



TYPE CODE

PHOTOELECTRIC SENSORS

FACTORY AUTOMATION



PEPPERL+FUCHS  
**VISOLUX**

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# GUIDE • BRIEF INFORMATION

Type	Brief information	see Type Code
<b>ACV</b>	Camera system	Vision system
<b>AIR</b>	Active infrared light scanner	Doors, Gates, Elevators (TTA)
<b>AL</b>	Elevator light curtain	Doors, Gates, Elevators (TTA)
<b>BL10-...</b>	Single path slab light beam switch	Customer-specific products
<b>DAD</b>	Data transmission light beam switch	Data transmission
<b>DF</b>	Print mark colour scanner	Print mark scanner + Colour sensors
<b>DFE</b>	Print mark colour scanner in stainless steel housing	Print mark scanner + Colour sensors
<b>DK</b>	Print mark contrast scanner	Print mark scanner + Colour sensors
<b>DKE</b>	Print mark contrast scanner in stainless steel housing	Print mark scanner + Colour sensors
<b>EDM</b>	Distance measuring unit	Distance measurement
<b>ELG</b>	Single path light grid	Light grids
<b>FLT</b>	Infrared surface scanner	Doors, Gates, Elevators (TTA)
<b>FLT...-CLS</b>	Counting sensor	Doors, Gates, Elevators (TTA)
<b>FW</b>	Thread break detector	Customer-specific products
<b>G/GV</b>	Single path light beam switch in threaded housing	Threaded housing
<b>GL</b>	Fork type light beam switch	Fork type light beam switches
<b>GLV</b>	Light beam switch or light scanner in threaded housing	Threaded housing
<b>GLV...-LL</b>	Fibre optic light beam switch	Threaded housing
<b>KLE</b>	Single path fibre optic	Fibre optics
<b>KLEF</b>	Single path fibre optic with fibre bundle	Fibre optics
<b>KLR</b>	Reflex fibre optic	Fibre optics
<b>KLRF</b>	Reflex fibre optic with fibre bundle	Fibre optics
<b>KS/KSE</b>	Single path light beam switch, miniature	Threaded housing
<b>KSU</b>	Signal converter	Power units
<b>KT</b>	Light scanner, miniature	Threaded housing
<b>L/LK and LA/LK</b>	Single path light beam switch for mains voltage	Rectangular housing
<b>L30/LK30-15..</b>	Single path light beam switch for fire protection	Doors, Gates, Elevators (TTA)
<b>L/LK...-TE</b>	Single path light beam switch with test input – Cat. 2	Safety light barriers

## GUIDE • BRIEF INFORMATION

Type	Brief information	see Type Code
<b>L/LV and LD/LV</b>	Single path light beam switch for low voltage	Rectangular housing
<b>L/LV...-TE</b>	Single path light beam switch with test input – Cat. 2	Safety light barriers
<b>LCE</b>	Single path fibre optic with PVC covering	Fibre optics
<b>LCR</b>	Reflex fibre optic with PVC covering	Fibre optics
<b>LG</b>	8 or 16 beam light grid	Light grids
<b>LLE</b>	Single path fibre optic with metal-silicon-covering	Fibre optics
<b>LLR</b>	Reflex fibre optic with metal-silicon-covering	Fibre optics
<b>LME</b>	Single path fibre optic with metal covering	Fibre optics
<b>LMR</b>	Reflex fibre optic with metal covering	Fibre optics
<b>LS...-DA</b>	Data transmission light beam switch	Data transmission
<b>LSE</b>	Single path fibre optic with silicon covering	Fibre optics
<b>LSR</b>	Reflex fibre optic with silicon covering	Fibre optics
<b>LS...-TE</b>	Single path light beam switch with test input – Cat. 2	Safety light barriers
<b>LT63 /LT64</b>	Direct detection light scanner with foreground and background suppression	Customer-specific products
<b>LT2</b>	Infrared light scanner for DC	Doors, Gates, Elevators (TTA)
<b>LTK2</b>	Infrared light scanner for AC/DC	Doors, Gates, Elevators (TTA)
<b>M/MV</b>	Miniature single path light beam switch	Rectangular housing
<b>M/MV...-TE</b>	Miniature single path light beam switch with test input – Cat. 2	Safety light barriers
<b>ML</b>	Miniature reflex light beam switch or scanner	Rectangular housing
<b>ML19</b>	Fork type light beam switch for label detection	Fork type light beam switches
<b>MLV</b>	Miniature reflex light beam switch or scanner with amplifier	Rectangular housing
<b>MLV40-LL</b>	Fibre optic light beam switch	Rectangular housing
<b>OBE</b>	Single path light beam switch, basic series	Standard sensors 3

