



# LASERAKADEMIET

## Laser treatment of blood vessels

You are hereby invited to a laser course held by  
Dr. Kingsley Mariadasan, under Laserlegene.

**Date:** 20.01.2024

**Time:** 10.00 - 16.00

**Venue:** Sommerro House

Registration before 15.12.2023

NOK 9.900,-

Registration after 15.12.2023

NOK 11.900,-

Dr. Kingsley Mariadasan has worked with lasers for over two decades, and now wants to share his expertise in the use of different laser types. He has extensive experience with CO2 laser, Er:YAG, modulated/nonablative Er:YAG, Alexandrite, Q-switched Nd:YAG, KTP laser, Q-switched 532, picolaser, IPL and more. In addition to primarily treating patients, he has been a lecturer at the Senzie academy and has an adjunct position as a lecturer at UIO. As the founder of Laserakademiet and responsible for teaching at the internationally recognized LA&HA Academy, the courses are guaranteed high quality.

All our courses are approved by Fotona Laser & Health academy, and a diploma from Fotona will be issued after completing the course with us.



**Laser & Health**  
**A C A D E M Y**

The course in vascular lesions will be held at Sommerro House on **Jan 20th 2024** consisting of theory, interactive discussion with case studies and video treatment.

Please use the following link to register:

<https://uwmn5s3wjtt.typeform.com/to/gOkPiTVz>

# Course layout

## Del 1 – Theoretical part



*Basic theory of long-pulse Nd:YAG, long-pulse 532nm (KTP) and IPL.*

### **Features of the long-pulse Nd:YAG:**

- How can one use the theory of selective photothermolysis to coagulate and thereby damage the vessel wall?
- How deep can this laser penetrate: What is the optical penetration depth (OPD) and the real penetration depth of this laser?
- How can the treatment be more effective and avoid complications?
- How do we explain spot size effects in relation to fluence, OPD, scattering, backscattering etc?
- Why is this wavelength "colorblind"?
- When do we use long-pulse Nd:YAG rather than KTP or IPL?

### **Characteristics of long-pulse KTP:**

- Why do both the OPD and the absorption coefficient make this wavelength the first choice in the treatment of superficial vascular lesions?
- Why is it not recommended to use this laser for skin types III - VI?
- How can we use the increased scattering effect of this wavelength to our advantage in the clinic?
- What is the advantage of using this wavelength over other wavelengths that are absorbed by the hemoglobin?

### **Advantages and disadvantages of using PDL.**

#### **Egenskaper av IPL ved behandling av vaskulære lesjoner:**

- How short should the pulse length be to treat generalized flushing?
- Thorough review of the principles of TRT, TDT, OPD and PD.

### **Advantages and disadvantages of IPL vs PDL.**

Review of combination treatment with different wavelengths (multiplex laser). What are the advantages and disadvantages?

The theory of inflammation after laser treatment of vessels and subsequent secretion of cytokines as the cause of angiogenesis (new formation of vessels). How can one avoid this vicious circle?

What is the desired end point for best effect and low probability of recanalization when treating vessels?

Principles in the treatment of rosacea/general redness. How to use the theory of "Thermal Kinetic Selectivity" when treating vessels of different sizes in this condition?

Can we treat ecchymoses or blood marks that come from e.g. filler treatment with vessel-laser?

## Part 2 — Practical part

- Practical review with pictures and video about the treatment of various vascular conditions/lesions.
- Case studies and discussion about the use of the correct wavelength, settings, possible pitfalls etc.