



doctor smile[®]
dental laser

Dark Grey,

Light yellow,

or LWS White?

Gel for Laser Assisted Bleaching

New formula with Titanium

New Laser Whitening System

**NEW FORMULA
WITH TiO₂**



• Why TiO₂?

TiO₂ (Titanium dioxide) is an effective photocatalyst pigment mixed in the powder which provides a natural whiteness and a physical blocker of light avoiding unwanted increase of heating to the elements.

New Laser Whitening System

**NEW FORMULA
WITH TiO₂**



- **Why LWS give no sensitivity?**

TiO₂ allows the use of decreased concentrations of hydrogen peroxide in the bleaching agent, thus achieve similar bleaching effects with fewer side effects (e.g. sensitivity, change in tooth surface topography, etc.)

New Laser Whitening System

**NEW FORMULA
WITH TIO₂**

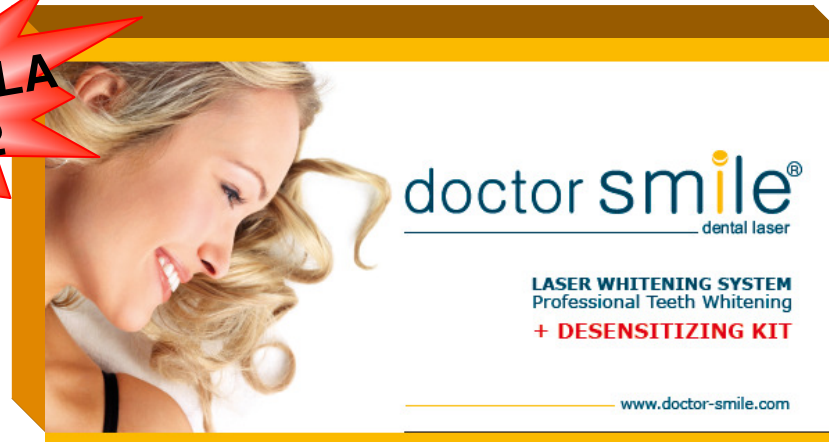


• Who develop this new gel?

The LWS Power Bleaching Gel was developed by a cooperation between Vienna Dental School and Vienna University of Technology with the survey of two professors, Dr. Johann Wernisch and DDr. Andreas Moritz. They turned very high attention on high bleaching efficiency combined with very high protection of the dental enamel.

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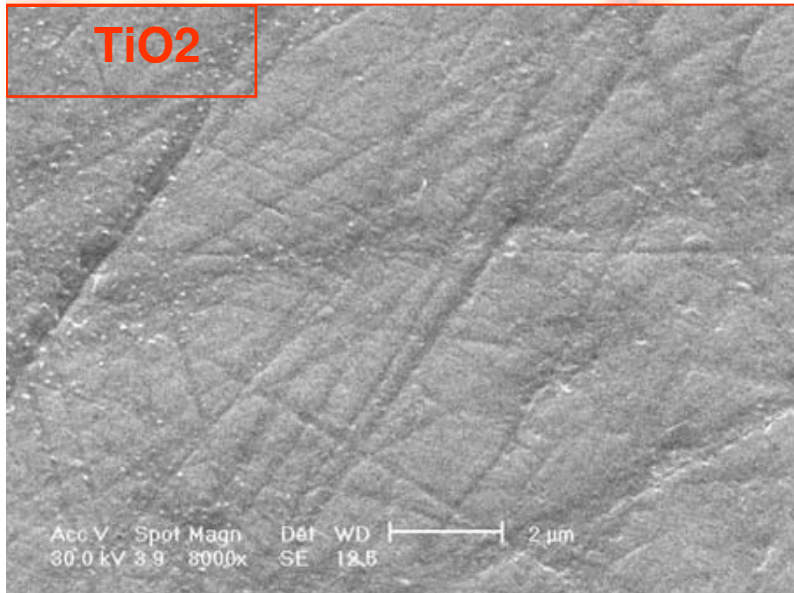


• Is this new gel safe for bleaching teeth?

