

# Lighting and signaling

More than just light



# PHOENIX CONTACT – In dialog with customers and partners worldwide

Phoenix Contact is a global market leader in the field of electrical engineering, electronics and automation. Founded in 1923, the family-owned company now employs around 14,500 people worldwide. A sales network with over 50 sales subsidiaries and more than 30 additional global sales partners guarantees customer proximity directly on site, anywhere in the world.

Our range of services consists of products associated with various electrotechnical applications. This includes numerous connection technologies for device manufacturers and machine building, components for modern control cabinets, and tailor-made solutions for many applications and industries such as the automotive industry, wind energy, solar energy, the process industry or applications in the field of water management, power transmission/distribution, and transportation infrastructure.



# Global player with personal customer contact

Company independence is an integral part of our corporate policy. Phoenix Contact therefore relies on in-house competence and expertise in a range of contexts: the design and development departments constantly come up with innovative product ideas, developing special solutions to meet customer requirements. Numerous patents emphasize the fact that many of Phoenix Contact's products have been developed in-house.





### Light in the control cabinet

Optimal illumination, quick to install. LED technology for control cabinets and control boxes.

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#### Light in the machine

Integrate LED lighting perfectly into your machines. Machine lighting for every application.

PLD Machine Lights	
Class 100	

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#### Light on the machine

Easily detect machine states by combining visual and acoustic signals in one module.

# Other lighting and signaling solutions from Phoenix Contact



Benefit from a complete tower lighting system for wind turbine generators, offering an uninterrupted power supply and LED lights.



With LED signal lights and control technology from Phoenix Contact, you can design reliable and energy-efficient signaling systems for maritime use, including for locks or bridges. Thanks to the bus connection, the signaling unit can be seamlessly integrated into your network and automation environment.



To ensure that light creates a safe, concentrated and ambient atmosphere in the office and in production, it is worth investing in the adjustable and controlled lighting. Phoenix Contact offers different light distributor cabinets which are fully assembled and easy to operate.

# PLD enclosure lights – Optimal illumination, quick to install

PLD enclosure lights (Phoenix Contact Lighting Devices) provide optimal illumination for your control cabinet, even at the very bottom of the cabinet. They are easy to install and no tools are needed. Choose from two performance classes and a particularly flexible product range that meet your special LED lighting needs. If you don't have much space in your control cabinet or if you are looking for a cost-effective option, but still want the perfect lighting solution, we recommend class 400. With its swiveling light emission window and various assembly options, this lighting solution gives you maximum flexibility.



### **Different length options**

The enclosure lights from the class 400 are available in three different lengths. Simply select the right lighting based on the width and height of your cabinet.





### Installation

A click system for fast, tool-free assembly reduces installation costs and increases flexibility.

# **Prismatic system**

Optimal illumination of the control cabinet's interior, even at the bottom.

# Additional advantages

- Series connections reduce the costs of cabling additional lights in control cabinets arranged in a series
- Various operating modes enable flexible use of the lights, even with door position switches
- Individual customization for your particular control cabinet through various light lengths and a swiveling light emission window
- An LED service life of at least 50,000 hours prevents maintenance costs incurred through light and light bulb replacements, and does not rely on switching cycles
- UL approval allows these systems to be used on the North American market



# PLD enclosure lights – Optimal illumination, quick to install

The class 600 lights feature a motion detector and an optional, country-specific socket for fast, easy maintenance of your control cabinet. Thanks to the integrated, high-quality optics, you achieve particularly bright illumination even in large control cabinets. Because of the variety of installation options, you can also quickly and flexibly install the class 600 LED lights in your control cabinet.





#### Variants

You can obtain the enclosure lights from the class 600 with or without the countryspecific socket (e.g. Europe, USA/Japan and France/Belgium).



### Installation

A patented retaining hook system for fast, tool-free assembly reduces installation costs and increases flexibility.

# Visibility

Optimal illumination of the control cabinet's interior, even at the bottom.

