

ICS-10 intelligent laser interlock control system with computer interface

The ICS-10 is a development of the market leading ICS-1 laser interlock control system, based upon the same tried and tested safety control system technology and therefore having the same certifications to EN 954-1 and EN 61508. It has all the basic functions of the ICS-1 namely:

- Interlocked mains supply
- Interlocked low voltage supply for beam shutters
- Laser interlock connector operators
- Key operation
- Reset button
- Time limited fail-safe override
- Automatic switching of illuminated signs
- Emergency stop circuit
- Locking or non-locking system configuration
- Use with unlimited interlock switches
- Hard wired safety circuit
- Extremely versatile

In addition it has the following extra functions:

- Computer interface for configuration
- Ability to assign descriptive names to each interlock
- Data circuit for monitoring of interlocks
- Monitoring of up to 16 interlock switches
- Extra safety check through monitor circuit
- Interface to access control system
- Tamper / missing node detection disables reset
- Real-time download of system information for data logging¹
- Network access²



- Remote tripping of interlock system by computer¹
- Remote reset of interlock by computer¹ (disabled by default and subject to stringent safety procedures)
- Large backlit LCD screen³ giving system state information
- ICS-10F standard wall mounted system

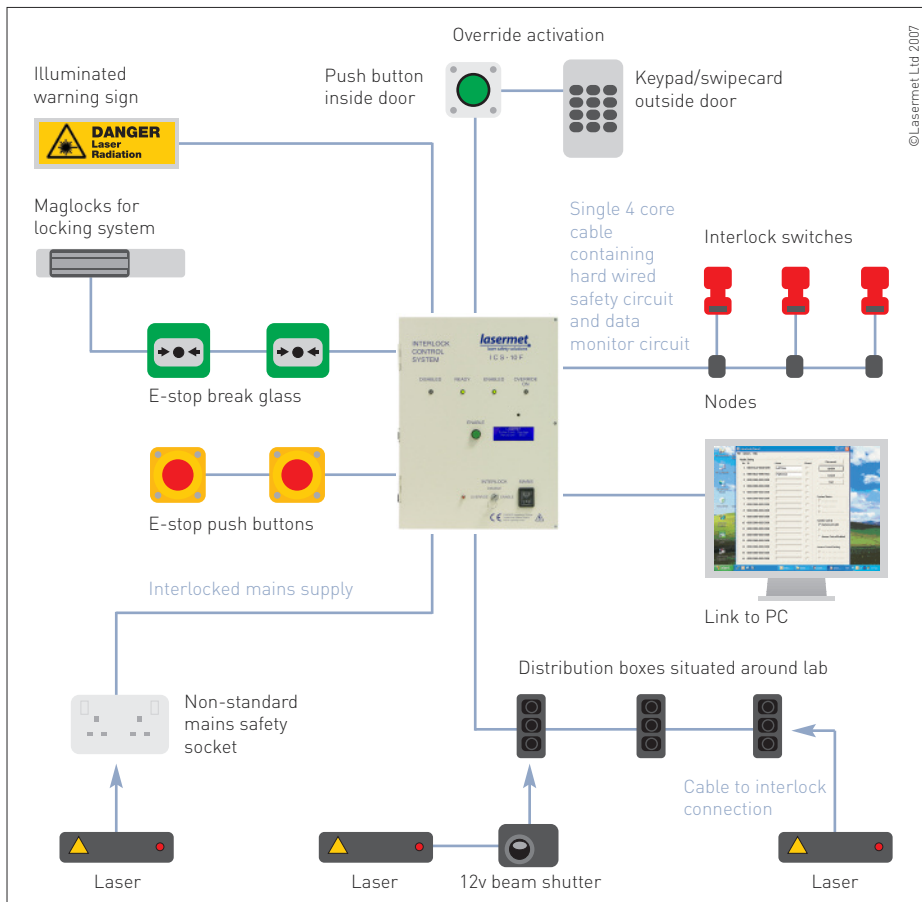
- ICS-10P portable control system with all plug-in interfaces

¹ Requires ICS-CM software upgrade

² Requires ICS-10-NC network converter

³ Backlight can be switched off

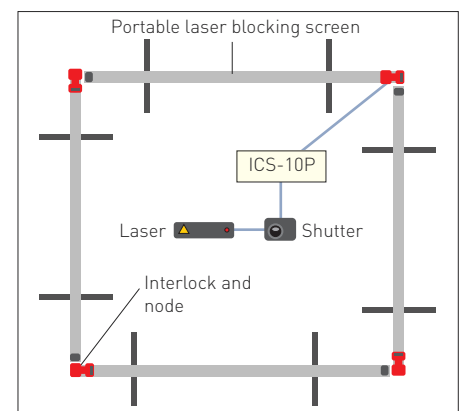
Fixed Interlock Installation (ICS-10F)



Portable Interlock Control System (ICS-10P panel)

The ICS-10P is a portable version of the ICS-10F, with plug-in interfaces, carry handle, rubber feet and user interface on one end. This can be used in conjunction with interlocked laser blocking screens such as the Lasetmet LBS-HD-8 and LBS-HD-4 to form a temporary interlocked enclosure controlling the laser through the usual interfaces (interlock connector, beam shutter or interlocked mains supply⁴).

⁴ Interlocked mains supply is hard wired. Other interfaces are plug-in.



	ICS-10F (Fixed)	ICS-10P (Portable)	ICS-10F with IPS-11
Interlocked mains supply	10 A	10 A	2 x 32 A
Interlocked 12 VDC supply for beam shutters	1 A	1 A	5 A
Laser interlock connector operator	2 off	2 off	8 off
Warning light output	230 V, 1 A	230 V, 1 A	230 V, 1 A
Connections	Hard wired to plug in distribution boxes	Plug in	Hard wired to plug in distribution boxes
Supply	230 V, 13A	230 V, 13A	230 V, 3A plus interlocked mains inputs
Size	300 w x 400 h x 100 deep (mm)	300 w x 100 h x 320 deep (mm)	600 w x 400 h x 100 deep (mm)
Weight	5.7kg	5.1kg	
Directives	Conforms to Machinery Directive, Low Voltage Directive, EMC Directive		
Standards	Meets EN 954-1 (Cat 3 safety system), EN 61508 (SIL 4), EN 61010, EN 60947-1		