



LEDVANCE

# PRODUCT DATASHEET

## LS P 1000 RGBW 940 5

LED STRIP PERFORMANCE 1000 RGBW GEN 2 | High performance RGBW LED strips with 1000 lm/m for high requirements



### Areas of application

- General illumination
- Architecture lighting
- Dynamic light as an architectural effect in public zones
- Intensive color effects for special moods
- Cove lighting
- Hotels and Offices
- Residential interiors

### Product benefits

- Very good white light quality thanks to color rendering index Ra > 90 and dedicated white LEDs
- Great scope of design options due to long and flexible RGBW LED strips
- Easy mounting thanks to self-adhesive tape
- Simple connection thanks to integrated cables on both sides
- Maximum flexibility due to large range of accessories
- Easy installation, no tools required for connection

### Product features

- Flexible and cuttable LED strip with white Chip and Multichip RGB LEDs
- Smallest cuttable unit: 83,30 mm
- Lifetime (L70/B50): up to 50,000 h at Ta: 55°C
- Dimmable by pulse width modulation (PWM)

## TECHNICAL DATA

### Electrical data

|                           |                        |
|---------------------------|------------------------|
| Nominal wattage           | 106.00 W <sup>1)</sup> |
| Construction wattage      | 106.00 W               |
| Nominal wattage per meter | 21 W <sup>2)</sup>     |
| Nominal voltage           | 24 V                   |
| Input voltage range       | 23...25 V              |
| Input voltage DC          | 24 V                   |
| Type of current           | DC                     |
| Nominal current           | 4440.000 mA            |
| Inrush current            | 0.03 A                 |

1) 42 W for White, 21.5 W for Red, 21.5W for Green, 21.5 W for Blue, 65.0 W for Red Green Blue

2) 4.3 W per meter for Red, 4.3 W per meter for Green, 4.3 W per meter for Blue, 8.3 W per meter for White. 12.8 W per meter for Red Green Blue

### Photometrical data

|                                      |                       |
|--------------------------------------|-----------------------|
| Luminous efficacy                    | 125 lm/W              |
| Luminous flux                        | 8450 lm <sup>1)</sup> |
| Luminous flux per meter              | 1775 lm               |
| Luminous flux per module chain       | 8450 lm               |
| Luminous flux per meter - Red        | 155 lm/m              |
| Luminous flux per meter - Green      | 510 lm/m              |
| Luminous flux per meter - Blue       | 110 lm/m              |
| Luminous flux per meter - RGB        | 750 lm/m              |
| Color temperature                    | 4000 K                |
| Color rendering index Ra             | > 90                  |
| Light color LED                      | RGB, white            |
| Light color (designation)            | RGBW / Daylight       |
| Standard deviation of color matching | < 4 sdcm              |

1) 4830 lm for 2700 K, 4995 lm for 3000 K, 5250 lm for 4000 K, 5250 lm for 6500 K, 750 lm for Red, 2515 lm for Green, 535 lm for Blue, 3640 lm for Red Green Blue

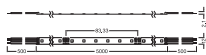
### Light technical data

|                                    |          |
|------------------------------------|----------|
| Beam angle                         | 120 °    |
| Rated beam angle (half peak value) | 120.00 ° |

### LED MODULE INFORMATION

|                                  |     |
|----------------------------------|-----|
| Number of LEDs per meter         | 168 |
| Number of LEDs per module        | 840 |
| Number of LEDs per smallest unit | 14  |

Dimensions & Weight



|                                      |            |
|--------------------------------------|------------|
| Length                               | 5000.00 mm |
| Length – smallest unit               | 83,33 mm   |
| Cable length                         | 500.000    |
| Width                                | 12.00 mm   |
| Height                               | 2.10 mm    |
| Prewired                             | Yes        |
| Wire preparation length, input side  | 5.00 mm    |
| Wire preparation length, output side | 5.00 mm    |
| Conductor cross section              | 0.5 mm²    |
| LED pitch                            | 11.90 mm   |
| Product weight                       | 150.00 g   |

Colors & materials

|               |                    |
|---------------|--------------------|
| Product color | White              |
| Body material | Polycarbonate (PC) |

Temperatures & operating conditions

|                                          |                            |
|------------------------------------------|----------------------------|
| Ambient temperature range                | -20...+55 °C <sup>1)</sup> |
| Maximum temperature at tc test point     | 85 °C <sup>2)</sup>        |
| Temperature range in operation           | -20...+55 °C               |
| Permitted rel. humidity during operation | 0...55 %                   |

- 1) Providing that temperature at Tc point is below max value during operation
- 2) Exceeding the maximum specified ratings can reduce expected life time or destroy the LED strip

Lifespan

|                        |         |
|------------------------|---------|
| Nominal lamp life time | 50000 h |
|------------------------|---------|

Additional product data

|                   |                               |
|-------------------|-------------------------------|
| Product remark    | Available from December 2024  |
| Mounting location | Ceiling / Wall / Floor / Pole |