# Additional advantages

- An AC wide-range input enables global use, prevents order errors and reduces inventory costs
- Status LEDs indicate which of the three modes the light is operating in
- Series connections reduce the costs of cabling additional lights in control cabinets arranged in a series
- The integrated sensor saves on MRP and installation costs for door position switches
- Country-specific variants allow external devices to be operated anywhere in the world, even with a de-energized control cabinet
- An LED service life of at least 50,000 hours prevents maintenance costs incurred through light and light bulb replacements, and does not rely on switching cycles
- UL approval allows these systems to be used on the North American market



# Technical data for class 400 PLD enclosure lights

Ambient conditions	
Temperature range (operation)	-25 °C +60 °C
Relative humidity (operation)	5 % 95 %
Vibration	5g in acc. with EN 60068-2-6
Shock	25g in acc. with EN 60068-2-27
Continuous shock	10g in acc. with EN 60068-2-27
Degree of protection	IP20

Light properties	
Color temperature	5,000 K
Color rendering index $(R_a)$	≥ 75
Electromagnetic compatibility	
Noise emission	In accordance with EN 61000-6-4

In accordance with EN 61000-6-2

### Service life

LED service life (L70)

# Supply voltage Nominal voltage 24 V DC Permissible range 19.2 V DC ... 30 V DC

Product overview of the class 400 PLD enclosure lights

50,000 h

		2	Stop 2
<b>Type</b> Order No.	PLD E 400 W 250 2702221	PLD E 400 W 375 2702222	PLD E 400 W 500 2702223
Dimensions L x W x H	250 mm x 23 mm x 38 mm	375 mm x 23 mm x 38 mm	500 mm x 23 mm x 38 mm
Luminous flux	140 lm (net luminous flux)	340 lm (net luminous flux)	560 lm (net luminous flux)
Protection class	ш	ш	ш
Power consumption	1.5 W	3 W	5 W

Noise immunity

#### Accessories

<b>Type</b>	SAC-3P- 3,0-PUR/M 8SIFS AE	PLD E 400-DS-3,0/FS/0,6	PLD E 400-DS-MS/1,0-FS/0,6
Order No.	1417698	2702336	2702337
Description	Connection cable with socket and free cable end, halogen-free PUR, black, 3 m, 3 x 0.25 mm <sup>2</sup>	Door position switch set: 3 m line with free cable end, 0.6 m line with M8 socket, incl. mounting material	Door position switch set: 1 m line with M8 plug, 0.6 m line with M8 socket, incl. mounting material
<b>Type</b>	SAC-3P-M 8MS/ 0,6-PUR/M 8SIFS	SAC-3P-M 8MS/ 1,0-PUR/M 8SIFS	SAC-3P-M 8MS/ 3,0-PUR/M 8SIFS
Order No.	1417699	1417700	1417701
Description	Cable for series connection with M8 socket	Cable for series connection with M8 socket	Cable for series connection with M8 socket
	and M8 plug, halogen-free PUR, black,	and M8 plug, halogen-free PUR, black, 1 m,	and M8 plug, halogen-free PUR, black, 3 m,
	0.6 m, 3 x 0.25 mm <sup>2</sup>	3 x 0.25 mm <sup>2</sup>	3 x 0.25 mm <sup>2</sup>
<b>Type</b>	PLD E 400-ME MM	PLD E 400-ME SM	PLD E 400-ME CM
Order No.	2702312	2702313	2702314
Description	2 magnets for magnet mounting	2 fasteners for screw mounting, including screws and washers	2 clip holders (replacement parts)
<b>Type</b>	PLD E 400-DS/1AC/24DC/12W	PLD E 400-DS/1AC/24DC/30W	
Order No.	2702435	2702436	
Description	12 W power supply unit with country- specific plug adapters	30 W power supply unit with diverse, country-specific plug adapters	

# Technical data for class 600 PLD enclosure lights

Ambient conditions		Light properties	
Temperature range (operation)	-25 °C +60 °C	Luminous flux	685 lm (net luminous flux)
Relative humidity (operation)	5 % 95 %	Color temperature	4,000 K
Relative numbery (operation)	5 % 75 %	Color rendering index (R <sub>a</sub> )	≥80
Vibration	5g in acc. with EN 60068-2-6		
Shock	25g in acc. with EN 60068-2-27	Electromagnetic compatibility	
Continuous shock	10g in acc. with EN 60068-2-27	Noise emission	In accordance with EN 61000-6-3
		Noise immunity	In accordance with EN 61000-6-2
Degree of protection	IP20		
		Supply voltage	
Service life		Permissible range	85 V AC 265 V AC
LED service life (L70)	50,000 h	Frequency	50 Hz/60 Hz

