

# PRODUCT DATASHEET ST8S-UN 8 W/6500 K 600 mm

SubstiTUBE T8 STAR UNIVERSAL | LED tubes for electronic and electromagnetic control gears



#### Areas of application

- General illumination within ambient temperatures from -20...+45 °C
- Corridors, stairways, parking garages
- Cooling and storage rooms
- Warehouses

#### **Product benefits**

- Also suitable for operation at low temperatures
- Easy installation
- No bending thanks to glass technology

#### **Product features**

- Mercury-free and RoHS compliant
- Type of protection: IP20
- Lifetime: up to 30,000 h
- Compatible with conventional and many common electronic control gears (see also compatibility list) and line voltage





## **TECHNICAL DATA**

## Electrical data

| Nominal wattage  | 8 W                   |
|--|-----------------------|
| Construction wattage   | 8.00 W                |
| Nominal voltage  | 220240 V              |
| Nominal current  | 45 mA <sup>1)</sup>   |
| Type of current  | AC                    |
| Inrush current   | 42 A                  |
| Operating frequency  | 5060 Hz               |
| Mains frequency  | 5060 Hz <sup>2)</sup> |
| Max. lamp no. on circuit break. 10 A (B)                         | 113                   |
| Max. lamp no. on circuit break. B10 A - CCG without compensation | 113                   |
| Max. lamp no. on circuit break. B10 A - CCG with compensation    | 37                    |
| Max. lamp no. on circuit break. 16 A (B)                         | 166                   |
| Max. lamp no. on circuit break. B16 A - CCG without compensation | 166                   |
| Max. lamp no. on circuit break. B16 A - CCG with compensation    | 62                    |
| Power factor $\lambda$   | 0.80                  |

<sup>1) 378</sup> mA for ECG (HF)

## Photometrical data

| Luminous flux                           | 800 lm        |
|---|---------------|
| Luminous efficacy                       | 100 lm/W      |
| Lumen main.fact.at end of nom.life time | 0.70          |
| Light color (designation)               | Cool Daylight |
| Color temperature                       | 6500 K        |
| Color rendering index Ra                | ≥80           |
| Light color                             | 865           |
| Standard deviation of color matching    | ≤6 sdcm       |
| Rated LLMF at 6,000 h                   | 0.80          |

# Light technical data

| Beam angle          | 160 °    |
|---------------------|----------|
| Warm-up time (60 %) | < 0.50 s |
| Starting time       | < 0.5 s  |

<sup>2) &</sup>lt;sub>20-75KHz</sub> for ECG (HF)

# **Dimensions & Weight**

| Overall length                              | 600.00 mm |
|---|-----------|
| Length with base excl. base pins/connection | 598,00 mm |
| Diameter                                    | 28.00 mm  |
| Tube diameter                               | 26,7 mm   |
| Base diameter                               | 28,0 mm   |
| Maximum diameter                            | 28 mm     |
| Product weight                              | 133.00 g  |

# Temperatures & operating conditions

| Ambient temperature range            | -20+45 °C |
|--------------------------------------|-----------|
| Maximum temperature at tc test point | 53 °C     |

## Lifespan

| Number of switching cycles                   | 100000 |
|--|--------|
| 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) | G13    |
|-----------------------------|--------|
| Mercury content             | 0.0 mg |
| Mercury-free                | Yes    |

## **Capabilities**

| Dimmable |
|----------|
|----------|

## Certificates & Standards

| Energy efficiency class | F <sup>1)</sup> |
|-------------------------|-----------------|
| Energy consumption      | 8.00 kWh/1000h  |
| Type of protection      | IP20            |
| Standards               | CE              |

<sup>1)</sup> Energy efficiency class (EEC) on a scale of A++ (highest efficiency) to E (lowest efficiency)

## **Country-specific categorizations**

| Order reference | ST8S-0.6M 8W/86   |
|-----------------|-------------------|
| order reference | 3103 0.011 017,00 |

#### LOGISTICAL DATA

| Temperature range at storage | -20+80 °C |
|------------------------------|-----------|
|                              |           |

## Energy labelling regulation data acc EU 2019/2015

| Light source cap-type (or other electric interface) | G13       |
|---|-----------|
| Length  | 600.00 mm |
| Height  | 28.00 mm  |
| Width   | 28.00 mm  |

#### Safety advice

- Operation in outdoor applications in suitable damp-proof luminaires possible according to data sheet and installation instruction.

#### **DOWNLOAD DATA**

|     | Documents and certificates |
|-----|----------------------------|
| PDF | Installation guide         |

#### **LOGISTICAL DATA**

| Product code  | Packaging unit (Pieces/Unit) | Dimensions (length x width x height) | Gross weight | Volume               |
|---------------|------------------------------|--------------------------------------|--------------|----------------------|
| 4058075137264 | Sleeve<br>1                  | 29 mm x 36 mm x 708 mm               | 178.00 g     | 0.74 dm <sup>3</sup> |
| 4058075137271 | Shipping box<br>8            | 752 mm x 180 mm x 125 mm             | 2202.00 g    | 16.92 dm³            |

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.

#### References / Links

- For current information see www.ledvance.com/substitube

#### Legal advice

- When used to replace a T8 fluorescent lamp the total energy efficiency and light distribution depends on the design of the lighting system.

#### **DISCLAIMER**

Subject to change without notice. Errors and omission excepted. Always make sure to use the most recent release.