

# SLED-MN

- Zone 2, 21, 22
- Mechanical strength
- Reliability over time
- Instant, bright illumination

*Painted aluminium body and cover*

*Cooling fins*

*Tempered glass*



*Ex e terminal board housing for fast connection*



*Mounting bracket*

# SLED-MN series LED floodlights

The SLED-MN series LED floodlights are designed with the 'Ex nR' and 'Ex tb' protection method to be installed in ATEX classified areas "Zone 2" and "Zone 21", where the equipment must guarantee a level of normal protection in the presence of mixtures of gases, vapors, and mists (Zone 2), and a high level of protection against dust and combustible particles (Zone 21). SLED-MN series floodlights are equipped with LED light sources that allow for a diffused light beam and an exceptional Lumen Output. The finned body acts as a heat dissipator for the LED plate and allows greater circulation of the air and water present in the surrounding environment, thus minimizing the deposit of combustible dust.

## Application sectors:



## CERTIFICATION DATA

<b>Classification:</b>	Group II	Category 3GD/2D		
<b>Installation:</b> EN 60079.14	zone 2 (Gas)	zone 21 - zone 22 (Dust)		
<b>Marking:</b>	CE 0722 Ex II 3GD - Ex nR IIC T... Gc - Ex tc IIIC T... °C Dc - IP66			
	CE Ex II 2D - Ex tb IIIC T... °C Db - IP 66			
<b>Certification:</b>	ATEX ATEX	CML 19 ATEX 1312 CML 23 ATEX 4028X		
	IECEX	IECEX CML 17.0004	All IEC Ex, UKEX certification data can be downloaded at <a href="http://www.cortemgroup.com">www.cortemgroup.com</a>	
	UKEX	AVAILABLE		
<b>Standards:</b>	CENELEC EN 60079-0: 2018, EN 60079-15: 2019, EN 60079-31: 2014 and EUROPEAN DIRECTIVE 2014/34/UE IEC 60079-0: 2017, IEC 60079-15: 2010, IEC 60079-31: 2013 European Directive 2004/108 Electromagnetic compatibility European Directive 2012/19/UE, 2002/96/CE, 2003/108/CE WEEE European Directive 2011/65/UE RoHS			
<b>Ambient temperature:</b>	-60°C	+60°C	For all permitted ambient temperature ranges, please see the "Selection tables"	
<b>Degree of protection:</b>	IP66			

# SLED-MN series LED floodlights



 **EXEMPT FROM  
PHOTOBIOLOGICAL RISK  
(STANDARD IEC / EN 62471)**



**ORIGINAL PRODUCT**



For more information on electrical connectors see link:

[www.cortemgroup.com/fastex-m](http://www.cortemgroup.com/fastex-m)

