

# EUROMAG - Magnetic Non Contact Type: LPR

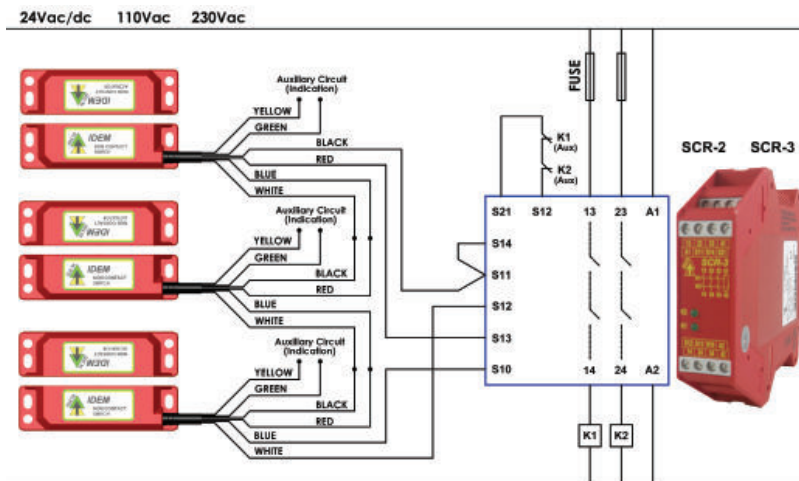
## FEATURES:

Popular European fitting suitable for all industry applications  
Wide 12mm sensing and high tolerance to misalignment  
Narrow fitting to enable flush mounting  
Long life high power switching capability up to 1A  
Up to: PLe ISO13849-1  
2NC 1NO circuits  
Quick Connect versions available

**Magnetic Actuation - Power Series**  
**Switching Tolerance up to 12mm**  
**Medium Duty versions 230Vac/24Vdc 1A**  
**Will operate with most Safety Relays**

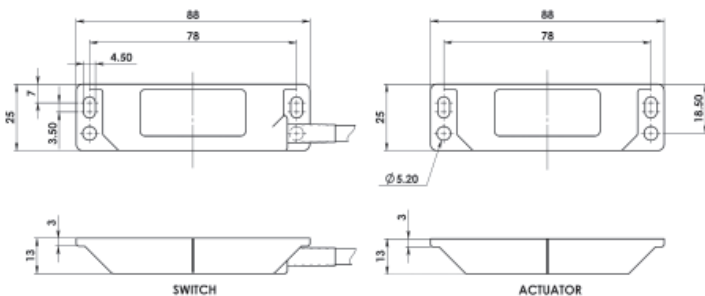


## CONNECTION EXAMPLE: Magnetic Switches



0V  
Three switches connected in series to an SCR-2 or SCR-3 to give Dual Channel guard monitoring with Automatic Start and Contactor Feedback check.  
Optional auxiliary circuits provides for remote signalling from each switch.

## DIMENSIONS:



Standards: ISO14119 EN60947-5-1  
EN60204-1 ISO13849-1 EN62061 UL508

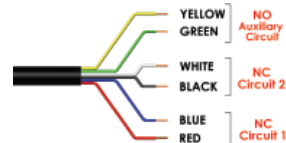
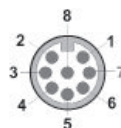
### Safety Classification and Reliability Data:

Mechanical Reliability B10d  
ISO13849-1  
Safety Data – Annual Usage  
8 cycles per hour/24 hours per day/365 days  
MTTFd 470 years  
Medium Duty Safety Channel 1 NC Voltage Free: 250Vac 1.0A Max. Rating  
Safety Channel 2 NC Voltage Free: 250Vac 1.0A Max. Rating  
Safety Channel 3 NO Voltage Free: 24Vdc 0.2A Max. Rating  
Fuse Internal 1.0A (F) External 0.8A (F) (User)  
Contact Release Time <2ms  
Initial Contact Resistance <500 milliohm  
Minimum Switched Current 10Vdc 1mA  
Dielectric Withstand 250Vac  
Insulation Resistance 100 Mohms  
Recommended Setting Gap 5mm  
Switching Distance Sao 8mm Close  
(Target to Target) Sar 22mm Open  
Tolerance to Misalignment 5mm in any direction from 5mm setting gap  
Switching Frequency 1.0Hz maximum  
Approach Speed 200mm/min to 1000mm/sec  
Body Material UL approved polyester  
Operating Temperature -25C +80C  
Enclosure Protection IP69K (NEMA PW12) IP67 (NEMA 6)  
Shock Resistance IEC68-2-27 11ms 30g  
Vibration Resistance IEC68-2-6 10-55Hz 1mm  
Cable Type PVC 6 core 6mm OD Conductors 0.25mm<sup>2</sup>  
Mounting Bolts 2xM4 Tightening torque 1.0Nm  
Mounting Position Any

