

Product description

Security System for fiber laser FLSCU16 / FLHPS16

Drawings: Pulsed laser construction guide
FLSCU16 / FLHPS16 connections

FLSCU16 / FLHPS16 allows easy construction of laser systems under consideration of necessary security aspects for emergency off (F-Stop) and interlock (s). Its two channel system with high security level is certified by DEKRA EXAM. Power switches interrupt the 24V/30A laser DC power through F-Stop, interlock (open doors) fault conditions and by means of a PLC controlled signal line. An additional circuit verifies functionality of the 24V/30A switch. In case of switch malfunction and F-STOP the AC input of the main laser supply is interrupted.

FLSCU11 / FLHPS16: DIN rail module: EN 50022 100 * 110 * 45mm

- A: Monitoring of F-STOP and interlocks circuits for contact faults and shorts.
- B: Dual interlock circuit galvanically separated by optocouplers.
- C: Dual emergency off circuit (F-Stop) galvanically separated by optocouplers.
- D: F-STOP rearm key.
- E. Monitoring output of FAULT condition: 24V = no fault; 0V = fault.
- F: Interlock status: door closed = 24V; door open = 0V.
- G: General enable input: 0V = disable unit and laser and laser; NC or 24V = enable all.
- H: Status indications by LED's.
- I: Cabling by cage clamp connectors (max.2.5mm², max. AWG13).
- K: External supply required: 24V / 1A minimum.
- L: All interface to SPS/PLC 24V is shortproof.

Operation: If faults are detected or F-Stop is activated the system rearm button must be operated to return to normal operation. A permanent fault is not resettable.

Module FLSCU16/FLHPS16E:

This module is designed to control an external power switch and is available in three voltage versions (24V/48V/96V). Above description is valid with exception of voltage and current switching capacity. Please view drawing:

FLSCU16/FLHPS16E connections. Power switch and free wheeling diode is user supplied and selected to voltage/current requirement.

Important note: minus of aux. 24V power supply and minus of main laser power supply must be interconnected!

FLSCU16/FLHPS16 is a direct replacement of SPISCU11/SPIHPS11!

APEX LASER UG
Hauptstr. 25
82386 HUGLFING
Fon: +49-8802-605
info@apex-laser.de