

SYNCHRO REPLA:Y
3.4 - HP - 2.4.2 - 1.4.2

NEW: ALEX at 3 Hz!



MEDICINE AND AESTHETICS

SYNCHRO REPLA:Y

3.4 - HP - 2.4.2 - 1.4.2

Hair Removal
Vascular Treatments
Pigmented Lesions
Non-Ablative Skin Rejuvenation
Pseudofolliculitis Barbae (PFB)
Acne
Onychomycosis

**The First Alexandrite Laser
Working at 3 Hz**

**DEKA Intelligent Technologies:
Experts From the Start**



The Code of Excellence

SYNCHRO REPLA:Y 3.4 - 2.4.2 - 1.4.2

THE FASTEST AND MOST POWERFUL ALEXANDRITE LASERS IN THE WORLD: 3 HZ AND 125 WATTS

Physicians worldwide agree that the Alexandrite and Nd:YAG wavelengths are the most efficacious for hair removal treatments. Today DEKA anticipates the future introducing a NEW Alexandrite source: the fastest and most powerful in the world. The fastest laser because it works up to 3 Hz, while the standard is still 2 Hz!

The most powerful laser because it reaches 125 watts, at least 25% more than any other laser in the market!

Other than these increased performances the Alexandrite laser source can deliver energetic pulses with pulse length under 2 ms, down to 0.2 ms. Another incredible advantage for skin rejuvenation and pigmented lesions treatments.

"I have been a laser dermatologist for more than 10 years and I started utilizing the Synchro REPLA:Y platform for my practice lately. I previously used a KTP laser for vascular pathologies and a Diode laser for hair removal. I firmly believe that having more than a wavelength allows me to expand treatment indications: Alexandrite and Nd:YAG wavelengths are complementary for getting fast and safe results with any type of skin color, especially with tanned skin. Furthermore, superficial heliodermatitis and vascularities can be easily treated with pulsed light. Finally, I consider Synchro REPLA:Y as an indispensable tool to provide the widest range of hair removal treatments, given the unrivalled power levels, speed, and spot sizes. Synchro REPLA:Y flexibility allows me to address all patients needs and to expand my practice at once!"

Marc Patarin, MD
Dermatologist - Challans - France

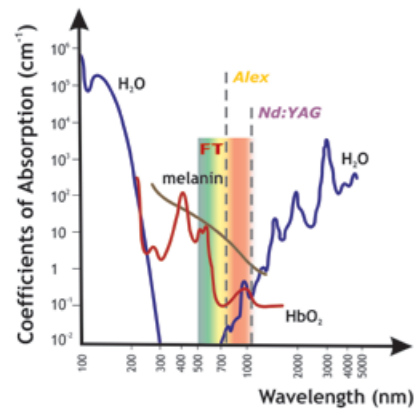


MEDICINE AND AESTHETICS SYNCHRO REPLA:Y 3.4 - HP - 2.4.2 - 1.4.2

WORLD'S MOST POWERFUL SYSTEMS FOR HAIR REMOVAL

Synchro REPLA:Y is a breakthrough laser platform for hair removal offering a widest range of wavelengths by using an Alexandrite laser with and without a combination of Nd:YAG laser. The benefits of Synchro REPLA:Y multi platform enables physicians to adapt the characteristics of Alexandrite and Nd:YAG lasers together with a flexible and optional pulsed lamp: DEKA FT source. Synchro REPLA:Y is a product especially designed for reaching the right range of energies and frequencies for the most effective and fastest hair removal treatment. DEKA constantly seeks to fulfill its commitment in providing technical and clinical innovations.

3 Hz	The NEW incredible repetition rate for hair removal with the most powerful Alexandrite laser source in the world. More speed for faster treatments.
125 W	More power for the Alexandrite laser for reaching higher fluences with the new repetition rates up to 3 Hz! At least 25% more powerful than any other system on the market!
150 W	More power also for the new Nd:YAG laser source, 25% more than Synchro HP and the other systems on the market!
20 mm	The largest spot size in the world for Alexandrite and Nd:YAG lasers.
4	Different types of sources available: Alexandrite laser; Nd:YAG Long Pulse (Standard Mode Emission) laser; Nd:YAG Short Pulse (High Peak Mode of emission) laser; FT pulsed light.
1st	The first and only Alexandrite laser with fractionate pulse emission.
1st	The top worldwide laser system for speed and power in Hair Removal treatments.
10	Choose up to ten handpieces on board for the laser sources (customized selection) with Top-Hat Spot Size technology and an automatic recognition system.
10	Interchangeable filters for the FT pulsed light handpiece. It takes only a moment to adjust the emission to the specific application and the patient's phototype.
Over 270	Protocols dealing with dermatology and aesthetic surgery.
Cooling	Choose between the contact skin cooling system integrated in all the laser and pulsed light handpieces and the external cool-air generator with the laser handpiece adapter.



