

ClearSense Provides Clear Solution for Onychomycosis

By Ilya Petrou, M.D., Contributing Editor



Jill S. Waibel, M.D.
Founder and Owner
Miami Dermatology & Laser Institute
Miami, FL, USA

“This approach appears to be very effective, particularly in those patients who have failed other tried therapies and are recalcitrant to standard fungal therapies.”



Toenail before Tx



Toenail seven months after ClearToe Tx
Photos courtesy of Marla Quintana, R.N.

Onychomycosis is a notoriously challenging fungal infection to treat, with limited therapeutic modalities achieving various clinical results. A novel laser treatment option, ClearSense™ from Sciton (Palo Alto, California, U.S.), has proven to be a safe and effective therapeutic treatment solution for those onychomycosis cases in which other therapies fall short.

Extending the versatility of Sciton's JOULE™ platform, the laser delivery technology of ClearSense can be used with all of Sciton's currently available laser and light-based technologies, as well as future aesthetic devices. In addition to the treatment of onychomycosis, this versatile, lightweight and ergonomic ClearSense accessory boasts a range of cosmetic and medical indications including warts, hypertrophic and keloid scars, wrinkles and rosacea.

“Onychomycosis can be very challenging to treat both from the medical and the aesthetic aspect. Patients who have never before had any success with other fungal therapies are seeing significant improvements in their affected nails using this device,” said Jill S. Waibel, M.D., founder and owner of the Miami Dermatology & Laser Institute in Miami, Fla.

Apart from the often difficult to achieve clinical clearance of onychomycosis, the condition can lead to an embarrassing and unsightly appearance of the nails and in some cases even pain. Current treatment modalities range from topical anti-fungal creams that cannot penetrate the nail adequately to completely eradicate the fungus, prescription based oral anti-fungals which can lead to varying degrees of compromised liver function and liver toxicity, or permanent removal of the nail. These sometimes less than optimal approaches leave a treatment void, which a therapeutic solution like ClearSense can fulfill.

The technology powering Sciton's innovative ClearSense accessory allows physicians to accurately gauge the real time temperatures used when performing laser treatments to maximize clinical and aesthetic outcomes, as well as treatment comfort, while helping to avoid adverse events. Sciton has combined its advanced laser technology with the ClearSense accessory and developed ClearToe, a novel approach for the treatment of onychomycosis. The ClearToe technology heats the nail and the nail bed with laser energy resulting in a decrease of nail fungus and increase in the growth of clear nails.

In a recent six month clinical trial, Dr. Waibel used ClearSense for the cosmetic improvement of onychomycosis. Study participants included non-diabetic patients who were either recalcitrant or have failed other fungal therapies. Patients received a total of four therapies spaced one week apart on culture proven onychomycosis infections only.

Results of the study showed that there was at least a 60% to 70% clearance of dermatophyte onychomycosis in patients, backed by negative culture and PSA tests. According to Dr. Waibel, these are very strong and encouraging results, particularly for a skin condition that is historically challenging to treat. “This approach appears to be very effective, particularly in those patients who have failed other tried therapies and are recalcitrant to standard fungal therapies,” she said.

ClearSense requires no consumables resulting in more cost-effective treatments for a wide-range of aesthetic and medical indications, maximizing the user's return on investment. The ClearSense accessory can be acquired as an upgrade by owners of existing Sciton systems or as a single module on a new, stand-alone system.