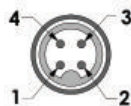
For all IDEM switches the normally closed (NC) circuits are closed when the guard is closed and the actuator is present.



Quick Connect M12 versions fitted with 250mm (10") cable



Quick Connect QC M12 8 Way Male Plug Pin view from Switch	Standard Lead Colour	Circuit (Actuator Present)
4	Yellow	NO
6	Green	NO
7	Black	NC2
1	White	NC2
2	Red	NC1
3	Blue	NC1



NC1 Pins 1 and 2  
NC2 Pins 3 and 4  
M12 4 Way Versions  
Asi compatible Pin out  
Pin view from switch

SALES NUMBER	TYPE	CABLE LENGTH	CIRCUITS
110009	Euromag LPR	2M	2NC
110010	Euromag LPR	5M	2NC
110011	Euromag LPR	10M	2NC
110012	Euromag LPR	QC-M12	2NC
110013	Euromag LPR	2M	2NC 1NO
110014	Euromag LPR	5M	2NC 1NO
110015	Euromag LPR	10M	2NC 1NO
110016	Euromag LPR	QC-M12	2NC 1NO
110021	Euromag LPR	2M	1NC 1NO
110022	Euromag LPR	5M	1NC 1NO
110023	Euromag LPR	10M	1NC 1NO
110024	Euromag LPR	QC-M12 4 Way	2NC



140101	Female QC Lead	M12 Female 5m. 8 way
140102	Female QC Lead	M12 Female 10m. 8 way

110300	Plastic 8mm Spacers (2) for use when mounting on Ferrous Materials	1 x Switch 1 x Actuator
--------	--------------------------------------------------------------------	----------------------------

# EUROMAG - Magnetic Non Contact: LPR (with Integral LED)

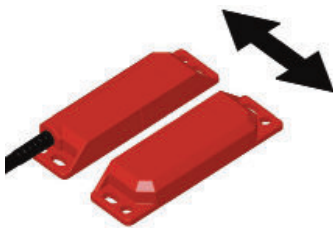
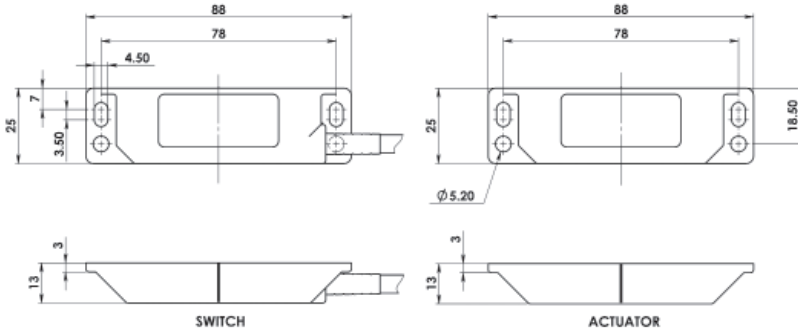
## FEATURES:

- 2NC circuits for connection to safety relays to achieve up to: PLe ISO13849-1
- Integral LED indication of sensing position
- Choice of LED versions:
  - Green - ON when guard is closed
  - Red - ON when guard is open
- Popular European fitting suitable for all industry applications
- Narrow fitting to allow for flush mounting
- Wide 10mm sensing with high tolerance to misalignment
- Long life high power switching capability up to 1A
- M12 Quick Connect versions available