#### Product overview of the class 600 PLD enclosure lights

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<b>Type</b> Order No.	<b>PLD E 608 W 265</b> 2702224	PLD E 608 W 315/F 2702226	PLD E 608 W 315/B 2702227	PLD E 608 W 315/E 2702228
Dimensions L x W x H	265 mm x 91 mm x 44 mm	315 mm x 91 mm x 44 mm	315 mm x 91 mm x 44 mm	315 mm x 91 mm x 44 mm
Socket	-	Type F (Schuko)	Туре В	Туре Е
Motion sensor	Yes	Yes	Yes	Yes
Protection class	1	1	1	1
Power consumption	10 W	10 W	10 W	10 W

#### Accessories

<b>Type</b> Order No.	PLD E 608-CA-3,0/FS AM 2702302	PLD E 608-CA-3,0/FS/UL 2702306		
Description	Connection cable with socket, free cable end, orange, 3 m, 3 x 1.5 mm <sup>2</sup>	Connection cable with socket, free cable end, black, 3 m, 3 x 1.5 mm², UL approval		
<b>Type</b> Order No.	PLD E 608-CA-MS/0,6/FS AM 2702303	PLD E 608-CA-MS/1,0/FS AM 2702304	PLD E 608-CA-MS/4,0/FS AM 2702305	PLD E 608-CA-MS/0,6/FS/UL 2702307
Description	Cable for series connection with socket and plug, orange, 0.6 m, 3 x 1.5 mm <sup>2</sup>	Cable for series connection with socket and plug, orange, 1 m, 3 x 1.5 mm <sup>2</sup>	Cable for series connection with socket and plug, orange, 4 m, 3 x 1.5 mm <sup>2</sup>	Cable for series connection with socket and plug, black, 0.6 m, 3 x 1.5 mm², UL approval
<b>Type</b> Order No.	PLD E 608-CO-MS 2702308	PLD E 608-CO-FS 2702309	PLD E 608-CO-MS/FS/FR 2702310	
Description	Plug for series connection, black, 3-pos.	Socket for power supply and series connection, black, 3-pos.	T-distributor with 2 sockets and 1 plug, black, 3-pos.	
<b>Type</b> Order No.	PLD E 608-ME MM 2702315	PLD E 608-ME SM 2702316	PLD E 608-ME SFM 2702317	
Description	2 magnets for magnet mounting	2 fasteners for screw mounting, including screws	2 fasteners with retaining hooks (replacement part)	

# PLD machine lights Class 100 – Lots of light for tight spaces

PLD machine lights (Phoenix Contact Lighting Devices) guarantee the best illumination for your machine. You can now select the right light for your application from three performance classes.

The class 100 lights stand out due to their very narrow design. This means they can be ideally integrated into the machine, even if there is not much space.

As they can be rotated, these lights also provide extremely good illumination at small to medium distances from the surface that you wish to illuminate.





#### **Different length options**

Class 100 machine lights come in five different lengths. You can therefore select the right lights for your machine's size or achieve the illumination levels you need for your application.





# Design

The very narrow design of these lights allows them to be integrated in almost any machine area, even when space is tight.

# Illumination

Outstanding and targeted illumination for small to medium distances during alignment and maintenance work, also because of its swivel feature.

# Additional advantages

- The 24 V supply makes servicing easier and increases safety
- Ready to connect through the attached 3 m supply line
- Ready to install using the light mounts provided in the scope of delivery
- Maintenance-free due to very high LED service life of at least 50,000 hours (L70 value)
- IP67 protection allows use even under wet conditions
- ETL approval allows these systems to be used on the North American market



Intertek

# PLD machine lights Class 200 – High illumination for any application

Class 200 LED machine lights are impressive due to their bright illumination. In comparison to the class 100 LED machine lights, these are ideal for medium to large distances to the target area.

Do you need lighting in a harsh environment? The lights from this class are the perfect answer to this because of their high vibration and shock resistance as well as their resistance to cooling agents and lubricants. You can ideally integrate the variants with 40 mm diameter into new machines. This enables you to illuminate your machine's interior efficiently and without taking up too much space.





#### **Different length options**

The class 200 machine lights with a 40 mm diameter come in four different lengths. This means you can select the right lights for your machine size or the illumination you need to achieve for your application.



### Illumination

The most modern, highly efficient LED technology and a wide emission angle ensure low-glare and homogenous illumination even over larger target areas.

# Cabling

Free selection of cable lengths and simple installation thanks to the molded M12 connector.