Main skin chromophores absorption spectrum: Melanin, Water and Oxyhaemoglobin.

**POWERFUL, FAST, COMPLETE
A PLATFORM FOR TRUE SPECIALISTS**

Synchro REPLA:Y has nowadays the most powerful (125 W) and fastest (3 Hz) Alexandrite laser for the first time together with the unrivalled characteristics of DEKA Nd:YAG lasers (150 W - 20 mm spot size). Synchro REPLA:Y offers eight different configurations to specifically address the needs of medical clinics.

Synchro REPLA:Y Excellium Systems

Two new powerful systems are joining the range of Synchro REPLA:Y systems:

- **Excellium 3.4**, the most powerful worldwide system for hair removal offering an incredible laser platform with the fastest Alexandrite laser (frequency up to 3 pulse per second where competitors are still offering 2 pps) together with a 150 W Nd:YAG laser;
- **Excellium HP**, the new version of Synchro HP, a 150 W Nd:YAG laser with incredible pulse characteristics.

Both systems can work for a large number of handpieces, from 2.5 (only for Nd:YAG) to 20 mm. The user can easily customize the system for his needs and any skin type.

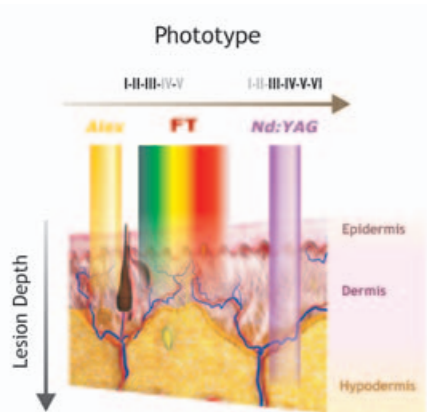
Synchro REPLA:Y Premium 2.4.2 and 1.4.2

These new Premium configurations offer the use of the powerful Alexandrite source (125W) with the option of a 70 W Nd:YAG Long Pulsed laser (Model 2.4.2).

- **Premium 2.4.2**, a combined system with the most powerful Alexandrite source (3 Hz - 125 W) together with a 70 W Nd:YAG laser. for all the users willing to have the maximum performances in Alexandrite hair removal and an efficient vascular Nd:YAG.
- **Premium 1.4.2**, a system with only the most powerful Alexandrite laser (3 Hz - 125 W).

Synchro REPLA:Y Premium 1.4 and 2.4, One 0.7 and 1.7

For specifications about these configurations please refer to the relative documentation.



The interaction of the different wavelengths and skin layers determines the appropriate treatment choice.



FT pulsed light handpiece with 5 interchangeable filters: A complete range of wavelengths at the physician's fingertips.

INNOVATION AT THE SERVICE OF SIMPLICITY

Synchro REPLA:Y with the FT Pulsed Light Handpiece

The versatile FT lamp can be added to the system at any time, enhancing the user capability in treating superficial vascular and pigmented lesions. The FT lamp covers a large treatment area (6.3 cm²) which can be cooled down to 4° C. In addition, a special system configuration allows the physician to change the filter of the wavelength to adapt the light emission to the treatment and the patient's skin type. There are also special filters that reduce the surface treatment to 3.1 cm² in order to adapt the emission to smaller areas.

Simple to Use and Know-How at your Fingertips with the Protocol Database

The clinical protocols included in the database cover a comprehensive range of treatments. By following the treatment settings validated by dermatologists and researchers, the physician can select the correct pulse parameters. In this way, the database guides professionals in the simple and safe selection of the most effective protocol.

Long & Short Pulse: Enhanced Potential of the Nd:YAG Laser

The Long & Short Pulse technology offers the physician the opportunity to work with two different pulse emission modes corresponding to the *Standard Mode* and the *High Peak Mode*. By selecting one of them, the professional can guarantee excellent results for patients in all applications: hair removal, vascular lesions and photorejuvenation.

Constant Fluence with the Top Hat Spot Size

The Top Hat Spot Size is an indispensable device for working in complete safety. Certain of a consistently even fluence over the entire area of the spot, the physician eliminates all risks of overexposing the skin or not irradiating it sufficiently because the fluence is too weak.

