

**OPPLE**  
LIGHTING.

# Content

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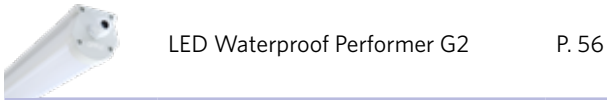
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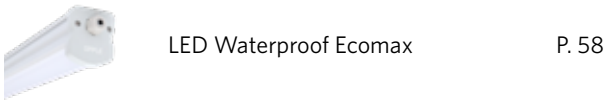
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## LED Waterproofs

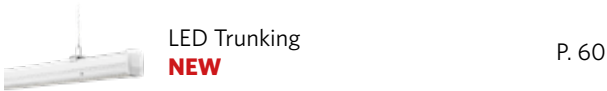


LED Waterproof Performer G2 P. 56



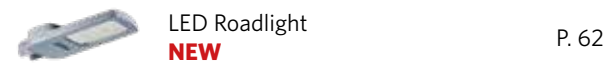
LED Waterproof Ecomax P. 58

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LED Trunking **NEW** P. 60

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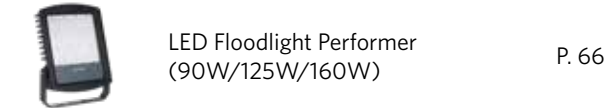


LED Roadlight **NEW** P. 62



LED Streetlight P. 64

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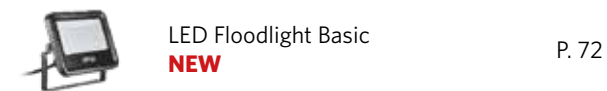
LED Floodlight Performer (90W/125W/160W) P. 66



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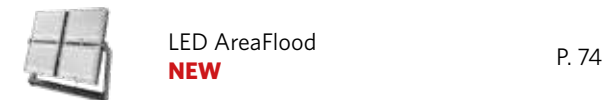


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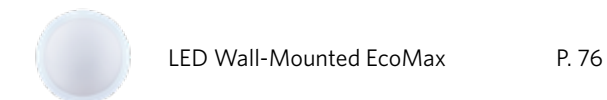
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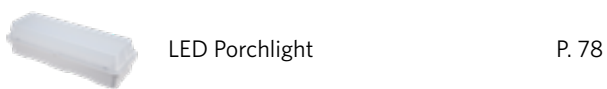
LED AreaFlood **NEW** P. 74

## LED Wall Mounted



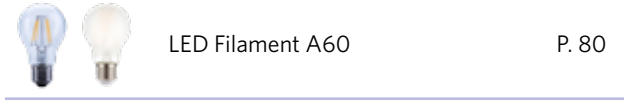
LED Wall-Mounted EcoMax P. 76

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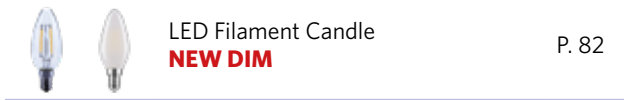


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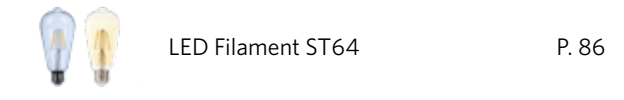
LED Filament A60 P. 80



LED Filament Candle **NEW DIM** P. 82

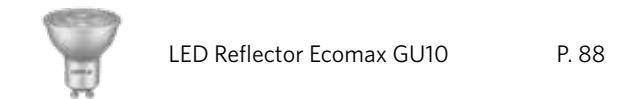


LED Filament Mini Globe **NEW DIM** P. 84



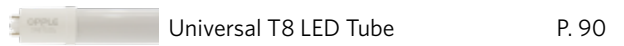
LED Filament ST64 P. 86

## LED Reflectors

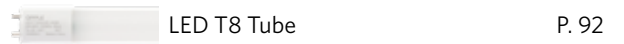


LED Reflector Ecomax GU10 P. 88

## LED Tubes

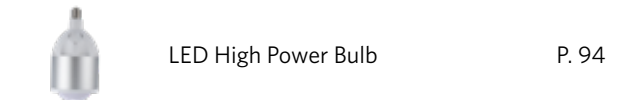


Universal T8 LED Tube P. 90



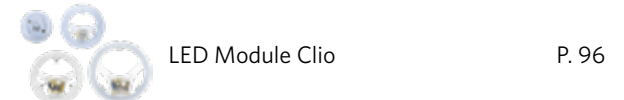
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## High Power Bulb



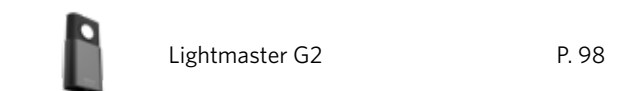
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# OPPLE Online

Check our website ([www.opple.com](http://www.opple.com)) for the latest overview of our complete portfolio and related specifications.



Energy labels | Family sheets | Installation instructions | Dimmer compatibility list |  
Photometric data | Connection specifications | Safety Instructions |  
Guarantee & Warranty policy | Terms & conditions





## LED Panel Recessed Grille

- Direct replacement for existing T5 and T8 fixtures
- Comfortable lighting for study and work environment (UGR < 16)
- Can be recessed & surface mounted
- System efficacy up to 113 lm/W
- Significantly lower energy consumption up to 55%



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
140043967	LEDPanelRc-G Sq598-36W-3000-WH-CT	TL 4x18W	36	3800	106	16	3000	4.12
140043968	LEDPanelRc-G Sq598-36W-4000-WH-CT	TL 4x18W	36	4050	113	16	4000	4.12
140043971	LEDPanelRc-G Re298-36W-3000-WH-CT	TL 2x36W	36	3800	106	16	3000	5.33
140043972	LEDPanelRc-G Re298-36W-4000-WH-CT	TL 2x36W	36	4050	113	16	4000	5.33
140043973	LEDPanelRc-G Re166-21W-3000-WH-CT	TL 1x36W	21	2000	95	16	3000	3.31
140043974	LEDPanelRc-G Re166-21W-4000-WH-CT	TL 1x36W	21	2090	100	16	4000	3.31
140043969	LEDPanelRc-G Sq298-11W-3000-WH-CT	CFL 2x18W	11	1050	95	16	3000	1.40
140043970	LEDPanelRc-G Sq298-11W-4000-WH-CT	CFL 2x18W	11	1090	99	16	4000	1.40
140046181	LEDPanelRc-G Sq598-36W-DALI-3000-WH-CT	TL 4x18W	36	3450	96	16	3000	4.90
140046182	LEDPanelRc-G Sq598-36W-DALI-4000-WH-CT	TL 4x18W	36	3690	103	16	4000	4.90
140046185	LEDPanelRc-G Re298-36W-DALI-3000-WH-CT	TL 2x36W	36	3450	96	16	3000	5.00
140046186	LEDPanelRc-G Re298-36W-DALI-4000-WH-CT	TL 2x36W	36	3690	103	16	4000	5.00
140046187	LEDPanelRc-G Re166-21W-DALI-3000-WH-CT	TL 1x36W	21	1800	86	16	3000	3.31
140046188	LEDPanelRc-G Re166-21W-DALI-4000-WH-CT	TL 1x36W	21	1900	90	16	4000	3.31
140046183	LEDPanelRc-G Sq298-13W-DALI-3000-WH-CT	CFL 2x18W	13	930	72	16	3000	1.40
140046184	LEDPanelRc-G Sq298-13W-DALI-4000-WH-CT	CFL 2x18W	13	990	76	16	4000	1.40

Available on request with 3- or 5- or 3+2 pole Wieland GST18i connector. Emergency lighting available on request.

## Accessories



140044054  
LEDPanelRc-G Sq598-Surface  
Module-CT



140044055  
LEDPanelRc-G Re298-Surface  
Module-CT



140044056  
LEDPanelRc-G Sq298-Surface  
Module-CT



140044057  
LEDPanelRc-G Re166-Surface  
Module-CT

**Technical Specifications**

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	3
Dimmable	No / Yes (DALI)
Beam angle	90 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	I
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

**Electrical Supply**

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

**Mechanical Properties**

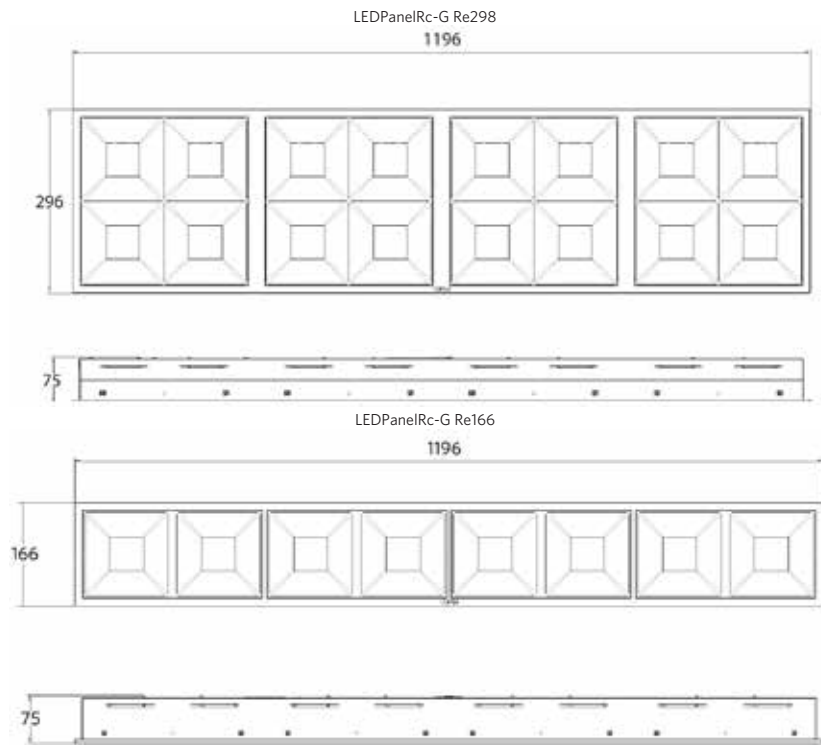
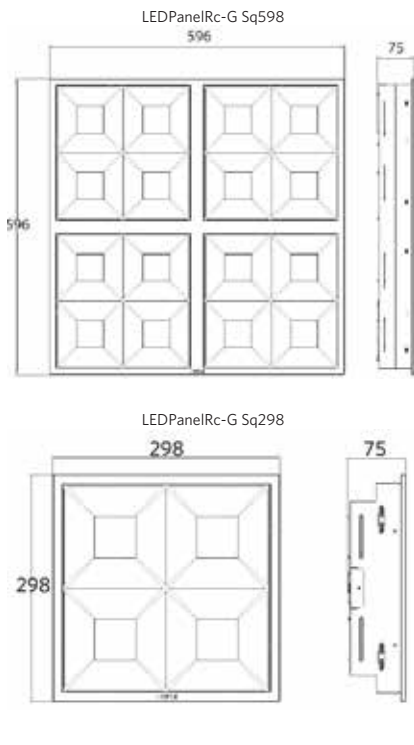
Material housing	Coated Steel
Optical material	Polycarbonate

**Ambient Conditions**

Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



**Dimensional Drawing (mm)**



**Installation Opening Drawing (mm)**

LEDPanelRc-G Sq298  
285 x 285





LED Slim Panel Performer UGR19

- High efficacy up to 115lm/W, suitable for offices (UGR19)
- Available as Smart Lighting solution (BLE)
- IP54 version available
- Recessed, suspended and surface mounting possible
- Low glare luminaire brings comfort to working and study environments (UGR < 19)
- Up to 60% lower energy consumption vs TL
- Surface module available (65 mm thickness)



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
140063714	LEDPanelRc-S Sq595-30W-3000-WH-U19	TL 4x18W	30	3300	110	19	3000	3.81
140063715	LEDPanelRc-S Sq595-30W-4000-WH-U19	TL 4x18W	30	3500	115	19	4000	3.81
140063717	LEDPanelRc-S Re295-30W-3000-WH-U19	TL 2x36W	30	3300	110	19	3000	3.84
140063718	LEDPanelRc-S Re295-30W-4000-WH-U19	TL 2x36W	30	3500	115	19	4000	3.84
140063723	LEDPanelRc-S Sq595-30W-DALI-3000-WH-U19	TL 4x18W	30	3300	110	19	3000	3.81
140063724	LEDPanelRc-S Sq595-30W-DALI-4000-WH-U19	TL 4x18W	30	3500	115	19	4000	3.81
140063726	LEDPanelRc-S Re295-30W-DALI-3000-WH-U19	TL 2x36W	30	3300	110	19	3000	3.84
140063727	LEDPanelRc-S Re295-30W-DALI-4000-WH-U19	TL 2x36W	30	3500	115	19	4000	3.84
140063733	LEDPanelRc-S S595-30W-DALI-4000-U19-IP54	TL 4x18W	30	3500	115	19	4000	4.50
140063557	LEDPanelRc-S Sq595-30W-BLE-3000-WH-U19	TL 4x18W	30	3300	110	19	3000	3.81
140063558	LEDPanelRc-S Sq595-30W-BLE-4000-WH-U19	TL 4x18W	30	3500	115	19	4000	3.81
140063554	LEDPanelRc-S Re295-30W-BLE-3000-WH-U19	TL 2x36W	30	3300	110	19	3000	3.84
140063555	LEDPanelRc-S Re295-30W-BLE-4000-WH-U19	TL 2x36W	30	3500	115	19	4000	3.84
542004002200	LEDPanelRc-S Sq595-30W-10V-3000-WH-U19	TL 4x18W	30	3300	110	19	3000	3.81
542004002100	LEDPanelRc-S Sq595-30W-10V-4000-WH-U19	TL 4x18W	30	3500	115	19	4000	3.81
542004001900	LEDPanelRc-S Re295-30W-10V-3000-WH-U19	TL 2x36W	30	3300	110	19	3000	3.84
542004001800	LEDPanelRc-S Re295-30W-10V-4000-WH-U19	TL 2x36W	30	3500	115	19	4000	3.84
542004001300	LEDPanelRc-S S595-30W-10V-4000-U19-IP54	TL 4x18W	30	3500	115	19	4000	4.50

Available on request with 3- or 5- or 3+2 pole Wieland GST18i connector. Emergency lighting available on request. BLE versions are not compatible with surface module accessories.



## Accessories



140055484  
LEDPanelRc-SI Sq600-Surface-Module-WH-CT



140055486  
LEDPanelRc-SI Re300-Surface-Module-WH-CT



140057770  
LEDPanelRc-SI-Mounting-Springs-595



140048490  
LEDPanel-SI-Suspension-Kit-CT

### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	3
Dimmable	No / Yes (DALI/BLE/1-10V)
Beam angle	85 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20 / IP54
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Aluminium
Optical material	PMMA
Cover material	Polystyrene

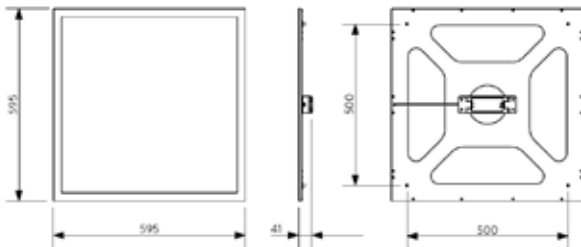
### Ambient Conditions

Operating temperature	-25 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

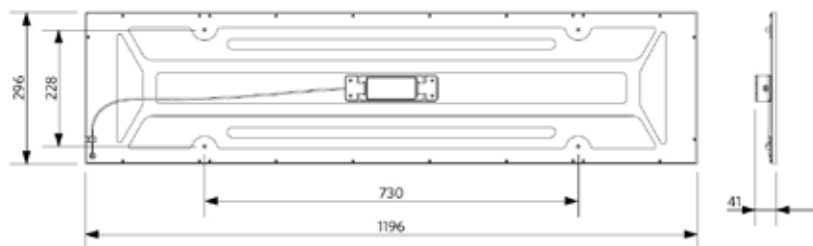


## Dimensional Drawing (mm)

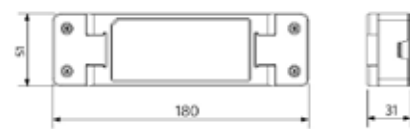
LEDPanelRc-S Sq595



LEDPanelRc-S Re295



LEDPanelRc-S Driver



## Installation Opening Drawing (mm)

LEDPanelRc-S Sq595  
580 x 580



LEDPanelRc-S Re295  
1180 x 280





## LED Slim Panel EcoMax UGR22

- Slim and well designed, also suitable for suspension
- Up to 55% lower energy consumption vs TL
- Suspension kit and ceiling clip accessories available
- Surface module available (65mm thickness)



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140062700	LEDPanelRc-S-E2 Sq595-34W-3000-WH-U22	TL 4x18W	34	3500	105	3000	3.20
140062701	LEDPanelRc-S-E2 Sq595-34W-4000-WH-U22	TL 4x18W	34	3500	105	4000	3.20
140062706	LEDPanelRc-S-E2 Re295-34W-3000-WH-U22	TL 2x36W	34	3500	105	3000	3.20
140062707	LEDPanelRc-S-E2 Re295-34W-4000-WH-U22	TL 2x36W	34	3500	105	4000	3.20

Available on request with 3- pole Wieland GST18i connector  
Emergency lighting available on request

## Accessories



140055484  
LEDPanelRc-SI Sq600-Surface-Module-WH-CT



140055486  
LEDPanelRc-SI Re300-Surface-Module-WH-CT



140053150  
LEDPanelRc-SI-E Mounting-Springs



140055365  
LEDPanel-SI-E-Suspension-Kit

**Technical Specifications**

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Beam angle	120 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
UGR	22
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

**Electrical Supply**

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

**Mechanical Properties**

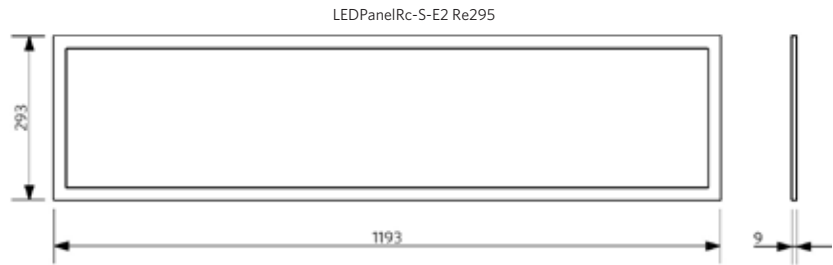
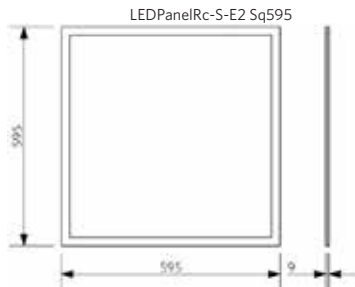
Material housing	Aluminium
Optical material	Polystyrene
Cover material	Polycarbonate

**Ambient Conditions**

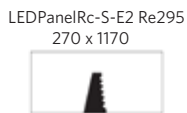
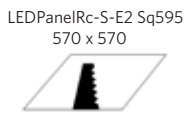
Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



**Dimensional Drawing (mm)**



**Installation Opening Drawing (mm)**





## LED Slim Panel Basic

- NEW: available in 3000K
- Suitable for recessed and suspended applications
- Replacement for conventional 4x18W luminaire
- Energy saving up to 55%
- Comfortable and uniform light available in UGR22 and UGR19
- Slim design, only 8mm thick
- Solid aluminum frame



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
542004008610	LEDPanelRc-S-B Sq595-36W-3000-WH-U19	TL 4x18W	36	3060	85	19	3000	2.48
542004008710	LEDPanelRc-S-B Sq595-36W-3000-WH	TL 4x18W	36	3060	85	22	3000	2.20
140066707	LEDPanelRc-S-B Sq595-36W-4000-WH-U19	TL 4x18W	36	3240	90	19	4000	2.48
140067185	LEDPanelRc-S-B Sq595-36W-4000-WH	TL 4x18W	36	3240	90	22	4000	2.20

## Accessories



140055484  
LEDPanelRc-SI Sq600-Surface-Module-WH-CT



140053150  
LEDPanelRc-SI-E Mounting-Springs



140055365  
LEDPanel-SI-E-Suspension-Kit

Mounting springs and suspension kit compatible with 140066707 and 542004008610 only.

### Technical Specifications

Lifespan (L70B50)	50.000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	85/120 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

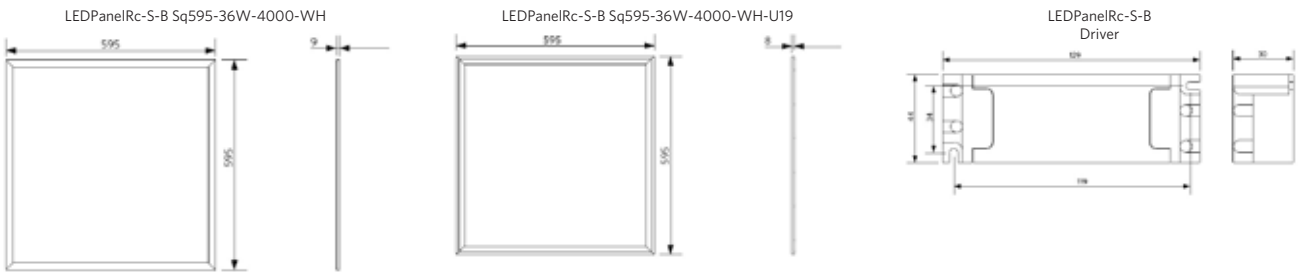
Material housing	Aluminium
Optical material	Polystyrene

### Ambient Conditions

Operating temperature	-10 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



### Dimensional Drawing (mm)



### Installation Opening Drawing (mm)

LEDPanelRc-S-B Sq595  
585 x 585





## LED Panel Suspended Zenith

- NEW: available as Smart Lighting solution (BLE)
- Special design luminaire distributes light both up and down, combining comfort and efficiency
- High lumen output and high efficacy up to 105 lm/W
- Light up your offices and meeting rooms in an architectural way

UGR19



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
140054053	LEDPanelSp-Z L1222-75W-DALI-3000-AL	TL 2x58W	75	7875	105	19	3000	3.90
140054054	LEDPanelSp-Z L1222-75W-DALI-4000-AL	TL 2x58W	75	7875	105	19	4000	3.90
542006001000	LEDPanelSp-Z L1222-75W-BLE-3000-AL	TL 2x58W	75	7875	105	19	3000	3.90
542006000900	LEDPanelSp-Z L1222-75W-BLE-4000-AL	TL 2x58W	75	7875	105	19	4000	3.90

All codes include the required suspension kit. Suspension length 2.5m  
Available on Request with 5- or 2+3 pole Wieland GST18i connector

### Technical Specifications

Lifespan (L70B50)	60,000 h
Lifespan (L80B50)	40,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	3
Dimmable	Yes (DALI)
Beam angle	112° up (50%) + down (50%)
Finishing	Aluminium
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

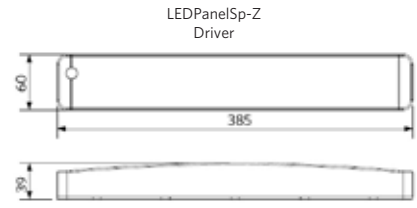
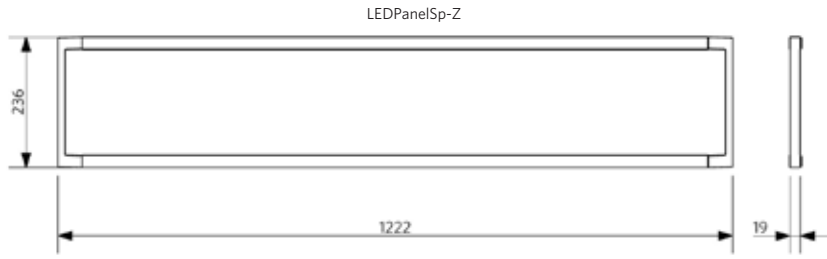
Material housing	Aluminium
Optical material	PMMA
Cover material	Semi-opaque PMMA

### Ambient Conditions

Operating temperature	-20 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



# Dimensional Drawing (mm)





## LED Downlight Performer HG

- Available as wireless Smart Lighting solution (BLE)
- Unique optical lens concept with high gloss (HG) reflector and low glare
- Low luminaire height (max 73mm)
- Direct replacement for compact fluorescent downlights - saving over 60% of energy costs
- IP44 (light output side)
- Provided with protective foil in order to protect the downlight against dust and dirt during the assembly
- Suitable for retrofitting due to various adapter ring sizes



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
140057154	LEDDownlightRc-P-HG R150-11.5W-3000	CFL 1x18W	11.5	1150	102	19	3000	0.45
140057155	LEDDownlightRc-P-HG R150-11.5W-4000	CFL 1x18W	11.5	1200	104	19	4000	0.45
140057152	LEDDownlightRc-P-HG R200-15W-3000	CFL 1x26W	15	1600	108	19	3000	0.76
140057153	LEDDownlightRc-P-HG R200-15W-4000	CFL 1x26W	15	1660	110	19	4000	0.76
140057156	LEDDownlightRc-P-HG R200-23W-3000	CFL 2x26W	23	2350	102	19	3000	0.76
140057157	LEDDownlightRc-P-HG R200-23W-4000	CFL 2x26W	23	2400	104	19	4000	0.76
140057158	LEDDownlightRc-P-HG R200-33W-3000	CFL 2x32W	33	3360	105	22	3000	0.76
140057159	LEDDownlightRc-P-HG R200-33W-4000	CFL 2x32W	33	3500	107	22	4000	0.76
140057162	LEDDownlightRc-P-HG R150-11.5W-DALI-3000	CFL 1x18W	11.5	1150	100	19	3000	0.45
140057163	LEDDownlightRc-P-HG R150-11.5W-DALI-4000	CFL 1x18W	11.5	1200	102	19	4000	0.45
140057160	LEDDownlightRc-P-HG R200-15W-DALI-3000	CFL 1x26W	15	1600	105	19	3000	0.76
140057161	LEDDownlightRc-P-HG R200-15W-DALI-4000	CFL 1x26W	15	1660	107	19	4000	0.76
140057164	LEDDownlightRc-P-HG R200-23W-DALI-3000	CFL 2x26W	23	2350	100	19	3000	0.76
140057165	LEDDownlightRc-P-HG R200-23W-DALI-4000	CFL 2x26W	23	2400	102	19	4000	0.76
140057166	LEDDownlightRc-P-HG R200-33W-DALI-3000	CFL 2x32W	33	3360	103	22	3000	0.76
140057167	LEDDownlightRc-P-HG R200-33W-DALI-4000	CFL 2x32W	33	3500	105	22	4000	0.76
140063611	LEDDownlightRc-P-HG R150-11.5W-BLE-3000	CFL 1x18W	11.5	1150	100	19	3000	0.45
140063612	LEDDownlightRc-P-HG R150-11.5W-BLE-4000	CFL 1x18W	11.5	1200	102	19	4000	0.45
140063613	LEDDownlightRc-P-HG R200-15W-BLE-3000	CFL 1x26W	15	1600	105	19	3000	0.76
140063614	LEDDownlightRc-P-HG R200-15W-BLE-4000	CFL 1x26W	15	1660	107	19	4000	0.76
140063615	LEDDownlightRc-P-HG R200-23W-BLE-3000	CFL 2x26W	23	2350	100	19	3000	0.76
140063616	LEDDownlightRc-P-HG R200-23W-BLE-4000	CFL 2x26W	23	2400	102	19	4000	0.76
140063617	LEDDownlightRc-P-HG R200-33W-BLE-3000	CFL 2x32W	33	3360	103	22	3000	0.76
140063618	LEDDownlightRc-P-HG R200-33W-BLE-4000	CFL 2x32W	33	3500	105	22	4000	0.76

Available on request with 5- or 2+3 pole Wieland GST18i connector. Emergency lighting available on request. BLE versions are not compatible with surface module accessories.