# Additional advantages

- Compact thanks to small diameter
- 4 mm safety glass allows these lights to also be used in environments with potential mechanical load
- Resistant to many cooling agents and lubricants thanks to Viton<sup>®</sup> seal
- Can be used at high temperatures and can be subjected to strong vibrations and shock
- Flexible assembly options because its swivel feature comes in both assembly variants (angle or holder)
- ETL approval allows these systems to be used on the North American market



Intertek

# PLD machine lights Class 200 – Fast switch to LED technology

Do you want to switch the lighting in your existing machines over to the most modern LED technology? You can easily accomplish this with the 70 mm diameter variant because these lights can be mounted in already installed pipe brackets.





### **Different length options**

The class 200 machine lights with a 70 mm diameter come in five different lengths. You can therefore select the right lights for your machine's size or achieve the illumination levels you need for your application.





### Illumination

Low-glare illumination thanks to larger light emission window.

# Retrofitting

Exterior diameter of 70 mm to allow easy mechanical replacement of traditional tube lights.

# Additional advantages

- 4 mm safety glass allows these lights to also be used in environments with potential mechanical load
- Resistant to many cooling agents and lubricants thanks to Viton<sup>®</sup> seal
- Can be used at high temperatures and can be subjected to strong vibrations and shock
- Flexible assembly options because its swivel feature comes in both assembly variants (angle or holder)
- ETL approval allows these systems to be used on the North American market



# Optimal protection for your lights

For machine and system types which place the strictest demands on the degree of protection of the installed components, this class 200 version with IP69 protection is the ideal solution. Due to the narrow beam angle, the light is ideal for lighting smaller areas.

# PLD machine lights Class 300 – Fully integrated light

Make the most of your machine lighting: with the class 300 PLD machine lights you can benefit from all the advantages of LED technology and additionally save on material costs and installation time.

The use of a lighting interface opens up brand new possibilities for the class 300 PLD machine lights, thus increasing the efficiency of your machine. Thanks to extensive mounting accessories and various integration options in your machine, you can achieve the necessary flexibility, even for system expansions or conversions.





#### **Different length options**

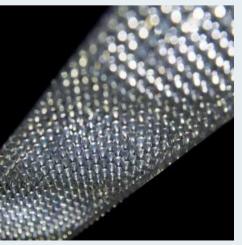
The class 300 machine lights come in three different lengths, each with two emission angles. You can therefore select the right lights for your machine's size or achieve the illumination level you need for your application.



#### Visibility

Glare protection prevents the machine operator's performance from being impaired.

Various emission angles for individualized and optimal illumination.



### Installation

Series connections with the SPEEDCON M12 fast locking system saves on cabling time and materials.

# Control

Flexible control and mounting – the PLD machine lights can be integrated into the machine in different ways.

# Additional advantages

- Cold switching eliminates the need for additional relays and switches with a high current-carrying capacity
- Lightning-fast processes become easy and cost-effective to manage due to the use of the stroboscopic effect
- Continuous dimming provides individualized light settings and a further reduction in energy costs
- Error indication early error detection increases machine availability
- High-quality LEDs ensure a longer service life of at least 65,000 hours
- Excellent protective functions against polarity reversal, excessively high supply voltage, and overtemperature prevent the early failure of the light
- Laminated safety glass protects people and machinery from shards of glass
- UL approval allows these systems to be used on the North American market



# PLD machine lights Class 300 – Fully integrated light

The class 300 PLD machine lights can be integrated into your machine in a variety of ways – individually suited to your requirements.

The lighting interface allows the lights to be controlled using an already existing I/O system. A PWM terminal block enables all functional options to be exhausted so that a machine conversion is quickly completed. If only the basic functions are required, then the machine can be switched on and off via a digital output or switch.



### Control from the control cabinet

The control of the PLD machine lights via a PWM terminal block enables integration into the existing IP20 I/O system.



### **Control in the field**

The control of PLD machine lights via a digital output module enables the use of basic functions.