Total Comfort with the New Cooling System

DEKA has incorporated an extremely functional skin cooling technology in all its handpieces. Designed to innovative criteria, the Contact Skin Cooling system *SmartCooler* reduces recovery time, minimising the invasiveness of treatments and making them practically pain-free. Total comfort for the patient, maximum safety for the physician.

A special and small adapter for air cooling is available (see Figure).



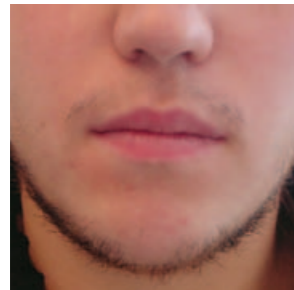
The colour touch screen of Synchro REPLA:Y has been restyled for enhanced user-friendliness: All functions are clearly visible, accessible and easy to use.



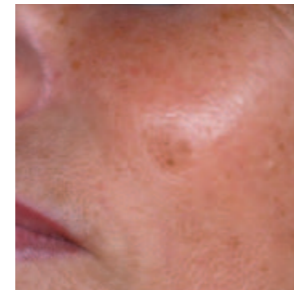
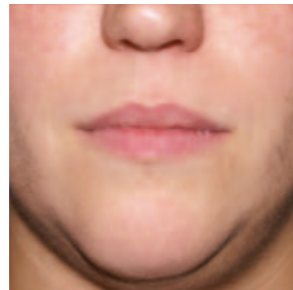
Adapter for Cryo air cooling, smaller dimensions for an easier handling.

LASER DEPTH AND PULSED LIGHT FLEXIBILITY COMBINED IN A COMPLETE PLATFORM

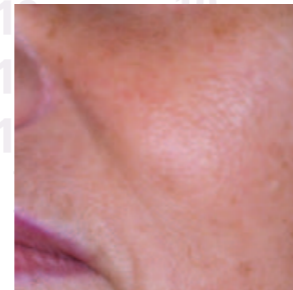
The deep action of the laser source is sustained and optimised on the surface by the FT pulsed light handpiece. The FT pulsed light features an innovative interchangeable filter system. Physicians can select the most suitable wavelength for the type of application or patient's phototype simply by replacing the filter, without changing the entire handpiece. Maximum versatility, maximum flexibility of use: changing the filter is a quick and simple operation which enables the physician to use this platform for all photorejuvenation and hair removal treatments.



Alexandrite Laser
Courtesy of N. Zerbinati, MD - Pavia, Italy.



Alexandrite Laser
Courtesy of M. Patarin, MD - Challans, France



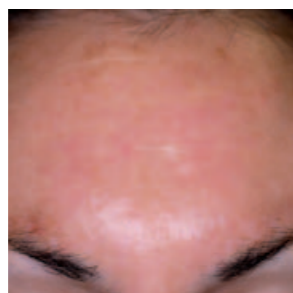
Nd:YAG Laser
Courtesy of P. Campolmi, MD - G. Cannarozzo, MD - P. Bonan, MD. Florence, Italy.



Nd:YAG Laser (Congenital angioma resistant to KTP laser treatment)
Courtesy of M. Patarin, MD - Challans, France.



FT Pulsed Light Handpiece
Courtesy of M. Patarin, MD - Challans, France.



FT Pulsed Light Handpiece
Courtesy of P. Campolmi, MD - G. Cannarozzo, MD - P. Bonan, MD. Florence, Italy.



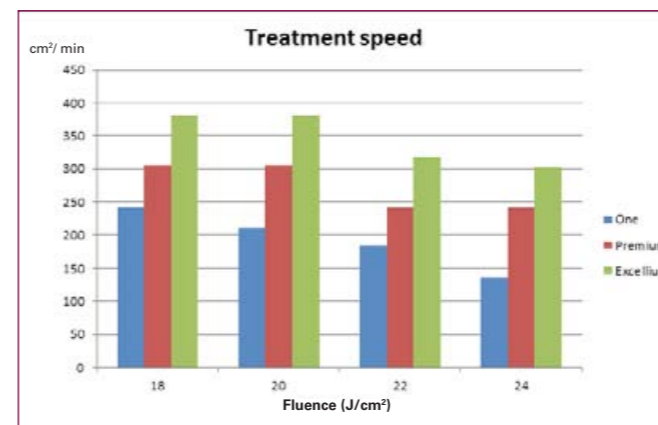
TECHNICAL DATA

Alexandrite Laser Module

Models	Premium 1.4.2 and 2.4.2	Excellium 3.4
Laser Type	Alexandrite	
Wavelength	755 nm	
Energy per Pulse	63.5 J (max.)	
Laser Power	125 W (max.)	
Pulse Duration	From 2 to 50 ms	
Delay between Pulses	From 2 to 50 ms (single pulse) From 2 to 40 ms (twin pulse)	
Number of Pulses	1 or 2	
Repetition Rate	Up to 10 Hz	
Spot Sizes (optional)	From 5 to 20 mm	
Fluence	Up to 250 J/cm ²	