## Accessories



140060646  
LEDDownlightRc-P-HZ-Adapter-150-175

140060647  
LEDDownlightRc-P-SI-E-Adapter-200-225

140060648  
LEDDownlightRc-P-SI-E-Adapter-200-250



140061242  
LEDDownlightRc-P-R150-Surface-Module-WH

140061243  
LEDDownlightRc-P-R200-Surface-Module-WH

For adapter ring dimensional drawings see LED Downlight Slim EcoMax (p.22).

### Technical Specifications

Lifespan (L70B50)	60,000 h
Lifespan (L80B50)	40,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No / Yes (DALI/BLE)
Beam angle	70 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP44
IP recessed part	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0 / RG1 (23W & 33W)
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

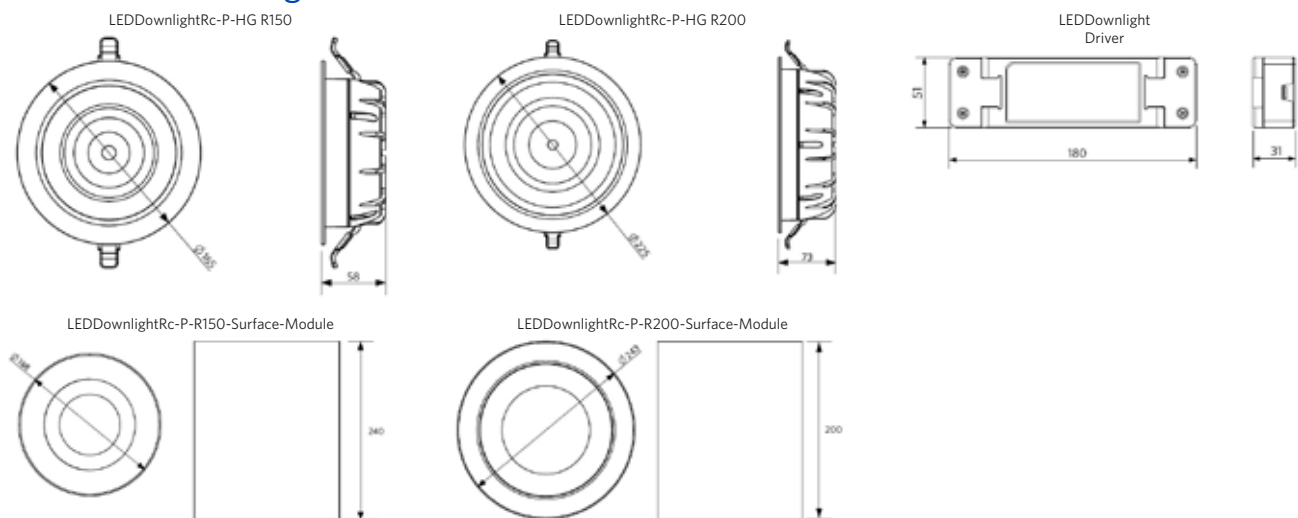
Material housing	Die-casted Aluminum
Optical material	Aluminum coated PC

### Ambient Conditions

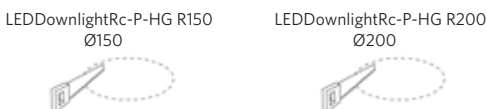
Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



## Installation Opening Drawing (mm)





## LED Downlight Performer MW

- Available as wireless Smart Lighting solution (BLE)
- Unique optical lens concept with matte white (MW) reflector and low glare
- Low luminaire height (max 73mm)
- Direct replacement for compact fluorescent downlights - saving over 60% of energy costs
- IP44 (light output side)
- Common cut-out diameters of 150mm and 200mm
- Provided with protective foil in order to protect the downlight against dust and dirt during the assembly



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)	Weight (kg/pc)
140057170	LEDDownlightRc-P-MW R150-11.5W-3000	CFL 1x18W	11.5	1150	102	22	3000	0.45
140057171	LEDDownlightRc-P-MW R150-11.5W-4000	CFL 1x18W	11.5	1200	104	22	4000	0.45
140057168	LEDDownlightRc-P-MW R200-15W-3000	CFL 1x26W	15	1600	108	19	3000	0.76
140057169	LEDDownlightRc-P-MW R200-15W-4000	CFL 1x26W	15	1660	110	19	4000	0.76
140057172	LEDDownlightRc-P-MW R200-23W-3000	CFL 2x26W	23	2350	102	22	3000	0.76
140057173	LEDDownlightRc-P-MW R200-23W-4000	CFL 2x26W	23	2400	104	22	4000	0.76
140057174	LEDDownlightRc-P-MW R200-33W-3000	CFL 2x32W	33	3360	105	22	3000	0.76
140057175	LEDDownlightRc-P-MW R200-33W-4000	CFL 2x32W	33	3500	107	22	4000	0.76
140057178	LEDDownlightRc-P-MW R150-11.5W-DALI-3000	CFL 1x18W	11.5	1150	100	22	3000	0.45
140057179	LEDDownlightRc-P-MW R150-11.5W-DALI-4000	CFL 1x18W	11.5	1200	102	22	4000	0.45
140057176	LEDDownlightRc-P-MW R200-15W-DALI-3000	CFL 1x26W	15	1600	105	19	3000	0.76
140057177	LEDDownlightRc-P-MW R200-15W-DALI-4000	CFL 1x26W	15	1660	107	19	4000	0.76
140057180	LEDDownlightRc-P-MW R200-23W-DALI-3000	CFL 2x26W	23	2350	100	22	3000	0.76
140057181	LEDDownlightRc-P-MW R200-23W-DALI-4000	CFL 2x26W	23	2400	102	22	4000	0.76
140057182	LEDDownlightRc-P-MW R200-33W-DALI-3000	CFL 2x32W	33	3360	103	22	3000	0.76
140057183	LEDDownlightRc-P-MW R200-33W-DALI-4000	CFL 2x32W	33	3500	105	22	4000	0.76
140063619	LEDDownlightRc-P-MW R150-11.5W-BLE-3000	CFL 1x18W	11.5	1150	100	19	3000	0.45
140063620	LEDDownlightRc-P-MW R150-11.5W-BLE-4000	CFL 1x18W	11.5	1200	102	19	4000	0.45
140063621	LEDDownlightRc-P-MW R200-15W-BLE-3000	CFL 1x26W	15	1600	105	19	3000	0.76
140063622	LEDDownlightRc-P-MW R200-15W-BLE-4000	CFL 1x26W	15	1660	107	19	4000	0.76
140063623	LEDDownlightRc-P-MW R200-23W-BLE-3000	CFL 2x26W	23	2350	100	19	3000	0.76
140063624	LEDDownlightRc-P-MW R200-23W-BLE-4000	CFL 2x26W	23	2400	102	19	4000	0.76
140063625	LEDDownlightRc-P-MW R200-33W-BLE-3000	CFL 2x32W	33	3360	103	22	3000	0.76
140063626	LEDDownlightRc-P-MW R200-33W-BLE-4000	CFL 2x32W	33	3500	105	22	4000	0.76

Available on request with 5- or 2+3 pole Wieland GST18i connector. Emergency lighting available on request. BLE versions are not compatible with surface module accessories.

## Accessories



140060646  
LEDDownlightRc-P-HZ-Adapter-150-175



140061242  
LEDDownlightRc-P-R150-Surface-Module-WH

140060647  
LEDDownlightRc-P-SI-E-Adapter-200-225

140061243  
LEDDownlightRc-P-R200-Surface-Module-WH

140060648  
LEDDownlightRc-P-SI-E-Adapter-200-250

For adapter ring dimensional drawings see LED Downlight Slim EcoMax.

### Technical Specifications

Lifespan (L70B50)	60,000 h
Lifespan (L80B50)	40,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No / Yes (DALI/BLE)
Beam angle	70 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP44
IP recessed part	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0 / RG1 (23W & 33W)
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

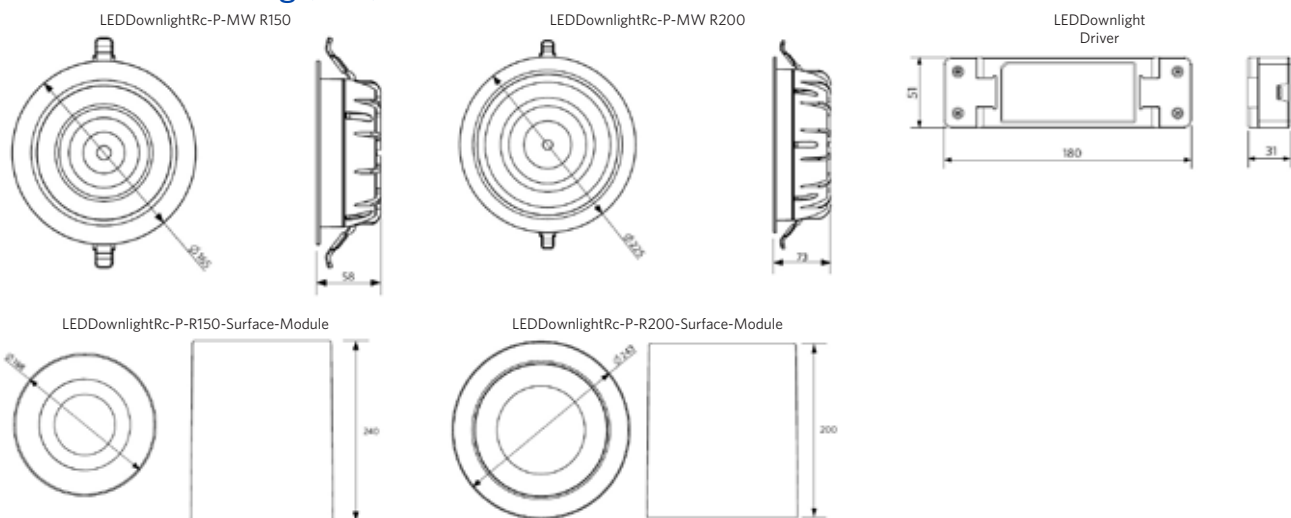
Material housing	Die-casted Aluminum
Optical material	Polycarbonate

### Ambient Conditions

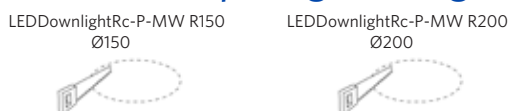
Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



## Installation Opening Drawing (mm)





LED Downlight HZ<sup>DIM</sup>

- Easy switching from CFL to LED – even when dimming is needed
- Integrated driver for easier installation
- High system efficacy up to 94 lm/W
- Lower energy and maintenance costs
- IP44 (light output side)
- Suitable for retrofitting due to available adapter ring sizes



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140051474	LEDDownlightRc-HZ R125-7W-Dim-3000-WH	CFL 1x13W	7	600	86	3000	0.17
140051475	LEDDownlightRc-HZ R125-7W-Dim-4000-WH	CFL 1x13W	7	600	86	4000	0.17
140051476	LEDDownlightRc-HZ R150-10W-Dim-3000-WH	CFL 1x18W	10	900	90	3000	0.25
140051477	LEDDownlightRc-HZ R150-10W-Dim-4000-WH	CFL 1x18W	10	900	90	4000	0.25
140051478	LEDDownlightRc-HZ R175-13W-Dim-3000-WH	CFL 1x26W	13	1200	92	3000	0.32
140051479	LEDDownlightRc-HZ R175-13W-Dim-4000-WH	CFL 1x26W	13	1200	92	4000	0.32
140051480	LEDDownlightRc-HZ R200-16W-Dim-3000-WH	CFL 1x26W	16	1500	94	3000	0.37
140051481	LEDDownlightRc-HZ R200-16W-Dim-4000-WH	CFL 1x26W	16	1500	94	4000	0.37

Available on request with 3- pole Wieland GST18i connector. See appendix 1 for dimmer compatibility list.

## Accessories



140060650  
LEDDownlightRc-HZdim-Adapter-125-150

140060646  
LEDDownlightRc-P-HZ-Adapter-150-175

140060651  
LEDDownlightRc-HZdim-Adapter-175-200

140060649  
LEDDownlightRc-HZdim-Adapter-200-250

140060652  
LEDDownlightRc-HZdim-Adapter-200-225

**Technical Specifications**

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	Yes (Triac)
Beam angle	110 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP44
IP recessed part	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

**Electrical Supply**

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

**Mechanical Properties**

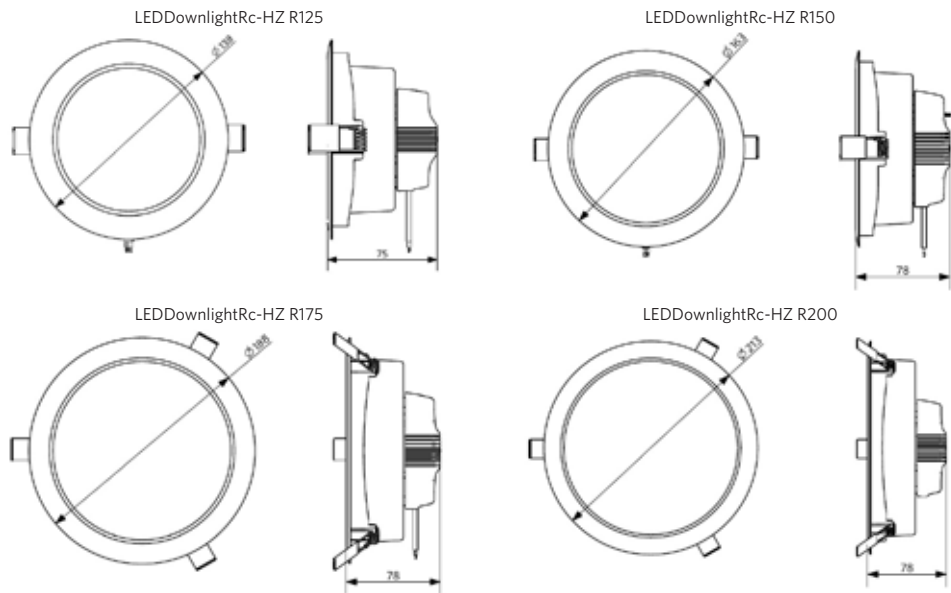
Material housing	Aluminum + Polycarbonate
Optical material	Polycarbonate

**Ambient Conditions**

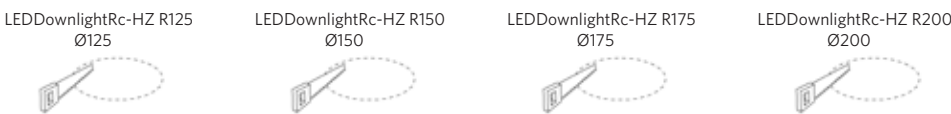
Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

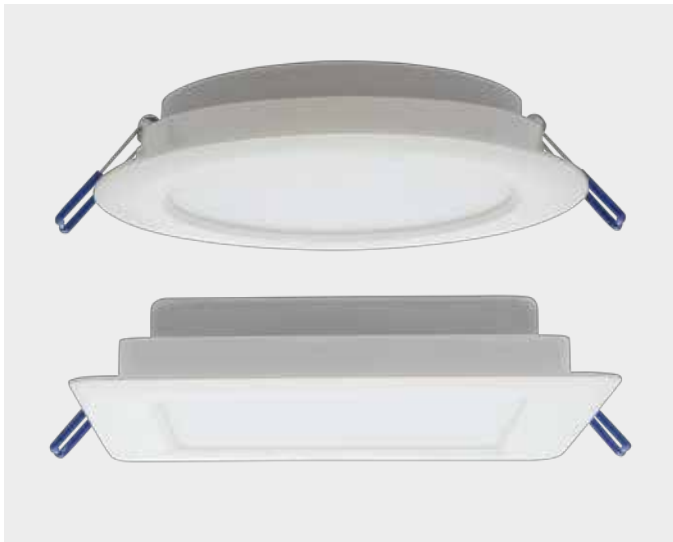


**Dimensional Drawing (mm)**



**Installation Opening Drawing (mm)**





## LED Downlight Slim EcoMax



- Very flat design, only 34mm height
- Available in both round and square version
- Integrated driver for easier installation
- Two lumen packages
- Efficacy up to 85 lm/W

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140056557	LEDDownlightRc-SI-E Rd150-12W-3000-WH	CFL 1x18W	12	1020	85	3000	0.25
140056558	LEDDownlightRc-SI-E Rd150-12W-4000-WH	CFL 1x18W	12	1020	85	4000	0.25
140056559	LEDDownlightRc-SI-E Rd200-24W-3000-WH	CFL 2x26W	24	2040	85	3000	0.41
140056560	LEDDownlightRc-SI-E Rd200-24W-4000-WH	CFL 2x26W	24	2040	85	4000	0.41
140056561	LEDDownlightRc-SI-E Sq150-12W-3000-WH	CFL 1x18W	12	1020	85	3000	0.24
140056562	LEDDownlightRc-SI-E Sq150-12W-4000-WH	CFL 1x18W	12	1020	85	4000	0.24
140056563	LEDDownlightRc-SI-E Sq200-24W-3000-WH	CFL 2x26W	24	2040	85	3000	0.55
140056564	LEDDownlightRc-SI-E Sq200-24W-4000-WH	CFL 2x26W	24	2040	85	4000	0.55

Available on request with 3- pole Wieland GST18i connector

## Accessories



140060653  
LEDDownlightRc-SI-E-Adapter-150-175

140060647  
LEDDownlightRc-P-SI-E-Adapter-200-225

140060648  
LEDDownlightRc-P-SI-E-Adapter-200-250

### Technical Specifications

Lifespan (L70B50)	40,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	3
Dimmable	No
Beam angle	112 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP44
IP recessed part	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

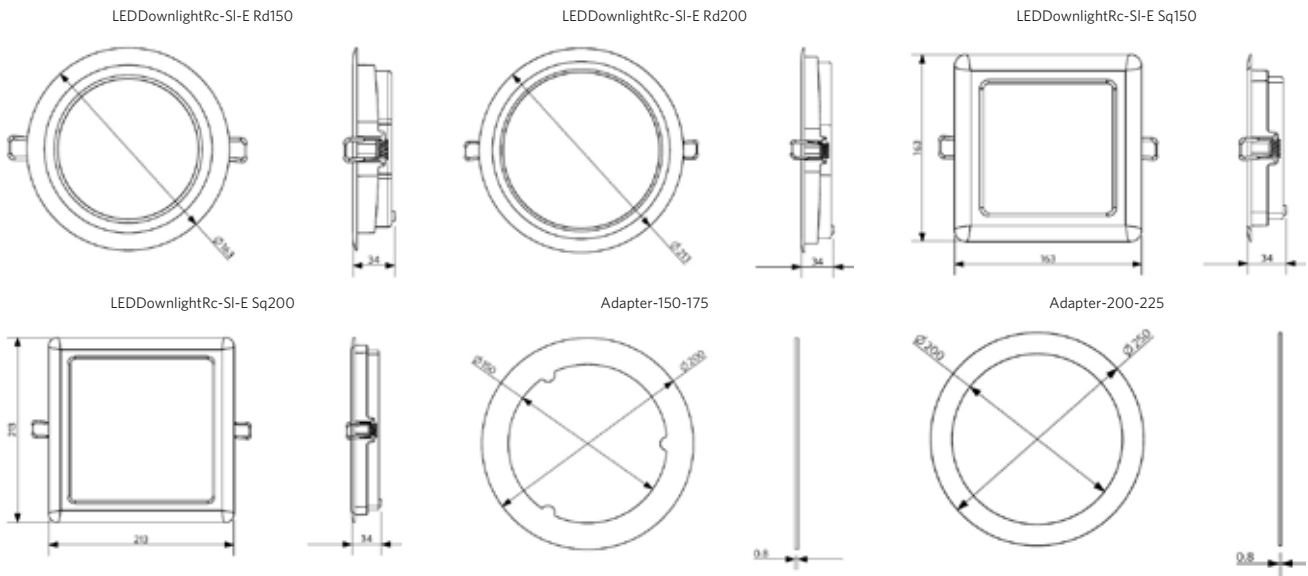
Material housing	Plastic
Optical material	Polycarbonate

### Ambient Conditions

Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



## Installation Opening Drawing (mm)





## LED Downlight Basic

- NEW: available in 3000K
- Suitable for recessed applications
- Replacement for conventional 1x18W or 2x26W CFL luminaires
- Energy saving up to 60%
- Flicker-free light with perfect uniformity
- Easy to install due to integrated LED driver



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
540001023800	LEDDownlightRc-B Rd150-12W-3000-WH	CFL 1x18W	12	930	79	3000	0.15
540001000510	LEDDownlightRc-B Rd150-12W-4000-WH	CFL 1x18W	12	960	80	4000	0.15
540001023700	LEDDownlightRc-B Rd200-22W-3000-WH	CFL 2x26W	22	1800	82	3000	0.25
540001000410	LEDDownlightRc-B Rd200-22W-4000-WH	CFL 2x26W	22	1870	85	4000	0.25

### Technical Specifications

Lifespan (L70B50)	30,000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	110 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	0.50

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Polycarbonate
Optical material	Polypropylene (PP)

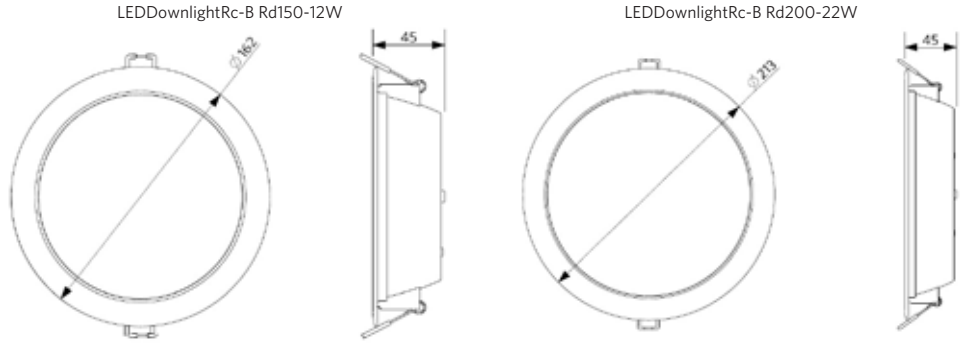
### Ambient Conditions

Operating temperature	-10 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

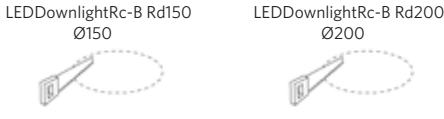




### Dimensional Drawing (mm)



### Installation Opening Drawing (mm)





## LED Smart Lighting

- NEW: Smart Relay to easily control multiple non-BLE luminaires
- NEW: LED Panel Zenith added to the Smart Lighting family
- Full wireless lighting control with Bluetooth Low Energy (BLE)
- Create dynamic office lighting, without extra control wires
- Extremely easy and quick installation, no control hardware/gateway required
- Maximum energy saving by using Smart Sensors
- Easy scene setting via free OPPL Smart Lighting App
- Maximum security by coded signals and strict user management



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	UGR	CCT (K)
140063557	LEDPanelRc-S Sq595-30W-BLE-3000-WH-U19	TL 4x18W	30	3300	110	19	3000
140063558	LEDPanelRc-S Sq595-30W-BLE-4000-WH-U19	TL 4x18W	30	3500	115	19	4000
140063554	LEDPanelRc-S Re295-30W-BLE-3000-WH-U19	TL 2x36W	30	3300	110	19	3000
140063555	LEDPanelRc-S Re295-30W-BLE-4000-WH-U19	TL 2x36W	30	3500	115	19	4000
542006001000	LEDPanelSp-Z L1222-75W-BLE-3000-AL	TL 2x58W	75	7875	105	19	3000
542006000900	LEDPanelSp-Z L1222-75W-BLE-4000-AL	TL 2x58W	75	7875	105	19	4000
140063611	LEDDownlightRc-P-HG R150-11.5W-BLE-3000	CFL 1x18W	11.5	1150	100	19	3000
140063612	LEDDownlightRc-P-HG R150-11.5W-BLE-4000	CFL 1x18W	11.5	1200	102	19	4000
140063613	LEDDownlightRc-P-HG R200-15W-BLE-3000	CFL 1x26W	15	1600	105	19	3000
140063614	LEDDownlightRc-P-HG R200-15W-BLE-4000	CFL 1x26W	15	1660	107	19	4000
140063615	LEDDownlightRc-P-HG R200-23W-BLE-3000	CFL 2x26W	23	2350	100	19	3000
140063616	LEDDownlightRc-P-HG R200-23W-BLE-4000	CFL 2x26W	23	2400	102	19	4000
140063617	LEDDownlightRc-P-HG R200-33W-BLE-3000	CFL 2x32W	33	3360	103	22	3000
140063618	LEDDownlightRc-P-HG R200-33W-BLE-4000	CFL 2x32W	33	3500	105	22	4000
140063619	LEDDownlightRc-P-MW R150-11.5W-BLE-3000	CFL 1x18W	11.5	1150	100	19	3000
140063620	LEDDownlightRc-P-MW R150-11.5W-BLE-4000	CFL 1x18W	11.5	1200	102	19	4000
140063621	LEDDownlightRc-P-MW R200-15W-BLE-3000	CFL 1x26W	15	1600	105	19	3000
140063622	LEDDownlightRc-P-MW R200-15W-BLE-4000	CFL 1x26W	15	1660	107	19	4000
140063623	LEDDownlightRc-P-MW R200-23W-BLE-3000	CFL 2x26W	23	2350	100	19	3000
140063624	LEDDownlightRc-P-MW R200-23W-BLE-4000	CFL 2x26W	23	2400	102	19	4000
140063625	LEDDownlightRc-P-MW R200-33W-BLE-3000	CFL 2x32W	33	3360	103	22	3000
140063626	LEDDownlightRc-P-MW R200-33W-BLE-4000	CFL 2x32W	33	3500	105	22	4000