# Technical data for class 100 PLD machine lights

Ambient conditions	
Temperature range (operation)	0 °C +25 °C
Relative humidity (operation)	95 %
Degree of protection	IP67
Resistant to cooling agents/lubricants	No

5,800 K
≥ 70
In accordance with EN 61000-6-3
In accordance with EN 61547
24 V DC

22 V DC ... 29 V DC

LED service life (L70)
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Service life

50,000 h

#### Product overview of class 100 PLD machine lights

Туре	PLD M 160 W-95/105 196	PLD M 160 W-95/105 336	PLD M 160 W-95/105 616
Order No.	2702475	2702476	2702477
Dimensions L x W x H	196 mm x 22.5 mm x 23 mm	336 mm x 22.5 mm x 23 mm	616 mm x 22.5 mm x 23 mm
Emission angle	95°/105°	95°/105°	95°/105°
Swivel range	±35°	±35°	±35°
Average illumination (1 m² area at a distance of 0.5 m)	89 lx	169 lx	336 lx
Maximum illumination (distance of 0.5 m)	206 lx	391 lx	691 lx
Power consumption	3.5 W	7 W	14 W

Permissible range

Туре	PLD M 160 W-95/105 896	PLD M 160 W-95/105 1176	
Order No.	2702478	2702479	
Dimensions $L \times W \times H$	896 mm x 22.5 mm x 23 mm	1176 mm x 22.5 mm x 23 mm	
Emission angle	95°/105°	95°/105°	
Swivel range	±35°	±35°	
Average illumination (1 m² area at a distance of 0.5 m)	449 lx	535 lx	
Maximum illumination (distance of 0.5 m)	833 lx	908 lx	
Power consumption	21 W	28 W	

# Technical data for class 200 PLD machine lights

Ambient conditions	
Relative humidity (operation)	95 %
Resistant to cooling agents/lubricants	Yes

#### **Electromagnetic compatibility**

Noise emission In accordance with EN 61000-6-3 Noise immunity In accordance with EN 61547

24 V DC

### Supply voltage Nominal voltage

Product overview for class 200 PLD machine lights, Ø 40 mm				
<b>Туре</b> Order No.	PLD M 260 W-85/95 190/D40 2702480	PLD M 260 W-85/95 365/D40 2702481	PLD M 260 W-85/95 540/D40 2702482	PLD M 260 W-85/95 715/D40 2702483
Dimensions L x W x H	190 mm x 40 mm x 30 mm	365 mm x 40 mm x 30 mm	540 mm x 40 mm x 30 mm	715 mm x 40 mm x 30 mm
Supply voltage range	20 V DC 28 V DC			
Emission angle	85°/95°	85°/95°	85°/95°	85°/95°
Color temperature	5,000 K	5,000 K	5,000 K	5,000 K
Color rendering index (Ra)	≥ 85	≥ 85	≥ 85	≥ 85
LED service life (L70)	60,000 h	60,000 h	60,000 h	60,000 h
Average illumination (1 m² area at a distance of 1 m)	156 lx	348 lx	541 lx	718 lx
Maximum illumination (distance of 1 m)	216 lx	477 lx	732 lx	957 lx
Power consumption	5 W	10 W	16 W	21 W
Temperature range (operation)	0 °C +50 °C			
Degree of protection	IP67	IP67	IP67	IP67
Vibration (in acc. EN 60068-2-6)	4g in acc. with EN 60068-2-6			
Shock (in acc. with EN 60068-2-27)	50g in acc. with EN 60068-2-27			

#### Mounting accessories for class 200 PLD machine lights, Ø 40 mm

	Ste	141	
<b>Type</b> Order No.	PLD M-ME MC/D40 2702492	PLD M-ME MC/D40 2702527	
Description	Two mounting holders for lights PLD M 260/D40, swivel range ±20°	Two mounting brackets for lights PLD M 260/D40, swivel range ±45°	

