

Clinical Practice Guideline for the Treatment of Obstructive Sleep Apnea and Snoring with Oral Appliance Therapy: An Update for 2015

An American Academy of Sleep Medicine and American Academy of Dental Sleep Medicine Clinical Practice Guideline

Kannan Ramar, MBBS, MD¹; Leslie C. Dort, DDS²; Sheri G. Katz, DDS³; Christopher J. Lettieri, MD⁴; Christopher G. Harrod, MS⁵; Sherene M. Thomas, PhD⁵; Ronald D. Chervin, MD⁶

1Mayo Clinic, Rochester, MN; 2University of Calgary, Calgary, Alberta, Canada; 3Atlanta, GA; 4Walter Reed National Military Medical Center, Bethesda, MD; 5American Academy of Sleep Medicine, Darien, IL; 6University of Michigan, Ann Arbor, MI

Introduction: Since the previous parameter and review paper publication on oral appliances (OAs) in 2006, the relevant scientific literature has grown considerably, particularly in relation to clinical outcomes. The purpose of this new guideline is to replace the previous and update recommendations for the use of OAs in the treatment of obstructive sleep apnea (OSA) and snoring.

Methods: The American Academy of Sleep Medicine (AASM) and American Academy of Dental Sleep Medicine (AADSM) commissioned a seven-member task force. A systematic review of the literature was performed and a modified Grading of Recommendations Assessment, Development, and Evaluation (GRADE) process was used to assess the quality of evidence. The task force developed recommendations and assigned strengths based on the quality of the evidence counterbalanced by an assessment of the relative benefit of the treatment versus the potential harms. The AASM and AADSM Board of Directors approved the final guideline recommendations.

Recommendations:

1. We recommend that sleep physicians prescribe oral appliances, rather than no therapy, for adult patients who request treatment of primary snoring (without obstructive sleep apnea). (STANDARD)
2. When oral appliance therapy is prescribed by a sleep physician for an adult patient with obstructive sleep apnea, we suggest that a qualified dentist use a custom, titratable appliance over non-custom oral devices. (GUIDELINE)
3. We recommend that sleep physicians consider prescription of oral appliances, rather than no treatment, for adult patients with obstructive sleep apnea who are intolerant of CPAP therapy or prefer alternate therapy. (STANDARD)
4. We suggest that qualified dentists provide oversight—rather than no follow-up—of oral appliance therapy in adult patients with obstructive sleep apnea, to survey for dental related side effects or occlusal changes and reduce their incidence. (GUIDELINE)
5. We suggest that sleep physicians conduct follow-up sleep testing to improve or confirm treatment efficacy, rather than conduct follow-up without sleep testing, for patients fitted with oral appliances. (GUIDELINE)

6. We suggest that sleep physicians and qualified dentists instruct adult patients treated with oral appliances for obstructive sleep apnea to return for periodic office visits— as opposed to no follow-up—with a qualified dentist and a sleep physician. (GUIDELINE)

Conclusions: The AASM and AADSM expect these guidelines to have a positive impact on professional behavior, patient outcomes, and, possibly, health care costs. This guideline reflects the state of knowledge at the time of publication and will require updates if new evidence warrants significant changes to the current recommendations.

Keywords: obstructive sleep apnea, snoring, oral appliance, mandibular advancement, positive airway pressure

Citation: Ramar K, Dort LC, Katz SG, Lettieri CJ, Harrod CG, Thomas SM, Chervin RD. Clinical practice guideline for the treatment of obstructive sleep apnea and snoring with oral appliance therapy: an update for 2015. *J Clin Sleep Med* 2015;11(7):773–827. pii: jc-00186-15 <http://dx.doi.org/10.5664/jcsm.4858>

Summary: Since the publication of the initial position statement by the American Academy of Sleep Medicine (AASM) in 1995, the clinical use of oral appliances (OAs) for the treatment of snoring and obstructive sleep apnea (OSA) has markedly increased. The most recent AASM practice parameters on the treatment of snoring and OSA with oral appliances was published in 2006 as “Practice Parameters for the Treatment of Snoring and Obstructive Sleep Apnea with Oral Appliances: An Update for 2005” with the accompanying systematic review paper “Oral Appliances for Snoring and Obstructive Sleep Apnea: A Review.” Since these publications, the scientific literature on OAs has grown considerably, particularly related to clinical outcomes after use of OAs. The purpose of this guideline is therefore to replace the recommendations in the 2006 guideline for the use of OAs in the treatment of OSA and snoring.