## Accessories



140063563  
LEDsmartlight-Rc-Sensor



140063564  
LEDsmartlight-Switch

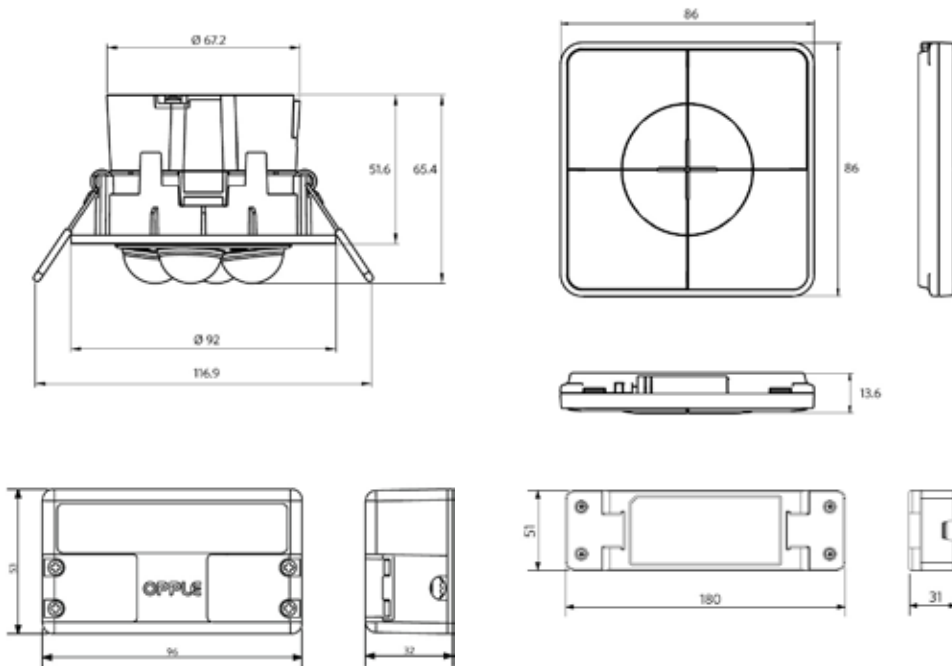


506006003100  
LEDsmart-Relay-500W



Sensor range:10m

## Dimensional Drawing (mm)



## Installation Opening Drawing (mm)

LEDsmartlight-Rc-Sensor  
 $\varnothing 76$





## LED Spot Performer 3C

- Attractive design with basic cylinder and box shapes fit easily into shop architectures
- High lumen packages with high efficacy: up to 3,600 lm and 85 lm/W (CRI 90)
- Equipped with original Global track adapters
- Fitting common Global/Nordic Aluminium® 3C tracks - and many other standard types
- Low glare due to matte black anti-glare ring
- Available in matte white (WH) and matte black (BL) versions
- High cost savings due to long lifetime (no lamp replacement)



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140054439	LEDSpot3C-P 30W-3000-40D-WH	HID 50W	30	2400	80	3000	40 °	1.20
140054443	LEDSpot3C-P 30W-3000-40D-BL	HID 50W	30	2400	80	3000	40 °	1.20
140054447	LEDSpot3C-P 30W-4000-40D-WH	HID 50W	30	2550	85	4000	40 °	1.20
140054451	LEDSpot3C-P 30W-4000-40D-BL	HID 50W	30	2550	85	4000	40 °	1.20
140058472	LEDSpot3C-P 45W-3000-36D-WH	HID 70W	45	3375	75	3000	36 °	1.60
140058476	LEDSpot3C-P 45W-3000-36D-BL	HID 70W	45	3375	75	3000	36 °	1.60
140058480	LEDSpot3C-P 45W-4000-36D-WH	HID 70W	45	3600	80	4000	36 °	1.60
140058484	LEDSpot3C-P 45W-4000-36D-BL	HID 70W	45	3600	80	4000	36 °	1.60

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Maximum tilt angle	90 °
Finishing	Matte white, matte black anti-glare ring / Matte Black, Matte Black anti-glare ring
Colour rendering index CRI	≥ 90
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	I
Risk group	RG1
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Die-casted Aluminum
Optical material	Polycarbonate
Lens material	Plastic (PC)

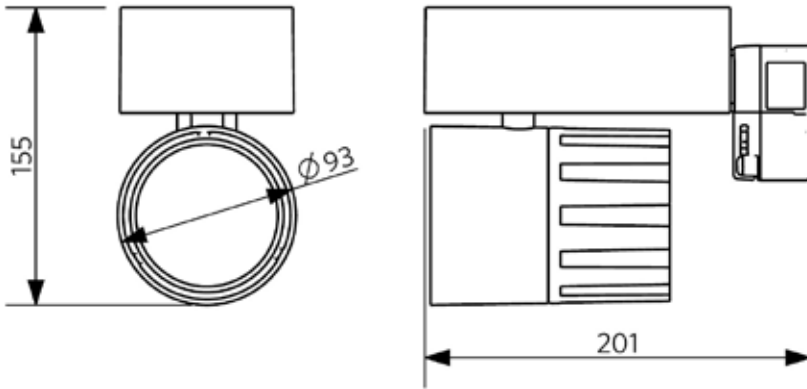
### Ambient Conditions

Operating temperature	-25 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

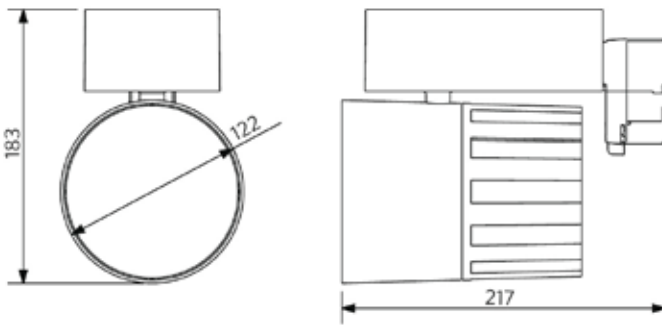


# Dimensional Drawing (mm)

LEDspot3C-P 30W



LEDspot3C-P 45W





## LED Spot Performer RA

- High lumen packages with high efficacy: up to 3,600 lm and 85 lm/W
- Tilttable
- Low glare due to matte black anti-glare ring
- Multiple beam angles and DALI versions available
- DALI versions available



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140054455	LEDSpotRA-P 30W-3000-40D-WH	HID 35W	30	2400	80	3000	40 °	0.90
140054459	LEDSpotRA-P 30W-4000-40D-WH	HID 35W	30	2550	85	4000	40 °	0.90
140058488	LEDSpotRA-P 45W-3000-36D-WH	HID 50W	45	3375	75	3000	36 °	1.30
140058492	LEDSpotRA-P 45W-4000-36D-WH	HID 50W	45	3600	80	4000	36 °	1.30
140063683	LEDSpotRA-P 30W-3000-40D-WH-DALI	HID 35W	30	2400	80	3000	40 °	0.88
140063687	LEDSpotRA-P 30W-4000-40D-WH-DALI	HID 35W	30	2550	85	4000	40 °	0.88
140063707	LEDSpotRA-P 45W-3000-36D-WH-DALI	HID 50W	45	3375	75	3000	36 °	1.33
140063711	LEDSpotRA-P 45W-4000-36D-WH-DALI	HID 50W	45	3600	80	4000	36 °	1.33

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No / Yes (DALI)
Maximum tilt angle	20 °
Finishing	Matte white, matte black anti-glare ring
Colour rendering index CRI	≥ 90
UGR	19
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	II
Risk group	RG1
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

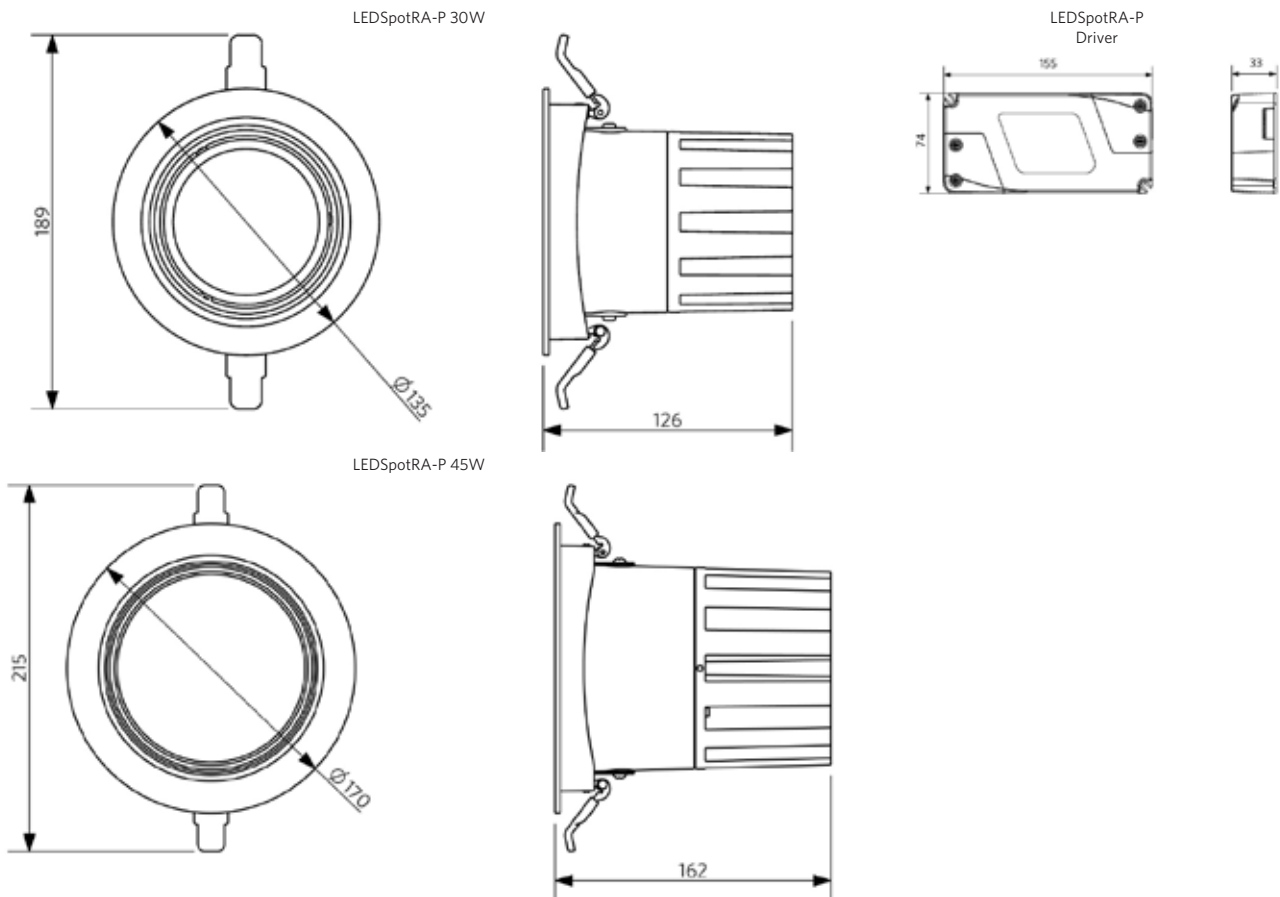
Material housing	Die-casted Aluminum
Optical material	Polycarbonate
Lens material	Polycarbonate

### Ambient Conditions

Operating temperature	-25 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



## Installation Opening Drawing (mm)





## LED Spot Round Adjustable HQ

- Attractive luminaire design with comfortable light beam
- Up to 85% lower energy consumption than halogen spotlights
- Unique light mixing technique and optics design, UGR16
- Good beam orientation adjustment, providing great flexibility
- Full IP44 solution, including IP44 LED-driver
- Available in white and aluminum with light colors 2700K, 3000K and 4000K



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140044423	LEDSpotRA-HQ 7W-Dim-2700-40D-WH-CT	Halogen 35W	7	400	57	2700	0.19
140044096	LEDSpotRA-HQ 7W-Dim-3000-40D-WH-CT	Halogen 35W	7	420	60	3000	0.19
140044100	LEDSpotRA-HQ 7W-Dim-4000-40D-WH-CT	Halogen 35W	7	450	64	4000	0.19
140044419	LEDSpotRA-HQ 7W-Dim-2700-40D-AL-CT	Halogen 35W	7	400	57	2700	0.19
140044080	LEDSpotRA-HQ 7W-Dim-3000-40D-AL-CT	Halogen 35W	7	420	60	3000	0.19
140044084	LEDSpotRA-HQ 7W-Dim-4000-40D-AL-CT	Halogen 35W	7	450	64	4000	0.19
140061281	LEDSpotRA HQ2 8W-Dim-2700-40D-WH-IP44	Halogen 50W	8	600	75	2700	0.40
140061282	LEDSpotRA HQ2 8W-Dim-3000-40D-WH-IP44	Halogen 50W	8	600	75	3000	0.40
140061283	LEDSpotRA HQ2 8W-Dim-4000-40D-WH-IP44	Halogen 50W	8	600	75	4000	0.40
140061278	LEDSpotRA HQ2 8W-Dim-2700-40D-AL-IP44	Halogen 50W	8	600	75	2700	0.40
140061279	LEDSpotRA HQ2 8W-Dim-3000-40D-AL-IP44	Halogen 50W	8	600	75	3000	0.40
140061280	LEDSpotRA HQ2 8W-Dim-4000-40D-AL-IP44	Halogen 50W	8	600	75	4000	0.40

See appendix 1 for dimmer compatibility list



### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	Yes (Triac)
Beam angle	40 °
Maximum tilt angle	23 °
Finishing	White RAL9003 / Brushed Aluminum RAL 9022
Colour rendering index CRI	≥ 80
UGR	16
Degree of protection (IP)	IP20 / IP44
Impact strength	IK02
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

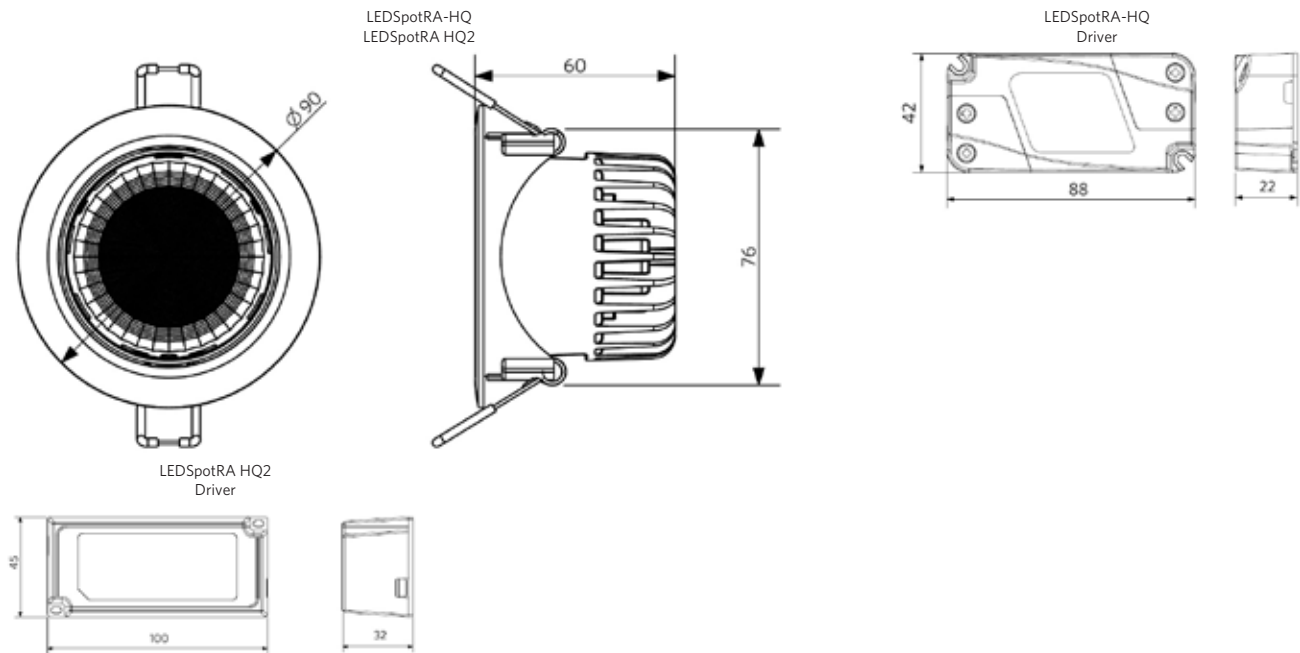
Material housing	Aluminum + Polycarbonate
Optical material	Polycarbonate

### Ambient Conditions

Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



### Dimensional Drawing (mm)



### Installation Opening Drawing (mm)

LEDSpotRA-HQ  
LEDSpotRA HQ2  
Ø80





## LED Spot EcoMax

- Fixed spotlight range with universal 68 mm cut-out
- Direct replacement for majority of halogen spotlights
- Over 85% savings of energy costs compared to halogen 35W and 50W
- Available in matte white and brushed aluminium finishes
- Can be used in e.g. bathrooms and related environments



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140054076	LEDspotRF-E 4.5W-2700-36D-AL-CT	Halogen 35W	4.5	330	73	2700	36°	0.08
140054077	LEDspotRF-E 4.5W-4000-36D-AL-CT	Halogen 35W	4.5	350	78	4000	36°	0.08
140054078	LEDspotRF-E 4.5W-2700-36D-WH-CT	Halogen 35W	4.5	330	73	2700	36°	0.08
140054079	LEDspotRF-E 4.5W-4000-36D-WH-CT	Halogen 35W	4.5	350	78	4000	36°	0.08
140055457	LEDspotRF-E 7W-2700-36D-AL	Halogen 50W	7	510	73	2700	36°	0.08
140055458	LEDspotRF-E 7W-4000-36D-AL	Halogen 50W	7	530	76	4000	36°	0.08
140055459	LEDspotRF-E 7W-2700-36D-WH	Halogen 50W	7	510	73	2700	36°	0.08
140055460	LEDspotRF-E 7W-4000-36D-WH	Halogen 50W	7	530	76	4000	36°	0.08

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	Brushed aluminum front, matte black back / Matte white
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP44
IP recessed part	IP20
Impact strength	IK02
Protection class	II
Risk group	RGO
Control gear included	Yes
Glow wire test	850 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Aluminium
Optical material	Polycarbonate

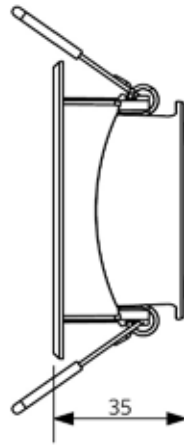
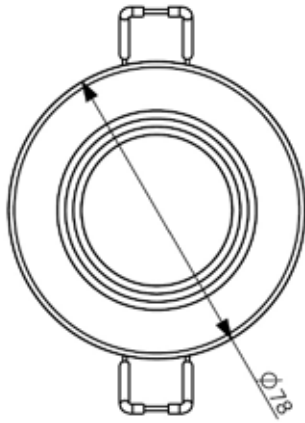
### Ambient Conditions

Operating temperature	-25 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)

LEDspotRF-E



## Installation Opening Drawing (mm)

LEDspotRF-E  
Ø68





## LED Recessed Spot Ava

- Energy saving up to 80% in comparison to a traditional light source
- Tilttable, also for IP44 versions
- Beam angle of 30° creates a perfect accent light
- Warm white light (2700K)
- Available in matte white (MW) and brushed aluminium (BA) finishes



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Energy Level	Weight (kg/pc)
140049619	LED HRS 7W Dim 2700K 30D Ava MW CT	Halogen 35W	7	310	44	2700	30 °	A	0.20
140049621	LED HRS 7W Dim 2700K 30D Ava BA CT	Halogen 35W	7	310	44	2700	30 °	A	0.20
140049625	LED HRS 9W Dim 2700K 30D Ava MW CT	Halogen 50W	9	430	47	2700	30 °	A	0.29
140049627	LED HRS 9W Dim 2700K 30D Ava BA CT	Halogen 50W	9	430	47	2700	30 °	A	0.29
140058060	LED HRS 7W Dim 2700K 30D Ava IP44 BA	Halogen 35W	7	330	50	2700	30 °	A	0.34
140058061	LED HRS 7W Dim 2700K 30D Ava IP44 MW	Halogen 35W	7	330	50	2700	30 °	A	0.34

See appendix 1 for dimmer compatibility list

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	50,000
Dimmable	Yes (Triac)
Maximum tilt angle	25 °
Finishing	Brushed Aluminum / Matte white
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20 / IP44
Protection class	II
Control gear included	Yes

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

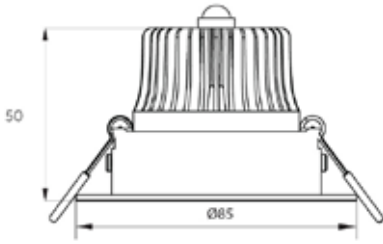
### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

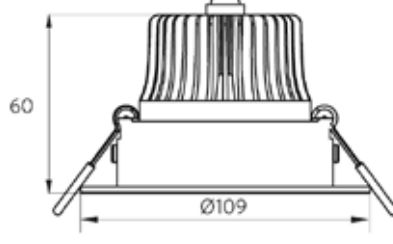


## Dimensional Drawing (mm)

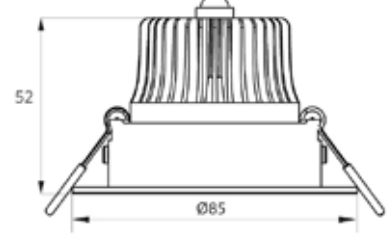
LED HRS 7W Dim 2700K 30D Ava



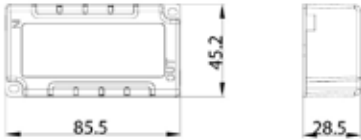
LED HRS 9W Dim 2700K 30D Ava



LED HRS 7W Dim 2700K 30D Ava IP44



LED HRS 7W Dim 2700K 30D Ava  
Driver



## Installation Opening Drawing (mm)

LED HRS 7W Dim 2700K 30D Ava  
Ø68-76



LED HRS 9W Dim 2700K 30D Ava  
Ø95





## LED Ceiling Light Apollo

- NEW: 22W dimmable version available
- NEW: bracket accessory for easy mounting on existing installations (no new screw holes needed)
- Easy installation on wall or ceiling
- LED Module Clio inside (12W and 16W)
- Uniform, diffused light, creating a pleasant atmosphere
- IP44 versions also suitable for bathrooms and comparable spaces
- Energy saving up to 80% in comparison to a traditional light source



## Specifications

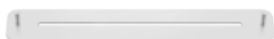
Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
520020000100	LED HC300 12W 2700K Apollo III	GLS 75W	12	1000	83	2700	A+	0.43
520020000200	LED HC300 12W 4000K Apollo III	GLS 75W	12	1100	91	4000	A+	0.43
520021000300	LED HC350 16W 2700K IP44 Apollo III	GLS 100W	16	1300	81	2700	A+	0.59
520021000400	LED HC350 16W 4000K IP44 Apollo III	GLS 100W	16	1400	87	4000	A+	0.59
520021000700	LED HC350 22W DIM 2700K IP44 Apollo	GLS 100W	22	1500	68	2700	A+	0.59
520021000800	LED HC350 22W DIM 4000K IP44 Apollo	GLS 100W	22	1600	73	4000	A+	0.59

See appendix 1 for dimmer compatibility list

## Accessories



140060553  
LED Module sensor CT



520098000200  
LED Apollo HC300 bracket

Sensor only compatible with 12W and 16W versions. Sensor range 12m.  
Bracket accessory only compatible with 12W versions.

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	100,000
Dimmable	No / Yes (DIM)
Beam angle	120 °
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20 / IP44
Protection class	I
Risk group	RG0
Control gear included	Yes

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V
	AC
DC input voltage	No

### Mechanical Properties

Material housing	Steel
Optical material	Polycarbonate

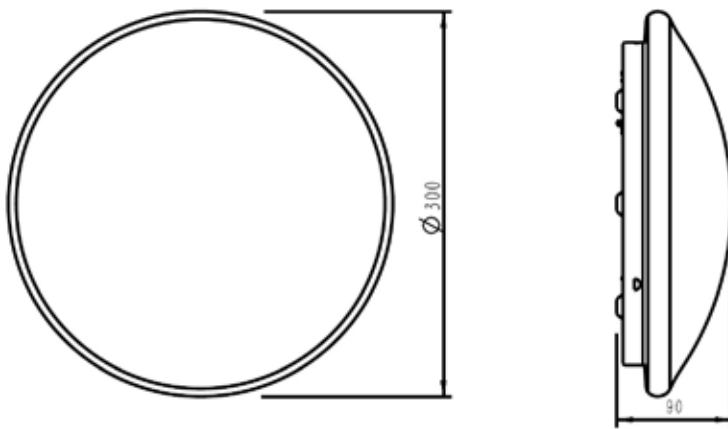
### Ambient Conditions

Operating temperature	-20 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

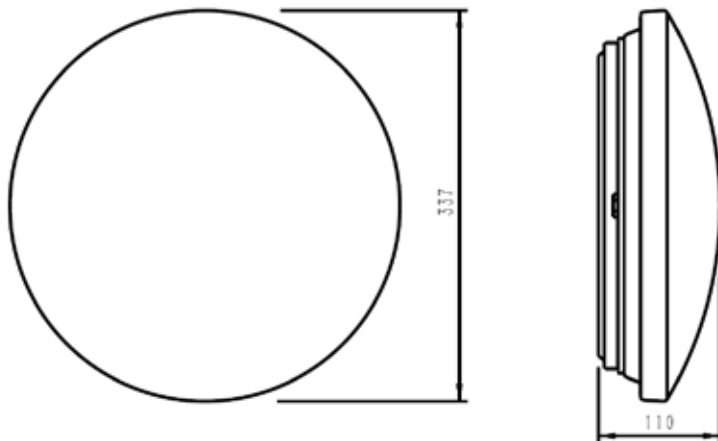


## Dimensional Drawing (mm)

LED HC300 12W



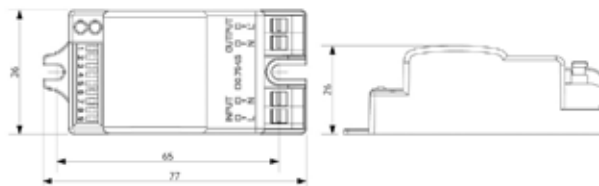
LED HC350 16W  
LED HC350 22W



LED Apollo HC300 bracket



LED Module sensor CT





## LED Ceiling Light Doris

- 2 in 1, ceiling light & recessed downlight
- Easy installation
- Uniform, diffused light, creating a pleasant atmosphere
- Provides instant light from the first second
- Choice of warm white light (2700K) and neutral white light (4000K)
- Energy saving up to 80% in comparison to a traditional light source

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140044147	LED HC140 8W 2700K Doris MW CT	GLS 60W	8	600	75	2700	A	0.35
140044149	LED HC140 8W 2700K Doris BS CT	GLS 60W	8	600	75	2700	A	0.35
140044151	LED HC230 14W 2700K Doris MW CT	GLS 100W	14	1200	86	2700	A	0.69
140044153	LED HC230 14W 2700K Doris BS CT	GLS 100W	14	1200	86	2700	A	0.69
140044152	LED HC230 14W 4000K Doris MW CT	GLS 100W	14	1200	86	4000	A	0.69

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	50,000
Dimmable	No
Beam angle	115 °
Finishing	Brushed Steel / Matte white
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Control gear included	No

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-224 V AC
DC input voltage	No