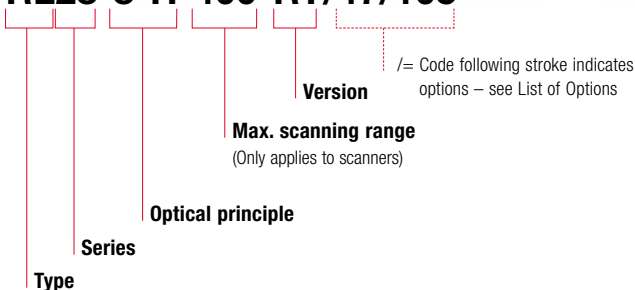
## GUIDE • BRIEF INFORMATION

Type	Brief information	see Type Code
<b>OBH</b>	Direct detection light scanner with background suppression, basic series	Standard sensors 3
<b>OBS</b>	Reflex light beam switch, basic series	Standard sensors 3
<b>OBT</b>	Direct detection light scanner, basic series	Standard sensors 3
<b>OCE</b>	Single path light beam switch, comfort series	Standard sensors 3
<b>OCH</b>	Direct detection light scanner with background suppression, comfort series	Standard sensors 3
<b>OCS</b>	Reflex light beam switch, comfort series	Standard sensors 3
<b>OCT</b>	Direct detection light scanner comfort series	Standard sensors 3
<b>PIR</b>	Passive infrared light scanner	Doors, Gates, Elevators (TTA)
<b>PLVScan</b>	Profile light grid - 8 to 64 beams	Light grids
<b>Proscan</b>	Energy light scanner	Doors, Gates, Elevators (TTA)
<b>PR</b>	Light grid - 4 or 16 beams	Light grids
<b>PRS</b>	Paper break detection	Light grids
<b>PS1</b>	Power unit	Power unit
<b>RK</b>	Radar motion detector	Doors, Gates, Elevators (TTA)
<b>RL</b>	Direct detection light scanner/ reflex light beam switch for low voltage	Rectangular housing
<b>RL91</b>	Reflex light beam switch for low voltage	Doors, Gates, Elevators (TTA)
<b>RL5-LL</b>	Print mark contrast scanner for fibre optics	Print mark scanner + Colour sensors
<b>RL...-UV</b>	Print mark contrast scanner with UV emitted light	Print mark scanner + Colour sensors
<b>RL24-55-2429</b>	Reflex light beam switch for fire protection	Doors, Gates, Elevators (TTA)
<b>RLF</b>	Direct detection light scanner/ reflex light beam switch in special housing	Rectangular housing
<b>RLK</b>	Direct detection light scanner/ reflex light beam switch for mains voltage	Rectangular housing

Type	Brief information	see Type Code
<b>RLK91</b>	Reflex light beam switch for mains voltage	Doors, Gates, Elevators (TTA)
<b>RST</b>	Special light scanner	Customer-specific products
<b>SC</b>	Safety control unit	Safety control units
<b>SL</b>	Safety light barrier for control unit – Cat. 2	Safety light barriers
<b>SLA</b>	Safety light barrier for control unit – Cat. 4	Safety light barriers
<b>SLC</b>	Safety light curtain – Cat. 4	Safety light curtains
<b>SLP</b>	Safety light grid for ext. control unit – Cat. 4	Safety light grids
<b>SLPC</b>	Safety light grid with integrated control unit – Cat. 4	Safety light grids
<b>SLPCM</b>	Safety light grid with integrated control unit – Cat. 4 with muting	Safety light grids
<b>SLT</b>	Reflex light barrier with background suppression	Customer-specific products
<b>SLVA</b>	Safety light barrier amplifier control unit – Cat. 4	Safety control units
<b>ST</b>	Signal converter, transistor	Power units
<b>SU10</b>	Signal converter for miniature light scanner KT10	Power units
<b>SU11</b>	Signal converter for miniature light scanner KT10	Power units
<b>SU14</b>	Fibre optic device	Rectangular housing
<b>SU15</b>	Fibre optic device	Rectangular housing
<b>Topscan2</b>	Infrared light scanner (Version 2)	Doors, Gates, Elevators (TTA)
<b>VB</b>	Barcode reader	Barcode reader
<b>C-Box</b>	Connection box for barcode reader	Barcode reader
<b>VCS</b>	Colour sensor	Print mark scanner + Colour sensors
<b>VL</b>	Threaded light beam switch	Threaded housing
<b>VS/VSE</b>	Threaded single path light beam switch	Threaded housing
<b>VS-Ga</b>	Power unit	Power units
<b>VSL</b>	Safety light barrier amplifier – Cat. 2	Safety control units
<b>VT</b>	Threaded scanner	Threaded housing
<b>VOS</b>	Optosorter	Vision Systems