Nd:YAG Module

Models	Premium 2.4.2	Excellium 3.4 and HP
Laser Type	Nd:YAG	
Wavelength	1064 nm	
Energy per Pulse	70 J (max.)	120 J (max.)
Laser Power	70 W (max.)	150 W (max.)
Peak Pulse	Up to 27,000 W (High Peak Mode or Standard Mode)	
Pulse Duration	From 0.2 to 10 ms (High Peak Mode) or From 2 to 30 ms (Standard Mode)	From 0.2 to 12 ms (High Peak Mode) or From 2 to 50 ms (Standard Mode)
Delay between Pulses	From 10 to 125 ms (single pulse)	
Total pulse length	From 10.4 to 270 ms (High Peak Mode) or From 14 to 280 ms (Standard Mode)	From 10.4 to 262 ms (High Peak Mode) or From 14 to 300 ms (Standard Mode)
Number of Pulses	Up to 3	
Repetition Rate	From 0.3 to 10 Hz	
Spot Sizes	From 2.5 to 20 mm (optional)	



Unrivalled Treatment Speed

The new Synchro REPLA:Y offers the highest treatment speeds on the market. The graph illustrates the differences between the treatment speeds for each REPLA:Y system at fixed fluences.

(*) "Treatment speed" is defined as the ability of a hair removal system to cover a surface in one minute. Take in consideration that a whole leg has an average surface of 3,000 cm².

TECHNICAL DATA

FT Pulsed Light Handpiece (Optional for All One and Premium Models)

Source	Xe Lamp
Spectrum of Emission	500-1200 nm; 520-1200 nm; 550-1200 nm; 600-1200 nm; 650-1200 nm
Energy per Pulse	160 J (max.)
Pulse Duration	From 3 to 8 ms
Delay between Pulses	From 5 to 50 ms
Total Pulse Length	From 3 to 124 ms
Number of Pulses	Up to 3
Repetition Rate	2 seconds (min.)
Treatment Area	48 x 13 mm (6.2 cm ²) 23 x 13 mm (3.0 cm ²)
Fluence	Up to 25 J/cm ²
Skin Cooler	Integrated Sapphire Cooling

General System Specifications

Models	Premium 2.4.2 and 1.4.2, Excellium 3.4 and HP
Aiming Beam for Lasers	Green Diode Laser @ 532 nm - 4 mW
Emission Control	Fingerswitch or footswitch
Laser Handpiece Cooling	Integrated Skin Cooler
DataBase Lines	More than 200
Dimensions	120 (H) cm x 49 (W) cm x 100 (D) cm
Weight	150 kg
Electrical Requirements	230 Vac - single phase - 50/60 Hz 32 A

**HAIR REMOVAL - VASCULAR TREATMENTS - PIGMENTED LESIONS
NON-ABLATIVE SKIN REJUVENATION
PSEUDOFOLLICULITIS BARBAE (PFB) – ACNE - ONYCHOMYCOSIS**

CE
0459



The Code of Excellence



Dealer stamp



www.dekalaser.com

DEKA M.E.L.A. s.r.l.
Via Baldanzese, 17 - 50041 Calenzano (FI) - Italy
Tel. +39 055 8874942 - Fax +39 0558832884

DEKA The Code of Excellence
A spin-off of the Ei.En. Group, DEKA is a world-class leader in the design and manufacture of lasers and light sources for applications in the medical field. DEKA markets its devices in more than 80 countries throughout an extensive network of international distributors as well as direct offices in France, Germany, U.S. Japan, and Italy. Excellence is the hallmark of DEKA's experience and recognition garnered in the sphere of R&D in over thirty years of activity. Quality, innovation and technological excellence place DEKA and its products in a unique and distinguished position in the global arena. DEKA manufactures laser devices in compliance with the specifications of Directive 93/42/EC and its quality assurance system, certified by  is in accordance with the ISO 9001 and ISO 13485 standards.