

LASERS



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Optogama team designs and manufactures a variety of “eye-safe” 1,54 μm diode pumped passively q-switched erbium glass laser transmitters as well as 1064 nm or 532nm wavelength Nd:YAG passively q-switched lasers. Optogama developed CW laser model at 1,5 μm lasing wavelength with an erbium ion doped active laser medium.



Nd:YAG passively q-switched DPSS lasers “WAVEGUARD”



“Eye-safe” 1,54 μm ns lasers “KAUKAS 1”



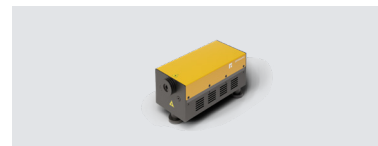
“Eye-safe” 1,54 μm ns lasers “KAUKAS 2”



“Eye-safe” 1,54 μm ns lasers “KAUKAS 3”



“Eye-safe” 1,54 μm ns lasers “KAUKAS-HR”



“Eye-safe” 1,5 μm ns lasers “KAUKAS CW”

Our services

- Optomechanical engineering: optomechanical design, functionality development and customization solutions.
- Optical design: low- and high-power, diffraction-limited optical design development and customization solutions.
- Laser crystal materials development and refurbishment: laser, passive Q-switch, nonlinear, photorefractive and Raman crystal growth, custom laser gain and optical modules development and crystal refurbishment services.
- Laser development: development, production and customization solutions of flash lamp-pumped and diode-pumped solid-state lasers.
- Metrology and quality assurance: state-of-the-art metrology and quality assurance services for laser and optical components.
- Laser optics manufacturing: we manufacture variety of precision optical components, crystals and optical assemblies.
- Coating services: we offer design and manufacturing of customized optical components for laser and vision applications with an optimum of coating performance and cost efficiency.

EXPERIENCE

Over 15 years' experience in laser optics industry

EFFICIENCY

Efficient communication & short leadtime for custom parts

TECHNICAL SUPPORT

> 90 % of staff has technical background in Laser Physics

RELIABILITY & REPEATABILITY

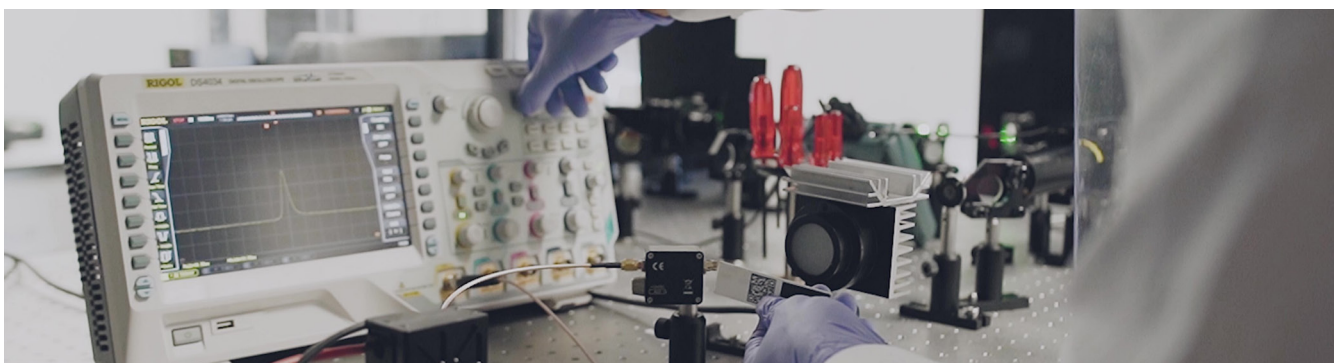
Standartized production and quality assurance

CUSTOM SOLUTIONS

Custom laser components design and production

COSTS SAVINGS

Superior price - performance ratio





BEAM DELIVERY DEVICES



BEAM DELIVERY DEVICES

We **design** and **manufacture** compact laser beam delivery systems, laser beam expanders, reducers, divergence compensators and laser power attenuators, which are used to increase or decrease laser beam diameter, control beam divergence, and adjust laser power.



Fixed ratio
laser beam expanders FEX



Variable laser beam
expanders VEX and reducers VRE



Compact motorized
laser beam expanders MEX



High power motorized laser
beam expanders MEX-HP



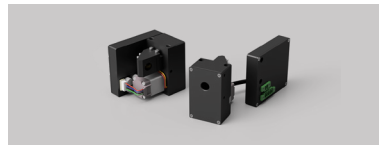
Ultrafast shutters



Motorized polarization
rotators MRO



Flat top converters FTC



Laser power attenuators

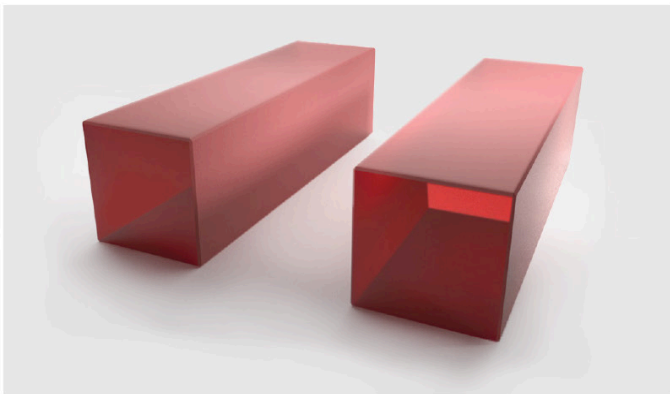
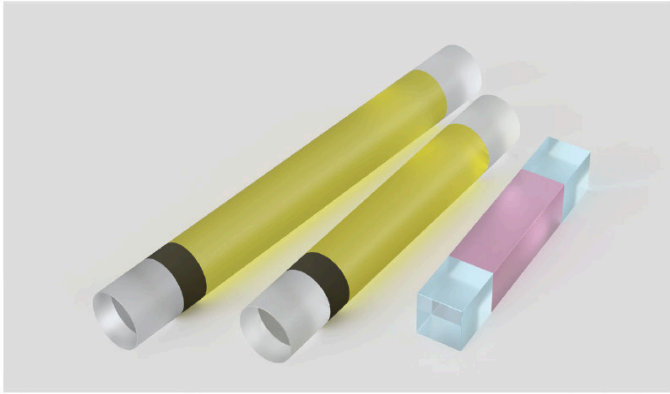


Device accessories

Production and quality assurance capabilities

Main capabilities & specialties:

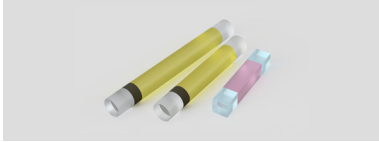
- Design and development of custom laser beam expanders, and beam delivery devices
- Development and production of different optical devices, including beam delivery systems and laser power attenuators
- From standard compact to custom large size devices
- Automated PC controlled and robust manual adjustment options
- Experience and knowledge in advanced high power (>75 J/cm², 8 nm @1064 nm available) and ultrafast dedicated optical systems



LASER OPTICS & COMPONENTS

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We offer the highest quality optical components and crystals for UV, VIS and NIR applications. Whether you are setting up your laser experiment or integrating a commercial product, we have competitively high performance components for your needs.



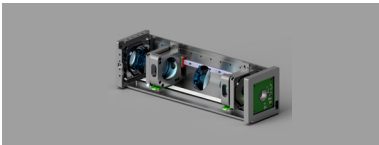
Laser crystal materials, elements, assemblies



Laser optics and components



Polarization optics



Laser setups and gain modules

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