# TYPE CODE, STANDARD RECTANGULAR HOUSING

## RL28-8-H-400-RT/47/105



### Types

<b>L/LK</b>	Single-path light beam switch, mains voltage (transmitter/receiver)
<b>LA/LK</b>	
<b>L/LV</b>	Single-path light beam switch, low voltage (transmitter/receiver)
<b>LD/LV</b>	
<b>M/MV</b>	Miniature light beam switch, single path (transmitter/receiver)
<b>ML</b>	Miniature light beam switch or direct detection light scanner
<b>ML19</b>	see fork-type light beam switch
<b>MLV</b>	Miniature light beam switch or direct detection light scanner with amplifier
<b>RL</b>	Direct-detection light scanner or reflex light beam switch, low voltage
<b>RLF</b>	Direct-detection light scanner or reflex light beam switch in special housing
<b>RLK</b>	Direct-detection light scanner or reflex light beam switch, mains voltage
<b>SU14</b>	Fibre optic device
<b>SU15</b>	Fibre optic device

# TYPE CODE, STANDARD RECTANGULAR HOUSING

## Series

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Numbering system to distinguish product sizes

## Optical principles

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- 6** Reflex light beam switch, without pol. filter
- 8** Direct detection light scanner, energetic
- 8-H** Direct detection light scanner with background suppression
- 8-HW** Direct detection light scanner with background analysis
- 8-HS** Direct detection light scanner with background suppression and analysis
- 54** Reflex light beam switch with pol. filter – low range
- 54-G** Reflex light beam switch for glass detection
- 55** Reflex light beam switch with pol. filter – long range
- 55-G** Reflex light beam switch for glass detection
- LL** Fibre optic light beam switch

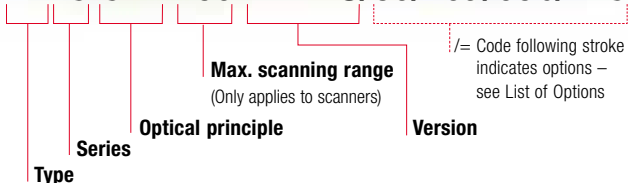
## Versions

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- AS-I** AS-Interface version
- Ex** Ex-version
- E** stainless steel version for food industry
- F** 0 to nominal range on foil
- V** Foreground suppression (near range)
- Z** Timing element
- LL-G** Fibre optic light beam switch for glass fibre light guide
- LL-K** Fibre optic light beam switch for plastic light guide
- IR** Emitted light, infrared
- RT** Emitted light, red light
- LAS** Emitted light, laser
- UV** Emitted light, ultraviolet



### VT18-8-H-150-M-LAS/30/40a/65b/118



#### Types

<b>KS/KSE</b>	Miniature single path light beam switch (emitter/receiver)
<b>KT</b>	Miniature direct detection light scanner
<b>(SU10)</b>	Signal converter for miniature light scanner KS/KSE10; KT10)
<b>(SU11)</b>	Signal converter for miniature light scanner KS/KSE10; KT10)
<b>G/GV</b>	Single path light beam switch in threaded housing (emitter/receiver)
<b>GLV</b>	Light beam switch or light scanner in threaded housing
<b>VL</b>	Light beam switch in threaded housing
<b>VT</b>	Direct detection light scanner in threaded housing
<b>VS/VSE</b>	Single path light beam switch in threaded housing (emitter/receiver)

#### Series

Numbering system to distinguish product sizes

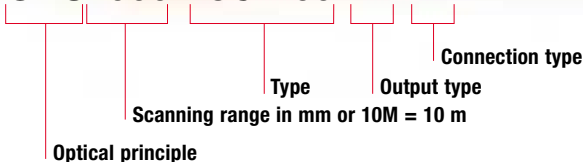
#### Optical principles

<b>-6</b>	Reflex light beam switch without pol. filter
<b>-8</b>	Direct detection light scanner, energetic
<b>-8-H</b>	Direct detection light scanner with background suppression
<b>-54</b>	Reflex light beam switch with pol. filter – low range
<b>-LL</b>	Fibre optic light beam switch

#### Versions

<b>-M</b>	Metal housing – front light outlet
<b>-MS</b>	Metal housing – side light outlet
<b>-L</b>	Plastic housing – front light outlet
<b>-LS</b>	Plastic housing – side light outlet
<b>-E</b>	Stainless steel housing
<b>-K</b>	Plastic housing
<b>-LAS</b>	Emitted light, laser

### OBS4000-18GM60-E4-V1



#### Optical principle

<b>OBE</b>	Single path light beam switch, basic series
<b>OBH</b>	Direct detection light scanner with background suppression, basic series
<b>OBS</b>	Reflex light beam switch, basic series
<b>OBT</b>	Direct detection light scanner, basic series
<b>OCE</b>	Single path light beam switch, comfort series
<b>OCH</b>	Direct detection light scanner with background suppression, comfort series
<b>OCS</b>	Reflex light beam switch, comfort series
<b>OCT</b>	Direct detection light scanner, comfort series

#### Types

<b>-18GM60</b>	Threaded type, $\varnothing$ 18 mm, length 60 mm
<b>-L2</b>	VariKont-L with LED
<b>-M1K</b>	VariKont-M with terminal compartment
<b>-M1A</b>	VariKont-M-AS-Interface