### Technical data for class 200 PLD machine lights

#### Product overview for class 200 PLD machine lights, Ø 70 mm and IP69 variant







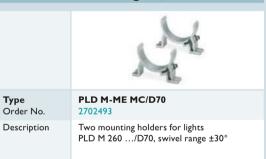


Туре	PLD M 260 W-75/95 370/D70	PLD M 260 W-75/95 510/D70	PLD M 260 W-75/95 650/D70	PLD M 260 W-75/95 790/D70
Order No.	2702484	2702485	2702486	2702488
Dimensions L x W x H	370 mm x 70 mm x 58 mm	510 mm x 70 mm x 58 mm	650 mm x 70 mm x 58 mm	790 mm x 70 mm x 58 mm
Supply voltage range	18 V DC 30 V DC			
Emission angle	75°/95°	75°/95°	75°/95°	75°/95°
Color temperature	5,000 K	5,000 K	5,000 K	5,000 K
Color rendering index (Ra)	≥ 85	≥ 85	≥ 85	≥ 85
LED service life (L70)	60,000 h	60,000 h	60,000 h	60,000 h
Average illumination (1 m² area at a distance of 1 m)	340 lx	506 lx	657 lx	814 lx
Maximum illumination (distance of 1 m)	443 lx	662 lx	856 lx	1056 lx
Power consumption	12 W	18 W	24 W	30 W
Temperature range (operation)	0 °C +45 °C			
Degree of protection	IP67	IP67	IP67	IP67
Vibration (in acc. EN 60068-2-6)	4g in acc. with EN 60068-2-6			
Shock (in acc. with EN 60068-2-27)	50g in acc. with EN 60068-2-27			



<b>Type</b> Order No.	PLD M 260 W-75/95 1070/D70 2702489	PLD M 280 W-40 284 2702491
Dimensions $L \times W \times H$	1070 mm x 70 mm x 58 mm	284 mm x 74 mm x 20 mm
Supply voltage range	18 V DC 30 V DC	22 V DC 26 V DC
Emission angle	75°/95°	40°
Color temperature	5,000 K	6,500 K
Color rendering index (Ra)	≥ 85	≥ 65
LED service life (L70)	60,000 h	50,000 h
Average illumination (1 m² area at a distance of 1 m)	1089 lx	347 lx
Maximum illumination (distance of 1 m)	1391 lx	869 lx
Power consumption	42 W	13 W
Temperature range (operation)	0 °C +45 °C	0 °C +40 °C
Degree of protection	IP67	IP67/IPX9
Vibration (in acc. EN 60068-2-6)	4g in acc. with EN 60068-2-6	
Shock (in acc. with EN 60068-2-27)	50g in acc. with EN 60068-2-27	

#### Mounting accessories for class 200 PLD machine lights, Ø 70 mm





# Technical data for class 300 PLD machine lights

Ambient conditions		Light properties	
Temperature range (operation)	-25 °C +60 °C	Color temperature	5,000 K
Relative humidity (operation)	95 %	Color rendering index (Ra)	≥ 80
Vibration	5g in acc. with EN 60068-2-6	Electromagnetic compatib	ility
Shock	25g in acc. with EN 60068-2-27	Noise emission	Class B in acc. with EN 61000-6-3
Continuous shock	10g in acc. with EN 60068-2-27	Noise immunity	In accordance with EN 61000-6-2
Degree of protection	IP67		1
		Supply voltage	
Service life		Nominal voltage	24 V DC
LED service life (L70)	65,000 h	Permissible range	19.2 V DC 28.8 V DC

#### Product overview for class 300 PLD machine lights

Туре	PLD M 360 W-50 200	PLD M 360 W-50 365	PLD M 360 W-50 695
Order No.	2701689	2701690	2701691
Dimensions L x W x H	200 mm x 60 mm x 35 mm	365 mm x 60 mm x 35 mm	695 mm x 60 mm x 35 mm
Emission angle	50°	50°	50°
Average illumination (1 m² area at a distance of 1 m)	250 lx	490 lx	905 lx
Maximum illumination (distance of 1 m)	535 lx	1005 lx	1755 lx
Power consumption	5.5 W	11 W	22 W
Туре	PLD M 360 W-100 200	PLD M 360 W-100 365	PLD M 360 W-100 695
Order No.	2701692	2701693	2701694
Dimensions $L \times W \times H$	200 mm x 60 mm x 35 mm	365 mm x 60 mm x 35 mm	695 mm x 60 mm x 35 mm
Emission angle	100°	100°	100°
Average illumination (1 m² area at a distance of 1 m)	150 lx	310 lx	585 lx
Maximum illumination (distance of 1 m)	220 lx	450 lx	830 lx
Power consumption	9 W	18 W	36 W

#### Mounting accessories for class 300 PLD machine lights



PLD M-ME MB/90 2701878 Mounting bracket for lights PLD M 360 ...,

permanent 90° angle

**Type** Order No.

Description



PLD M-ME MB 2701879 Swivel mounting bracket

for lights PLD M 360 ..., adjustable angle: 0 ... 180°



**PLD M-ME AP** 2701880

Adapter plate for lights PLD M 360 ... for mounting on narrow machine parts



PLD M-ME MP 2701881

Mounting plate for lights PLD M 360 ... (replacement part)

# PSD signal towers – Optimal detection of machine states

Reducing downtime and avoiding costs – this is the only way to ensure critical competitive advantages. A clear signaling of the machine or system state is an important prerequisite for this. The modular signal towers of the PSD product range (Phoenix Contact Signaling Devices) feature a wide range of visual and audible signals. If space is tight, then you can map up to seven different states with just one multi-colored element.