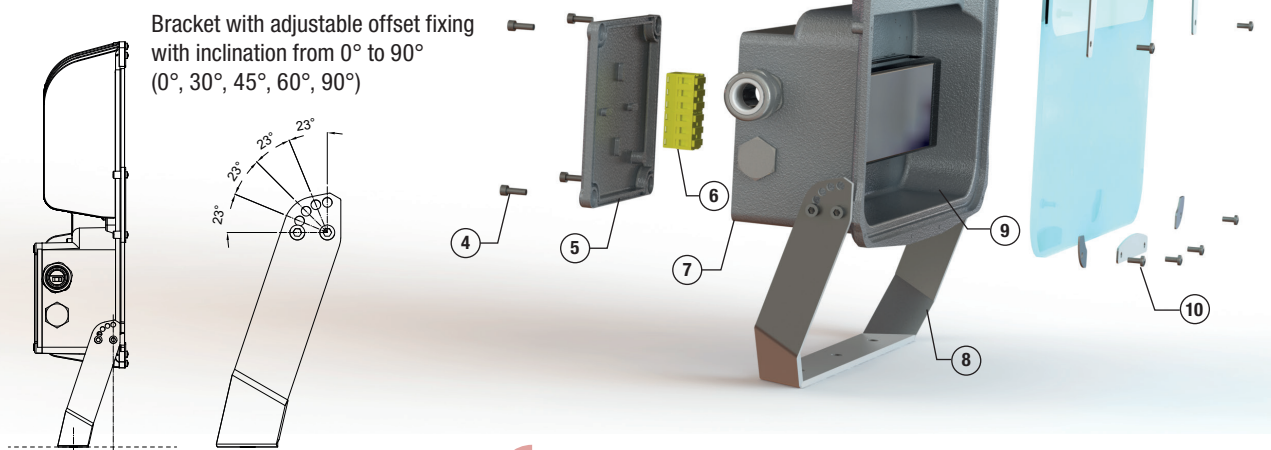
## MECHANICAL FEATURES

<b>Body:</b>	Low copper content aluminium alloy fitted with cooling fins for better heat dissipation
<b>Glass face:</b>	Shock and temperature resistant tempered glass sealed with aluminium ring
<b>Supporting bracket:</b>	Galvanised steel
<b>Gaskets:</b>	Acid, hydrocarbon and high temperature resistant silicone
<b>Bolts and screws:</b>	Stainless steel
<b>Entries:</b>	SLED-400...: 2 x ISO M20 entries. (Floodlight kit with plug PLG11B and cable gland NAV201B) SLED-600...: 2 x ISO M25 entries. (Floodlight kit with plug PLG21B and cable gland NAV251B)
<b>Coating:</b>	Polyester coating Ral 7035 (Light grey)
<b>Corrosion Resistance:</b>	The STANDARD of the aluminium alloy used by Cortem has passed the tests required by standards EN60068-2-30 (hot/humid cycles) and EN60068-2-11 (salt mist tests)

## EXPLODED DIAGRAM OF SLED-MN-600500 FLOODLIGHT


Descriptions:

1. Painted body
2. Tempered glass
3. LED board
4. Stainless steel screws
5. Cover for "Ex e" housing
6. Terminals L, N, PE, Section max. 4 mm<sup>2</sup>, suitable for loop-in, loop-out
7. 'Ex e' housing complete with connection terminals
8. Mounting bracket
9. 'Ex nR' housing complete with power supply
10. Brackets and screws in stainless steel for glass locking