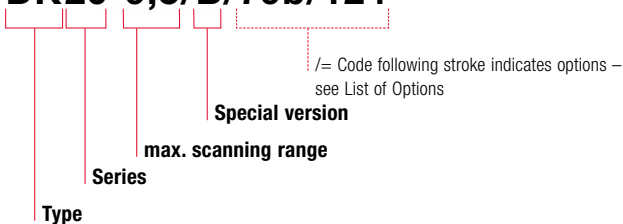
#### Output types

<b>-A0</b>	2 NPN, antivalent	<b>-E01</b>	1 NPN-switch + 1NPN-pre-fault output, switchable
<b>-A2</b>	2 PNP, antivalent	<b>-E23</b>	1 PNP-switch + 1NPN-pre-fault output, switchable
<b>-B3</b>	AS-Interface	<b>-N2</b>	1 Namur-output
<b>-E0</b>	1 NPN (NO)		
<b>-E2</b>	1 PNP (NO)		
<b>-E4</b>	1 NPN (NO/NC)		
<b>-E5</b>	1 PNP (NO/NC)		

#### Connection types

<b>without</b>	fixed cable
<b>-V1</b>	M12x1 connector

## DK20-9,5/B/79b/124



### Types

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<b>DK</b>	Print mark contrast scanner
<b>DKE</b>	Print mark contrast scanner, stainless steel housing
<b>DF</b>	Print mark colour scanner
<b>DFE</b>	Print mark colour scanner, stainless steel housing
<b>VCS</b>	Visolux colour sensor
<b>RL5-LL</b>	Print mark contrast scanner for fibre optics
<b>RL-UV</b>	Print mark contrast scanner - with UV emitted light

### Series

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Numbering system to distinguish product sizes

### Print mark special versions

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<b>/A</b>	Light spot crosswise to housings longitudinal axis
<b>/B</b>	Light spot point-shaped
<b>/H</b>	Special filter BG39
<b>8S50</b>	Galvanic drop out time relay 50 ms
<b>9S20</b>	Impulsed drop out time relay 20 ms
<b>9S50</b>	Impulsed drop out time relay 50 ms

## TYPE CODE, STANDARD LIGHT GRIDS

### ELG-S

S = Emitter  
E = Receiver

Single path light grid

### PRS201

Protected area

Paper web  
break detection

## TYPE CODE LIGHT GRIDS PR

### PR4-30-K-2-F-F/S

Analogue output

Connection type

F = Fixed cable; S = Plug

Calibration

F = Fixed in memory

W = After switching on again

Sensitivity steps 1 – 4

Beam evaluation

K = crossed · P = parallel

Range

30 = 300 mm ... 550 mm

80 = 550 mm ... 800 mm

150 = 550 mm ... 1500 mm

Number of beams

Type – Light grid PR

## TYPE CODE, STANDARD LIGHT GRIDS LG

# LG8-G-30-K-2-F-F

### Connection type

F = Fixed cable; S = Plug

### Calibration

F = Fixed in memory

W = After switching on again

### Sensitivity steps 1 – 4

### Beam evaluation

K = crossed · P = parallel

### Range

30 = 300 mm ... 550 mm

80 = 550 mm ... 800 mm

150 = 550 mm ... 1500 mm

### Number of beams

Type – Light grid LG

## TYPE CODE

## LIGHT CURTAIN (Doors, Gates and Elevators TTA)

# AL4012-P-1650/49/76a

/= Code following stroke indicates options – see List of Options

### Field height in mm

**P** = Pair (emitter + receiver);

**T** = Emitter; **R** = Receiver

### Profile width in mm

### Number of beams

Elevator light curtain

# TYPE CODE, STANDARD LIGHT GRID PLVSCAN

## PLVScan P16-0640-42/47/139

/= Code following stroke indicates options – see List of Options

At special version follows instead of options a VBv number (four-digit)

Light beam distance in mm

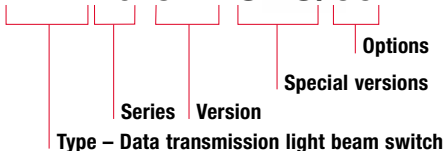
Field height in mm

Number of single beams (straight)

**P** = Pair; **T** = Emitter; **R** = Receiver

Type – Profile light grid PLVScan

### DAD10-8-P-SDS/35



Type	Series	
<b>DAD</b>	<b>10-8</b> } Parallel data transmission 8bits	
<b>LS ...-DA</b> } Data transmission light beam switch		
	<b>15-8</b> } wide	
	<b>30</b> } Series numbering	
		<b>230</b>
		<b>600</b>

#### Versions

<b>-PNP</b>	Output PNP
<b>-P</b>	PROFIBUS
<b>-P-1,5</b>	PROFIBUS transmission rate 1.5Mbit/s
<b>-IBS</b>	InterBus
<b>-RT</b>	Visible red light
<b>-GUF</b>	Low temperature version up to -35 °C
<b>-W</b>	Wide opening angle version
<b>-NPN</b>	Output NPN

