



Robust Safety Light Curtain

Safe4

The Safe4 safety light curtain enables contact-free and very cost-effective safeguarding of areas on and around hazardous machines. Thanks to the devices' multiple configuration and combination options, machine manufacturers are able to simply and reliably safeguard geometrically complex areas, whether they be large or small. The machine operator is thus provided with maximum safety.

Safe4 has been developed in conjunction with leading automobile manufacturers. Ease-of-operation, cost-efficiency and total reliability were the guiding principles du-

ring the devices' development. Safe4 has proven itself around the globe, often under extreme conditions.

With the standard Integrated Laser Alignment System ILAS, you receive a product which saves you precious time and frustration during installation. So you no longer need expensive specialists with an enormous amount of technical flair to get a category 4 light curtain to work!

Safe4 - serial safety

Application areas:

- ▶ Presses
- ▶ Paper cutting machines
- ▶ Production lines
- ▶ Indexing tables
- ▶ Conveyor industry
- ▶ Access control
and many more

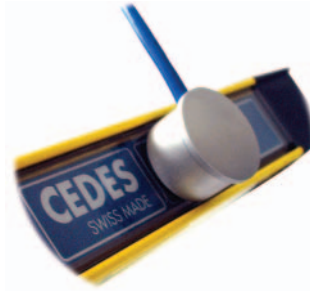
At a glance!

- Patented laser alignment system ILAS (US Patent No. 6'124'586, EP 0 889 332 B1 and others)
- Resolution 14 and 30 mm
- Diagnosis at machine (optical interface - OptiLink)
- Large operating range
- Modular construction (14,000,000 configurations)
- Extremely compact and stable construction
- Combination of multiple protective fields, e.g. L-configuration
- External controller also possible

Safe4 light curtain is a contactless safety device with built-in self-testing. It contains two redundant self-monitored channels which fulfill index IV of the Machine Directive EC/98/37 as cat. 4 safety light curtains and IEC / EN 61496.

The light curtain system is very resistant to ambient light interference and can cope easily and very reliably with demanding applications, such as welding robots. The large detection range (up to 30 m for hand-resolution and up to 9 m for finger-resolution) also enables the reliable safeguarding of hazardous zones covering large areas. With Safe4 units available starting at 120 mm lengths, they are optimally designed to safeguard small hazardous areas.

In addition, it is also possible to combine multiple protective fields (cascading or L-configuration), and monitor them with a single controller. This provides the machine manufacturer the freedom to optimize the machine design.



OptiLink kit for diagnosis



ILAS, laser alignment system



LED status display



L-Configuration, Cascading and Perimeter systems

Application examples



Special solution for a guillotine machine



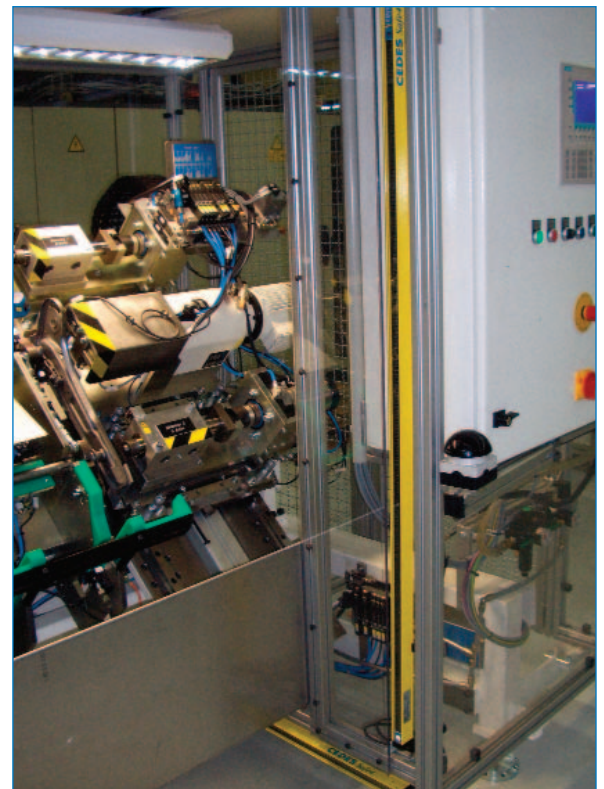
Safeguarding a stamping machine



A 125° Safe4 L-configuration in a weaving machine



Design-in for a laser welding machine



Cascaded safeguard on a tube forming machine