Especially for applications with restricted space we offer a very small sized laser head with a view port for a coaxial fiber coupled infrared pyrometer. The fiber coupled infrared pyrometer is projected into the laser beam by a beam splitter. The pyrometer signal is digitized inside the LASCON controller with a resolution of 20 bits every 0.1ms. The laser head is connected to the LASCON® Controller and the diode laser by an armored glass fiber cable. This setup guarantees highest protection against EMI as all components in the laser head are only optical. The laser head is capable for laser power up to 100W and we offer different glass fiber diameters and lengths. The optics can be changed easily so that the customer can shift from point to line spots on the workpiece. We also develop custom specific optics with different spot geometries – just ask us!

**Technical data:**

- **Optical Power:** for fiber coupled lasers max. to 100 W
- **Wavelength:** 808nm - 980nm
- **Optics:** AR coated 1.0"-optics, focal length on customers request
- **Pyrometer:** infrared pyrometer, range typical: 140°C – 650°C , optional < 70°C
- **Acquisition time:** 100µs
- **Software:** LASCON® Process Manager
  
  unique measurement and closed-loop control software
- **Hardware:** LASCON controller
- **Fiber connector:** FSMA905
- **Fiber diameters:** typical 100µm-600µm
- **Num. Aperture:** 0.22, others on request
- **Laser Spot:** with working distance 100mm approx. 2x fiber diameter
  
  (dep. on bending radius fiber )
- **Dim.of laser head:** 52mm x 40mm footprint, length approx. 100mm
- **Protection:** IP50
- **Weight:** 0.2 kg
- **Pilot laser beam:** Pilot laser, Laser Class 3R, Wavelength 635nm
  
  0-5mW adjustable by the LASCON® Laser Controller