AMENDMENT SUMMARY

Diagnosis and Treatment of Overactive Bladder (Non-Neurogenic) in Adults: AUA/SUFU Guideline

Amendment Panel

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Purpose: The purpose of this guideline is to provide a clinical framework for the diagnosis and treatment of non-neurogenic overactive bladder (OAB).

Updated Methodology

Methods: The primary source of evidence for the original version of this guideline was the systematic review and data extraction conducted as part of the Agency for Healthcare Research and Quality (AHRQ) Evidence Report/Technology Assessment Number 187 titled *Treatment of Overactive Bladder in Women* (2009).[1] That report searched PubMed, MEDLINE, EMBASE, and CINAHL for English-language studies published from January 1966 to October 2008 relevant to OAB. AUA conducted additional literature searches to capture treatments not covered in detail by the AHRQ report (e.g., intravesical onabotulinumtoxinA) and relevant articles published between October 2008 and December 2011. The review yielded an evidence base of 151 treatment articles after application of inclusion/exclusion criteria. These publications were used to create the majority of the treatment portion of the guideline. When sufficient evidence existed, the body of evidence for a particular treatment was assigned a strength rating of A (high), B (moderate), or C (low). Additional treatment information is provided as Clinical Principles and Expert Opinions when insufficient evidence existed.

The AUA update literature review process, in which an additional systematic review is conducted periodically to maintain guideline currency with newly-published relevant literature, was conducted in 2014 and 2019. These reviews identified an additional 72 (2014) and 37 (2019) articles relevant to treatment. These articles were added to the database, and AUA's qualitative and quantitative analyses were updated as appropriate. The review panels determined that each update review warranted targeted updates to the document, thereby creating the 2014 and 2019 amendments. The current document reflects relevant literature published through October 2018.

Peer Review and Approval: The AUA conducted a thorough peer review process to ensure that the document was reviewed by experts in the diagnosis and treatment of OAB. In addition to reviewers from the AUA Practice Guidelines Committee (PGC), Science and Quality Council (SQC), and Board of Directors (BOD), the document was reviewed by representatives from SUFU as well as external content experts. Additionally, a call for reviewers was placed on the AUA website from January 21-25, 2019 to allow any additional interested parties to request a copy of the document for review. The guideline was also sent to the Urology Care Foundation to open the document further to the patient perspective. The draft guideline document was distributed to 53 peer reviewers. All peer review comments were blinded and sent to the Panel for review. In total, 20 reviewers provided comments, including 8 external reviewers. At the end of the peer review process, a total of 33 comments were received. Following comment discussion, the Panel revised the draft as needed. Once finalized, the guideline was submitted for approval to the AUA PGC, SQC and BOD as well as the governing body of SUFU for final approval.

Summary of Guideline Changes

Section 6: Treatment, clarifying importance of patient factors in selecting optimal treatment

This clinical framework does not require that every patient go through each line of treatment in order. There are many factors to consider when identifying the best treatment for a particular patient, including information regarding allergies, sensitivity to various adverse drug events, patient ability and motivation to comply and availability of and access to specific treatments. It should be duly noted that, as mentioned above, every patient does not need to proceed through each line of therapy before considering the next. In other words, the lines of therapy, while representing a successive increase in risk or invasiveness, are not intended to represent a strict algorithm. This is specifically relevant with regard to PTNS, as it is the opinion of the Panel that, given the minimally invasive and reversible nature of this therapy, juxtaposed with the potential side effects and cost of medications, PTNS can be considered in drug-naïve patients who opt to forego pharmacotherapy.

Second-Line Treatments: Pharmacologic Management

New Statement 12. Clinicians may consider combination therapy with an anti-muscarinic and β_3-

adrenoceptor agonist for patients refractory to monotherapy with either anti-muscarinics or β_3-adrenoceptor agonists. *Option* (*Evidence Strength Grade B*)

Additional discussion is available in the full-length guideline to serve as supporting text for this new statement.

Fourth-Line Treatments: Augmentation Cystoplasty and Urinary Diversion*

22. In rare cases, augmentation cystoplasty or urinary diversion for severe, refractory, complicated OAB patients may be considered. *Expert Opinion*

* Please note that no changes have been made to the text of this guideline statement or the associated discussion. This statement was previously included in the Guideline under "Additional Treatments" but is now being recategorized as "Fourth-Line Treatment."

Updated References

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155. Gratzke C, van Maanen R, Chapple C et al: Long-term safety and efficacy of mirabegron and solifenacin in combination compared with monotherapy in patients with overactive bladder: a randomised, multicentre phase 3 study (SYNERGY II). Eur Urol 2018; **74**:501.

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157. Kosilov K, Kuzina I, Loparev S et al: Influence of the short-term intake of high doses of solifenacin and trospium on cognitive function and health-related quality of life in older women with urinary incontinence. Int Neurourol J 2018; **22**:41.

158. Kosilov K, Loparev S, Ivanovskaya M et al: Maintenance of the therapeutic effect of two high-dosage antimuscarinics in the management of overactive bladder in elderly women. Int Neurourol J 2013; **17**:191.

159. Ellington DR, Szychowski JM, Malek JM et al: Combined tolterodine and vaginal estradiol cream for overactive bladder symptoms after randomized single-therapy treatment. Female

Pelvic Med Reconstr Surg 2016; **22**:254.

160. Rovner ES, Raymond K, Andruczyk E et al: Low-dose desmopressin and tolterodine combination therapy for treating nocturia in women with overactive bladder: a double-blind, randomized, controlled study. Low Urin Tract Symptoms 2018; **10**:221.