### Ambient Conditions

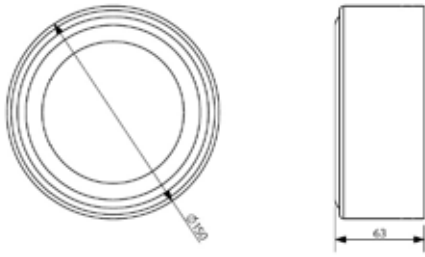
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



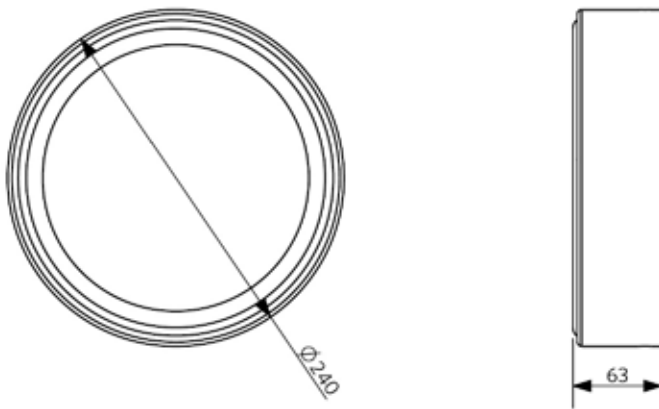


## Dimensional Drawing (mm)

LED HC140 8W



LED HC230 14W



## Installation Opening Drawing (mm)

LED HC140 8W  
 $\text{Ø}125$



LED HC230 14W  
 $\text{Ø}215$





## LED Ceiling Light Pallas

- 2 in 1, ceiling light & recessed downlight
- Easy installation
- Uniform, diffused light, creating a pleasant atmosphere
- Provides instant light from the first second
- Choice of warm white light (2700K) and neutral white light (4000K)
- Energy saving up to 80% in comparison to a traditional light source

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140044155	LED HC1818 11W 2700K Pallas MW CT	CFL 1x18W	11	900	82	2700	A	0.62
140044157	LED HC1818 11W 2700K Pallas BS CT	CFL 1x18W	11	900	82	2700	A	0.62
140044159	LED HC2323 12W 2700K Pallas MW CT	CFL 1x18W	12	1050	88	2700	A	0.88
140044161	LED HC2323 12W 2700K Pallas BS CT	CFL 1x18W	12	1050	88	2700	A	0.88
140044160	LED HC2323 12W 4000K Pallas MW CT	CFL 1x18W	12	1050	88	4000	A	0.88

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	50,000
Dimmable	No
Beam angle	115 °
Finishing	Brushed Steel / Matte white
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Control gear included	Yes

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-230 V AC
DC input voltage	No

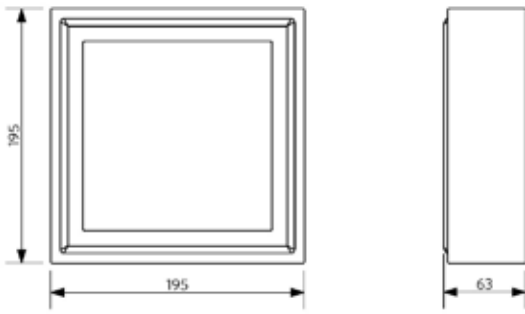
### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

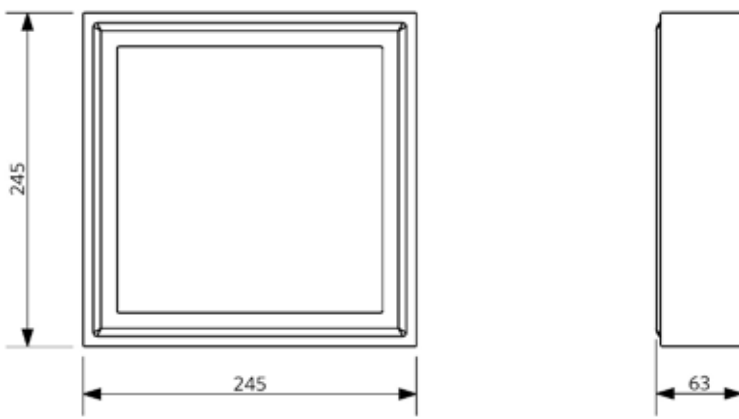


## Dimensional Drawing (mm)

LED HC1818 11W



LED HC2323 12W



## Installation Opening Drawing (mm)

LED HC1818 11W  
170 x 170



LED HC2323 12W  
220 x 220





## LED T8 Batten

- Plug & play installation
- High lumen efficiency up to 105 lm/w
- Delivered with clips for surface mounted installation
- Suspension possible with separate accessory kit
- Mechanically connect multiple luminaires via connector accessory
- Energy saving up to 55%



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140063301	LED T8 Batten 600mm 19W 3000K CT	TL 2x18W	19	1800	95	3000	0.29
140063302	LED T8 Batten 600mm 19W 4000K CT	TL 2x18W	19	1900	100	4000	0.29
140063303	LED T8 Batten 600mm 19W 6500K CT	TL 2x18W	19	1900	100	6500	0.29
140063304	LED T8 Batten 1200mm 38W 3000K CT	TL 2x36W	38	3800	100	3000	0.47
140063305	LED T8 Batten 1200mm 38W 4000K CT	TL 2x36W	38	4000	105	4000	0.47
140063306	LED T8 Batten 1200mm 38W 6500K CT	TL 2x36W	38	4000	105	6500	0.47

## Accessories



140063307  
LED T8 Batten connector



140063308  
LED T8 Batten suspension Kit

### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	120 °
Finishing	White
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	I
Risk group	RG0
Control gear included	Yes
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Mechanical Properties

Material housing	Aluminium
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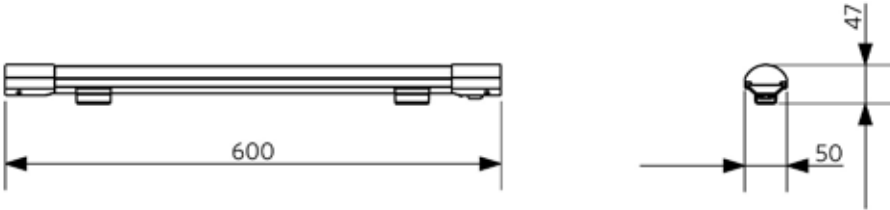
### Ambient Conditions

Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



# Dimensional Drawing (mm)

LED T8 Batten 600mm 19W



LED T8 Batten 1200mm 38W





## LED T5 Batten EcoMax

- Uniform, diffused light, creating a pleasant atmosphere
- Trailing edge dimmable
- Up to 50% lower energy consumption
- Battens connect up to 15 meters
- Incl. power cable, mounting and connection pieces (fixed and flexible)
- With transparent end caps



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140043898	LED E T5 batten 600 9W 800lm 3000K CT	TL 1x18W	9	800	89	3000	A+	0.14
140043899	LED E T5 batten 600 9W 800lm 4000K CT	TL 1x18W	9	800	89	4000	A+	0.14
140043900	LED E T5 batten 1200 18W 1600lm 3000K CT	TL 1x36W	18	1600	89	3000	A+	0.24
140043901	LED E T5 batten 1200 18W 1600lm 4000K CT	TL 1x36W	18	1600	89	4000	A+	0.24
140062784	LED P T5 batten 600 9W DIM 3000K CT	TL 1x18W	9	1000	111	3000	A+	0.29
140062783	LED P T5 batten 600 9W DIM 4000K CT	TL 1x18W	9	1000	111	4000	A+	0.29
140062786	LED P T5 batten 1200 18W DIM 3000K CT	TL 1x36W	18	2000	111	3000	A+	0.41
140062785	LED P T5 batten 1200 18W DIM 4000K CT	TL 1x36W	18	2000	111	4000	A+	0.41

See appendix 1 for dimmer compatibility list.

Technical Specifications	
Lifespan (L70B50)	40,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Dimmable	No / Yes (DIM)
Beam angle	140 °
Finishing	White
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Risk group	RG0
Control gear included	Yes
Power factor	≥ 0.90

Electrical Supply	
Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

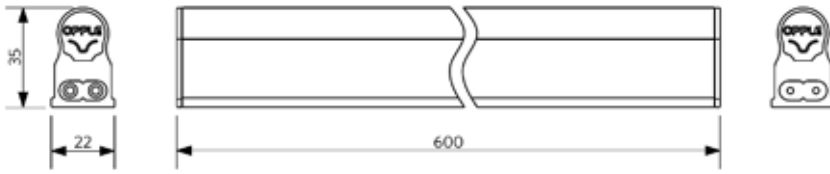
Mechanical Properties	
Material housing	Polycarbonate

Ambient Conditions	
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

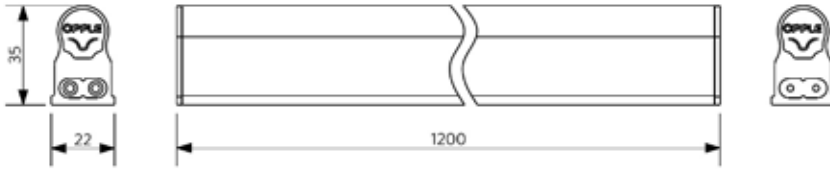


## Dimensional Drawing (mm)

LED E T5 batten 600  
LED P T5 batten 600



LED E T5 batten 1200  
LED P T5 batten 1200





## LED T5 Batten S with switch

- Uniform, diffused light, creating a pleasant atmosphere
- Available in 300, 600, 900 and 1200 mm
- Battens connect up to 15 meters
- Incl. power cable, mounting and connection pieces (fixed and flexible)
- Including integrated switch
- Energy saving up to 50%

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140043904	LED E T5 batten 300 4.5W S 3000K BL	TL 1x9W	4.5	400	89	3000	A+	0.08
140044077	LED E T5 batten 300 4.5W S 4000K BL	TL 1x9W	4.5	400	89	4000	A+	0.08
140043903	LED E T5 batten 600 9W S 3000K BL	TL 1x18W	9	800	89	3000	A+	0.14
140044076	LED E T5 batten 600 9W S 4000K BL	TL 1x18W	9	800	89	4000	A+	0.14
140043902	LED E T5 batten 900 11W S 3000K BL	TL 1x18W	11	950	86	3000	A+	0.19
140044075	LED E T5 batten 900 11W S 4000K BL	TL 1x18W	11	950	86	4000	A+	0.19
140044293	LED E T5 batten 1200 13W S 3000K BL	TL 1x30W	13	1200	92	3000	A+	0.25
140044292	LED E T5 batten 1200 13W S 4000K BL	TL 1x30W	13	1200	92	4000	A+	0.25

### Technical Specifications

Lifespan (L70B50)	40,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	140 °
Finishing	White
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Risk group	RG0
Control gear included	Yes
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Mechanical Properties

Material housing	Polycarbonate
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### Ambient Conditions

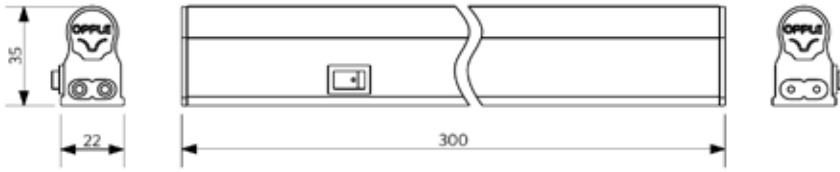
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



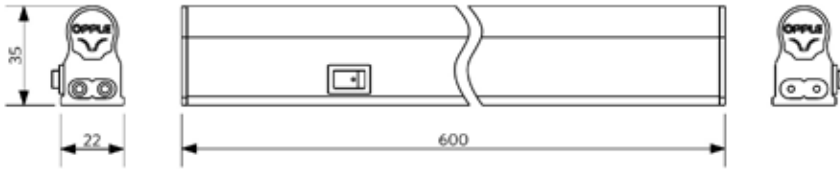


# Dimensional Drawing (mm)

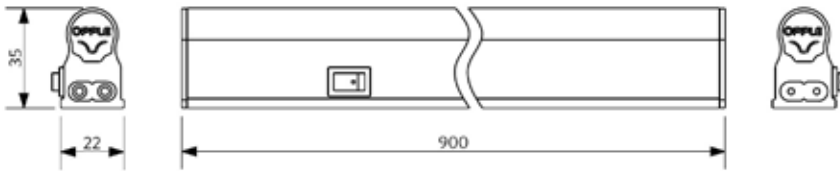
LED E T5 batten 300



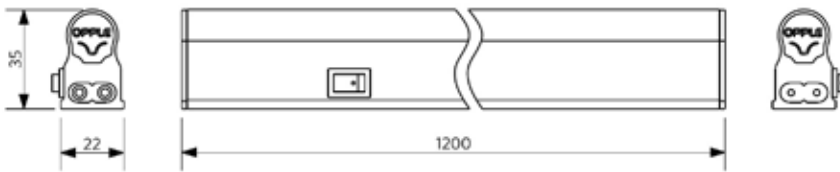
LED E T5 batten 600



LED E T5 batten 900



LED E T5 batten 1200





## LED Lowbay

- NEW: 80W versions available
- Stylish solution for medium high ceilings in retail and industry
- High efficacy up to 100lm/W
- Up to 50% energy saving compared to HID solutions
- Multiple beam angles available



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
545002000600	LEDLowbay-E 30W-4000-60D	CFL 2x26W	30	3000	100	4000	60 °	0.54
545002000500	LEDLowbay-E 30W-4000-120D	CFL 2x26W	30	3000	100	4000	120 °	0.65
545002000400	LEDLowbay-E 50W-4000-60D	HID 70W	50	5000	100	4000	60 °	1.03
545002000300	LEDLowbay-E 50W-4000-120D	HID 70W	50	5000	100	4000	120 °	1.14
545002000200	LEDLowbay-E 80W-4000-60D	HID 100W	80	7200	90	4000	60 °	1.70
545002000100	LEDLowbay-E 80W-4000-90D	HID 100W	80	8000	100	4000	90 °	1.70

### Technical Specifications

Lifespan (L70B50)	60,000 h
Lifespan (L80B50)	40,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	Silver
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK03
Protection class	I
Risk group	RG1
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	0.95

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Aluminium
Optical material	Polycarbonate

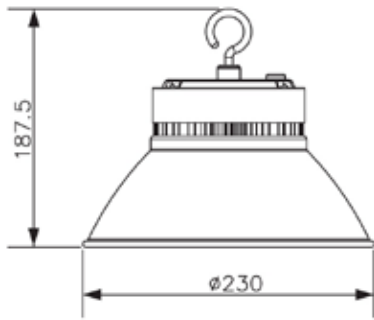
### Ambient Conditions

Operating temperature	-20 ~ 45 °C
Application temperature	25 °C
Storage environment	-30 ~ 50 °C

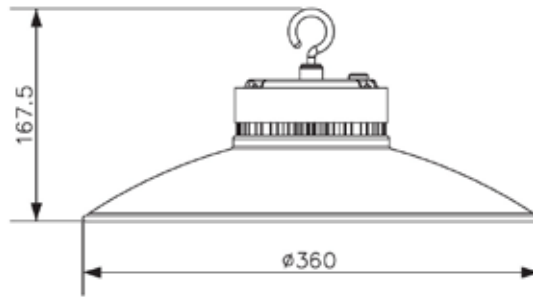


## Dimensional Drawing (mm)

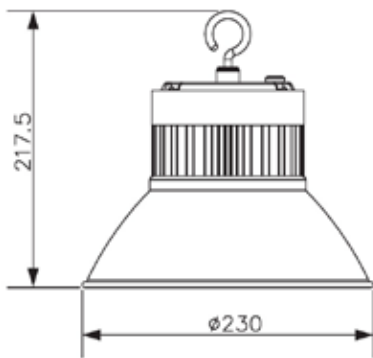
LEDLowbay-E 30W-4000-60D



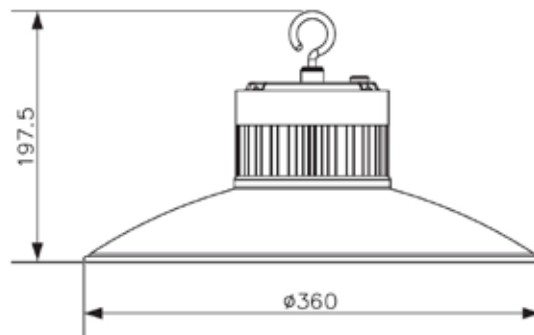
LEDLowbay-E 30W-4000-120D



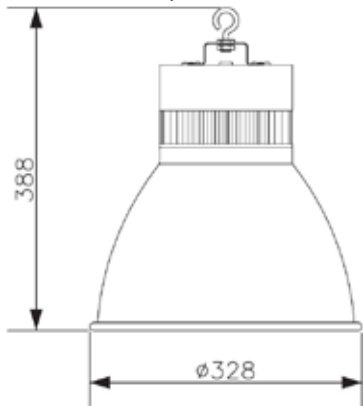
LEDLowbay-E 50W-4000-60D



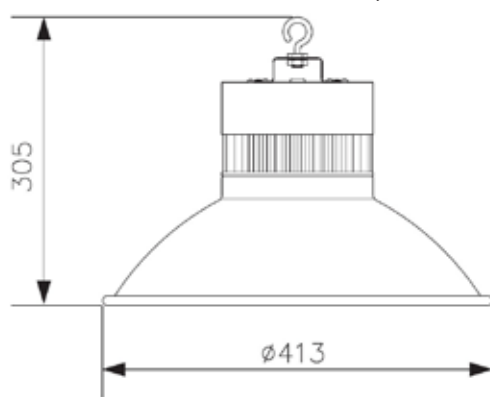
LEDLowbay-E 50W-4000-120D



LEDLowbay-E 80W-4000-60D



LEDLowbay-E 80W-4000-90D





## LED Highbay Performer G4

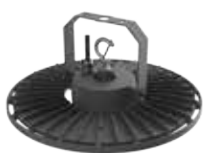
- Advanced ultra slim design
- High efficiency of 130 lm/W
- Up to 40% weight reduction compared to Highbay Performer G3
- Multiple beam angles and DALI versions available
- Equipped with IP68 connector
- Fit for surface mounting by use of bracket accessory



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
545001001000	LEDHighbay-P4 230W-4000-60D	HID 600W	230	30000	130	4000	60 °	3.10
545001000900	LEDHighbay-P4 230W-4000-100D	HID 600W	230	30000	130	4000	100 °	3.10
545001001500	LEDHighbay-P4 230W-DALI-4000-60D	HID 600W	230	30000	130	4000	60 °	3.20
545001001600	LEDHighbay-P4 230W-DALI-4000-100D	HID 600W	230	30000	130	4000	100 °	3.20

## Accessories



545098000600  
LEDHighbay-P4 Bracket-D420



140044049  
LEDHighbay-POLE-CT

### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	5
Dimmable	No / Yes (DALI)
Finishing	Grey 417U
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I
Risk group	RG1
Control gear included	Yes
Glow wire test	850 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90
Surge protection	4 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

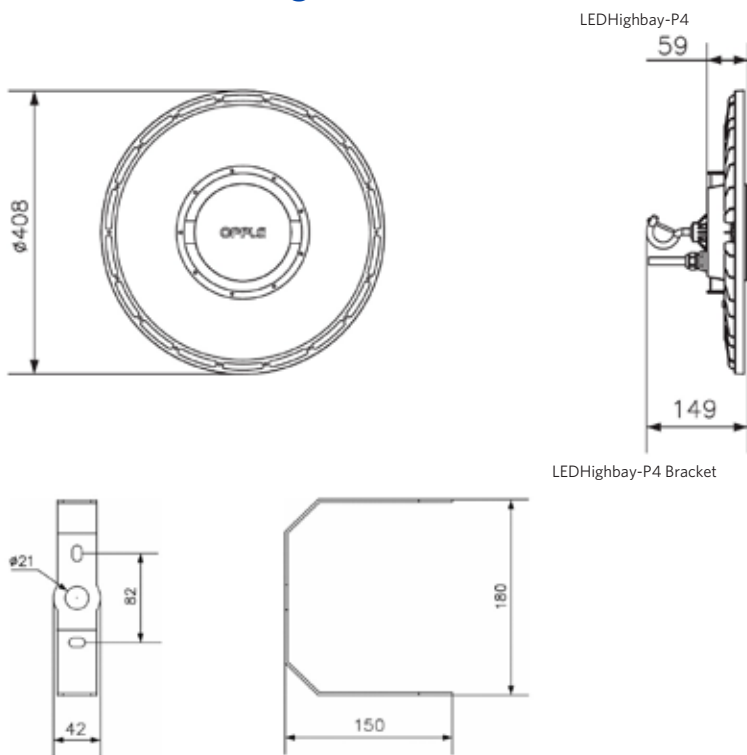
Material housing	Aluminium
Optical material	Polycarbonate
Cover material	Polycarbonate

### Ambient Conditions

Operating temperature	-25 ~ 50 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



LEDHighbay-P4 Bracket





## LED Highbay Performer G3

- Highbay fixture with high efficacy of 125 lm/W
- Up to 80% energy savings compared to 250-400W metal-halide highbay
- Multiple beam angles and DALI versions available
- Equipped with IP65 connector
- Polycarbonate and opal cover available



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140057960	LEDHighbay-P3 80W-4000-60D-GY	HID 250W	80	10000	125	4000	60 °	4.20
140057961	LEDHighbay-P3 80W-4000-100D-GY	HID 250W	80	10000	125	4000	100 °	4.20
140057962	LEDHighbay-P3 80W-4000-60+100D-GY	HID 250W	80	10000	125	4000	60 ° x 100 °	4.20
140057963	LEDHighbay-P3 120W-4000-60D-GY	HID 400W	120	15000	125	4000	60 °	4.20
140057964	LEDHighbay-P3 120W-4000-100D-GY	HID 400W	120	15000	125	4000	100 °	4.20
140057965	LEDHighbay-P3 120W-4000-60+100D-GY	HID 400W	120	15000	125	4000	60 ° x 100 °	4.20
140057966	LEDHighbay-P3 160W-4000-60D-GY	HID 400W	160	20000	125	4000	60 °	6.00
140057967	LEDHighbay-P3 160W-4000-100D-GY	HID 400W	160	20000	125	4000	100 °	6.00
140057968	LEDHighbay-P3 160W-4000-60+100D-GY	HID 400W	160	20000	125	4000	60 ° x 100 °	6.00
140057969	LEDHighbay-P3 80W-DALI-4000-60D-GY	HID 250W	80	10000	125	4000	60 °	4.20
140057970	LEDHighbay-P3 80W-DALI-4000-100D-GY	HID 250W	80	10000	125	4000	100 °	4.20
140057971	LEDHighbay-P3 80W-DALI-4000-60+100D-GY	HID 250W	80	10000	125	4000	60 ° x 100 °	4.20
140057972	LEDHighbay-P3 120W-DALI-4000-60D-GY	HID 400W	120	15000	125	4000	60 °	4.20
140057973	LEDHighbay-P3 120W-DALI-4000-100D-GY	HID 400W	120	15000	125	4000	100 °	4.20
140057974	LEDHighbay-P3 120W-DALI-4000-60+100D-GY	HID 400W	120	15000	125	4000	60 ° x 100 °	4.20
140057975	LEDHighbay-P3 160W-DALI-4000-60D-GY	HID 400W	160	20000	125	4000	60 °	6.00
140057976	LEDHighbay-P3 160W-DALI-4000-100D-GY	HID 400W	160	20000	125	4000	100 °	6.00
140057977	LEDHighbay-P3 160W-DALI-4000-60+100D-GY	HID 400W	160	20000	125	4000	60 ° x 100 °	6.00

## Accessories

 140060030 LEDHighbay-P3-Bracket-80-120	 140044049 LEDHighbay-POLE-CT	 140064594 LEDHighbay-P3-Ball-Proof-160	 140060028 LEDHighbay-P3-Glass-Opal-80-120	 140063029 LEDHighbay-P3-PC-Clear-80-120
140044050 LEDHighbay-Bracket10-CT	140064595 LEDHighbay-P3-Ball-Proof-80-120	140060029 LEDHighbay-P3-Glass-Opal-160	140063027 LEDHighbay-P3-PC-Opal-80-120	140063030 LEDHighbay-P3-PC-Clear-160
				140063028 LEDHighbay-P3-PC-Opal-160

Bracket 10 fits 160W versions, Bracket 80-120W fits 80-120W versions.  
 Glass Opal 80-120 fits 80-120W versions, Glass Opal 160 fits 160W versions.

### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	5
Dimmable	No / Yes (DALI)
Finishing	Grey 417U
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I
Risk group	RG1
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90
Surge protection	4 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Aluminium
Optical material	PC + Glass
Cover material	PC + Glass

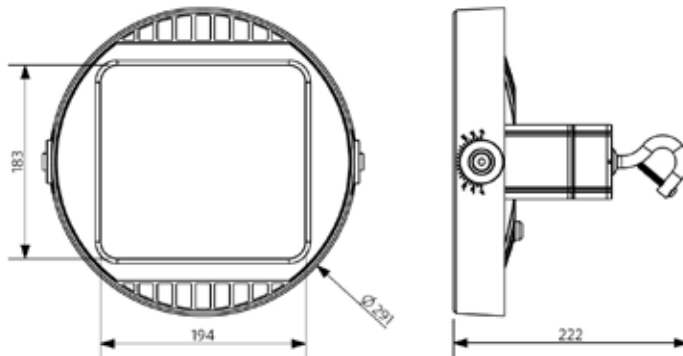
### Ambient Conditions

Operating temperature	-25 ~ 50 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)

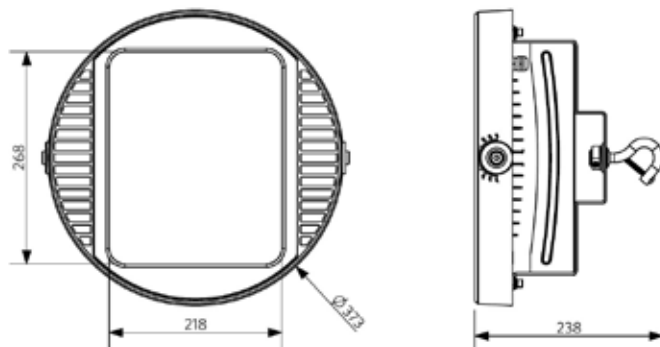
LEDHighbay-P3 80W  
LEDHighbay-P3 120W



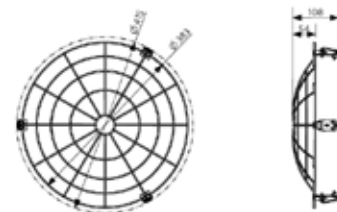
LEDHighbay-P3-Ball-Proof-80-120



LEDHighbay-P3 160W



LEDHighbay-P3-Ball-Proof-160





## LED Waterproof Performer G2

- Waterproof luminaire with high efficacy up to 130 lm/W
- Available in 3 lengths and 8 lumen packages
- Up to 60% lower energy consumption compared to traditional TL lighting
- Equipped with 2.5mm<sup>2</sup> through-wiring
- Specific "sealed for life" design for LED (IP65)
- Quick installation with through wiring and easy end-cap connections
- Supplied with stainless steel ceiling and suspension clips



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140057864	LEDWaterproof-P2 L653-12.5W-4000	TL 1x18W	12.5	1375	110	4000	0.89
140057865	LEDWaterproof-P2 L653-23W-4000	TL 2x18W	23	2530	110	4000	0.93
140057866	LEDWaterproof-P2 L1263-23W-4000	TL 1x36W	23	2530	110	4000	1.44
140057867	LEDWaterproof-P2 L1263-40W-4000	TL 2x36W	40	4400	110	4000	1.47
140057868	LEDWaterproof-P2 L1563-27W-4000	TL 1x58W	27	2970	110	4000	1.71
140057869	LEDWaterproof-P2 L1563-51W-4000	TL 2x58W	51	5610	110	4000	1.73
140058166	LEDWaterproof-P2 L1563-51W-6500	TL 2x58W	51	5610	110	6500	1.73
543022000200	LEDWaterproof-P2 L1563-75W-4000	TL 2x80W	75	9375	125	4000	1.73
543022000100	LEDWaterproof-P2 L1563-90W-4000	2x TLM 140W RS	90	11700	130	4000	1.73
140057870	LEDWaterproof-P2 L653-13W-DALI-4000	TL 1x18W	13	1430	110	4000	0.89
140057871	LEDWaterproof-P2 L653-24W-DALI-4000	TL 2x18W	24	2640	110	4000	0.93
140057872	LEDWaterproof-P2 L1263-24W-DALI-4000	TL 1x36W	24	2640	110	4000	1.80
140057873	LEDWaterproof-P2 L1263-45W-DALI-4000	TL 2x36W	45	4950	110	4000	1.80
140057874	LEDWaterproof-P2 L1563-28W-DALI-4000	TL 1x58W	28	3080	110	4000	2.21
140057875	LEDWaterproof-P2 L1563-55W-DALI-4000	TL 2x58W	55	6050	110	4000	2.21
140058167	LEDWaterproof-P2 L1563-55W-DALI-6500	TL 2x58W	55	6050	110	6500	2.21

Emergency lighting available on request (not for 75W and 90W)

Available on request with 3- or 5- pole Wieland GST18i connector



### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No / Yes (DALI)
Beam angle	110 °
Finishing	Grey RAL 7035
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I / II (75W & 90W)
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Polycarbonate
Optical material	Polycarbonate
Ceiling clips	Stainless steel

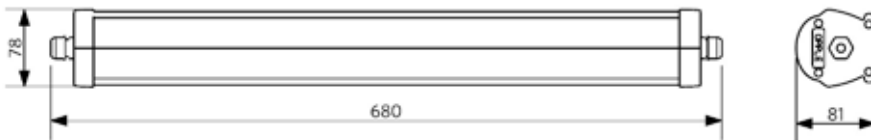
### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)

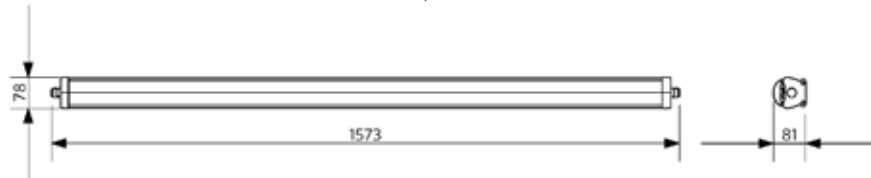
LEDWaterproof-P2 L653



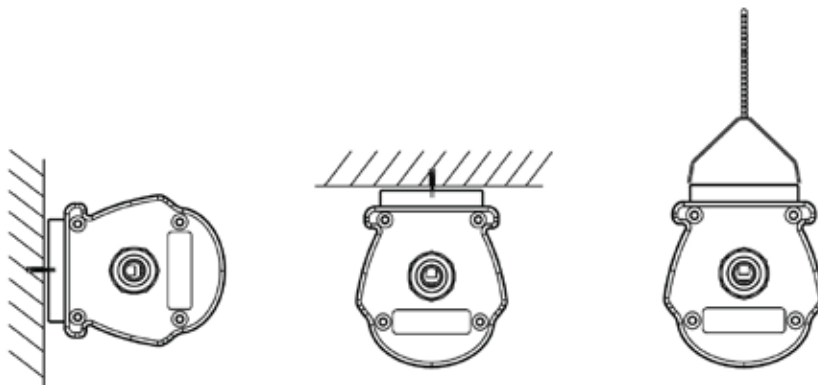
LEDWaterproof-P2 L1263



LEDWaterproof-P2 L1563



## Installation Possibilities





## LED Waterproof EcoMax



- Equipped with 2.5mm<sup>2</sup> through-wiring
- Waterproof luminaire in "sealed for life" concept
- Available in 3 lengths and 7 lumen packages, with efficacy up to 100 lm/W
- Quick installation with through wiring and easy end-cap connections
- Up to 50% lower energy consumption compared to traditional TL lighting

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140057384	LEDWaterproof-E L650-10W-4000-FR	TL 1x18W	10	1000	100	4000	0.62
140057385	LEDWaterproof-E L650-23W-4000-FR	TL 2x18W	23	2100	90	4000	0.62
140057386	LEDWaterproof-E L1250-20W-4000-FR	TL 1x36W	20	2000	100	4000	1.12
140057387	LEDWaterproof-E L1250-43W-4000-FR	TL 2x36W	43	3900	90	4000	1.12
140057388	LEDWaterproof-E L1550-29W-4000-FR	TL 1x58W	29	2900	100	4000	1.16
140057389	LEDWaterproof-E L1550-57W-4000-FR	TL 2x58W	57	5200	90	4000	1.16
140058165	LEDWaterproof-E L1550-57W-6500-FR	TL 2x58W	57	5400	95	6500	1.16

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Beam angle	110 °
Finishing	Grey 421C
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	II
Risk group	RG0
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

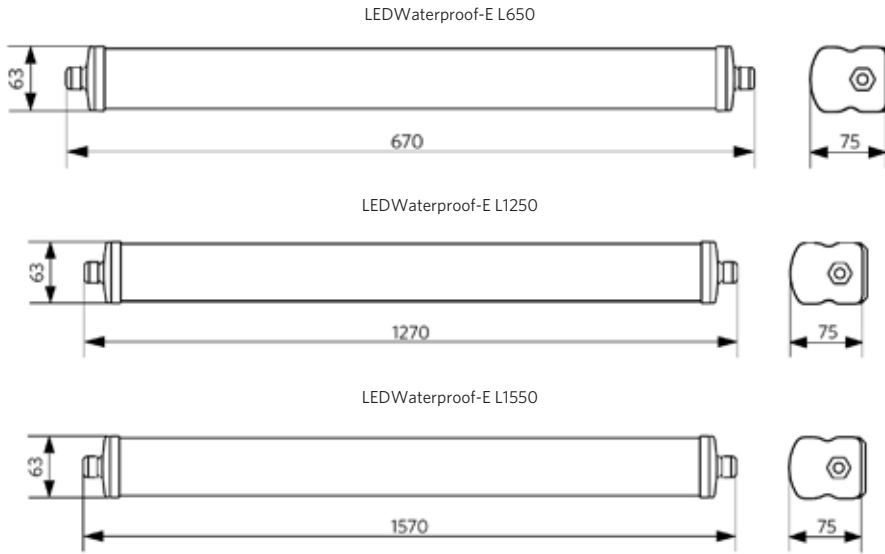
Material housing	Polycarbonate (PC)
Optical material	Polycarbonate

### Ambient Conditions

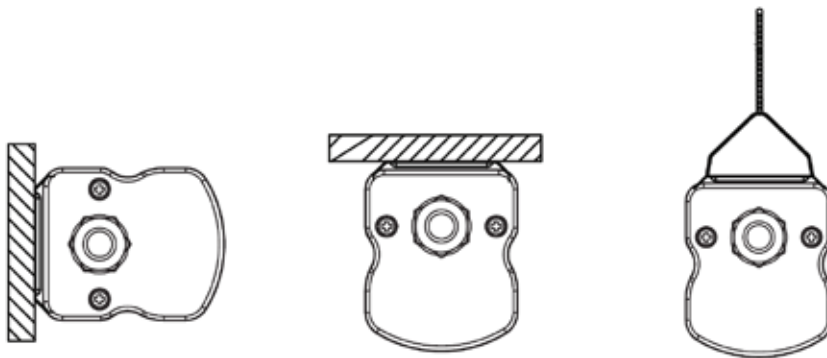
Operating temperature	-20 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)



## Installation Possibilities





## LED Trunking

- Very high efficacy of 160 lm/W
- Simple installation with snap-in mounting of LED modules and trunks
- Huge energy saving up to 65% compared to conventional TL lighting
- Multiple beam angles and powers available
- Extra energy saving by using DALI dimmable LED modules and fully customizable DALI sensors



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
542005006000	LEDTrunking Module L15-50W-4000-60	TL 2x80W	50	8000	160	4000	60 °	1.64
542005005900	LEDTrunking Module L15-50W-4000-90	TL 2x80W	50	8000	160	4000	90 °	1.64
542005005800	LEDTrunking Module L15-50W-4000-120	TL 2x80W	50	8000	160	4000	120 °	1.65
542005006100	LEDTrunking Module L15-50W-4000-BW	TL 2x80W	50	8000	160	4000	Batwing	1.64
542005006400	LEDTrunking Module L15-70W-4000-60	2x TLM 140W RS	70	11200	160	4000	60 °	1.71
542005006300	LEDTrunking Module L15-70W-4000-90	2x TLM 140W RS	70	11200	160	4000	90 °	1.71
542005006200	LEDTrunking Module L15-70W-4000-120	2x TLM 140W RS	70	11200	160	4000	120 °	1.72
542005006500	LEDTrunking Module L15-70W-4000-BW	2x TLM 140W RS	70	11200	160	4000	Batwing	1.71
542005006800	LEDTrunking Module L15-50W-4000-60-DALI	TL 2x80W	50	8000	160	4000	60 °	1.64
542005006700	LEDTrunking Module L15-50W-4000-90-DALI	TL 2x80W	50	8000	160	4000	90 °	1.64
542005006600	LEDTrunking Module L15-50W-4000-120-DALI	TL 2x80W	50	8000	160	4000	120 °	1.65
542005006900	LEDTrunking Module L15-50W-4000-BW-DALI	TL 2x80W	50	8000	160	4000	Batwing	1.64
542005007200	LEDTrunking Module L15-70W-4000-60-DALI	2x TLM 140W RS	70	11200	160	4000	60 °	1.71
542005007100	LEDTrunking Module L15-70W-4000-90-DALI	2x TLM 140W RS	70	11200	160	4000	90 °	1.71
542005007000	LEDTrunking Module L15-70W-4000-120-DALI	2x TLM 140W RS	70	11200	160	4000	120 °	1.72
542005007300	LEDTrunking Module L15-70W-4000-BW-DALI	2x TLM 140W RS	70	11200	160	4000	Batwing	1.71
542098002100	LEDTrunking Trunk 8 L15							1.75
542098002200	LEDTrunking Trunk 8 L15 End Part							1.40
542098002300	LEDTrunking Trunk 8 L30							3.30
542098002400	LEDTrunking Trunk 8 L30 End Part							2.95

Emergency lighting available on request.

## Accessories



542098001300  
LEDTrunking Feed-in Box 8



542098001500  
LEDTrunking Feed-in Connector 8



542098003000  
LEDTrunking Cable Gland



542098004600  
LEDTrunking Sensor Probe L  
542098004700  
LEDTrunking Sensor Probe H



542098001100  
LEDTrunking Sensor Cover L15



542098001000  
LEDTrunking DALI Power Supply



542098001700  
LEDTrunking End Cap



542098001800  
LEDTrunking Cover L15



542098001900  
LEDTrunking Mounting Clip Chain



542098002000  
LEDTrunking Cord-3m



542098002900  
LEDTrunking Mounting Clip

### Technical Specifications

Lifespan (L70B50)	50,000 h
On-/Off-cycles	100,000
Dimmable	Yes (DALI)
Finishing	White
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Impact strength	IK02
Protection class	I
Control gear included	Yes
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Mechanical Properties

Material housing	Steel
------------------	-------

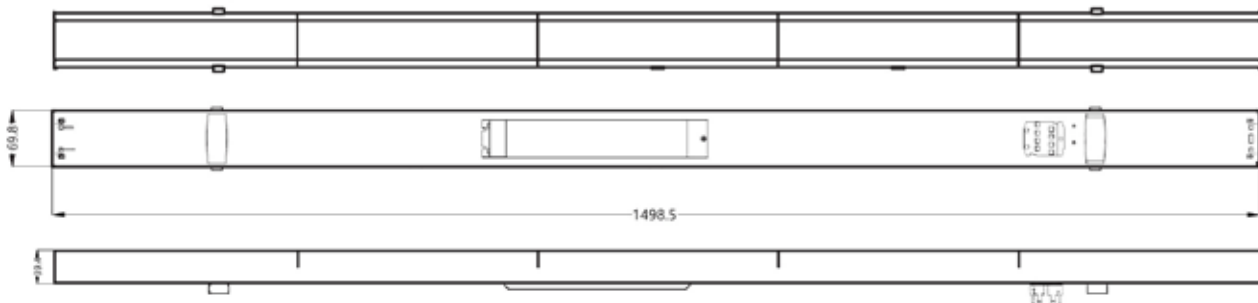
### Ambient Conditions

Operating temperature	-10 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)

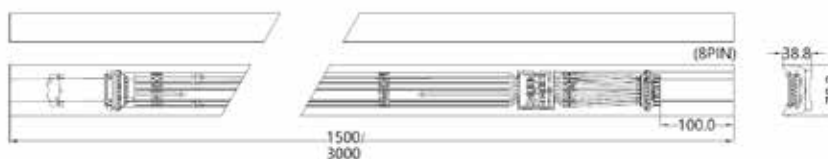
LEDTrunking Module L15



LEDTrunking Trunk 8



LEDTrunking Trunk 8  
End part





## LED Roadlight

- Up to 60% energy saving compared to HID roadlights
- Extra energy saving via DALI dimming
- Advanced optical design optimized for road lighting
- Flexible and adjustable pole connector for both side entry and pole top mounting
- Robust die-cast aluminium body
- IP66 and coastline proof



Roadlight standard without pole adapter.

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Lifespan (L80B50)	Weight (kg/pc)
543014005800	LEDRoadlight-90W-4000-DALI	HID 150W	90	11250	125	4000	70,000 h	9.00
543014005700	LEDRoadlight-120W-4000-DALI	HID 150W	120	15000	125	4000	70,000 h	9.20
543014005600	LEDRoadlight-150W-4000-DALI	HID 250W	150	18750	125	4000	70,000 h	9.20
543014005500	LEDRoadlight-200W-4000-DALI	HID 250W	200	24000	120	4000	50,000 h	9.40

## Accessories



543098007000  
Pole Adapter-Roadlight-60mm

76mm adapter available from end 2018.

**Technical Specifications**

On-/Off-cycles	100,000
Colour consistency (SDCM)	6
Dimmable	Yes (DALI)
Beam angle	150 ° x 70 °
Maximum tilt angle	15 °
Finishing	Grey
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP66
Impact strength	IK08
Protection class	I
Control gear included	Yes
Glow wire test	850 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90
Surge protection	10 kV

**Electrical Supply**

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

**Mechanical Properties**

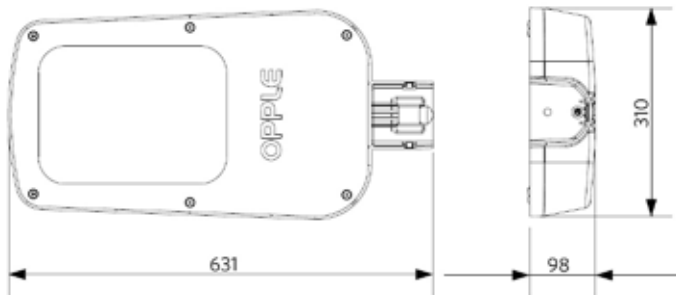
Material housing	Aluminium
Optical material	Polycarbonate
Compatible pole Ø	48-60 mm
Effective wind area	1478 cm <sup>2</sup>

**Ambient Conditions**

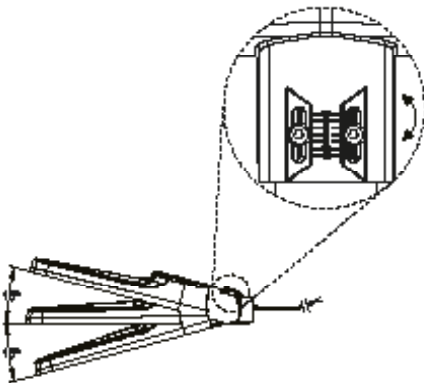
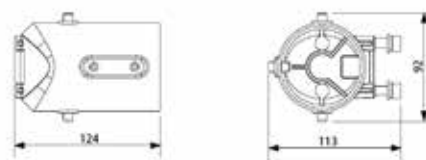
Operating temperature	-30 ~ 50 °C
Application temperature	25 °C
Storage environment	-30 ~ 65 °C

**Dimensional Drawing (mm)**

LED Roadlight



Pole Adapter-Roadlight-60mm





## LED Streetlight

- NEW: 6m extension cable available
- Up to 60% energy saving compared to HID streetlight
- High efficacy up to 125 lm/W
- Low glare & precise optical design
- Accessories available for many pole types
- IP65 and coastline proof



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140065922	LEDStreetlight 20W-4000K-SE	HID 50W	20	2500	125	4000	1.25
140066385	LEDStreetlight 40W-4000K-SE	HID 70W	40	4600	115	4000	1.25
543014002700	LEDStreetlight 65W-4000K-SE	HID 100W	65	7475	115	4000	1.25

## Accessories



543098001100  
LEDStreet-SE-Wall-Bracket



543098000800  
LEDStreet-SE-Adapter-60



543098001000  
LEDStreet-SE-Pole-Top-Adapter-60



543098000900  
LEDStreet-SE-Pole-Top-Adapter-76



599000004600  
LEDStreet-SE-ExtensionCable

### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	6
Dimmable	No
Beam angle	150 ° x 70 °
Finishing	Grey RAL 870-3
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	0.95
Surge protection	4 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Mechanical Properties

Material housing	Aluminium
Optical material	Polycarbonate
Compatible pole Ø	36-42 mm
Effective wind area	385 cm <sup>2</sup>

### Ambient Conditions

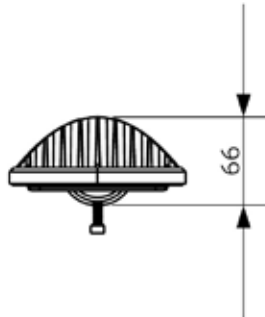
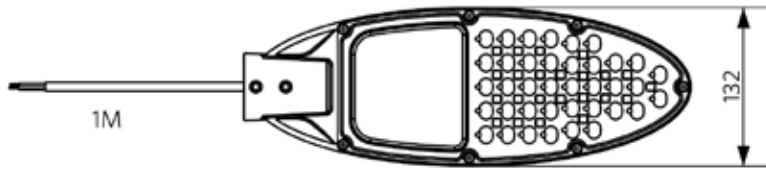
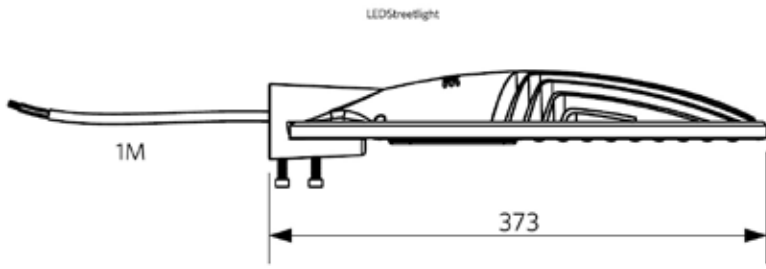
Operating temperature	-40 ~ 50 °C
Application temperature	25 °C
Storage environment	-30 ~ 65 °C



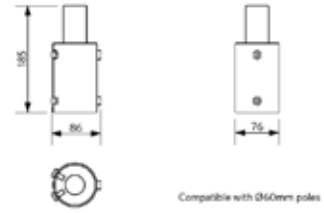


# Dimensional Drawing (mm)

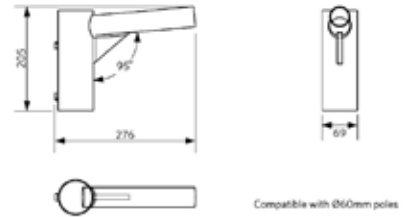
LEDStreetlight



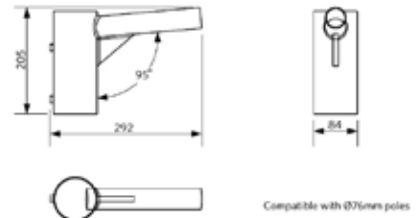
LEDStreetlight Adapter 60



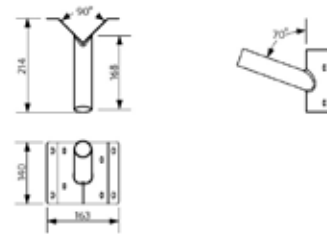
LEDStreetlight Pole Top Adapter 60



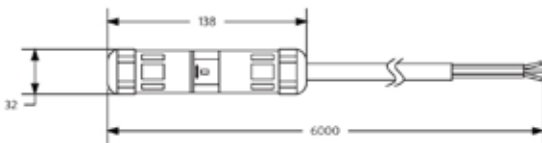
LEDStreetlight Pole Top Adapter 76



LEDStreetlight Wall Bracket



LEDStreet-SE-ExtensionCable





LED Floodlight Performer 90W/125W/160W

- Super slim aluminium body with integrated heatsink and clipless cover
- High lumen package up to 20,000 Lm
- Very high Efficacy of 125 lm/W
- High energy saving up to 65% compared to halogen and high pressure sodium lamps
- Wide (W) and asymmetric (AS) beam angles available
- Robust, water- and dustproof
- Equipped with GORE ventill to regulate pressure differences



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140062030	LEDflood-P Re440-90W-4000-W-BL	Halogen 750W	90	11250	125	4000	100 °	6.20
140062031	LEDflood-P Re440-90W-4000-AS-BL	Halogen 750W	90	11250	125	4000	55 ° x 115 °	6.20
140062032	LEDflood-P Re440-125W-4000-W-BL	Halogen 1000W	125	15625	125	4000	100 °	6.25
140062033	LEDflood-P Re440-125W-4000-AS-BL	Halogen 1000W	125	15625	125	4000	55 ° x 115 °	6.20
140062034	LEDflood-P Re440-160W-4000-W-BL	Halogen 1500W	160	20000	125	4000	100 °	6.20
140062035	LEDflood-P Re440-160W-4000-AS-BL	Halogen 1500W	160	20000	125	4000	55 ° x 115 °	6.25

## Accessories



599000004600  
LEDStreet-SE-ExtensionCable



### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	Black
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90
Surge protection	4 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

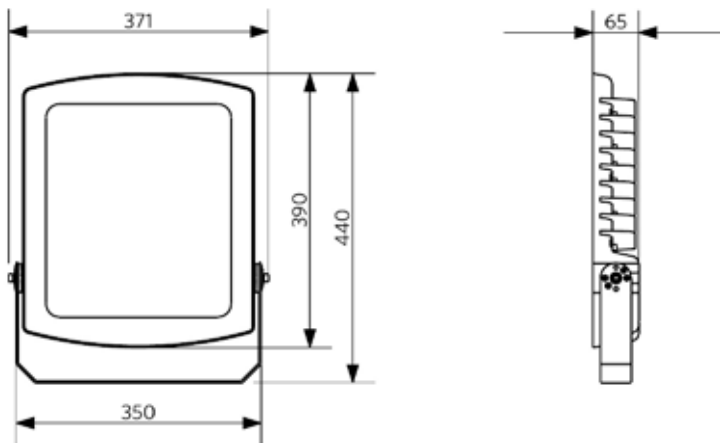
Material housing	Die-casted Aluminum
Optical material	PC + Glass
Cover material	Tempered glass

### Ambient Conditions

Operating temperature	-25 - 50 °C
Application temperature	25 °C
Storage environment	-30 ~ 60 °C

## Dimensional Drawing (mm)

LEDflood-P Re440





LED Floodlight EcoMax G2 30W/50W/70W

- NEW: stylish family design
- Slim aluminium body with integrated heatsink and clipless cover
- Robust and water- and dustproof
- High efficacy up to 100 lm/W
- High energy saving compared to halogen and high pressure sodium lamps
- Range from 3,000 to 7,000 lm
- Compatible brackets and ground spikes available
- IP65 daylight and motion sensor accessory available



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
543017012100	LEDflood-E2 Re199-30W-3000-BL	HID 50W	30	2850	95	3000	110 °	0.85
543017011800	LEDflood-E2 Re199-30W-4000-BL	HID 50W	30	3000	100	4000	110 °	0.85
543017012000	LEDflood-E2 Re253-50W-3000-BL	HID 70W	50	4750	95	3000	110 °	1.40
543017011700	LEDflood-E2 Re253-50W-4000-BL	HID 70W	50	5000	100	4000	110 °	1.40
543017011600	LEDflood-E2 Re283-70W-4000-BL	HID 150W	70	7000	100	4000	110 °	2.10

## Accessories



140065060  
LEDflood-E-Motion-Daylight-Sensor



140060793  
LEDflood-E-Re250-280-Bracket-BL



140060792  
LEDflood-E-Re250-280-Spike-BL



599000004600  
LEDStreet-SE-ExtensionCable

Sensor range 10m. Bracket extendable up to 60 cm.