#### Special versions

<b>-SDB</b>	Connection type SUB-D socket
<b>-SDS</b>	Connection type SUB-D plug
<b>-HD</b>	for standard rail mounting with 25-pin SUB-D socket
<b>-E</b>	front end only

#### Options

<b>/35</b>	Increased range
<b>/F1</b>	Centre frequency F1
<b>/F2</b>	Centre frequency F2

## TYPE CODE, STANDARD

# ELECTRONIC DISTANCE MEASUREMENT

## EDM20-R/122

### Options

/122 = Analogue output, 4 mA ... 20 mA

/86 = Interface RS 232

### Version

Measuring range in m

Electronic distance measurement device

### Versions

- R Measuring range on retroreflector
- L Measuring range on diffuse reflecting surfaces
- P Interface PROFIBUS
- SSI Interface SSI
- IBS Interface INTERBUS
- EHB Version for electro monorail systems

## TYPE CODE, SPECIAL

# VISION SYSTEMS

## VOS100

Camera system  
OptoSorter

## ACV100

Camera system  
Surface sensor



**TYPE CODE**

**BAR CODE READER**

## **VB12-110-S-R**

**R** = Raster version

**no letter** = line version (Standard)

**S** = Light exit rotated by 90°

**Max. reading distance in mm**

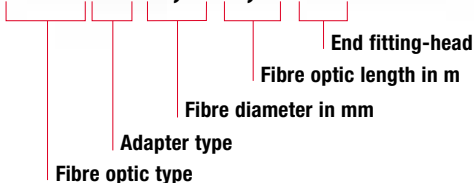
**Series**

**Bar Code Reader**

## **C-BOX 100**

Connecting box for bar code reader series VB10, VB12, VB14

### LCR18-3,2-0,5-K5



#### Fibre optic types

##### Glass fibre = L

<b>LCE</b>	With PVC covering	Single path fibre optic
<b>LCR</b>	With PVC covering	Reflex fibre optic
<b>LLE</b>	With metal-silicon covering	Single path fibre optic
<b>LLR</b>	With metal-silicon covering	Reflex fibre optic
<b>LSE</b>	With silicon covering	Single path fibre optic
<b>LSR</b>	With silicon covering	Reflex fibre optic
<b>LME</b>	With metal covering	Single path fibre optic
<b>LMR</b>	With metal covering	Reflex fibre optic

##### Plastic = K

<b>KLE</b>	Single path fibre optic
<b>KLEF</b>	Single path fibre optic (fibre bundle)
<b>KLR</b>	Reflex fibre optic
<b>KLRF</b>	Reflex fibre optic (fibre bundle)

#### Adapter types

<b>00</b>	No adapter; plastic fibre optic
<b>01</b>	Adapter for KSU-LL
<b>02</b>	Adapter for KSU-LL
<b>03</b>	Adapter for KSU-LL
<b>04</b>	Adapter for MLV40-LL, SU14, Series 20 and 21
<b>05</b>	Adapter for VCS110
<b>06</b>	Adapter for SU15-G (F66G)
<b>18</b>	Adapter for 18GM and VariKont-LL
<b>18/30</b>	Adapter for GLV30-1227
<b>30</b>	Adapter for RL5-LL

#### End fittings – heads

<b>ZO</b>	Cylinder
<b>Z1</b>	Cylinder
<b>G</b>	Thread
<b>WR</b>	90° angle with radius
<b>WC</b>	90° angle
<b>WC1</b>	90° angle
<b>Qw</b>	90° angle
<b>GK</b>	Metal fork head



**TYPE CODE**

**POWER UNITS**

**KSU** \_\_\_\_\_ Signal converter

**ST** \_\_\_\_\_ Signal converter transistor

**VS-Ga** \_\_\_\_\_ Power unit

**PS1** \_\_\_\_\_ Power unit

**SU10** \_\_\_\_\_ Signal converter for series 10

**SU11** \_\_\_\_\_ Signal converter for series 10

## **GL20-RT/32/40a/98**

/= Code following stroke indicates options – see List of Options

**RT** = Red light

**IR** = Infrared light

**Fork width in mm**

**Fork type light beam switch**

## **GL220-2276**

**Special version (VBv)**

**Fork width 220 mm**

**Fork type light beam switch**

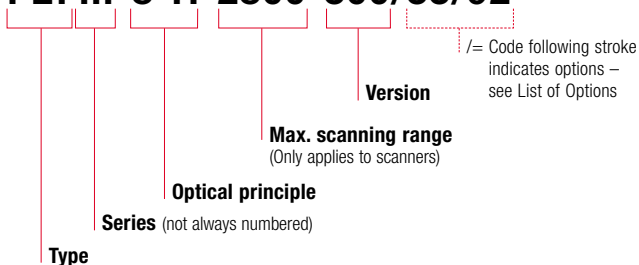
**Special version**

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**ML19** = Fork type light beam switch for label detection

