

The Non-invasive, NightLase® Erbium:YAG Laser Outpatient Treatment for Snoring

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SUMMARY

Snoring represents a real problem for many couples. In fact in the United States it is one of the major causes of separation and divorce. It can also be a life-threatening problem because in 15-45% of cases it can hide Obstructive Sleep Apnea Syndrome (OSAS), which, within some years, can lead to increased cardio-vascular, dysmetabolic or cerebro-vascular disease. OSAS can also lead to a greater incidence of car accidents. The mechanism of snoring is partial upper airway obstruction during sleep, which causes the vibration of the tissues of the rhino-oro-hypopharynx and, less frequently the larynx. Surgical therapy for snoring is almost always invasive, painful and with a high morbidity.

The NightLase® Erbium:YAG Laser treatment of the oropharynx is, on the other hand, painless (there is no need for local anesthesia) and performed in an outpatient setting. It works in three sessions, but already after the first the patient can immediately notice an improvement of snoring symptoms. A prospective study of 40 consecutive patients with snoring and sleep disorders was performed assessing data before and after three Er:YAG NightLase® treatments in order to quantify the efficacy of the procedure or the better outcome of certain features of the patient. The patient's evaluation of satisfaction of the results obtained showed that 85% of patients were very satisfied, 5 patients (12.5%) reported being fairly satisfied with the treatment and only 1 subject (2.5%) was not satisfied.

The nonsurgical and non-invasive Er:YAG laser treatment with NightLase® showed to be a statistically significant procedure in reducing the loudness of snoring as well as difficulty waking up in the morning, dryness of the mouth at wake-up time, and waking-up during the night because of snoring and choking. It was also statistically significant in raising the frequency of dreaming and the quality of sleep.

This Laser treatment showed no major side effects, also over a long-term of follow up.

A Non-Invasive Laser Treatment for Snoring - the "New" Paradigm

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SUMMARY

Snoring is the vibration of respiratory structures and the resulting sound due to obstructed air movement during breathing while sleeping. In some cases, the sound may be soft, but in most cases, it can be loud and unpleasant. Snoring during sleep may be a sign, or the first warning of obstructive sleep apnea (OSA). Research suggests that snoring is one of the factors of sleep deprivation.

Snoring is the result of the relaxation of the uvula and soft palate. These tissues can relax enough to partially block the airway, resulting in irregular airflow and vibrations. Using Er:YAG lasers (2940 nm) for the treatment of snoring is a real alternative for a simple and non-invasive procedure, in contrast with the classic treatment approaches for these cases, based on the results observed by patients.

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