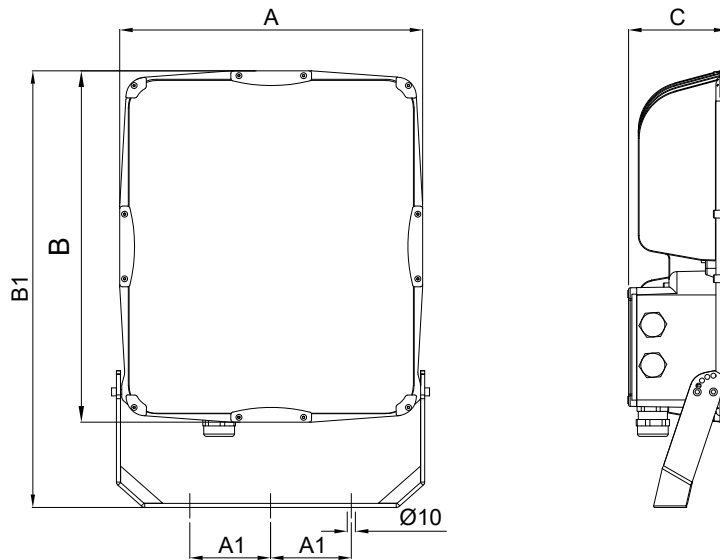


# SLED-MN series LED floodlights

Code	Dimensions mm					Watt	Class / Max surface temp. °C				Weight kg	mm 
	A	B	B1	C	A1		TA=+40°C	TA=+50°C	TA=+55°C	TA=+60°C		
<b>SLED-MN-400100</b>	315	304	395	121	70	100 W	T6/81	T5/91	T5/96	T4/101	7	420x355x145
<b>SLED-MN-400150</b>	315	304	395	121	70	147 W	T5/85	T5/95	T4/100	T4/105	7,8	420x355x145
<b>SLED-MN-400200</b>	315	304	395	121	70	196 W	T5/85	T5/95	T4/100	T4/105	7,8	420x355x145
<b>SLED-MN-600300</b>	375	435	540	121	100	268 W	T5/83	T5/93	T4/98	T4/103	13,6	565x425x167
<b>SLED-MN-600400</b>	375	435	540	121	100	405 W	T5/91	T4/101	T4/110	T4/111	13,6	565x425x167
<b>SLED-MN-600500</b>	375	435	540	121	100	497 W	T5/95	T4/105	T4/110	T4/115	15,6	565x425x167

Zona 2, 21, 22

## DIMENSIONAL DRAWING

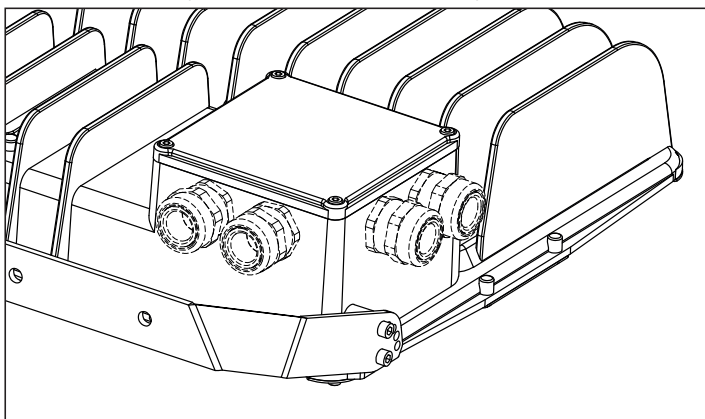


Dimensions in mm

## ACCESSORIES AVAILABLE / SPECIAL REQUESTS

Different colour temperature (code SLED-MN-250120/**2700K**)  
 Additional cable gland model NAV25SIB for unarmoured cable

Drilling for different standard cable gland entries



Standard drilling

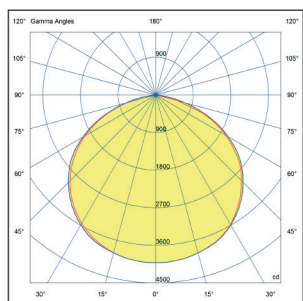


# SLED-MN series LED floodlights

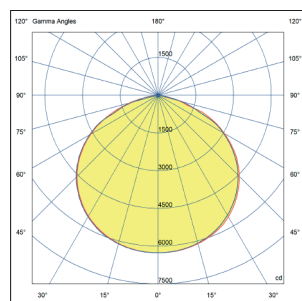
Electrical features	SLED-MN-400100	SLED-MN-400150	SLED-MN-400200
Power supply:	100-240 Vac ±10%	100-240 Vac ±10%	100-240 Vac ±10%
Rated frequency:	50-60 Hz ±5%	50-60 Hz ±5%	50-60 Hz ±5%
Power consumption*:	100 W	147 W	189 W
Connection:	Direct connection to terminal board L, N, Pe. Section 4mm <sup>2</sup> , suitable for loop-in/loop-out		
Power factor*:	>0,98	>0,97	>0,98
Rated current*:	450 mA	660 mA	840 mA
EMC (electromagnetic compatibility):	EN 55015, EN 61547, IEC 61000-3-2, IEC 61000-3-3, IEC 61000-4...		
THD (total harmonic distortion):	<15% 100-277 Vac	<20% 120-277 Vac	<20% 120-277 Vac
Over-voltage protection:	2 kV	4 kV	4 kV
Driver performances:	Over-Voltage protection, Over-Current protection, Short-Circuit protection		
Dimmer (on request):	(0-10 V) o PWM	(0-10 V)	(0-10 V)
Photometric features			
Viewing angle:	Cree	Cree	Cree
LED:	60°	60°	60°
Type:	Cool White	Cool White	Cool White
Colour temperature:	~ 5700 K	~ 5700 K	~ 5700 K
CRI**:	>70	>70	>70
Instant Restrike:	SI	SI	SI
L80:	> 72600 h	> 72600 h	> 72600 h
<b>Lumen:</b>	<b>12113 lm</b>	<b>18697 lm</b>	<b>23356 lm</b>
<b>Maximum light intensity:</b>	<b>4012 cd</b>	<b>6256 cd</b>	<b>7831 cd</b>
<b>Overall efficiency:</b>	<b>120 lm/W</b>	<b>127 lm/W</b>	<b>123 lm/W</b>

