for patients with LUTS/BPO.

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