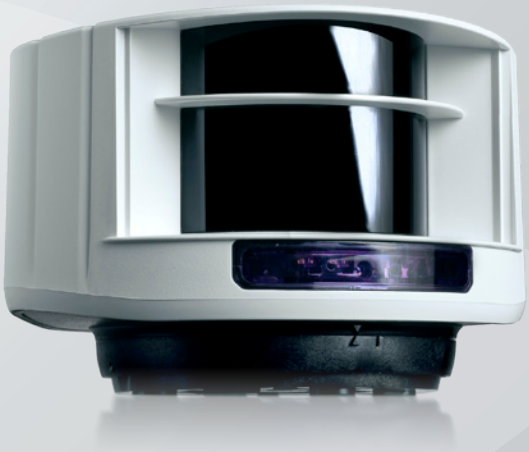
LZR®- i110

SAFETY SENSOR FOR INDUSTRIAL DOORS

Commercial sheet



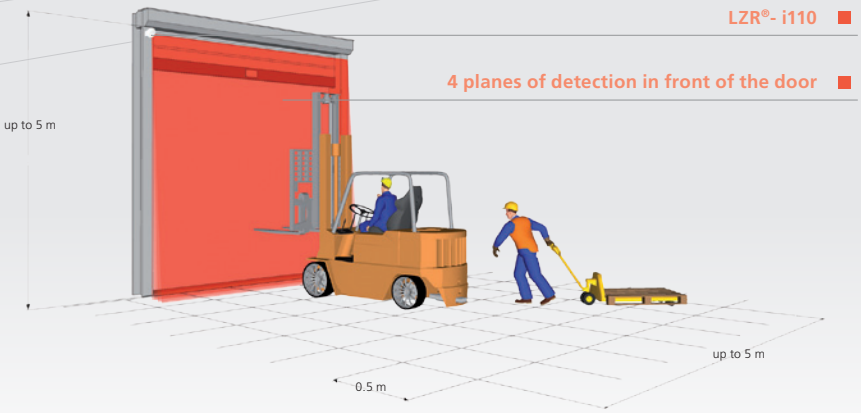
THE PREMIUM SAFETY SOLUTION

EN

Up to 5 m × 5 m

DESCRIPTION

The **LZR®-i110** works according to the principle of time of flight. This high-precision technology ensures optimal safety. A dynamic orientation of the LASER beams on 4 planes offers more safety in the door threshold and its proximity.

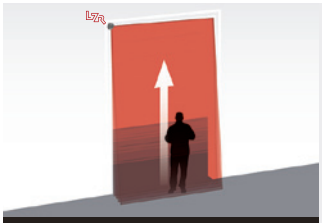


PERFORMANCE

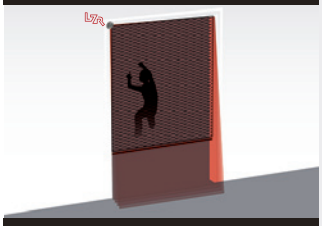
- Maximal detection range: 5 m × 5 m.
- Variable depth of plane (0.5 m max.) according to the installation height.
- High performance safety solution for industrial doors certified PL "d"/ CAT.2 according to EN ISO 13849-1 and Type E according to EN 12453.
- High level of safety with a complete three-dimensional detection in front of the door.
- Detection of small objects.*
- Replaces the current solutions such as contact edges, light beams and lightgrids.
- Easy installation and opportunity for the retrofit.

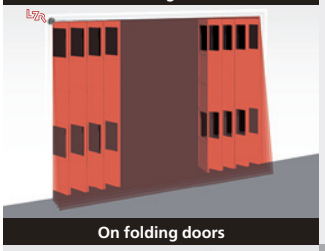
* up to a few centimeters depending on the application.

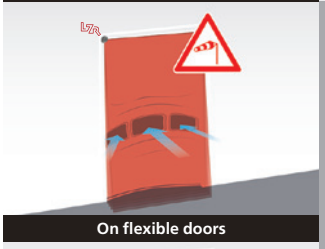
OPEN UP NEW HORIZONS



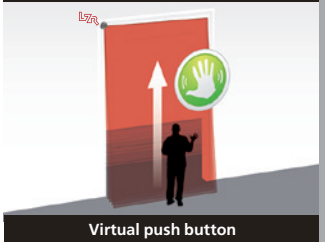
APPLICATIONS







EXTRA FEATURES



APPLICATIONS

- Safety at the opening and the closing of the door thanks to 2 separate detection areas.
- Possibility to create 2 virtual push buttons to open the door.

DESIGNED FOR INDUSTRIAL ENVIRONMENTS

- Filters door vibrations and environmental interferences.
- Filters door leaf deformation by wind force.
- Degree of protection: IP65.

EASE OF INSTALLATION

- Easy setting of the detection zone with 3 visible LASER beams.
- Automatic door dimensions teach-in.
- Setting with the universal remote control.
- Cable of 10 m provided.

TECHNICAL SPECIFICATIONS

Technology	LASER scanner, time-of-flight measurement
Detection mode	Presence (EN 12453 Type E)
Max. detection range	5 m × 5 m
Remission factor	> 2 %
Angular resolution	0,3516°
Typ. min. object size	2,1 cm @ 3 m / 3,5 cm @ 5 m (in proportion to object distance)
Testbody	700 mm × 300 mm × 200 mm (testbody A according to EN 12445)
Emission characteristics IR LASER Red visible LASER	 Wavelength 905 nm; max. output pulse power 75 W; Class 1 Wavelength 650 nm; max. output CW power 3 mW; Class 3R
Supply voltage	10-35V DC @ sensor terminal
Power consumption	< 5 W
Response time	Typ. 20 ms; max. 80 ms
Output Max. switching voltage Max. switching current	2 electronic relays (galvanic isolation - polarity free) 35V DC / 24V AC 80 mA (resistive)
LED-signals	1 blue LED: power-on status 1 orange LED: error status 2 bi-coloured LED: detection/output status
Dimensions	125 mm (L) × 93 mm (D) × 70 mm (H) (mounting bracket + 14 mm)
Material	PC/ASA
Colour	White
Rotation angles on bracket	-5° to +5° (lockable)
Tilt angles on bracket	-3° to +3°
Protection degree	IP65
Temperature range	-30 °C to +60 °C if powered
Humidity	0-95 % non-condensing
Vibrations	< 2 G
Norm conformity	2006/95/EC: LVD; 2002/95/EC: RoHS; 2004/108/EC: EMC; 2006/42/EC: MD; EN 12453:2000 chapter 5.1.1.6, chapter 5.5.1 Safety device E; EN 12978:2009; EN ISO 13849-1:2008 Pl "d"/ CAT2; EN 60529:2001; IEC 60825-1:2007; EN 60950-1:2005; EN 61000-6-2:2005; EN 61000-6-3:2006; IEC 61496-1:2009; EN 61496-3:2008 ESPE Type 2; EN 62061:2005 SIL 2; DIN 18650-1:2010 Chapter 5.7.4

Specifications are subject to change without prior notice.

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A HALMA COMPANY

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