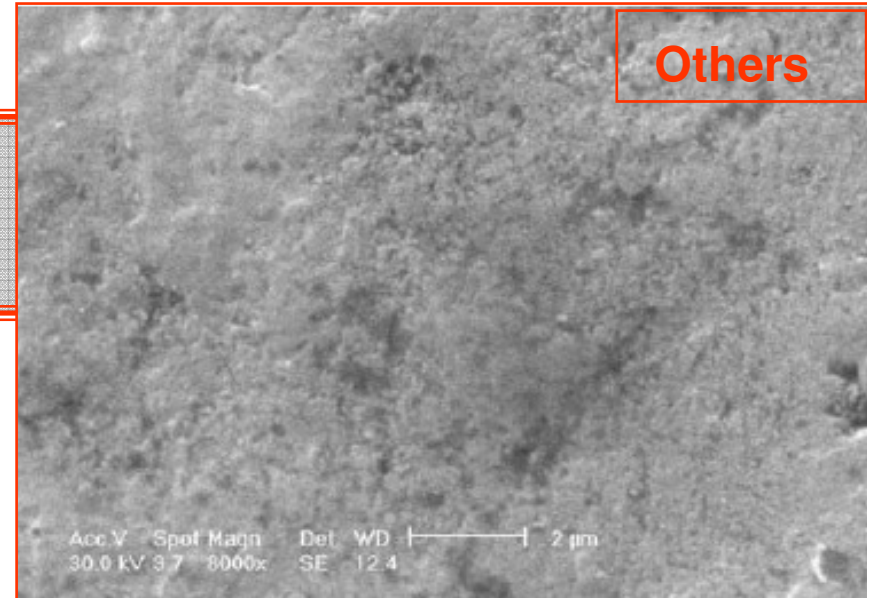
Several studies (e.g. *Laser Med Sci* 24(3)2009; p.339-346) could prove the high security for patient's health (no etching of enamel surfaces during application) and therapy success in daily application

Publication: *Laser Med Sci* 24(3)2009; p.339-346 Diode laser-activated power bleaching—pH, environmental scanning electron microscopy, and colorimetric in vitro evaluations - K. Goharkhay & U. Schoop & J. Wernisch & S. Hartl & R. De Moor & A. Moritz

TiO₂ power bleaching VS other bleaching gel



**ESEM
X 8000**



**With TiO₂ gel and diode laser
Irradiation no alteration of the
enamel's surface can be observed**

**Other whitening materials reveals
marked damage, superficial
dissolution and erosion**

Why associate TiO₂ gel and Laser?

All Home- and in-office Bleaching-Gels create (*depending on the duration of the application and the amount of hydroxyl radicals in the gel*) microscopic visible damage on enamel!

Cause: The Oxygen or Hydroxyl Radicals are not released quickly enough, due to activation with no, or too low energy

LASER

High energy for a short period of time

=

quick release of oxygen from gel

No structural changes even with prolonged activation

New Laser Whitening System

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WITH TIO₂**



doctor smile[®]
dental laser

LASER WHITENING SYSTEM
Professional Teeth Whitening
+ DESENSITIZING KIT

www.doctor-smile.com

• Why LWS Tio₂ whitening gel?

Brilliantly white teeth

Shorter treatment time

Immediately noticeable results

No damage to the tooth surface



New Laser Whitening System

**NEW FORMULA
WITH TIO₂**



NEW BOX COMPOSED BY LWS WHITENING KIT + DESENSITIZING KIT

- Nr.1 - Container with pre-dosed LWS Powder
- Nr.1 - 9 ml H₂O₂ 30% basic solution
- Nr.1 - Syringe of LWS Liquid Dam

+

**1 Syringe of LWS Desensitizing Gel
for Laser desensitization treatment**

Extra