

# Oral Appliance Therapy Should be Reimbursed as a First-Line Therapy for OSA

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## INTRODUCTION

It is the position of the American Academy of Dental Sleep Medicine (AASDM) that oral appliance therapy (OAT) should be reimbursed as a first-line therapy for the treatment of obstructive sleep apnea (OSA). OAT has been deemed an alternate therapy for OSA,<sup>1</sup> and numerous studies have indicated that OAT is an effective treatment for sleep-related breathing disorders.<sup>2,3</sup> The American Academy of Sleep Medicine (AASM) has also acknowledged that OAT should be considered if a patient does not wish to use Continuous Positive Airway Pressure (CPAP) therapy.<sup>1</sup>

In their joint clinical practice guideline, the AASDM and the AASM stated that “[p]atient preference for OAs versus CPAP should be considered by the treating sleep physician before therapy is prescribed.”<sup>1</sup> Patient treatment preference and choice can be critical in ensuring that patients experience positive health outcomes. This paper explores evidence regarding patient preference for OAT and how preference may lead to greater adherence and health improvement.

## PATIENTS PREFER OAT

When patients are given the choice between using CPAP or OAT to treat their OSA, studies have indicated that many patients prefer OAT.<sup>4-7</sup> One study indicated that among patients who completed trials with both OAT and CPAP, approximately 81% preferred OAT.<sup>7</sup>

In a qualitative study of why patients may choose OAT or CPAP, patients indicated that the most important factors affecting their choice were “device effectiveness, transportability, embarrassment, and cost.”<sup>8</sup> Some of the advantages of oral appliances (OAs) over CPAP are that they are easy to use,<sup>6,9</sup> easy to transport,<sup>9,10</sup> comfortable,<sup>9</sup> and noninvasive,<sup>9</sup> as well as less noisy<sup>9,11</sup> and less obtrusive.<sup>11</sup> Patient preference may lead to more use of and greater compliance with treatment.<sup>8</sup>

## PATIENTS ADHERE TO OAT

When it comes to the treatment of OSA, better compliance leads to better health outcomes and lower

healthcare costs. Numerous studies have indicated that adherence to OAT is very high. In one long-term study of OAT adherence, 86% of patients surveyed continued regular use of their OA over the average course of 3.3 years. Additionally, average nightly use among these respondents was 7.17 hours.<sup>12</sup> Objective measurement of OAT adherence has also validated patient self-report, with another study indicating that 93% of patients were compliant with OAT.<sup>13</sup>

In their study comparing OAT to CPAP in terms of health outcomes, Phillips and colleagues found that health outcomes were similar between the two therapies. They hypothesized that patient preference for OAT may have increased adherence, which in turn positively affected health outcomes.<sup>14</sup> This study highlights the possible relationship between treatment preference and outcomes for patients with OSA.

Untreated sleep apnea may lead to strokes, heart attacks, depression, and myriad health problems that financially drain the healthcare system. The overall cost to the US economy of untreated OSA through comorbidities, accidents, and lost productivity ranges in the billions of dollars.<sup>15</sup> When patients are unable to comply with treatment, their OSA can go unchecked, resulting in extremely high costs such as emergency room visits and attempts to resolve chronic, life-threatening side effects related to OSA.

OAT is effective in managing these side effects. OAT has been shown effective in resolving OSA symptoms including lowering blood pressure<sup>16-18</sup> and reducing risk of cardiovascular mortality.<sup>19,20</sup> Allowing patients to use OAT as a first-line therapy not only improves their health outcomes but also decreases OSA-related healthcare costs.

## CONCLUSION

When it comes to treating OSA, patients must be able to choose their preferred therapy – choice and compliance may go hand in hand. Patients who prefer OAT may be more likely to adhere to treatment, thereby better alleviating their symptoms.

Thus, if patients have a clear preference for OAT over other treatments, it is important to both prescribe and reimburse OAT as a first-line treatment. By insisting that patients utilize other therapies first, even if they do not prefer

and cannot comply with treatment, we only further delay health improvements and increase healthcare costs. Rather, patient-centered care should be bolstered by allowing patients to choose OAT as their first line of defense against OSA-related complications.

## CITATION

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## SUBMISSION AND CORRESPONDENCE INFORMATION

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## DISCLOSURE STATEMENT

The authors report no conflicts of interest.