\* Test at 230Vac

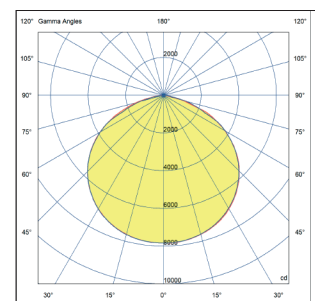
\*\* Different CRI on request



**SLED-MN-400100**  
Luminous flux: 12113 lm



**SLED-MN-400150**  
Luminous flux: 18697 lm



**SLED-MN-400200**  
Luminous flux: 23356 lm

On Cortem Group web site you can download .LDT and .IES lighting data files for the design and simulation of lighting levels in 2D and 3D, rendering and ray tracing.

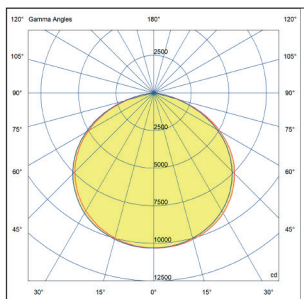
— = plane 90270  
— = plane 0180

# SLED-MN series LED floodlights

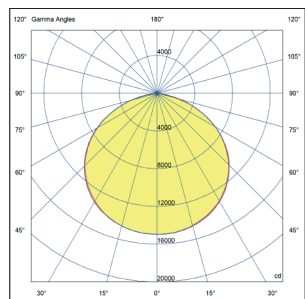
Electrical features	SLED-MN-600300	SLED-MN-600400	SLED-MN-600500
Power supply:	120-277 Vac ±10%	122-240 Vac ±10%	122-240 Vac ±10%
Rated frequency:	50-60 Hz ±5%	50-60 Hz ±5%	50-60 Hz ±5%
Power consumption*:	268 W	396 W	488 W
Connection:	Direct connection to terminal board L, N, Pe. Section 4mm <sup>2</sup> , suitable for loop-in/loop-out		
Power factor*:	>0,97	>0,98	>0,98
Rated current*:	1210 mA	1750 mA	2170 mA
EMC (electromagnetic compatibility):	EN 55015, EN 61547, IEC 61000-3-2, IEC 61000-3-3, IEC 61000-4-...		
THD (total harmonic distortion):	<10% 220-240 Vac	<10% 220-240 Vac	<20% 120-277 Vac
Over-voltage protection:	6-10 kV	6-10 kV	2-4 kV
Driver performances:	Over-Voltage protection, Over-Current protection, Short-Circuit protection		
Dimmer (on request):	(0-10 V) o PWM	(0-10 V) / PWM	(0-10 V) / PWM
Photometric features			
Viewing angle:	Cree	Cree	Cree
LED:	98°	100°	105°
Type:	Cool White	Cool White	Cool White
Colour temperature:	~ 5700 K	~ 5700 K	~ 5000 K
CRI**:	>70	>70	>70
Instant Restrike:	SI	SI	SI
L80:	> 72600 h	> 72600 h	> 72600 h
<b>Lumen:</b>	<b>30992 lm</b>	<b>44750 lm</b>	<b>61752 lm</b>
<b>Maximum light intensity:</b>	<b>10300 cd</b>	<b>14951 cd</b>	<b>20619 cd</b>
<b>Overall efficiency:</b>	<b>115 lm/W</b>	<b>113 lm/W</b>	<b>126 lm/W</b>