**Integral LED (options available)**  
**Magnetic Actuation - Power Series**  
**Switching Tolerance up to 10mm**  
**Will operate with most Safety Relays**

## DIMENSIONS:



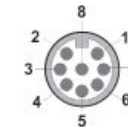
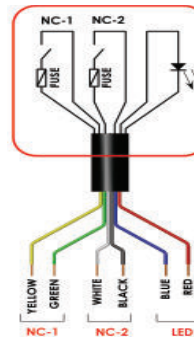
Recommended operating direction for optimum performance

**Standards:** ISO14119 EN60947-5-1  
 EN60204-1 ISO13849-1 EN62061 UL508

### Safety Classification and Reliability Data:

- |                             |                                           |
|-----------------------------|-------------------------------------------|
| Safety Channels NC1 and NC2 | Voltage free: 250Vac 1.0A Max.            |
| Fuse (NC Circuits)          | Fuse externally 0.8A (F)                  |
| Contact Release Time        | <2ms                                      |
| Initial Contact Resistance  | <500 milliohm                             |
| Minimum Switched Current    | 10Vdc 1mA                                 |
| Dielectric Withstand        | 250Vac                                    |
| Insulation Resistance       | 100 Mohms                                 |
| Recommended Setting Gap     | 5mm                                       |
| LED Supply Voltage          | 24Vdc +/-10%                              |
| NC Switching Distance       | Sao 8mm Close                             |
| (Target to Target)          | Sar 22mm Open                             |
| LED (Green)                 | Typical 8mm ON 15mm OFF                   |
| LED (Red)                   | Typical 8mm OFF 15mm ON                   |
| Tolerance to Misalignment   | 5mm in any direction from 5mm setting gap |
| Switching Frequency         | 1.0Hz maximum                             |
| Approach Speed              | 200mm/min to 1000mm/sec                   |
| Body Material               | UL approved polyester                     |
| Operating Temperature       | -25C +80C                                 |
| Enclosure Protection        | IP67                                      |
| Shock Resistance            | IEC68-2-27 11ms 30g                       |
| Vibration Resistance        | IEC68-2-6 10-55Hz 1mm                     |
| Mechanical Life Expectancy  | 10,000,000 switching operations           |
| Electrical Life Expectancy  | 1,000,000 switching operations            |

Cable Type: PVC 6 core 6mm OD Conductors 0.25mm<sup>2</sup>  
 Mounting Bolts: 2xM4 Tightening torque 1.0Nm  
 Mounting Position: Any



Quick Connect QC M12 8 Way Male Plug Pin view from Switch	Standard Lead Colour	Circuit (Actuator Present)
4	Yellow	NC2
6	Green	NC2
7	Black	NC1
1	White	NC1
2	Red	Supply +24Vdc
3	Blue	Supply 0Vdc

140101	Female QC Lead	M12 Female 5m. 8 way
140102	Female QC Lead	M12 Female 10m. 8 way



Quick Connect M12 versions fitted with 250mm (10") cable



**Note:** The LED does not indicate the status of the NC Safety Contacts, but indicates that the actuator is aligned to give optimum performance.

LED COLOUR AND STATUS	SALES NUMBER	TYPE	CABLE LENGTH	OUTPUT CIRCUITS
<b>LED GREEN</b> (Illuminated when the guard is closed)	110101	Euromag LPR (with Integral LED)	2M	2NC
	110102	Euromag LPR (with Integral LED)	5M	2NC
	110103	Euromag LPR (with Integral LED)	10M	2NC
	110104	Euromag LPR (with Integral LED)	QC-M12	2NC
<b>LED RED</b> (Illuminated when the guard is open)	110105	Euromag LPR (with Integral LED)	2M	2NC
	110106	Euromag LPR (with Integral LED)	5M	2NC
	110107	Euromag LPR (with Integral LED)	10M	2NC
	110108	Euromag LPR (with Integral LED)	QC-M12	2NC

For all IDEM switches the normally closed (NC) circuits are closed when the guard is closed and the actuator is present.

110300	Plastic 8mm Spacers (2) for use when mounting on Ferrous Materials	1 x Switch 1 x Actuator
--------	--------------------------------------------------------------------	----------------------------