

# PRODUCT DATASHEET

## DULUX LED SQ28 EM & AC MAINS V 13W 830 GR8

DULUX LED SQ EM & AC MAINS V | LED replacement for CFLni with 2-pin GR8 base for CCG and AC mains operation



### Areas of application

- General illumination within ambient temperatures from -20...+45 °C
- Supermarkets and department stores
- Walkways and corridors
- Hotels, restaurants

### Product benefits

- Easy installation
- Low energy consumption
- Easy relamping thanks to compact design
- Operation directly on 230 V AC mains possible

### Product features

- LED replacement for conventional compact fluorescent lamps for use in CCG luminaires or on AC mains
- Lifetime up to 30,000 h
- Single-ended two-pin plug-in GR8 base
- Type of protection: IP20
- Mercury-free lamps



## TECHNICAL DATA

### Electrical data

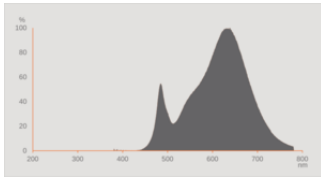
Nominal wattage	13 W
Construction wattage	13.00 W
Nominal voltage	220...240 V
Operating mode	CCG, AC Mains
Claimed equiv. conventional lamp power	28 W
Nominal current	57 mA
Type of current	AC
Inrush current	6 A
Suitable for DC input	Yes
Input voltage DC	186...260 V <sup>1)</sup>
Operating frequency	50/60 Hz
Mains frequency	50/60 Hz
Max. lamp number on MCB B10 A	75
Max. lamp number on MCB B10 A - CCG without compensation	30
Max. lamp number on MCB B10 A - CCG with compensation	20
Max. lamp number on MCB B16 A	120
Max. lamp number on MCB B16 A - CCG without compensation	48
Max. lamp number on MCB B16 A - CCG with compensation	30
Total harmonic distortion	≤ 30 %
Power factor $\lambda$	> 0.90

1) Permitted voltage range

### Photometrical data

Luminous flux	1350 lm
Nominal useful luminous flux 90°	1350 lm
Luminous efficacy	103 lm/W
Lumen main.fact.at end of nom.life time	0.70
Light color (designation)	Warm White
Color temperature	3000 K
Color rendering index Ra	80
Light color	830
Standard deviation of color matching	≤6 sdcM

Flickering metric (Pst LM)	1.0
Stroboscope effect metric (SVM)	0.4



EPREL data spectral diagram PROF LEDr 3000K

**Light technical data**

Beam angle	130 °
Warm-up time (60 %)	< 0.50 s
Starting time	< 0.5 s

**Dimensions & Weight**



Overall length	204.00 mm
Diameter	202.00 mm
Tube diameter	19,0 mm
Maximum diameter	19 mm
Product weight	132.00 g

**Temperatures & operating conditions**

Ambient temperature range	-20...+45 °C <sup>1)</sup>
Maximum temperature at tc test point	70 °C

<sup>1)</sup> Temperature surrounding the lamp - for enclosed luminaires: temperature inside of the luminaire

**Lifespan**

Lifespan L70/B50 at 25 °C	30000 h
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Number of switching cycles	200000
Lumen maintenance at end of service lifetime	0.70
Rated lamp survival factor at 6,000 h	≥ 0.90

### Additional product data

Base (standard designation)	GR8
Mercury content	0.0 mg
Mercury-free	Yes
Design / version	Frosted

### Capabilities

Dimmable	No
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### Certificates & Standards

Energy efficiency class	F 1)
Energy consumption	13.00 kWh/1000h
Type of protection	IP20
Standards	CE / EAC / UKCA
Photobiological safety group acc. to EN62778	RG0

1) Energy efficiency class (EEC) on a scale of A (highest efficiency) to G (lowest efficiency)

### Country-specific categorizations

Order reference	DULUX LED SQ28
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### LOGISTICAL DATA

Temperature range at storage	-20...+80 °C
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### Energy labelling regulation data acc EU 2019/2015






Lighting technology used	LED
Non-directional or directional	NDLS
Mains or non-mains	MLS
Light source cap-type (or other electric interface)	GR8
Connected light source (CLS)	No
Color-tuneable light source	No
Envelope	No
High luminance light source	No
Anti-glare shield	No







Correlated colour temperature type	SINGLE_VALUE
Standby power	0 W
Claim of equivalent power	No
Length	204.00 mm
Height	202.00 mm
Width	202.00 mm
Chromaticity coordinate x	0.433
Chromaticity coordinate y	0.403
R9 Colour rendering index	0.00
Beam angle correspondence	SPHERE_360
Survival factor	0.90
Displacement factor	0.90
LED light source replaces a fluorescent light source	No
EPREL ID	1404786,2059896
Model number	AC46464,AC64990,AC64990

### Safety advice

- Not suitable for tandem operation.
- The operating temperature range of DULUX LED is restricted. In case of doubt regarding suitability of the application please measure Tc temperature on the product prior to installation.
- All electrical connections must be made by a qualified person.
- Do not touch the lamp with bare fingers.
- Must not be used if outer bulb is defective.
- Lamp not suitable for emergency operation.

### DOWNLOAD DATA

	Documents and certificates	Document name
	User instruction / safety instructions	DULUX LED SQ V
	Extended installation guide	Installation instructions LED TUBE T8, T5 und DULUX LED 2024 10 EN
	Legal information	Informationstext 18 Abs 4 ElektroG
	Declarations of conformity	DULUX LED
	Declarations of conformity UKCA	DULUX LED

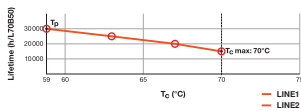
Photometric and lighting design files		Document name
	IES file (IES)	DULUX LED SQ28 EM V 13W 830 GR8 LEDV
	LDT file (Eulumdat)	DULUX LED SQ28 EM V 13W 830 GR8 LEDV
	UGR file (UGR table)	DULUX LED SQ28 EM V 13W 830 GR8 LEDV
	Light distribution curve type cone	DULUX LED SQ28 EM V 13W 830 GR8 LEDV
	Light distribution curve type polar	DULUX LED SQ28 EM V 13W 830 GR8 LEDV
	Spectral power distribution	EPREL data spectral diagram PROF LEDr 3000K

### LOGISTICAL DATA

Product code	Packaging unit (Pieces/Unit)	Dimensions (length x width x height)	Gross weight	Volume
4058075822573	Folding box 1	46 mm x 216 mm x 217 mm	173.00 g	2.16 dm <sup>3</sup>
4058075822580	Shipping box 10	468 mm x 224 mm x 231 mm	1973.00 g	24.22 dm <sup>3</sup>

The mentioned product code describes the smallest quantity unit which can be ordered. One shipping unit can contain one or more single products. When placing an order, for the quantity please enter single or multiples of a shipping unit.

### ADDITIONAL CATALOG INFORMATION



### DISCLAIMER

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