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	Black
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK07
Protection class	I
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90
Surge protection	2 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

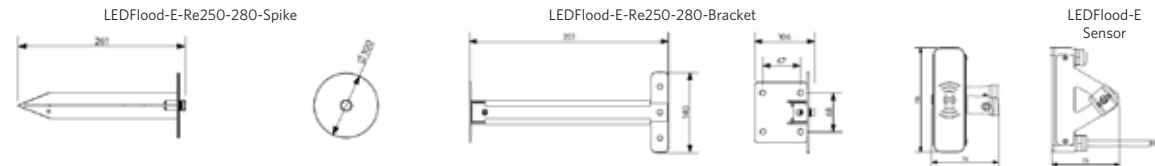
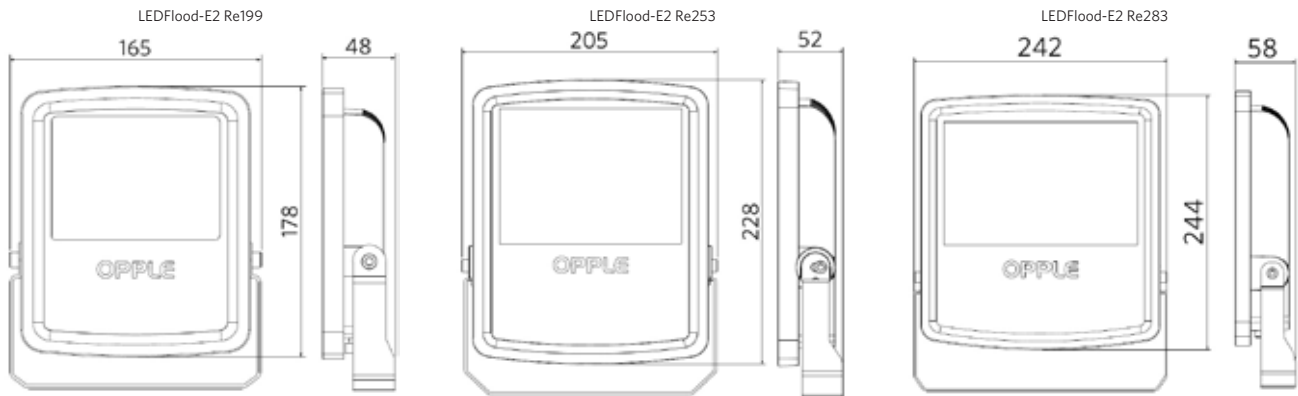
Material housing	Aluminium
Optical material	Polycarbonate
Cover material	Tempered glass

### Ambient Conditions

Operating temperature	-30 ~ 50 °C
Application temperature	25 °C
Storage environment	-30 ~ 60 °C



## Dimensional Drawing (mm)



## Installation Possibilities

LEDFlood-E





## LED Floodlight EcoMax 10W/20W

- Slim aluminium body with integrated heatsink and clipless cover
- Robust and water- and dustproof
- High energy saving compared to halogen and high pressure sodium lamps
- Also in available 3000K and white housing
- Compatible brackets and ground spikes available
- IP65 daylight and motion sensor accessory available



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
140059492	LEDflood-E Re150-10W-3000	Halogen 50W	10	800	80	3000	100 °	0.54
140055441	LEDflood-E Re150-10W-4000	Halogen 50W	10	800	80	4000	100 °	0.54
140059493	LEDflood-E Re150-20W-3000	Halogen 100W	20	1600	80	3000	100 °	0.54
140055442	LEDflood-E Re150-20W-4000	Halogen 100W	20	1600	80	4000	100 °	0.54
140060745	LEDflood-E Re150-10W-3000-WH	Halogen 50W	10	800	80	3000	100 °	0.54
140060746	LEDflood-E Re150-10W-4000-WH	Halogen 50W	10	800	80	4000	100 °	0.54
140060747	LEDflood-E Re150-20W-3000-WH	Halogen 100W	20	1600	80	3000	100 °	0.54
140060748	LEDflood-E Re150-20W-4000-WH	Halogen 100W	20	1600	80	4000	100 °	0.54

## Accessories



140065060  
LEDflood-E-Motion-Daylight-Sensor



140060790  
LEDflood-E-Re150-Bracket-BL

140060791  
LEDflood-E-Re150-Bracket-WH



140060789  
LEDflood-E-Re150-Spike-BL



599000004600  
LEDStreet-SE-ExtensionCable

Sensor range 10m. Bracket extendable up to 60 cm.

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	White / Black
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK08
Protection class	I
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90
Surge protection	2 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Die-casted Aluminum
Optical material	Polycarbonate
Cover material	Tempered glass

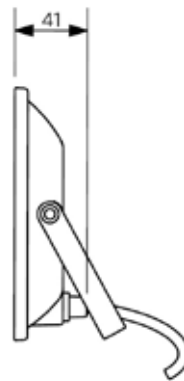
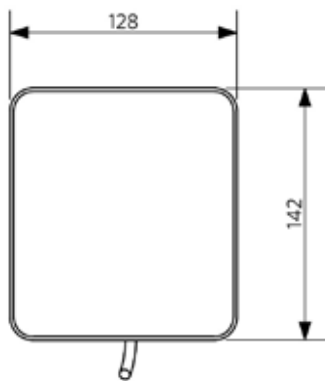
### Ambient Conditions

Operating temperature	-25 - 45 °C
Application temperature	25 °C
Storage environment	-30 - 60 °C

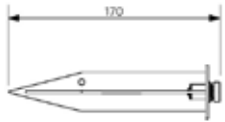


## Dimensional Drawing (mm)

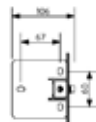
LED Flood-E Re150



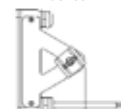
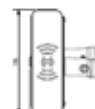
LED Flood-E-Re150-Spike



LED Flood-E-Re150-Bracket



LED Flood-E Sensor



## Installation Possibilities

LED Flood-E Re150





## LED Floodlight Basic



- Replacement of halogen and up to 150W HID
- Wide power range from 10W to 70W
- Slim and compact body design due to integrated driver
- IP65 & IK07 for both indoor and outdoor applications
- Compatible brackets and ground spikes available
- IP65 daylight and motion sensor accessory available

### Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Weight (kg/pc)
543017000200	LEDflood-B Re125-10W-4000	Halogen 50W	10	800	80	4000	100 °	0.26
543017000300	LEDflood-B Re170-20W-4000	Halogen 100W	20	1700	85	4000	100 °	0.45
543017000400	LEDflood-B Re191-30W-4000	HID 50W	30	2500	85	4000	100 °	0.57
543017009900	LEDflood-B Re217-50W-4000	HID 70W	50	4250	85	4000	100 °	1.25
543017010000	LEDflood-B Re266-70W-4000	HID 150W	70	5950	85	4000	100 °	1.53

### Accessories



140065060  
LEDflood-E-Motion-Daylight-Sensor



140060790  
LEDflood-E-Re150-Bracket-BL



140060789  
LEDflood-E-Re150-Spike-BL



599000004600  
LEDStreet-SE-ExtensionCable

140060793  
LEDflood-E-Re250-280-Bracket-BL

140060792  
LEDflood-E-Re250-280-Spike-BL

Sensor range 10m. Bracket extendable up to 60 cm.



**Technical Specifications**

Lifespan (L70B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	6
Dimmable	No
Finishing	Black
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK07
Protection class	I / II (10W, 20W, 30W)
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

**Electrical Supply**

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

**Mechanical Properties**

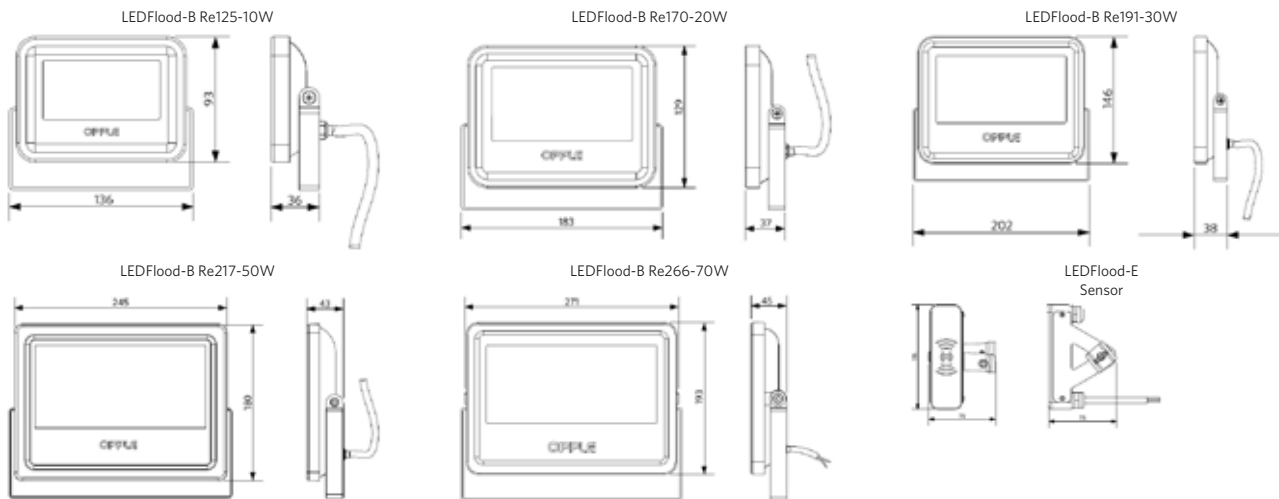
Material housing	PPS (10W, 20W, 30W) / Aluminum (50W, 70W)
Optical material	Polycarbonate
Cover material	PC + Glass

**Ambient Conditions**

Operating temperature	-30 ~ 50 °C
Application temperature	25 °C
Storage environment	-40 ~ 80 °C



**Dimensional Drawing (mm)**





## LED Areaflood

- Up to 60% energy saving compared to HID solutions
- Different optics to illuminate sport pitches (Class II/III NEN-EN 12193:2017) and open areas.
- Full IP66 and IK08, coastline proof
- Equipped with 1-10V dimming for further energy saving
- Easy installation thanks to included IP66 connector



310W version standard including bracket. 620W version standard without bracket.  
1240W versions available by combining two 620W modules and the mounting kit-4mod accessory.

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Beam angle	Effective wind area	Weight (kg/pc)
543017013300	LEDAreaFlood-P-310W-5700-W	HID 500W	310	40000	130	5700	120 ° x 30 °	1110 cm <sup>2</sup>	13.00
543017013200	LEDAreaFlood-P-310W-5700-N	HID 500W	310	40000	130	5700	60 °	1110 cm <sup>2</sup>	13.00
543017013100	LEDAreaFlood-P-310W-5700-XN	HID 500W	310	40000	130	5700	25 °	1110 cm <sup>2</sup>	13.00
543017012700	LEDAreaFlood-P-620W-5700-W	HID 1000W	620	80000	130	5700	120 ° x 30 °	2331 cm <sup>2</sup>	17.00
543017012600	LEDAreaFlood-P-620W-5700-N	HID 1000W	620	80000	130	5700	60 °	2331 cm <sup>2</sup>	17.00
543017012500	LEDAreaFlood-P-620W-5700-XN	HID 1000W	620	80000	130	5700	25 °	2331 cm <sup>2</sup>	17.00

## Accessories



543098006000  
LEDAreaFlood-P-MountingKit-2Mod



543098005800  
LEDAreaFlood-P-MountingKit-4Mod



543098005900  
LEDAreaFlood-P-SafetyCable



599000004600  
LEDStreet-SE-ExtensionCable

### Technical Specifications

Lifespan (L70B50)	70,000 h
Lifespan (L80B50)	50,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	6
Dimmable	Yes (1-10V)
Finishing	Black
Colour rendering index CRI	≥ 70
Degree of protection (IP)	IP66
Impact strength	IK08
Protection class	I
Control gear included	Yes
Glow wire test	850 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90
Surge protection	6 kV

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

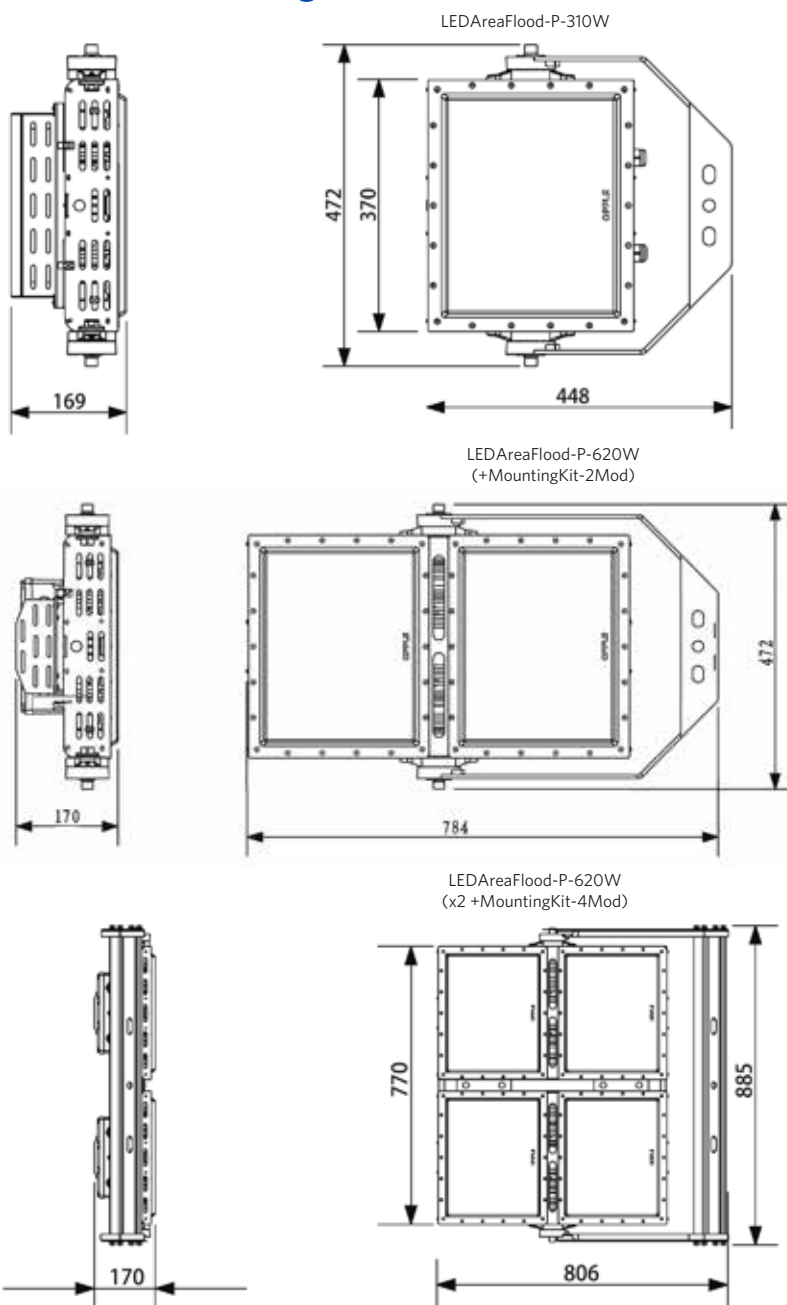
Material housing	Aluminium
Optical material	Polycarbonate
Cover material	Polycarbonate

### Ambient Conditions

Operating temperature	-30 - 50 °C
Application temperature	25 °C
Storage environment	-30 - 60 °C



## Dimensional Drawing (mm)





## LED Wall-Mounted EcoMax



- Well integrated in architecture and comfortable light distribution
- Over 60% energy savings compared to compact fluorescent
- Efficient and homogenous diffusor
- Option for combined motion/daylight sensor (type "microwave") --> MD version
- Easy connection and installation

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140051998	LEDWall-Mounted Rd300-13W-3000-WH	CFL 2x18W	13	1000	77	3000	0.96
140051999	LEDWall-Mounted Rd300-13W-3000-MD-WH	CFL 2x18W	13	1000	77	3000	1.02
140051994	LEDWall-Mounted Rd300-13W-4000-WH	CFL 2x18W	13	1100	85	4000	0.96
140051995	LEDWall-Mounted Rd300-13W-4000-MD-WH	CFL 2x18W	13	1100	85	4000	1.02
140058219	LEDWall-Mounted Rd300-20W-3000-WH	CFL 2x26W	20	1700	85	3000	0.96
140058220	LEDWall-Mounted Rd300-20W-3000-MD-WH	CFL 2x26W	20	1700	85	3000	1.02
140058215	LEDWall-Mounted Rd300-20W-4000-WH	CFL 2x26W	20	1800	90	4000	0.96
140058216	LEDWall-Mounted Rd300-20W-4000-MD-WH	CFL 2x26W	20	1800	90	4000	1.02

Emergency lighting available on request (incl. integrated 1hr battery pack)

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	4
Dimmable	No
Finishing	White RAL9003
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP66
Impact strength	IK10
Protection class	II
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Polycarbonate
Optical material	Polycarbonate

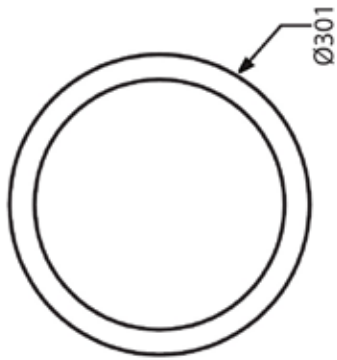
### Ambient Conditions

Operating temperature	-25 ~ 50 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



## Dimensional Drawing (mm)

LEDWall-Mounted Rd300



WALL MOUNTED





## LED Porchlight EcoMax

- Master Porchlight with integrated motion detector and daylight sensor (MD-versions)
- Automatic dimming to 20% light level in case of no movement detection (MD-versions)
- One Master Porchlight (MD) can control up to 10 Porchlight fixtures
- Detection range, hold time and daylight sensor settings can be easily customized via DIP switch
- Energy saving up to 50% compared to compact fluorescent based fixtures
- Further energy saving by the automatic dimming feature



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140064477	LEDPorch-E Re120-5W-3000K-WH	TL 8W	5	450	90	3000	0.83
140064478	LEDPorch-E Re120-5W-4000K-WH	TL 8W	5	500	100	4000	0.83
140064479	LEDPorch-E Re120-6W-3000K-MD-WH	TL 8W	6	480	80	3000	0.87
140064480	LEDPorch-E Re120-6W-4000K-MD-WH	TL 8W	6	510	85	4000	0.87
140064481	LEDPorch-E Re120-8W-3000K-WH	CFL 11W	8	720	90	3000	0.83
140064482	LEDPorch-E Re120-8W-4000K-WH	CFL 11W	8	800	100	4000	0.83
140064483	LEDPorch-E Re120-9W-3000K-MD-WH	CFL 11W	9	765	85	3000	0.87
140064484	LEDPorch-E Re120-9W-4000K-MD-WH	CFL 11W	9	810	90	4000	0.87

Emergency lighting available on request.

### Technical Specifications

Lifespan (L70B50)	50,000 h
Lifespan (L80B50)	30,000 h
On-/Off-cycles	100,000
Colour consistency (SDCM)	6
Dimmable	No
Finishing	White
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP65
Impact strength	IK10
Protection class	II
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	0.5 %
Power factor	≥ 0.90

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	Yes, see Appendix 2

### Mechanical Properties

Material housing	Polycarbonate
Optical material	Polycarbonate

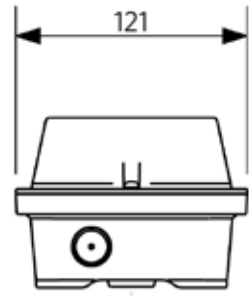
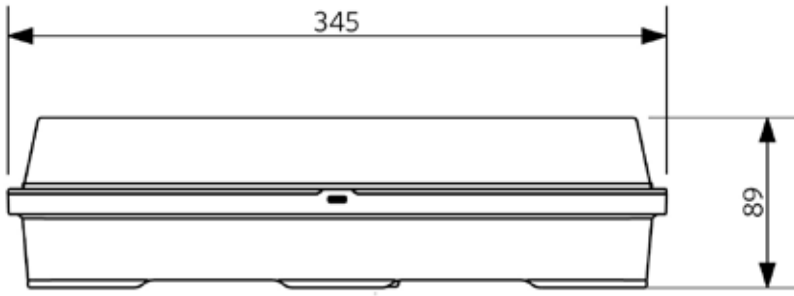
### Ambient Conditions

Operating temperature	-30 ~ 50 °C
Application temperature	25 °C
Storage environment	-30 ~ 60 °C



## Dimensional Drawing (mm)

LEDPorch-E Re120





## LED Filament A60

- Classic light bulb shape ensures an easy replacement
- Instant 100% light when switched on and no startup time
- Creating cosy atmosphere
- No UV / IR radiance so there is less risk of damage
- Up to 86% less energy consumption than traditional bulbs



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
500010001400	LED-E-A60-FILA-E27-4W-2700K-CL	GLS 40W	4	470	118	2700	A+	0.03
500010001500	LED-E-A60-FILA-E27-7W-2700K-CL	GLS 60W	7	806	115	2700	A+	0.03
500010001100	LED-E-A60-FILA-E27-4.5W-DIM-2700K-CL	GLS 40W	4.5	470	104	2700	A+	0.03
500010001000	LED-E-A60-FILA-E27-7W-DIM-2700K-CL	GLS 60W	7	806	115	2700	A+	0.03
500010001900	LED-E-A60-FILA-E27-4.5W-DIM-2700K-FR	GLS 40W	4.5	470	104	2700	A+	0.03
500010001200	LED-E-A60-FILA-E27-7W-DIM-2700K-FR	GLS 60W	7	806	115	2700	A+	0.03
500010001300	LED-E-A60-FILA-E27-4.5W-DIM-4000K-FR	GLS 40W	4.5	470	104	4000	A+	0.03
500010000400	LED-E-A60-FILA-E27-7W-DIM-4000K-FR	GLS 60W	7	806	115	4000	A+	0.03

See appendix 1 for dimmer compatibility list.

### Technical Specifications

Lifespan (L70B50)	15,000 h
On-/Off-cycles	15,000
Dimmable	No / Yes (DIM)
Beam angle	360 °
Finishing	Transparent / Frosted
Colour rendering index CRI	≥ 80

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Ambient Conditions

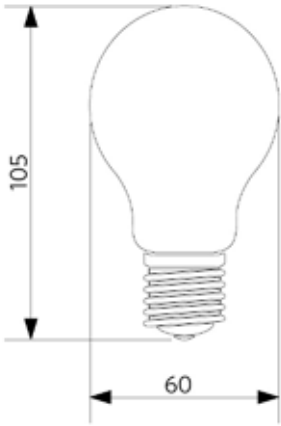
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C





# Dimensional Drawing (mm)

LED-E-A60-FILA





## LED Filament B35

- Classic light bulb shape ensures an easy replacement
- Instant 100% light when switched on and no startup time
- Creating cosy atmosphere
- No UV / IR radiance so there is less risk of damage
- Up to 86% less energy consumption than traditional bulbs



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
500011000500	LED-E-B35-FILA-E14-2.8W-2700K-CL	GLS 25W	2.8	250	89	2700	A+	0.03
500011000300	LED-E-B35-FILA-E14-4W-2700K-CL	GLS 40W	4	470	118	2700	A+	0.03
500011000200	LED-E-B35-FILA-E14-4.5W-DIM-2700K-CL	GLS 40W	4.5	470	104	2700	A+	0.03
500011000400	LED-E-B35-FILA-E14-2.8W-DIM-2700K-FR	GLS 25W	2.8	250	89	2700	A+	0.03
500011000100	LED-E-B35-FILA-E14-4.5W-DIM-2700K-FR	GLS 40W	4.5	470	104	2700	A+	0.03

See appendix 1 for dimmer compatibility list.

Technical Specifications	
Lifespan (L70B50)	15,000 h
On-/Off-cycles	15,000
Dimmable	No / Yes (DIM)
Beam angle	360 °
Finishing	Transparent / Frosted
Colour rendering index CRI	≥ 80

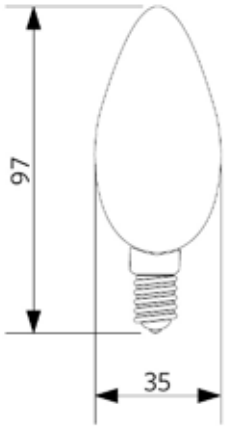
Electrical Supply	
Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

Ambient Conditions	
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



# Dimensional Drawing (mm)

LED-E-B35-FILA





## LED Filament Mini Globe

- Classic light bulb shape ensures an easy replacement
- Instant 100% light when switched on and no startup time
- Creating cosy atmosphere
- No UV / IR radiance so there is less risk of damage
- Up to 86% less energy consumption than traditional bulbs



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
500010000600	LED-E-P45-FILA-E14-2.8W-2700K-CL	GLS 25W	2.8	250	89	2700	A+	0.03
500010001800	LED-E-P45-FILA-E14-4W-2700K-CL	GLS 40W	4	470	118	2700	A+	0.03
500010001700	LED-E-P45-FILA-E14-4.5W-DIM-2700K-CL	GLS 40W	4.5	470	104	2700	A+	0.03
500010000500	LED-E-P45-FILA-E14-2.8W-DIM-2700K-FR	GLS 25W	2.8	250	89	2700	A+	0.03
500010000700	LED-E-P45-FILA-E14-4.5W-DIM-2700K-FR	GLS 40W	4.5	470	104	2700	A+	0.03
500010002000	LED-E-G45-FILA-E27-2.8W-2700K-CL	GLS 25W	2.8	250	89	2700	A+	0.03
500010000900	LED-E-G45-FILA-E27-4.5W-DIM-2700K-CL	GLS 40W	4.5	470	104	2700	A+	0.03
500010000800	LED-E-G45-FILA-E27-2.8W-DIM-2700K-FR	GLS 25W	2.8	250	89	2700	A+	0.03
500010001600	LED-E-G45-FILA-E27-4.5W-DIM-2700K-FR	GLS 40W	4.5	470	104	2700	A+	0.03

See appendix 1 for dimmer compatibility list.