# TYPE CODE, SPECIAL DOORS, GATES AND ELEVATORS

## FLT ...-8-H-2800-300/33/92



### Types

<b>AIR</b>	Active infrared light scanner
<b>FLT</b>	Infrared surface light scanner
<b>FLT...-CLS</b>	Counting sensor
<b>LT2</b>	Infrared light scanner – DC
<b>LTK2</b>	Infrared light scanner – AC/DC
<b>L30/LK30-15..</b>	Single path light beam switch, fire protection
<b>PIR</b>	Passive infrared light scanner
<b>Proscan</b>	Energy scanner
<b>RK</b>	Radar motion detector
<b>RL91</b>	Reflex light beam switch, low voltage
<b>RLK91</b>	Reflex light beam switch, mains voltage
<b>RL24-55-2429</b>	Reflex light beam switch with pol. filter – Special version for fire protection
<b>Topscan2</b>	Infrared light scanner, version 2
<b>MLV12-54-2463</b>	Reflex light beam switch with pol. filter Special version for fire protection

# TYPE CODE, SPECIAL DOORS, GATES AND ELEVATORS

## Optical principles

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- 6** Reflex light beam switch, without pol. filter
- 54** Reflex light beam switch, with pol. filter – Low range
- 55** Reflex light beam switch, with pol. filter – Long range
- 8-H** Direct detection light scanner, with background suppression
- 8-HW** Direct detection light scanner, with background analysis
- 8-HS** Direct detection light scanner, with background suppression and analysis

## Special versions

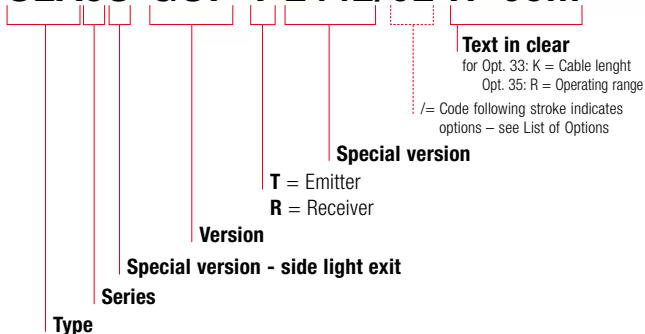
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- D** Dynamical scanner
- T** Traffic version – in accordance with automobile and rail standards
- S** Safety version – in accordance with door safety standards
- P** Mounting accessories in the extend of delivery
- PWH** Mounting accessories and weather hood in the extend of delivery
- 50** Scanning field dimensions 500 mm x 50 mm
- 300** Scanning field dimensions 500 mm x 300 mm
- 500** Scanning field dimensions 500 mm x 500 mm
- CLS** Counting sensor with scanning field 500 mm x 300 mm
- 1502** Special version, fire protection, single path light beam switch - 230 V AC
- 1503** Special version, fire protection, single path light beam switch – 24 V DC

**TYPE CODE, SPECIAL  
CUSTOMER-SPECIFIC UNITS**

- BL10-2052-S** \_\_\_\_\_ Slab single path light beam switch, transmitter
- BL10-2052-E** \_\_\_\_\_ Slab single path light beam switch, receiver
- FW15/FW16** \_\_\_\_\_ Thread break detector
- OBV10-F59-E22-0,1M-V1** \_\_\_\_\_ Welding cap sensor
- OBZ30GK-E2-V1** \_\_\_\_\_ Welding pistol sensor
- RST40** \_\_\_\_\_ Light scanner for scanning stacked, overlapped paper products - range 40 mm, sensitive to printing
- RST41** \_\_\_\_\_ Light scanner for scanning stacked, overlapped paper products - range 40 mm, non sensitive to printing
- RST100** \_\_\_\_\_ Light scanner for scanning stacked, overlapped paper products - range 100 mm, sensitive to printing
- RST101** \_\_\_\_\_ Light scanner for scanning stacked, overlapped paper products - range 100 mm, non sensitive to printing
- SLT100-1745** \_\_\_\_\_ Reflex light barrier with background suppression
- LT63** \_\_\_\_\_ Direct detection light scanner with foreground and background suppression
- LT64** \_\_\_\_\_ Direct detection light scanner with foreground and background suppression

### SLA5S-GUF-T-2442/92 R=65m



#### Types

- Category 4: Yellow unit**  
SLA Safety light barriers Cat. 4
- Category 2: Black/yellow unit**  
M/MV...-TE Single path light barrier, miniature, with test input  
L/LV...-TE Single path light barrier, with test input  
L/LK...-TE Single path light barrier, with test input  
LS...-TE Single path light barrier, with test input  
SL Safety light barriers Cat. 2

#### Series

Numbering to identify series

#### Versions

- TE Test input  
-IR Light type: Infrared  
-LAS Light type: Laser  
-GUF Low temperature version to -35 °C