\* Test at 230Vac

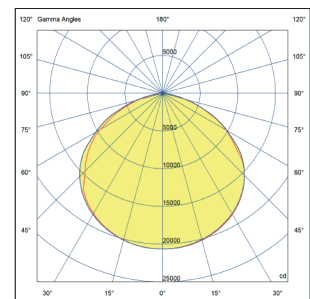
\*\* Different CRI on request



**SLED-MN-600300**  
Luminous flux: 30992 lm



**SLED-MN-600400**  
Luminous flux: 44750 lm



**SLED-MN-600500**  
Luminous flux: 61752 lm

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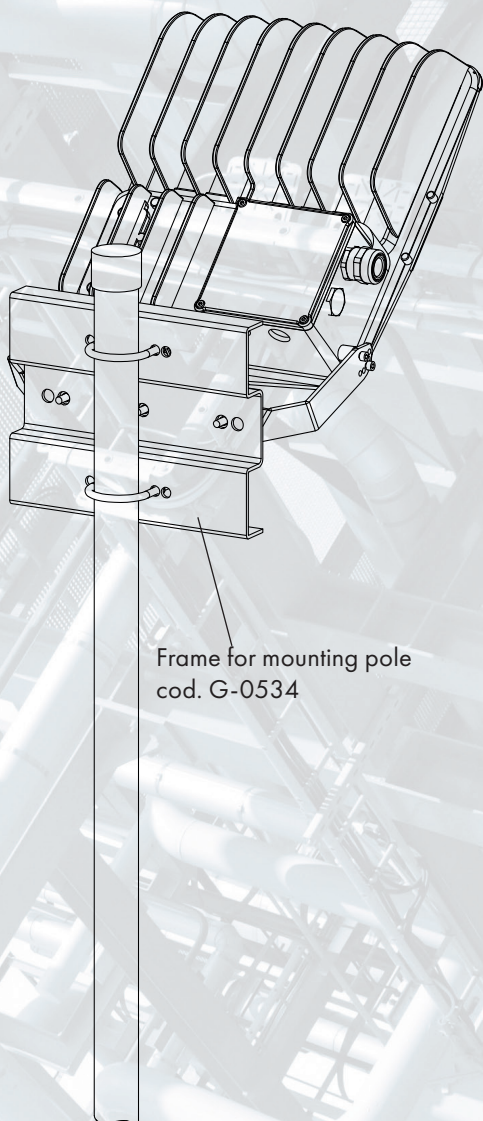
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## SLED-MN series Accessories and spare parts available on request

ILLUSTRATION	DESCRIPTION	MODEL	FEATURES	CODE	KEY
	Frame for pole mounting	Per tutti i modelli	Material: galvanised steel	<b>G-0534</b>	 
	Swivel base for 360° adjustment	SLED-MN-...	Material: aluminum RAL 7035 painted	<b>G-153 + G-161</b>	 
	Cable gland for nonarmored cables	SLED-MN-...	std. range cable 6,5÷14	<b>NAV20IB</b>	 
			std. range cable 11÷20	<b>NAV25IB</b>	
	Front glass	SLED-MN-400...	Material: tempered glass	<b>G-1283</b>	
		SLED-MN-600...		<b>G-1275</b>	
	Supporting bracket	SLED-MN-400...	Material: galvanised steel	<b>G-1282</b>	
		SLED-MN-600...		<b>G-1276</b>	
	LED board	SLED-MN-400100		<b>G-1219</b>	
		SLED-MN-400150		<b>G-1219</b>	
		SLED-MN-400200		<b>G-1219 (X2)</b>	
		SLED-MN-600300		<b>G-1219 (X2)</b>	
		SLED-MN-600400		<b>G-970</b>	
		SLED-MN-600500		<b>G-1026</b>	
	Power supply	SLED-MN-400100	100-240 Vac	<b>LEDDEVL080/8</b>	
		SLED-MN-400150	120-240 Vac	<b>LEDDEVL100/1/11</b>	
		SLED-MN-400200	120-240 Vac	<b>LEDDEVL100/1/10</b>	
		SLED-MN-600300	120-277 Vac	<b>LEDDSLEDMN600300</b>	
		SLED-MN-600400	122-277 Vac	<b>LEDDEVL100/1</b>	
		SLED-MN-600500	122-277 Vac	<b>LEDDSLED1001</b>	