### Technical Specifications

Lifespan (L70B50)	15,000 h
On-/Off-cycles	15,000
Dimmable	No / Yes (DIM)
Beam angle	360 °
Finishing	Transparent / Frosted
Colour rendering index CRI	≥ 80

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

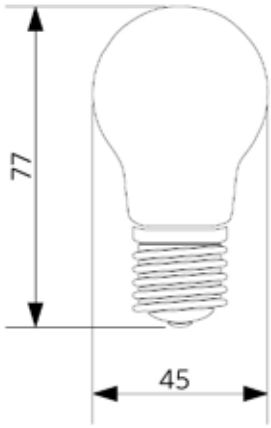
### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

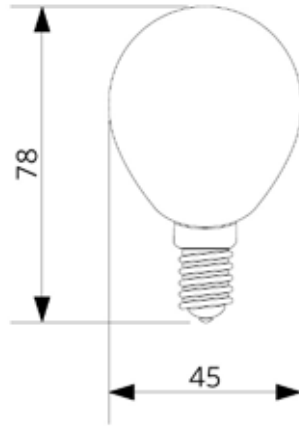


## Dimensional Drawing (mm)

LED-E-G45-FILA



LED-E-P45-FILA





## LED Filament ST64

- Classic light bulb shape ensures an easy replacement
- Instant 100% light when switched on and no startup time
- Creating cosy atmosphere
- No UV / IR radiance so there is less risk of damage
- Up to 86% less energy consumption than traditional bulbs
- Available in 2200K and 2700K



## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
500012000300	LED-E-ST64-FILA-E27-4.5W-DIM-2700K-CL	GLS 40W	4.5	470	104	2700	A+	0.03
500012000100	LED-E-ST64-FILA-E27-7W-DIM-2700K-CL	GLS 60W	7	806	115	2700	A+	0.03
500012000200	LED-E-ST64-FILA-E27-4.5W-DIM-2200K-CL	GLS 40W	4.5	400	89	2200	A+	0.03
500012000400	LED-E-ST64-FILA-E27-7W-DIM-2200K-CL	GLS 60W	7	700	100	2200	A+	0.03

See appendix 1 for dimmer compatibility list

### Technical Specifications

Lifespan (L70B50)	15,000 h
On-/Off-cycles	15,000
Dimmable	Yes (DIM)
Beam angle	360 °
Finishing	Transparent
Colour rendering index CRI	≥ 80

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



# Dimensional Drawing (mm)

LED-E-ST64-FILA





## LED Reflector EcoMax GU10

- Full retrofit of existing halogen GU10 lamps
- Dimmable versions available up to 575lm
- Available in 3000K and 4000K
- Light silver coloured
- No UV/IR radiation
- Significantly lower heat output than halogen, avoiding discolouration and risk of damaging goods
- Up to 87% lower energy consumption than halogen



See appendix 1 for dimmer compatibility list

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140060948	LED-E-GU10-3,5W-3000K-36D-DIM	Halogen 35W	3.5	245	70	3000	A+	0.03
140060952	LED-E-GU10-3,5W-4000K-36D-DIM	Halogen 35W	3.5	260	74	4000	A+	0.03
140060949	LED-E-GU10-5,2W-3000K-36D-DIM	Halogen 50W	5.2	350	67	3000	A+	0.04
140060953	LED-E-GU10-5,2W-4000K-36D-DIM	Halogen 50W	5.2	360	69	4000	A+	0.04
140060951	LED-E-GU10-7,5W-3000K-36D-DIM	Halogen 75W	7.5	565	75	3000	A+	0.06
140060955	LED-E-GU10-7,5W-4000K-36D-DIM	Halogen 75W	7.5	575	77	4000	A+	0.06

### Technical Specifications

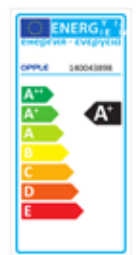
Lifespan (L70B50)	15,000 h
On-/Off-cycles	50,000
Dimmable	Yes
Beam angle	36 °
Finishing	Silver
Colour rendering index CRI	≥ 80

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No

### Ambient Conditions

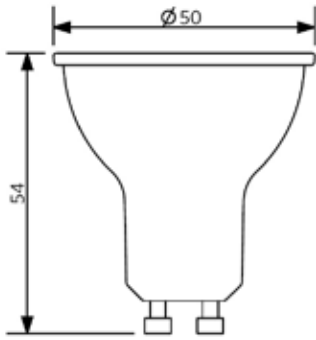
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C



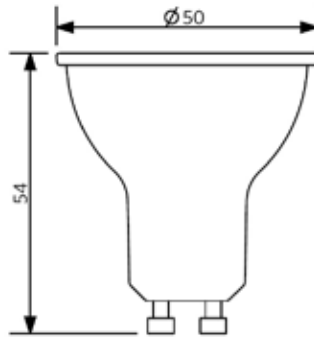


# Dimensional Drawing (mm)

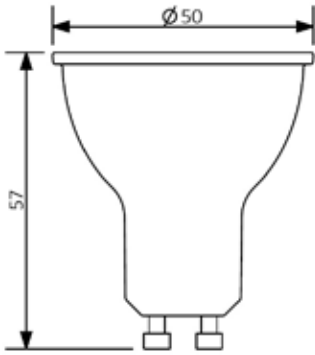
LED-E-GU10-3,5W



LED-E-GU10-5,2W



LED-E-GU10-7,5W





## Universal T8 LED Tube

- One fits all, compatible with all electronic & magnetic ballasts
- True plug & play LED tube solution
- Safety end cap to ensure complete safe installation
- Very short lamp cap
- Unique patented 'oneTLED' technology
- High efficacy up to 125 lm/W
- Energy saving up to 65%



For EM installations ALWAYS replace the starter with the starter which is delivered with the Universal LED T8 tube  
Tubes are NOT suitable for serial installation

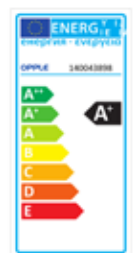
## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140056692	LED P T8 Uni 1200 16.5W 100pct 3000K CT	TL 1x36W	16.5	2150	130	3000	A+	0.38
140056693	LED P T8 Uni 1200 16.5W 100pct 4000K CT	TL 1x36W	16.5	2150	130	4000	A+	0.38
140056694	LED P T8 Uni 1200 16.5W 100pct 6500K CT	TL 1x36W	16.5	2150	130	6500	A+	0.38
140056695	LED P T8 Uni 1500 24.5W 100pct 3000K CT	TL 1x58W	24.5	3200	130	3000	A+	0.48
140056696	LED P T8 Uni 1500 24.5W 100pct 4000K CT	TL 1x58W	24.5	3200	130	4000	A+	0.48
140056697	LED P T8 Uni 1500 24.5W 100pct 6500K CT	TL 1x58W	24.5	3200	130	6500	A+	0.48

Use on dimmable ballast might effect lifetime of the lamp and/or ballast  
The light output can differ depending on the luminaire and/or driver used

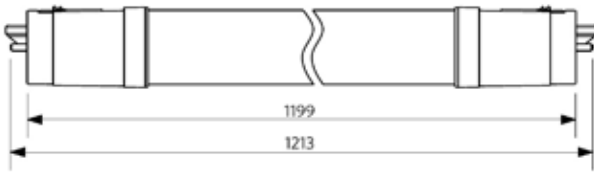
Technical Specifications	
Lifespan (L70B50)	50,000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	160 °
Finishing	White
Colour rendering index CRI	≥ 80
Fitting	G13

Electrical Supply	
Frequency	50/60 Hz
Nominal voltage	220-240 V AC
DC input voltage	No
Ambient Conditions	
Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

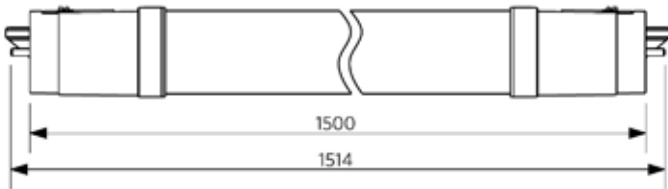


# Dimensional Drawing (mm)

LED P T8 Uni 1200



LED P T8 Uni 1500





## LED T8 Tube

- Single-ended full IEC compliant with patented driver
- Retrofit existing T8 lamps with EM ballast installations ONLY!
- No warm-up time, 100% light instantly when switched on
- Full glass
- High efficacy up to 120 lm/W
- Up to 62% lower energy consumption than fluorescent



SAFE AND EASY INSTALLATION: ONLY USE WITH LED DUMMY STARTER  
Tubes are NOT suitable for serial installation

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140062610	LED P T8 glass 600 8W 100pct 3000K CT	TL 1x18W	8	1050	131	3000	A++	0.12
140062611	LED P T8 glass 600 8W 100pct 4000K CT	TL 1x18W	8	1050	131	4000	A++	0.12
140062612	LED P T8 glass 600 8W 100pct 6500K CT	TL 1x18W	8	1050	131	6500	A++	0.12
140062613	LED P T8 glass 1200 16W 100pct 3000K CT	TL 1x36W	16	2100	131	3000	A++	0.21
140062614	LED P T8 glass 1200 16W 100pct 4000K CT	TL 1x36W	16	2100	131	4000	A++	0.21
140062615	LED P T8 glass 1200 16W 100pct 6500K CT	TL 1x36W	16	2100	131	6500	A++	0.21
140062616	LED P T8 glass 1500 23W 100pct 3000K CT	TL 1x58W	23	3100	134	3000	A++	0.26
140062617	LED P T8 glass 1500 23W 100pct 4000K CT	TL 1x58W	23	3100	134	4000	A++	0.26
140062618	LED P T8 glass 1500 23W 100pct 6500K CT	TL 1x58W	23	3100	134	6500	A++	0.26

Single-ended connection



### Technical Specifications

Lifespan (L70B50)	50,000 h
On-/Off-cycles	100,000
Dimmable	No
Beam angle	220 °
Finishing	White
Colour rendering index CRI	≥ 80
Fitting	G13

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V
	AC
DC input voltage	No

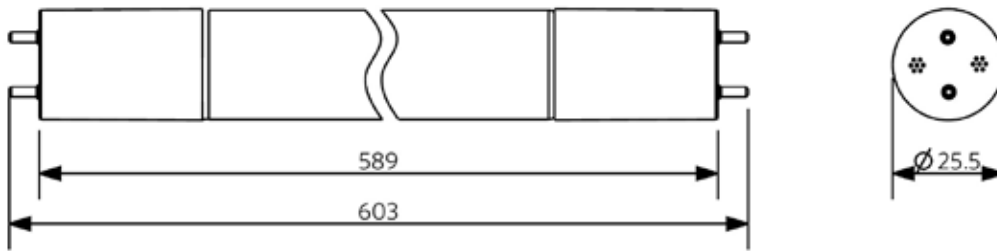
### Ambient Conditions

Operating temperature	-20 ~ 45 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

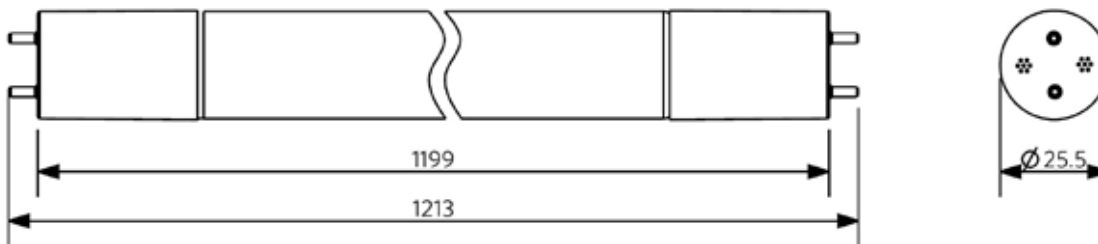


## Dimensional Drawing (mm)

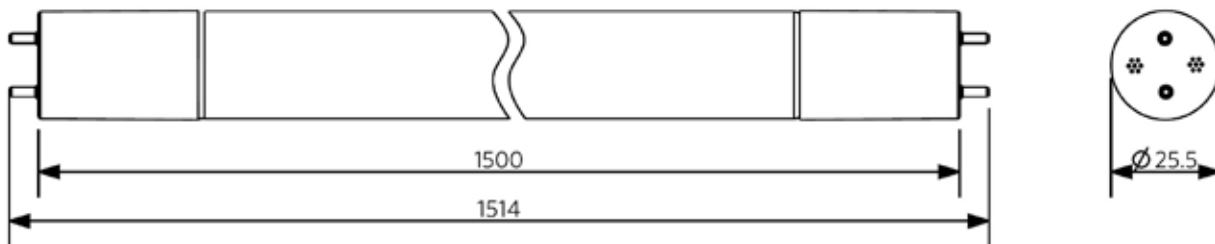
LED P T8 glass 600



LED P T8 glass 1200



LED P T8 glass 1500





## LED High Power Bulb

- High lumen output allows easy replacement up to 400W HID
- To be used in existing luminaire with E40 sockets, of which the ballast needs to be removed
- Connects directly to 220-240V
- High lumen packages with high efficacy: up to 13,000 lm and 113 lm/W
- Enables both surface and hook mounting
- Up to 55% energy savings compared to traditional HID lamps
- 2.5 times longer lifetime compared to traditional HID lamps

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Weight (kg/pc)
140062576	LED P HPB E40 90W 4000K 140D CT	HID 250W	90	8000	89	4000	1.38
140062577	LED P HPB E40 115W 4000K 140D CT	HID 400W	115	13000	113	4000	1.86

## Accessories



140062578  
HPB Accessory Hook Mounted E40



140062579  
HPB Accessory Surface Mounted E40

### Technical Specifications

Lifespan (L70B50)	25,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	50,000
Colour consistency (SDCM)	6
Dimmable	No
Beam angle	140 °
Finishing	Grey
Colour rendering index CRI	≥ 80
Protection class	II
Control gear included	Yes
Glow wire test	650 °C
Driver failure rate (at 5,000 hrs)	1 %
Power factor	≥ 0.90

### Electrical Supply

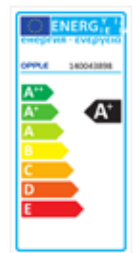
Frequency	50/60 Hz
Nominal voltage	220-240 V
	AC
DC input voltage	No

### Mechanical Properties

Material housing	Aluminum
Optical material	Polycarbonate

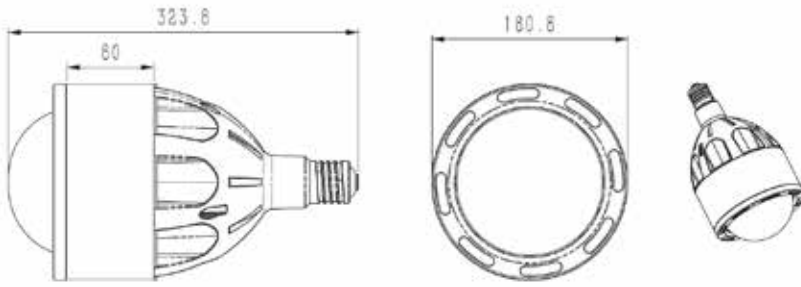
### Ambient Conditions

Operating temperature	-20 ~ 35 °C
Storage environment	-25 ~ 50 °C

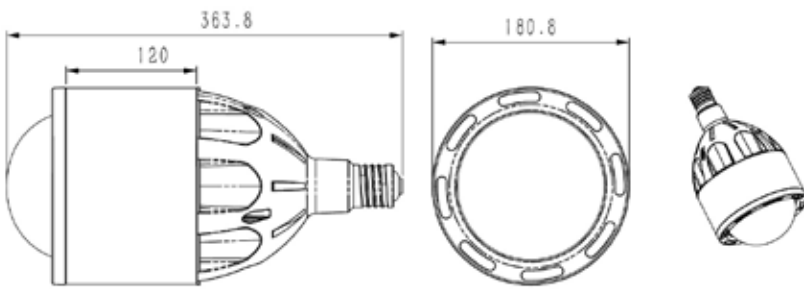


# Dimensional Drawing (mm)

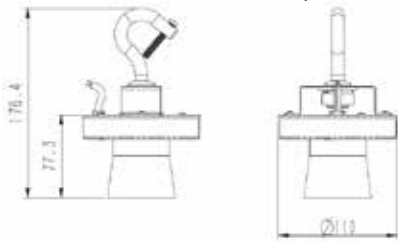
LED P HPB E40 90W



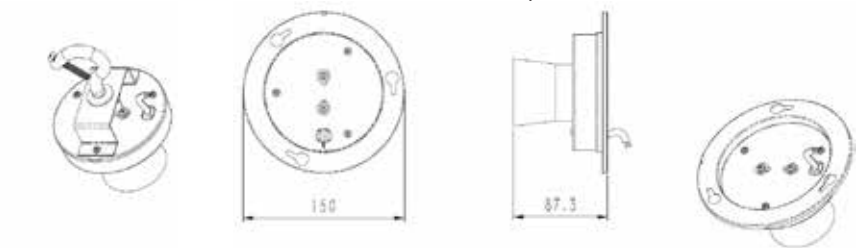
LED P HPB E40 115W

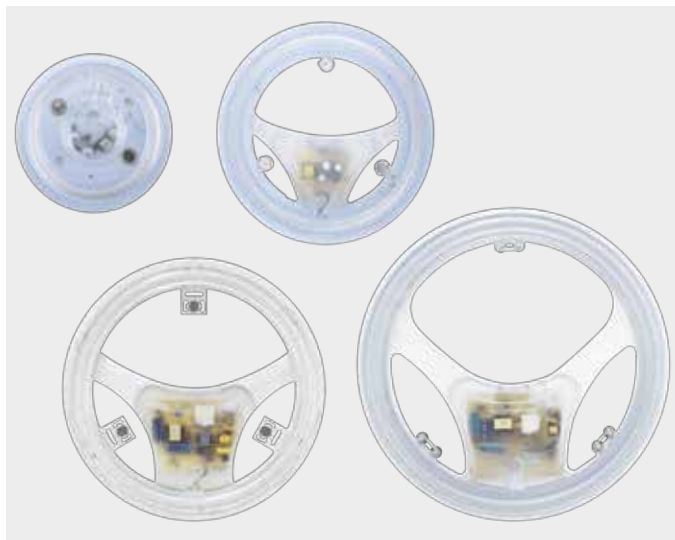


HPB Accessory Hook Mounted



HPB Accessory Surface Mounted





## LED Module Clío G2

- Fits well in slim ceiling luminaires up to 550mm in diameter
- Easy and flexible installation
- Shadow free, homogeneous light diffusion and 100% light instant on
- High efficacy up to 100 lm/W
- Integrated driver, connects directly to 220-240V
- Including magnets and connection box
- Movement detector accessory available for 12W & 16W



See appendix 1 for dimmer compatibility list

## Specifications

Item Code	Item Description	Equivalent to (W)	Power (W)	Lumen	Efficacy (lm/W)	CCT (K)	Energy Level	Weight (kg/pc)
140066573	LED E C module 12W 2700K Clío CT	GLS 75W	12	1000	82	2700	A+	0.10
140066574	LED E C module 12W 4000K Clío CT	GLS 75W	12	1100	91	4000	A+	0.10
140066575	LED E C module 16W 2700K Clío CT II	GLS 100W	16	1400	87	2700	A+	0.17
140066576	LED E C module 16W 4000K Clío CT II	GLS 100W	16	1600	100	4000	A+	0.17
140066204	LED E C module 22W DIM 2700K Clío CT	CFL TC-DD/PL-Q 28W	22	1800	83	2700	A+	0.24
140066205	LED E C module 22W DIM 4000K Clío CT	CFL TC-DD/PL-Q 28W	22	2000	91	4000	A+	0.24
140066206	LED E C module 36W DIM 2700K Clío CT	CFL TC-DD/PL-Q 38W	36	2800	78	2700	A	0.49
140066207	LED E C module 36W DIM 4000K Clío CT	CFL TC-DD/PL-Q 38W	36	3000	83	4000	A+	0.49

## Accessories



140060553  
LED Module sensor CT

Sensor only for 12W and 16W.  
Sensor range 12m.



### Technical Specifications

Lifespan (L70B50)	30,000 h
Lifespan (L80B50)	20,000 h
On-/Off-cycles	100,000
Dimmable	No / Yes (22W/36W)
Beam angle	150 °
Colour rendering index CRI	≥ 80
Degree of protection (IP)	IP20
Protection class	II
Control gear included	Yes

### Electrical Supply

Frequency	50/60 Hz
Nominal voltage	220-240 V
	AC
DC input voltage	No

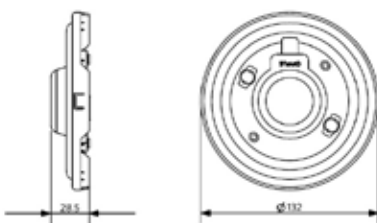
### Ambient Conditions

Operating temperature	-20 ~ 40 °C
Application temperature	25 °C
Storage environment	-25 ~ 50 °C

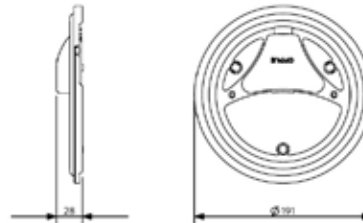


## Dimensional Drawing (mm)

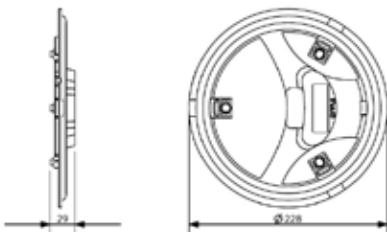
LED E C module 12W



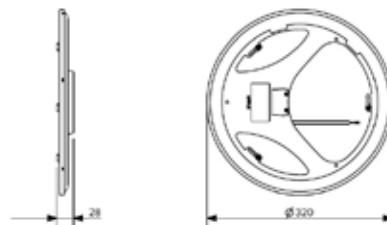
LED E C module 16W



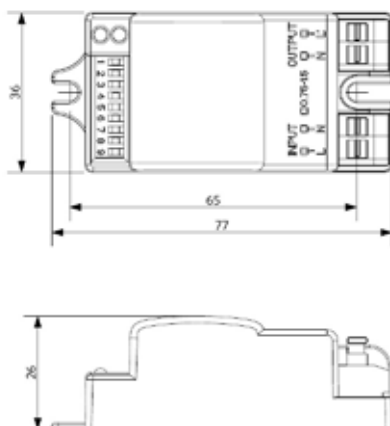
LED E C module 22W



LED E C module 36W



LED Module sensor CT





## LED Light Master G2

- Easy connection via bluetooth
- Simple solution for measurement of light level (lux) and colour temperature (Kelvin)
- Compatible with iOS and Android
- Rechargeable with micro USB (cable not included)



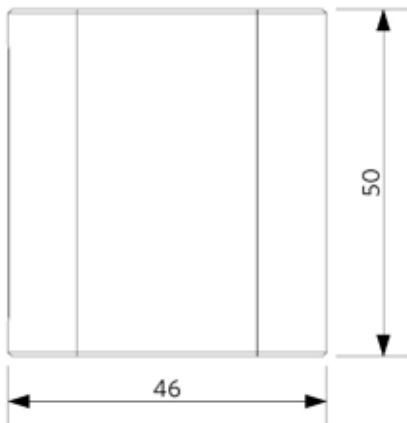
### Specifications

Item Code	Item Description
599000001600	Light-master-II

Technical Specifications	
Rechargeable	Yes - micro USB
Lux range	0-10000 lx
Color temperature range	2000-25000 K
Accuracy	~ 5% deviation
Operating temperature	-10 ~ 40 °C






### Dimensional Drawing (mm)







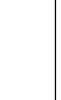










# Dimming compatibility Level

Compatible	No flicker, no noise
Semi-compatible	No flicker, possible noise
Incompatible	Possible flicker, possible noise
Untested	

Dimmer brand	Type	Max. load	Spot RA HQ Dim		Downlight HZ Dim				Spot Ava	
			7W	8W	7W	10W	13W	16W		
										
GIRA	UNIV 420WV	50 VA - 420 VA		1-9						
GIRA	HAL/LED 500VA	20 VA - 500 VA							1-6	1-6
GIRA	117600/104	50-420W	1-11		1-11	1-8	1-6	1-5		
GIRA	226200/101	20-500W/LED3-100W	1-13		1-13	1-10	1-7	1-6	1-14	1-11
GIRA	0302 00/101	60-600W	1-16		1-16	1-12	1-9	1-7	1-17	1-13
GIRA	0307 00/102	20-525W	1-14		1-14	1-10		1-6	1-15	1-11
ABB	2250 AJ-513	60 - 600W		2-11					2-6	2-6
Berker	286610	20-500W	1-13	1-5	1-13	1-10	1-7	1-6		1-11
Berker	2819	60-400W		1-10						
Berker	2830 10	60-400W	1-10			1-8	1-6	1-5	1-11	
BUSCH-JAEGER	6523U	LED typical 2 ... 100W	1-13	1-11	1-13	1-10	1-7	1-6	1-14	1-11
BUSCH-JAEGER	6513 U-102	40 - 420W	1-11	1-9	1-11	1-8		1-5	1-12	1-9
BUSCH-JAEGER	2247U	20 - 500W		1-11	1-13	1-10	1-7	1-6	1-14	1-6
BUSCH-JAEGER	6524U	LED 2 - 100 W	1-13	2-5	1-13	1-10	1-7	1-6	1-14	
BUSCH-JAEGER	2250U	600W	1-16	2-11	1-16	1-12	1-9	1-7	1-17	2-13
Busch	6523U-102	10-250W/LED2-100W	1-13		1-13	1-10	1-7	1-6	1-14	1-11
Busch	6526U	10-200W/LED2-100W					1-7			
Eetako	EUD61NPN-UC	400W		1-9						
JUNG	225 NV DE	20-500W/LED3-100W	1-13	1-3	1-13	1-10	1-7	1-6	1-14	1-11
JUNG	266 G DE	60-600W	1-16	1-3	1-16	1-12	1-9	1-7	1-7	1-13
Klemko	891040	315W		1-5					1-6	1-6
merten	MEG5134-0000	4-400W	1-10	1-10	1-11	1-8	1-6	1-5	1-11	1-11
NIKO	310-0190X	5-325W	1-8	1-13	1-9	1-6	1-4	1-4	1-9	1-7
NIKO	310-02900	3-300W	1-8		1-8	1-6	1-4	1-3	1-8	
PEHA	TRONIC-DIMMER 435 HAB	20-600W	1-16	1-10	1-16	1-12	1-7	1-7	1-17	1-2
PEHA	D 431HAN LED	6-120W/LED6-60W	1-8	1-7	1-8	1-6	1-4	1-4	1-8	1-7
TRUMP	DIMMAX 420SL	400W		1-10						
EFAPPEL	21215	3-50W	1-6		1-6	1-5	1-3	1-3	1-7	1-5
EFAPPEL	21214	3-35W	1-4		1-4	1-3	1-2	1-2	1-5	1-4
EFAPPEL	21216	3-85W	1-11		1-11	1-8	1-6	1-5	1-12	1-9
OPUS	852,397	7-110W/LED3-35W	1-4		1-4	1-3	1-2	1-2	1-5	
EPV	PAB 315	20-315W	1-8		1-8	1-6	1-4	1-4	1-9	
Legrand	617 030	40-600w	1-16			1-12		1-7		
Panasonic	BS EN 60669-2-1	150-500W				1-10	1-7	1-6		
Panasonic	WEG578153	80-500W	1-13		1-13	1-10	1-7	1-6	1-14	
BULL	B6GD100	500W				1-10	1-7	1-6	1-14	
SIEMENS	5UH8222-3NC01	40-500W	1-13		1-13	1-10	1-7	1-6	1-14	
NVC	EP8D11A BLB5	400W	1-10		1-11	1-8	1-6	1-5	1-11	
Feller	40200 LED FMI 61	4-200W/VA	1-5		1-5	1-3	1-3	1-2		
Feller	40600 RL FIM61	20-300W/VA	1-8		1-7	1-5	1-4	1-3		
Feller	40300 RC FMI 61	40-600VA/W	1-16						1-16	1-12
Feller	40600 RLC FMI 61	20-600VA/W			1-15	1-11	1-8	1-7		1-12

Please note: For example, a Berker 286610 dimmer can control a minimum of 1 and a maximum of 10 Opplé GU10 3.2W lamps

Dimmer brand	Model	Type	Max. load	Filament											
				A60	A60	G45	G45	P45	P45	B35	B35	ST64	ST64	ST64	ST64
				470lm	806lm	470 lm	806lm	470 lm	806lm	250lm	470lm	470lm	806lm	400lm	700lm
															
Busch Jaeger	2247U	RL	500W	1-20	1-20	2-20	1-20	2-20	1-20	2-20	1-20	1-20	1-20	1-20	1-20
Busch Jaeger	2250U	R	600W	1-20	1-20	1-12	1-20	1-12	1-20	1-12	1-20	1-20	1-20	1-20	1-20
Busch Jaeger	6513 U-102	RC	40-420W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Busch Jaeger	6523U	R,L	100W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Busch Jaeger	6523 U-102	R,C	250W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Jung	266 GDE	R	60-600W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Jung	Licht-Management 225 NV DE	RL	100W	1-20	1-20	2-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Berker	286610	RL	500W	1-20	1-20	2-10	1-20	2-10	1-20	2-10	1-20	1-20	1-20	1-20	1-20
Berker	2819	R	400W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Berker	283010	R	400W	1-20	1-20	1-12	1-20	1-12	1-20	1-12	1-20	1-20	1-20	1-20	1-20
Wintop	13212	L	300W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Wintop	13512	RC	500W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Gira	1176 00/104	R,L,C	420W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Gira	2262 00/101	R,L	500W	1-20	1-20	2-20	1-20	2-20	1-20	2-20	1-20	1-20	1-20	1-20	1-20
Gira	030200	R	600W	1-20	1-20	1-12	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Gira	030700	R,C	525W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
Druck	8095	RL	400W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20
NIKO	310-01901	R,L,C,CFLi	325W	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20	1-20

Dimmer brand	Model	Type	Max. load	GU10			LED Module Clio GEN2		LED Ceiling Light Apollo	T5 Batten DIM	
				3,2W	5,2W	7,5W	22W	36W	22W	9W	18W
											
Busch Jaeger	2247U	RL	500W	1-10	1-3	1-10	1-4	1-3	1-4	1-6	1-6
Busch Jaeger	2250U	R	600W	1-10	1-5	1-10	1-5	1-3	1-5	1-6	1-5
Busch Jaeger	6513 U-102	RC	40-420W	2-10	1-10	1-10	1-6	1-4	1-6	1-9	1-5
Busch Jaeger	6523U	R,L	100W	1-10	1-5	1-10	1-1	1-2	1-1	1-1	1-1
Busch Jaeger	6523 U-102	R,C	250W	1-10	1-10	1-10	1-1	1-1	1-1	1-1	1-1
Jung	266 GDE	R	60-600W	1-10	1-7	1-10	1-4	1-3	1-4	1-6	1-6
Jung	Licht-Management 225 NV DE	RL	100W	1-10	1-5	1-10				1-6	1-6
Berker	286610	RL	500W	1-10	1-3	1-10	1-4	1-3	1-4	1-6	1-3
Berker	2819	R	400W	1-7	1-4	1-10	1-1	1-1	1-1	1-3	1-3
Berker	283010	R	400W	1-10	1-3	1-10	1-2	1-1	1-2	1-3	1-3
Wintop	13212	L	300W				1-2	1-1	1-2	1-2	1-2
Wintop	13512	RC	500W	1-10	1-10	1-10	1-7	1-4	1-7	1-22	1-16
Gira	1176 00/104	R,L,C	420W	1-10	1-10	1-10	1-2	1-2	1-2	1-18	1-12
Gira	2262 00/101	R,L	500W	1-10	1-10	1-10	1-5	1-3	1-5	1-6	1-6
Gira	030200	R	600W	1-10	1-3	1-10	1-5	1-3	1-5	1-6	1-6
Gira	030700	R,C	525W	1-10	1-10	1-10	1-5	1-4	1-5	1-23	1-16
Druck	8095	RL	400W	1-10	1-10	1-10	1-2	1-2	1-2	1-3	1-3
NIKO	310-01901	R,L,C,CFLi	325W	1-10	1-10	1-10	1-4	1-3	1-4	1-13	1-9

# Connection specifications

Tables below present the maximum number of luminaires that can be connected on one B16/C16 automate.