# Construction of a PSD signal tower – modular and flexible

Follow these steps to assemble your signal tower:

- Select the type of mounting appropriate for your use of the signal tower: surface or tube mounting.
- ② Where appropriate, select the mounting bracket and the junction box.
- Where appropriate, select the foot and the tube with the desired length: 110 mm ... 1000 mm.
- ④ Select the connection element that corresponds to the mounting type: screw or spring-cage connection.
- (5) Select
  - (a) the required visual elements(b) the audible element, where
  - appropriate.



(4)

(2)

(1)

Order No. 2700093 Connection element with screw connection



Order No. 2700091 Connection element with spring-cage connection



Order No. 2700160 Bracket for one-sided surface mounting



Order No. 2700161 Bracket for two-sided surface mounting



Order No. 2700153 Junction box with lateral cable entry



Order No. 2700144 Bracket for surface mounting

Surface mounting

You can combine up to five visual signal elements or up to four visual elements and one audible signal element.

#### Visual signal elements

LED permanent light LED blinking light LED flashing light LED random flashing light LED rotating light LED multi-color permanent light (for ordering information, see page 26)

(5a)



#### Audible signal elements

Siren, buzzer, voice output (for ordering information, see page 27)



(5b)



Order No. 2700095 **Connection element** with screw connection



Order No. 2700092 **Connection element** with spring-cage connection

Order No. 2700157

Order No. 2700158

Tube, Ø 25 mm

1000 mm Order No. 2700154

(4)



Adapter for single-hole mounting



Order No. 2700156 Foot with integrated tube, 110 mm long

Order No. 2700153

Junction box with

lateral cable entry



250 mm

400 mm

Foot for tube, Ø 25 mm, plastic



Order No. 2700164 Foot for tube, Ø 25 mm, aluminum Order No. 2700152 Tube for direct mounting on the foldaway base



(3)

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Order No. 2700151 Foldaway base, pitch 7.5°

Order No. 2700150



Order No. 2700155 Junction box with magnetic base and lateral cable entry

**Tube mounting** 



Order No. 2700149 Bracket for base mounting with concealed cable routing



Order No. 2700143 Bracket for base mounting

# Technical data for PSD signal towers

General data		Visual elements	
Input voltage	24 V DC		LED permanent light
Ambient temperature	-20 °C +50 °C	Type of visual signal	LED blinking light LED flashing light (double flash)
Degree of protection	IP65, when installed		LED random flashing light LED rotating light
Diameter	70 mm		LED multi-color permanent light
Mounting position	Any	Audible elements	
		Type of audible signal	Siren, buzzer, voice output
Approvals	CUU US	Volume	Max. 105 dB(A)

### Visual signal elements

보	PSD-S OE LED RD	PSD-S OE LED YE	PSD-S OE LED GN	PSD-S OE LED CL	PSD-S OE LED BU
LED permanent light	Order No. 2700107 • 24 V AC/DC	Order No. 2700122 • 24 V AC/DC	Order No. 2700119 • 24 V AC/DC	Order No. 2700127 • 24 V AC/DC	Order No. 2700131 • 24 V AC/DC
	PSD-S OE LED BL RD	PSD-S OE LED BL YE	PSD-S OE LED BL GN	PSD-S OE LED BL CL	PSD-S OE LED BL BU
LED blinking light	Order No. 2700114 • 24 V AC/DC	Order No. 2700123 • 24 V AC/DC	Order No. 2700121 • 24 V AC/DC	Order No. 2700128 • 24 V AC/DC	Order No. 2700132 • 24 V AC/DC
	PSD-S OE LED FL RD	PSD-S OE LED FL YE		PSD-S OE LED FL CL	PSD-S OE LED FL BU
LED flashing light	Order No. 2700115	Order No. 2700124		Order No. 2700129	Order No. 2700134
	• Double flash • 24 V DC	• Double flash • 24 V DC		• Double flash • 24 V DC	• Double flash • 24 V DC
	PSD-S OE LED RFL RD	PSD-S OE LED RFL YE		PSD-S OE LED RFL CL	PSD-S OE LED RFL BU
LED random flashing light	Order No. 2700118 • 24 V DC	Order No. 2700126 • 24 V DC		Order No. 2700130 • 24 V DC	Order No. 2700135 • 24 V DC
L.	PSD-S OE LED RL RD	PSD-S OE LED RL YE			
LED rotating light	Order No. 2700116 • 24 V AC/DC	Order No. 2700125 • 24 V AC/DC			
ħ				PSD-S OE LED MC	
LED multi-color permanent light				Order No. 2702090 • 24 V DC • 7 colors	