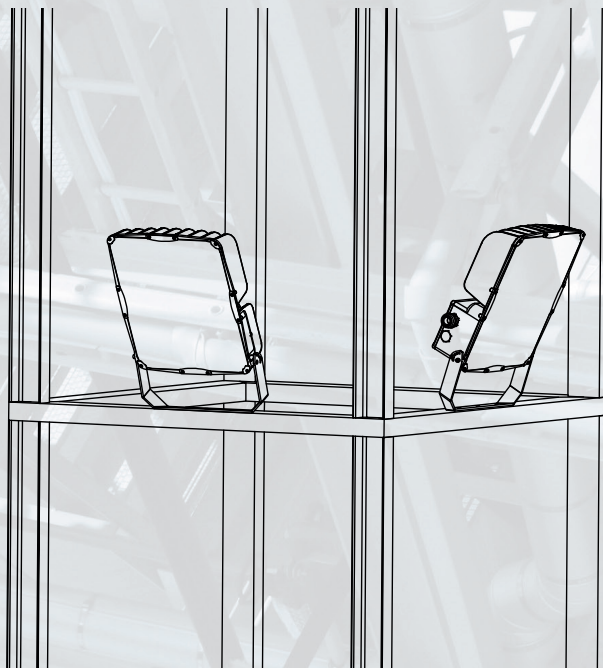


Example of pole mounting

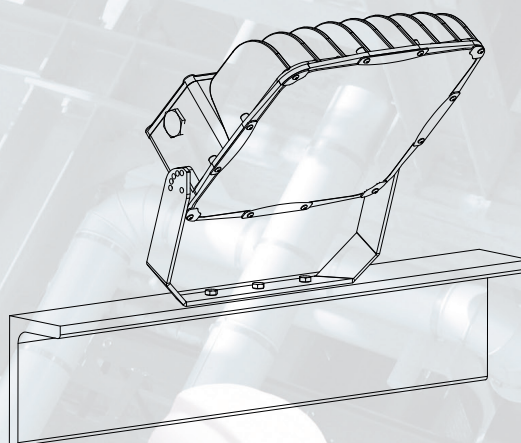


Frame for mounting pole  
cod. G-0534

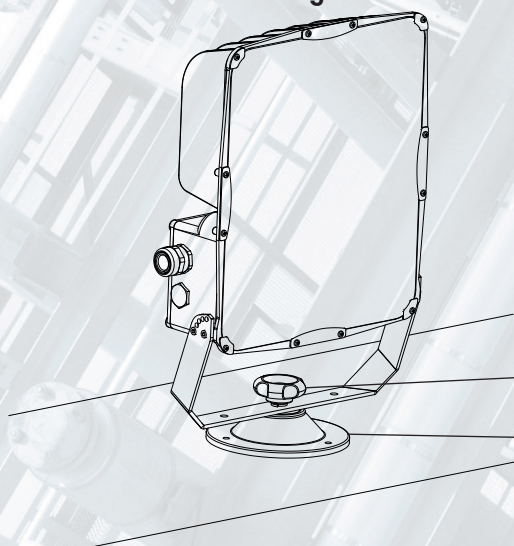
Example of vertical mounting on structure



Example of horizontal mounting on structure



Example with base for swivel fixing



Clamping knob with 5 lobes cod. G-153

Fixing base in aluminum cod. G-161