Category	Series	Types	DC Input Voltage	Max. units per B16	Max. units per C16	Category	Series	Types	DC Input Voltage	Max. units per B16	Max. units per C16
LED Panel	Grille	11W / 21W / 36W	190-210 V DC	37	62	LED Highbay	Performer G3	120W / 120W DALI	176 - 280 V DC	11	19
LED Panel	Grille	13W DALI / 21W DALI	186-250 V DC	30	51	LED Highbay	Performer G3	160W / 160W DALI	176 - 280 V DC	11	18
LED Panel	Grille	36W DALI Sq595	186-250 V DC	37	62	LED Waterproof	EcoMax L650	10W	130 - 200 V DC	52	88
LED Panel	Grille	36W DALI Re298	186-250 V DC	24	40	LED Waterproof	EcoMax L650	23W	190 - 220 V DC	42	70
LED Panel	Slim Performer	30W / 30W DALI	200 - 300 V DC	25	42	LED Waterproof	EcoMax L1250	20W	190 - 220 V DC	44	73
LED Panel	Slim Performer	30W BLE	n / a	25	42	LED Waterproof	EcoMax L1250	43W	140 - 215 V DC	28	47
LED Panel	Slim EcoMax	34W	n / a	11	19	LED Waterproof	EcoMax L1550	29W	140 - 215 V DC	32	54
LED Panel Suspended	Zenith	75W DALI	190 - 210 V DC	18	30	LED Waterproof	EcoMax L1550	57W	140 - 215 V DC	19	33
LED Panel	Slim Basic	36W	150 - 300 V DC	47	80	LED Waterproof	Performer G2 L653	12.5W / 23W	150 - 300 V DC	66	111
LED Downlight	Performer HG/MW	11.5W / 11.5W DALI	200 - 300 V DC	55	92	LED Waterproof	Performer G2 L1263	23W	150 - 300 V DC	58	96
LED Downlight	Performer HG/MW	15W / 15W DALI	200 - 300 V DC	55	92	LED Waterproof	Performer G2 L1263	40W	150 - 300 V DC	66	111
LED Downlight	Performer HG/MW	23W / 23W DALI	200 - 300 V DC	26	43	LED Waterproof	Performer G2 L1563	27W / 51W	150 - 300 V DC	58	96
LED Downlight	Performer HG/MW	33W / 33W DALI	200 - 300 V DC	26	43	LED Waterproof	Performer G2 L1563	75W / 90W	180 - 260 V DC	6	11
LED Downlight	HZdim	7W	200 - 300 V DC	181	307	LED Waterproof	Performer G2 L653	13W DALI	n/a	30	51
LED Downlight	HZdim	10W	200 - 300 V DC	126	214	LED Waterproof	Performer G2 L653	24W DALI	n/a	24	40
LED Downlight	HZdim	13W	200 - 300 V DC	97	164	LED Waterproof	Performer G2 L1263	24W DALI / 45W DALI	n/a	24	40
LED Downlight	HZdim	16W	200 - 300 V DC	79	134	LED Waterproof	Performer G2 L1563	28W DALI / 55W DALI	n/a	24	40
LED Downlight	Slim EcoMax	12W	n/a	105	178	LED Waterproof	Performer G2 L1563	75W / 90W	180 - 260 V DC	6	11
LED Downlight	Slim EcoMax	24W	n/a	52	88	LED T8 Batten	T8 Batten	19W / 38W	150 - 300 V DC	44	74
LED Downlight	Basic	12W	200 - 300 V DC	168	263	LED Streetlight	Streetlight	20W / 40W	200 - 300 V DC	29	49
LED Downlight	Basic	22W	200 - 300 V DC	44	74	LED Streetlight	Streetlight	65W	190 - 210 V DC	11	18
LED Spot	Performer 3C/RA	30W	200 - 300 V DC	13	22	LED Flood	EcoMax	10W / 20W	n/a	62	105
LED Spot	Performer 3C/RA	45W	190 - 210 V DC	9	15	LED Flood	EcoMax	30W	310 V DC	44	74
LED Spot	Performer 3C/RA	30W DALI / 45W DALI	180 - 260 V DC	8	14	LED Flood	EcoMax	50W	310 V DC	27	45
LED Spot	HQ	7W Dim	200 - 300 V DC	181	307	LED Flood	EcoMax	70W	310 V DC	19	32
LED Spot	HQ	8W Dim	190 - 210 V DC	240	408	LED Flood	Performer	90W / 125W / 160W	190 - 210 V DC	11	18
LED Spot	Ecomax	4.5W	190 - 210 V DC	281	477	LED Flood	Basic	10W	190-270	37	75
LED Spot	Ecomax	7W	180 - 260 V DC	181	307	LED Flood	Basic	20W	190-270	16	31
LED Lowbay	Lowbay	30W / 50W	n/a	17	29	LED Flood	Basic	30W	190-270	12	24
LED Highbay	Performer G3	80W / 80W DALI	176 - 280 V DC	11	19	LED Flood	Basic	50W	176-264	58	116
						LED Flood	Basic	70W	176-264	25	50
						LED Wall-Mounted	EcoMax	13W	n/a	55	93
						LED Wall-Mounted	EcoMax	20W	280 - 370 V DC	55	118
						LED Porchlight	EcoMax	5W / 6W / 8W / 9W	n/a	200	340

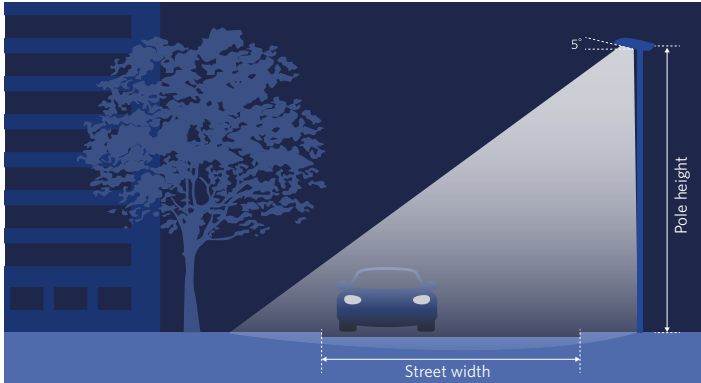
# Cut-Out conversion list

Cut-Out Overview																	
		Cut-Out (mm)	Φ60	Φ68	Φ72	Φ76	Φ80	Φ95	Φ120	Φ125	Φ150	Φ172	Φ175	Φ200	Φ210		
LED Downlight	Performer	LED DL-RC-P HG/MW R150-11.5W (incl DALI/BLE)									■						
		LED DL-RC-P HG/MW R200-15W (incl DALI/BLE)													■		
		LED DL-RC-P HG/MW R200-23W (incl DALI/BLE)													■		
		LED DL-RC-P HG/MW R200-33W (incl DALI/BLE)													■		
	EcoMax	HZdim	LED DL-RC-HZ DIM R125-7W								■						
			LED DL-RC-HZ DIM R150-10W									■					
			LED DL-RC-HZ DIM R175-13W											■			
			LED DL-RC-HZ DIM R200-16W													■	
	Slim EcoMax	Slim	LED DL-SL-E R150-12W									■					
			LED DL-SL-E R200-24W													■	
			LED DL-SL-E Sq150-12W										■				
			LED DL-SL-E Sq200-24W													■	
	Basic	Basic	LED DL-RC-B Rd150 12W									■					
			LED DL-RC-B Rd200 22W													■	
		Cut-Out (mm)	Φ60	Φ68	Φ72	Φ76	Φ80	Φ95	Φ120	Φ125	Φ150	Φ172	Φ175	Φ200	Φ210		
LED Spots	Performer	RA	LED SP-RA-P 30W								■						
			LED SP-RA-P 45W									■					
	HQ	RA	LED SP-RA-HQ 7W				■	■									
			LED SP-RA-HQ 8W				■	■									
	EcoMax	RF	LED-SP-RF 4.5W		■												
			LED-SP-RF 7W		■												
	Decorative	Chalice	LED Chalice 4.5W	■													
		Ava	LED Ava 7W		■	■	■										
		Ava	LED Ava 9W						■								

Note: For Downlight Performer, HZ<sup>DIM</sup> en Slim adapter rings are also available.

# Roadlight - Possible pole distances

## Maximum Pole Distances



Lighting Class according to EN 13201: 2015  
 Lighting Calculation details:  
 • Roadway surface CIE R3 Qo: 0.7  
 • Maintenance factor: 0.8  
 • Arrangement type: single side bottom

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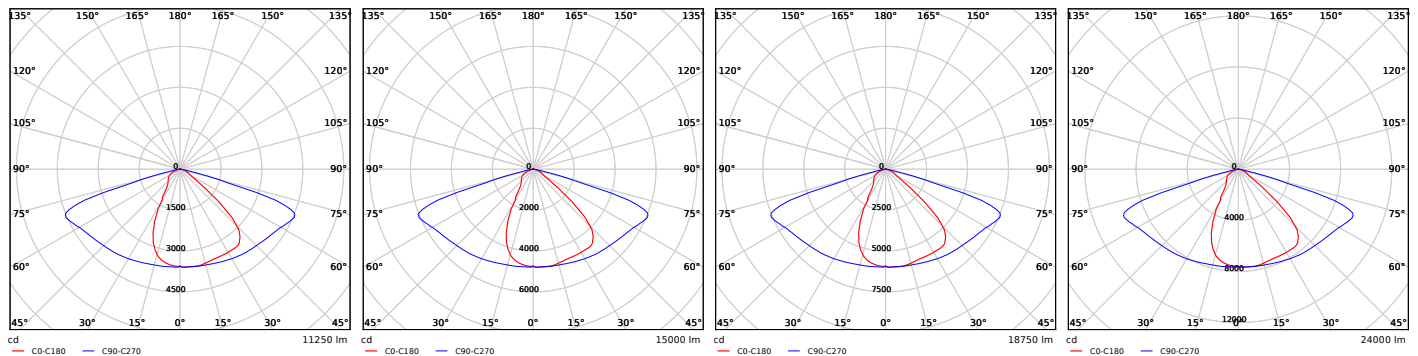
## M-Class Roads

Luminaire	Illuminance Class	Width [m]	Pole distance[m]	Pole height [m]	Boom angle [°]	Light overhang [m]
543014005800 LEDRoadlight-90W-4000-DALI	M3	11	32	8	10	1
		10	34	8	5	1
		9	35	8	10	0,8
		8	35	9	0	0,9
	M4	11	39	9	10	1
		10	40	10	0	0,9
		9	41	10	5	0,9
		8	42	10	5	0,6
543014005700 LEDRoadlight-120W-4000-DALI	M3	11	39	9	10	0,7
		10	40	10	0	1
		9	41	10	0	0,6
		8	42	10	5	0,9
	M4	11	47	11	5	0,7
		10	48	11	10	0,6
		9	49	12	0	0,9
		8	51	12	5	0,9

Luminaire	Illuminance Class	Width [m]	Pole distance[m]	Pole height [m]	Boom angle [°]	Light overhang [m]
543014005600 LEDRoadlight-150W-4000-DALI	M3	11	45	11	0	0,9
		10	46	11	5	0,8
		9	47	11	5	0,8
		8	48	11	10	0,3
	M4	11	54	13	0	1
		10	55	13	5	1
		9	55	13	10	0,4
		8	57	14	0	1
543014005500 LEDRoadlight-200W-4000-DALI	M3	11	52	12	10	0,9
		10	54	13	0	1
		9	55	13	5	1
		8	55	13	5	0,7
	M4	11	62	15	0	0,7
		10	64	15	5	0,9
		9	64	15	5	0,2
		8	65	15	10	0

M-class = main road

## Polar Diagrams



LEDRoadlight 90W-4000K-DALI

LEDRoadlight 120W-4000K-DALI

LEDRoadlight 150W-4000K-DALI

LEDRoadlight 200W-4000K-DALI

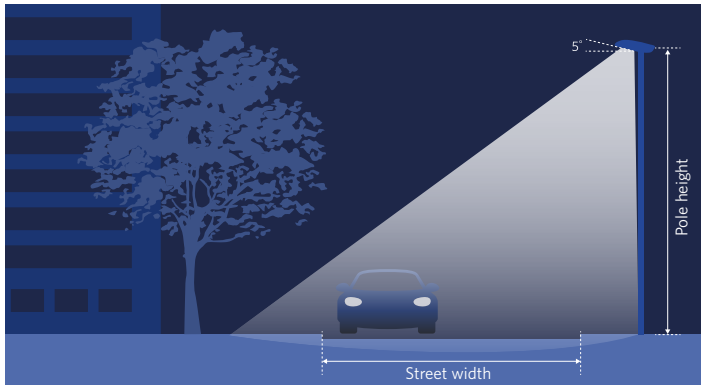
### Appendix 4

Version October 2018  
 Data subject to change  
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# Streetlight - Possible pole distances

## Maximum Pole Distances



Lighting Class according to EN 13201: 2015  
 Lighting Calculation details:

- Roadway surface CIE R3 Qo: 0.7
- Maintenance factor: 0.8
- Arrangement type: single side bottom

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### M-Class Roads

Luminaire	Illuminance Class	Street width [m]	Maximum pole distance[m]	Pole height [m]	Boom angle [°]	Light overhang [m]
140065922-LEDStreetlight 20W-4000K-SE	M5	4	26	5	5	0,1
		5	24	5	5	0,3
		6	22	5	5	0,4
	M6	4	35	7	5	0,2
		5	34	6,5	5	0,1
		6	32	6,5	5	0,5
140066385-LEDStreetlight 40W-4000K-SE	M5	4	37	7,5	5	0,4
		5	36	7	5	0,2
		6	34	7	5	0,4
	M6	4	49	10	5	0,5
		5	48	9,5	5	0,1
		6	46	9,5	5	0,5
543014002700-LEDStreetlight 65W-4000K-SE	M4	5	34	8,5	5	0,3
		6	33	8,5	5	0,4
		7	32	8	5	0,4
	M5	8	30	8	5	0,5
		5	47	10	5	0,3
		6	46	9,5	5	0,3
		7	44	9,5	5	0,5
		8	41	9,5	5	0,5

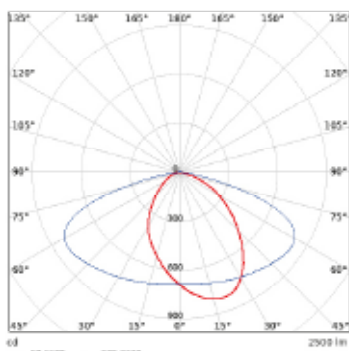
M-class = main road

### P-Class Roads

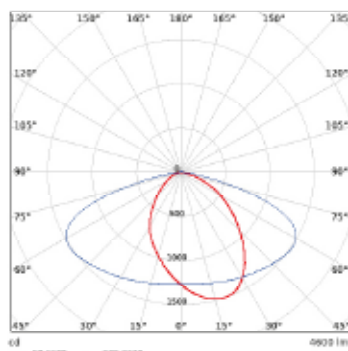
Luminaire	Illuminance Class	Street width [m]	Maximum pole distance[m]	Pole height [m]	Boom angle [°]	Light overhang [m]
140065922-LEDStreetlight 20W-4000K-SE	P2	3	24	4,5	5	0
		4	23	4	5	0
		5	23	4	5	0,5
	P4	6	20	4	5	0,3
		3	35	6,5	5	0,5
		4	35	6,5	5	0,3
140066385-LEDStreetlight 40W-4000K-SE	P2	5	34	6	5	0,1
		6	33	6	5	0,5
		3	32	6	5	0,4
	P4	4	32	6,5	5	0,5
		5	32	6	5	0,2
		6	31	5,5	5	0,2
543014002700-LEDStreetlight 65W-4000K-SE	P4	3	47	9	5	0,1
		4	47	9	5	0,3
		5	46	9	5	0,5
	P2	6	46	8,5	5	0,3
		4	43	8,5	5	0,3
		5	42	8	5	0,1
		6	41	8,5	5	0,3
		7	41	8	5	0,5

P-class = pedestrian road

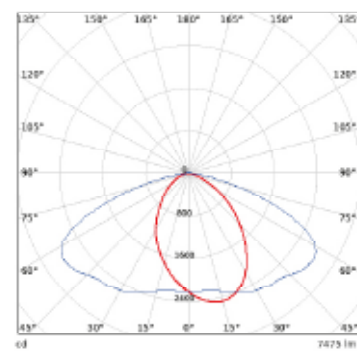
## Polar Diagrams



LEDStreetlight 20W-4000K-SE



LEDStreetlight 40W-4000K-SE



LEDStreetlight 65W-4000K-SE









# Definition of terms

## CRI (Ra)

### Colour Rendering Index

A color rendering index (CRI) is a quantitative measure of the ability of a light source to reveal the colors of various objects faithfully in comparison with an ideal or natural light source.

## CCT

### Color temperature in Kelvin

The color temperature of a light source is the temperature of an ideal black-body radiator that radiates light of comparable color to that of the light source.

## lm

### lumen

The lumen (symbol: lm) is a measure of the total quantity of visible light emitted by a source

## lx

### lux

#### lumen/m<sup>2</sup>

The lux (symbol: lx) is measuring luminous flux per unit area. It is equal to one lumen per square metre. In photometry, this is used as a measure of the intensity, as perceived by the human eye, of light that hits or passes through a surface.

## Efficacy

### lm/W

Amount of light produced (lm) per unit of energy consumed (W) Luminous efficacy is a measure of how well a light source produces visible light. It is the ratio of luminous flux to power, measured in lumens per watt

## UGR

### Unified Glare Rating

The unified glare rating (UGR) is a measure of the glare in a given environment. It is basically the logarithm of the glare of all visible lamps, divided by the background lumination.

## DALI

### Digital Addressable Lighting Interface

Digital Addressable Lighting Interface (DALI) is a trademark for network-based systems that control lighting in building automation.

## SDCM

### standard deviation of color matching

SDCM has the same meaning as a "MacAdam ellipse". A 1-step MacAdam ellipse defines a zone in the CIE 1931 2 deg (xy) colour space within which the human eye cannot discern colour difference.

## Power factor (pf)

### Difference between power and apparent power

The power factor of an AC electrical power system is defined as the ratio of the real power flowing to the load to the apparent power in the circuit and is a dimensionless number in the closed interval of -1 to 1. A power factor of less than one means that the

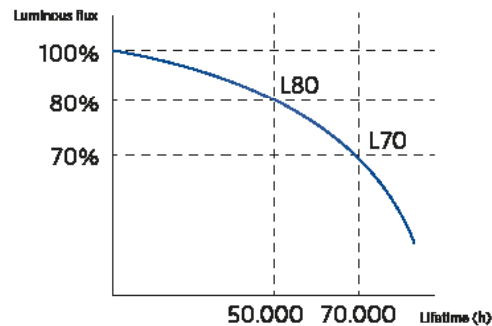
voltage and current waveforms are not in phase, reducing the instantaneous product of the two waveforms.

## L70B50

Lifespan: 50% of the installed luminaires, gives min. 70% lightoutput

## L80B50

Lifespan: 50% of the installed luminaires, gives min. 80% lightoutput



L70B50, L80B50 are as described in IEC 62717 and IEC 62722-2-1.

## Input current

The steady state current which a device uses from the net after switch-on

## Inrush Current

The maximum current that will occur during a short period of time after switching on of the luminaire.

## IP

### International Protection Rating

- I. The IP Code, International Protection Marking, IEC standard 60529, sometimes interpreted as Ingress Protection Marking, classifies and rates the degree of protection provided against intrusion (body parts such as hands and fingers), dust, accidental contact, and water by mechanical casings and electrical enclosures. It is published by the International Electrotechnical Commission (IEC). The equivalent European standard is EN 60529.
- II. The IP code consists of two digits. First digit: Solid particle protection. Second digit: Liquid ingress protection

#### 1. The first digit indicates the level of protection that the enclosure provides against access to hazardous parts

- IP 0\* No protection against contact and ingress of objects
- IP 1\* Any large surface of the body, such as the back of a hand, but no protection against deliberate contact with a body part (> 50 mm)
- IP 2\* Fingers or similar objects > 12.5 mm)
- IP 3\* Tools, thick wires, etc. > 2.5mm)
- IP 4\* Most wires, slender screws, large ants etc. 1 mm
- IP 5\* Ingress of dust is not entirely prevented, but it must not

enter in sufficient quantity to interfere with the satisfactory operation of the equipment.

IP 6\* No ingress of dust; complete protection against contact (dust tight). A vacuum must be applied. Test duration of up to 8 hours based on air flow.

**2. The second digit indicates the level of protection that the enclosure provides against harmful ingress of water.**

IP \*0 None

IP \*1 Dripping water (vertically falling drops) shall have no harmful effect on the specimen when mounted in an upright position onto a turntable and rotated at 1 RPM.

IP \*2 Vertically dripping water shall have no harmful effect when the enclosure is tilted at an angle of 15° from its normal position. A total of four positions are tested within two axes.

IP \*3 Water falling as a spray at any angle up to 60° from the vertical shall have no harmful effect, utilizing either:  
a) an oscillating fixture, or b) A spray nozzle with a counterbalanced shield. Test a) is conducted for 5 minutes, then repeated with the specimen tilted 90° for the second 5-minute test. Test b) is conducted (with shield in place) for 5 minutes minimum.

IP \*4 Water splashing against the enclosure from any direction shall have no harmful effect, utilizing either: a) an oscillating fixture, or b) A spray nozzle with no shield. Test a) is conducted for 10 minutes. Test b) is conducted (without shield) for 5 minutes minimum.

IP \*5 Water projected by a nozzle (6.3 mm) against enclosure from any direction shall have no harmful effects.

IP \*6 Water projected in powerful jets (12.5 mm nozzle) against the enclosure from any direction shall have no harmful effects.

IP \*7 Ingress of water in harmful quantity shall not be possible when the enclosure is immersed in water under defined conditions of pressure and time (up to 1 m of submersion).

IP \*8 The equipment is suitable for continuous immersion in water under conditions which shall be specified by the manufacturer. However, with certain types of equipment, it can mean that water can enter but only in such a manner that it produces no harmful effects. The test depth and/or duration is expected to be greater than the requirements for IPx7, and other environmental effects may be added, such as temperature cycling before immersion.

IP \*9 Protected against close-range high pressure, high temperature spray downs. Smaller specimens rotate slowly on a turntable, from 4 specific angles. Larger specimens are mounted upright, no turntable required, and are tested freehand for at least 3 minutes at distance of 0.15-0.2 m."

## IK

This is an international numeric classification for the degrees of protection provided by enclosures for electrical equipment against external mechanical impacts. It provides a means of specifying the capacity of an enclosure to protect its contents from external impacts.

The most common IK values are:

- IK 02 Impact Resistance 0.2 Joules  
Standard impact resistance, for example, a standard fixture
- IK 04 Impact Resistance 0.5 Joules  
Standard Plus impact resistance, for example, a standard luminaire with an enhanced optical system
- IK 07 Shock resistance 2 Joule  
Fortified fixture, for example, a standard fixture with a grid
- IK 08 Resistance to shock of 5 Joules  
Vandalism protective fixture, such as a closed luminaire with polycarbonate or glass shade
- IK 10 Shock resistance 20 Joules  
Vandal-proof fixture, for example a closed luminaire

## SKG

SKG has developed into the partner for safeguarding the long-term performance and safety of industrial products for the building envelope.

## Protection class

IEC protection classes are defined in IEC 61140 and used to differentiate between the protective-earth connection requirements of devices. These appliances must have their chassis connected to electrical earth.

- Class 0 These appliances have no protective-earth connection and feature only a single level of insulation between live parts and exposed metalwork. If permitted at all, Class 0 items are intended for use in dry areas only.
- Class 1 These appliances must have their chassis connected to electrical earth (US: ground) by a separate earth conductor (coloured green/yellow in most countries, green in the US, Canada and Japan). The earth connection is achieved with a 3-conductor mains cable, typically ending with 3-prong AC connector which plugs into a corresponding AC outlet.
- Class 01 Electrical installations where the chassis is connected to earth with a separate terminal, instead of via the mains cable. In effect this provides the same automatic disconnection as Class I, for equipment that otherwise would be Class 0
- Class 2 A Class II or double insulated electrical appliance is one which has been designed in such a way that it does not require a safety connection to electrical earth (ground).
- Class 3 A Class III appliance is designed to be supplied from a separated/safety extra-low voltage (SELV) power source. The voltage from a SELV supply is low enough that under normal conditions a person can safely come into contact with it without risk of electrical shock. The extra safety features built into Class I and Class II appliances are therefore not required. For medical devices, compliance with Class III is not considered sufficient protection, and further more-stringent regulations apply to such equipment.

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