#### Special versions

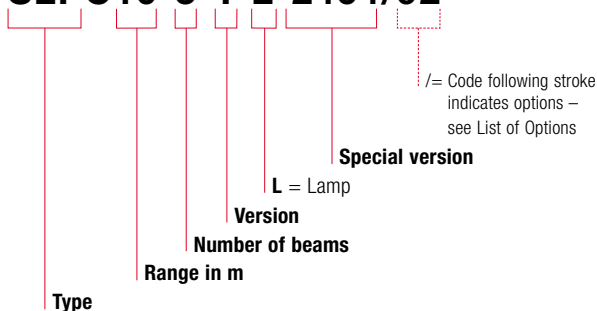
- S Side light exit  
-1528 Plastic front panel  
-2442 Sealing test to IP67, encapsulated version



## TYPE CODE, SAFETY PRODUCTS

### SAFETY LIGHT GRIDS CAT. 4 (Yellow unit)

**SLPC10-3-T-L-2464/92**



#### Types

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<b>SLP</b>	Safety light grid for external control unit
<b>SLPC</b>	Safety light grid with integrated control unit
<b>SLPCM</b>	Safety light grid with integrated control unit with muting

#### Versions

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<b>-T</b>	Emitter
<b>-R</b>	Receiver
<b>-A</b>	Active emitter and receiver
<b>-M</b>	Mirror

#### Special versions

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<b>-2464</b>	Variable protective beam separation, different housing length
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### SLC14-600-T-S/92

/= Code following stroke  
indicates options – see List of Options

**S** = Slave

**T** = Emitter

**R** = Receiver

**M** = Mirror

Height of protection field area in mm

Obstacle size in mm

Type – SLC Safety light curtain

### SLC-4-T/31

without /31 = Outputs, 2 separated failsafe  
semiconductors

/31 = 2 relay outputs

**T** = Emitter

**R** = Receiver

Number of beams

Type – SLC Safety light curtain

### SLC-1600-M

Mirror for SLC

Height of mirror in mm

Mirror for SLC

### SLVA-8K 115VAC-RI/7b

/= Code following stroke indicates options – see List of Options

#### Operating mode

RI = Start/Restart Interlock;

RM = Relay monitor

#### Connection voltage

max. number of channels

#### Type:

SLVA Safety light barrier amplifier – control unit – Category 4

VSL Safety light barrier amplifier – Category 2

### SC4-8 24VAC/DC

#### Connection voltage

Max. number of channels

#### Safety category according to EN 61496

2 = Category 2

4 = Category 4

Type – Safety control unit

## Options-No. Explain

/15	Light source intensity control
/16	Sensitivity control
/24	On/Off pulse suppression
/25	Light switching
/27	Protection category IP65
/28	2 NPN complementary outputs, not short-circuit proof, open collectors, 0.2 A/30 V DC
/30	1 NPN output, short circuit proof, open collector, 0.2 A/30 V DC
/31	Relay output
/32	1 PNP output, short circuit proof, open collector, 0.2 A/30 V DC
/33	Non standard cable length - preferred length 5 m and 10 m (16 ft and 32 ft)
/35	Increased operating range
/36	1 NPN output, short circuit proof, open collector, 0.3 A/30 V DC
/37	1 PNP output, short circuit proof, open collector, 0.3 A/30 V DC
/38	Low current relay output IMAX: 1 A; UMAX: 60 V AC/75 V DC; PMAX: 30 W/50 VA <b>a)</b> Low current relay output, IMAX: 1 A; UMAX: 55 V AC/24 V DC; PMAX: 24 W/55 VA
/40	Light/Dark selector <b>a)</b> mechanical <b>b)</b> electrical
/41	Function reserve indicator
/43	2 PNP complementary outputs, not short-circuit-proof, open collectors, 0.2 A/30 V DC
/44	Severe vibration protection
/45	1 NPN output, not short circuit proof, open collector, 0.2 A/30 V DC
/46	1 PNP output, not short circuit proof, open collector, 0.2 A/30 V DC
/47	2 PNP complementary outputs, short-circuits-proof, open collector, 0.2 A/30 V DC
/48	2 NPN complementary outputs, short-circuits-proof, open collector, 0.2 A/30 V DC
/49	1 PNP and NPN simultaneous outputs, short-circuit-proof, open collectors, 0.2 A/30 V DC
/59	Dark switching