#### Audible signal elements

	Contractory Contractory		Constant	Circusters	
PSD-S AE SC1-2 105DB	PSD-S AE BM2-1 85DB	PSD-S AE SP1-3 100DB/2	PSD-S AE SM8-5 100DB/1	PSD-S AE SM7-4 100DB/3	PSD-S AE V15/1
Order No. 2700139	Order No. 2700136	Order No. 2700137	Order No. 2700138	Order No. 2700141	Order No. 2700140
Siren • Alternating continuous tone • Max. 105 dB(A) • Degree of protection IP40 • 24 V DC	Buzzer • Continuous/pulse tone • Max. 85 dB(A) • 24 V AC/DC	Siren • Pulse tone • Automatic volume control • Max. 100 dB(A) • 24 V DC	Siren • 8 tones • Max. 100 dB(A) • Tones can be selected via DIP switch • 24 V AC/DC	Siren • 7 tones • Max. 100 dB(A) • Tone selection via 3 signal lines • 24 V DC	Voice output • Up to 15 sound sequences • Max. play time of 60 minutes • 24 V DC

#### Connection and mounting elements for surface mounting

PSD-S ME OB	PSD-S ME BR-SM	PSD-S ME BR-SM/1S	PSD-S ME BR-SM/2S	PSD-S CE-SM SPRING	PSD-S CE-SM SCREW
Order No. 2700153	Order No. 2700144	Order No. 2700160	Order No. 2700161	Order No. 2700091	Order No. 2700093
Junction box with lateral cable entry	Bracket for surface mounting	Bracket for one-sided surface mounting	Bracket for two-sided surface mounting	Connection element <ul> <li>Spring-cage connection</li> </ul>	Connection element • Screw connection

#### Connection and mounting elements for tube mounting

PSD-S ME OB	PSD-S ME OB/MB	PSD-S ME BR-BM/HCR	PSD-S ME BR-BM	PSD-S ME A-SH M18
Order No. 2700153	Order No. 2700155	Order No. 2700149	Order No. 2700143	Order No. 2700150
Junction box with lateral cable entry	Junction box with magnetic base and lateral cable entry	Bracket for base mounting with concealed cable routing	Bracket for base mounting	Adapter for single-hole mounting
PSD-S ME FB	PSD-S ME T-P 45	PSD-S ME BT 110	PSD-S ME B-P	PSD-S ME B-M
Order No. 2700151	Order No. 2700152	Order No. 2700156	Order No. 2700163	Order No. 2700164
Foldaway base	Tube for direct mounting on foldaway base	Foot with integrated tube • 110 mm long	Foot for tube • Plastic	Foot for tube • Metal
PSD-S ME T-M 250	PSD-S ME T-M 400	PSD-S ME T-M 1000	PSD-S CE-TM SPRING	PSD-S CE-TM SCREW
Order No. 2700157	Order No. 2700158	Order No. 2700154	Order No. 2700092	Order No. 2700095
Tube • 250 mm long	Tube • 400 mm long	Tube • 1000 mm long	Connection element • Spring-cage connection	Connection element • Screw connection

#### Accessories





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- Functional safety
- HMIs and industrial PCs
- I/O systems

- Industrial communication technology
- Industrial Ethernet
- Installation and mounting material
- Lighting and signaling
- Marking and labeling
- Measurement and control technology
- Monitoring
- PCB terminal blocks and PCB connectors
- Power supply units and UPS

- Protective devices
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- Tools
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PHOENIX CONTACT GmbH & Co. KG Flachsmarktstraße 8 32825 Blomberg, Germany Phone: + 49 5235 3-00 Fax: + 49 5235 3-41200 E-mail: info@phoenixcontact.com phoenixcontact.com



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