ISSN 1855-9913

Journal of the Laser and Health Academy
Vol. 2016, No.1; www.laserandhealth.com

Treatment of Peri-implantitis with Er:YAG and Nd:YAG Combinations

Aslan Y. Gökbuget
[1]*Private practice PGGdent, İstanbul, Turkey*

SUMMARY

Peri-implantitis is defined as an inflammatory reaction with loss of supporting bone around the implant (Albrektsson & Isidor 1994). The frequency of peri-implantitis has been reported in the range of 5–8% for selected implant systems (Berglundh et al. 2002). Similar figures are reported in a recent long-term follow-up study (Roos-Jansaaker et al. 2006a). More recently (Marrone et al. 2012): 37% of the subjects and 23% of implants.

Different regenerative therapies have been tried to resolve peri-implantitis (for a review, see Roos-Jansaker et al. 2003, Schou et al. 2004 and Schwarz et al. 2012). The concept of submerged healing was earlier reported as a treatment option for periodontally involved teeth. Laser-supported peri-implantitis therapy became an adjunct therapy for controlling the disease activity (Er:YAG and Nd:YAG Lasers). One of the important things to consider is that in order to use a laser beam effectively, we need to understand the interaction between the laser beam and the periodontal tissues. Variable parameters affecting absorption include the wavelength/form, power, pulse duration, energy density, angulation, pigmentation, water and mineral content, heat capacity and tissue density.

The best treatment option for managing peri-implantitis is an Er:YAG and Nd:YAG combination therapy. It is possible to eradicate granulation tissues and perform implant surface decontamination with Er:YAG, and do bacterial decontamination with the Nd:YAG laser. This combination enables regenerative osseous surgery around implants with no complications and with high patient and clinician satisfaction and confidence.

There is a need for evidence-based studies. Randomized, blinded, controlled and longitudinal, clinical trials are essential to achieve reliable evidence.

Soft-tissue Treatments with QSP Mode

Alexander Kelsch
[1]*Private dental practice, Karlsruhe, Germany*

SUMMARY

QSP mode has changed and improved our daily routine in the treatment of hard dental tissue in such a way that it is hard to imagine how work was done back in the "old" days. The LightWalker's QSP mode supports dentists in many different soft-tissue applications, preventing complications and conducting treatments with minimal intervention.

Soft-tissue treatments with QSP offer us a high therapeutic effectiveness combined with the reduced dental anxiety of our patients. This is a point which is sometimes underestimated.

Dentist all-rounders are now able to provide clinical solutions without necessarily transferring their patients to external experts like they used to do. QSP allows minimally painful treatments using techniques that are safe, fast and easy to reproduce. Shorter operation times generally improve our daily workflow and help us to improve our patients' acceptance.

QSP is HLD (=Highest Level Dentistry) at its best.