## Options-No. Explain

/63	1 PNP and NPN simultaneous outputs, short-circuit-proof, open collectors, PNP: 0.2 A/24 V DC; NPN: 0.1 A/150 V DC
/65	Adjustable scanning range for background suppression scanners <b>a)</b> mechanical <b>b)</b> electrical
/70	Metal connector type 712, 5pole
/71	Metal connector type 711, 4pole
/72	Metal connector type 712, 4pole with connecting socket and 2 m cable
/73	Plastic connector M12, 4pole
/74	Plastic connector type 714, 4pole with unwired angle socket
/76	With connection for test input <b>a)</b> + 24 V DC <b>b)</b> 0 V DC <b>c)</b> + 24 V DC or open input
/77	1 PNP and NPN simultaneous outputs, short-circuit-proof, open collectors, 0.2 A/50 V DC
/78	Metal connector type 712, 5pole with angled socket and 2 m cable
/79	Analogue output increasing <b>a)</b> 0 V ... 10 V <b>b)</b> 0.3 mA ... 10 mA
/80	Analogue output decreasing <b>a)</b> 10 V ... 0 V <b>b)</b> 10 mA ... 0.3 mA
/82	PNP Function reserve output <b>a)</b> output active when function reserve too low <b>b)</b> output inactive when function reserve too low <b>c)</b> without time delay, output active when function reserve too low <b>d)</b> without time delay, output inactive when function reserve too low <b>e)</b> time delay < 1.5 s output inactive when function reserve too low <b>f)</b> dynamical pre-fault indicator (alarm) <b>g)</b> dynamical output dependent on degree of pollution
/85	20 mA current loop interface
/86	RS 232 interface
/87	RS 422/485 interface <b>a)</b> RS 422/485 interface, full duplex, ENABLE output, OV = high impedance output, input and output use different cables <b>b)</b> RS 485 standard interface, half duplex, selectable direction, HIGH = receive, input and output use different cables <b>c)</b> RS 485 standard interface, half duplex, selectable direction, LOW = receive, input and output use different cables

## Options-No. Explain

/92	Metal connector M12 , 4pole, according to the Euro-Norm
/93	Metal connector M12 , 4pole, according to the Euro-Norm with 90° angled Socket RKWT4-07/2m, with 2 m connecting cable
/95	Metal connector M8, 4pole (VAUDEHA)
/98	Metal connector M8, 3pole
/100	Connector GO 070 UM, 7pole, pin 1 UB+, pin 2 UB-, pin 4 light output, pin 5 dark output, with unwired cable socket for operating voltages up to: <b>a)</b> 50 V AC/DC with cable socket <b>b)</b> 150 V AC/DC with cable socket <b>c)</b> 50 V AC/DC without cable socket <b>d)</b> 250 V AC/DC without cable socket
/101	1 PNP and NPN simultaneous outputs, short-circuit-proof, open collector, 0.2 A/48 V DC
/102	1 NPN output, short-circuit-proof, open collector, 0.1 A/30 V DC
/103	1 PNP output, short-circuit-proof, open collector, 0.1 A/30 V DC
/104	Multi sensor array, devices do not influence each other
/105	Plastic connector M12, 5pole, without cable
/106	Increased temperature range, -35 °C up to 55 °C, with heated front lens, voltage 24 V DC ± 20 %
/108	Synthetic material lens
/110	Push-pull output short-circuit-proof, 0.1 A/30 V DC
/112	Connector M12, adjustable by 90°
/115	Fixed cable <b>a)</b> with M8 connector <b>b)</b> with M12 connector
/116	Terminal compartment
/118	Connector Vario Quick, 4pole
/119	1 PNP output, overvoltage protected, short-circuit-proof, open collector, 0.1 A/48 V DC <b>a)</b> 1 PNP output, overvoltage protected, short-circuit-proof, open collector, 0.2 A/48 V DC
/120	2 PNP complementary outputs, short-circuits-proof, open collector, 0.1 A/30 V DC <b>a)</b> 2 PNP complementary outputs, short-circuits-proof, open collector, 0.2 A/48 V DC
/122	Analogue output, 4 mA ... 20 mA
/124	Metal connector M12, 5pole, according to the Euro-Norm
/125	2 PNP transistors complementary, 1 NPN transistor, short-circuit-proof, open collector, 0.2 A/30 V DC

## Options-No. Explain

/126	Function reserve output NPN <b>a)</b> output active when function reserve too low <b>b)</b> output inactive when function reserve too low <b>c)</b> without time delay, output active when function reserve too low <b>d)</b> without time delay, output inactive when function reserve too low <b>e)</b> time delay < 1.5 s output inactive when function reserve too low <b>f)</b> Dynamical pre-fault indicator (alarm) <b>g)</b> Dynamical Output dependent on Degree of pollution
/127	2 NPN complementary outputs, short-circuits-proof, open collector, 0.1 A/30 V DC
/128	Push-pull output; short-circuit-proof, 0.2 A/30 V DC
/129	With relay monitor
/130	Reduced response time
/131	Special option for USA: Micro AC connector, 1/2" (inch) diameter, 3 pin, dual-key
/132	Special option for USA: 2-wire AC/DC solid state output, 200 mA maximum
/133	Ex-Zone 2
/134	Special version with scratch resistant glass pane
/135	Special option for USA: 5-pin male Mini-style connector, 7/8 inch
/136	2 Push-pull outputs; short-circuit-proof, 0.1 A/ 30 V DC
/137	Adjustable potentiometer secured (determined with Loctite)
/138	2 displays for switching state
/139	4 PNP-outputs. light switching
/140b	Manual focus adjustments by laser light beam switches
/150	1 PNP- und NPN simultaneous outputs, short-circuit-proof, open collector, 0.1 A/30 V DC

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