Capabilities

|          |                   |
|----------|-------------------|
| Dimmable | Yes <sup>1)</sup> |
|----------|-------------------|

|                        |         |
|------------------------|---------|
| Overheating protection | No      |
| Lowest bending radius  | 30,0 mm |
| Self-adhesive          | Yes     |

1) Dimmable with suitable drivers, see also [www.ledvance.com/dim](http://www.ledvance.com/dim)

### Certificates & Standards

|                                          |                                                                                                                     |
|------------------------------------------|---------------------------------------------------------------------------------------------------------------------|
| Approval marks – approval                | TUV / CE / UKCA / EAC                                                                                               |
| Standards                                | Acc. to IEC 62471 / Acc. to IEC 60598-1 / Acc. to EN 60529 / Acc. to EN 62031 / Acc. to EN 55015 / Acc. to EN 61547 |
| Protection class                         | III                                                                                                                 |
| Type of protection                       | IP20                                                                                                                |
| Energy class of contained light source   | E                                                                                                                   |
| Salt mist resistance acc. IEC 60068-2-52 | Yes                                                                                                                 |
| UV resistance acc. IEC 60068-2-5         | Yes                                                                                                                 |

### LOGISTICAL DATA

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

### Accessories Mandatory

| Product image                                                                      | Product name      | EAN           |
|------------------------------------------------------------------------------------|-------------------|---------------|
|  | LS AY P 14 SMB    | 4099854358937 |
|  | LS AY P CSD P5    | 4099854359101 |
|  | LS AY P CSW P5 50 | 4099854359057 |
|  | LS AY P CP P5 500 | 4099854358968 |

### ADDITIONAL PRODUCT INFORMATION

- All the technical parameters apply to the entire LED module. In view of the complex manufacturing process for light emitting diodes, the typical values given above for the technical LED parameters are merely statistical values that do not necessarily correspond to the actual technical parameters of an individual product; individual products may vary from the typical values.
- All LED strips have a self-adhesive tape on the reverse side. LED strips can be attached to suitable materials, e.g. aluminum profiles. The surface of the material must be free of grease, oil, silicone and dirt particles. The adhesive tape can be used only one time, if the LED strip will be removed from the mounting surface, there could be a damage of the LED strips and the mounting material. The surface temperature of the mounting

material should be in the temperature range of 18°C...35°C. Complete adhesion takes up to 72 h.

- LED strips are designed for static installation. Vibrations, respective torsion and elongation/compression must be considered.
- Galvanic Insulation between LED strip and mounting surface must be ensured. This Insulation is needed especially in the area of connections or cut ends.
- In a wide temperature range operation field (e.g. outdoor installation) and a LED strip length with more than 2m suitable mounting surface is required. To avoid stress due to mismatch in expansion of the different materials, there should be an extra thicker adhesive tape between LED strip and mounting surface. Additionally, the LED strip should have enough space for thermal expansion at higher temperatures.
- Compensation due to chemical corrosion is excluded. A suitable protection against corrosive agents such as moisture, condensation etc. must be provided. Hydrogen sulfide (H<sub>2</sub>S) will cause an accelerated corrosion which leads to shortened lifetime or premature failure.
- Installation of the LED strip has to be done by a qualified electrician.
- Handle with care to avoid mechanical product damage
- If the maximum operating and storage temperature ratings will be exceeded, the expected lifetime will be reduced or even the LED strip will be destroyed. It is not allowed to operate the LED strip over the specified T<sub>c</sub> temperature (acc. EN 60598-1 under steady state conditions)
- It is not allowed to exceed the maximum operation voltage. This could cause a hazardous overload and will destroy the LED strip.
- The applicable electrical and safety standards have to be maintained for a LED strip installations
- In installations of LED strips ESD safety must be taken in account. Adequate precautions during installation and operation for the products are required.
- To avoid a damage of the LED strip, the unmounted LED strip should be handled and stored only in the original LEDVANCE packaging (wheel / ESD bag). Repacking is not allowed. Cutted IP 6x LED strips can be stored only with mounted endcaps.

## DOWNLOAD DATA

| Documents and certificates                                                         |                                        | Document name                      |
|------------------------------------------------------------------------------------|----------------------------------------|------------------------------------|
|   | User instruction / safety instructions | LS P-1000/RGBW                     |
|  | Legal information                      | Informationstext 18 Abs 4 ElektroG |
|  | Legal information                      | LS P-1000/RGBW                     |
|  | Legal information                      | Safety Insert G11205012            |
|  | Declarations of conformity             | CE declaration - LS module         |
|  | Declarations of conformity UKCA        | UKCA declaration - LS module       |
| Photometric and lighting design files                                              |                                        | Document name                      |
|  | IES file (IES)                         | LS P 1000 RGBW 940 5 LEDV          |
|  | LDT file (Eulumdat)                    | LS P 1000 RGBW 940 5 LEDV          |
|  | UGR file (UGR table)                   | LS P 1000 RGBW 940 5 LEDV          |
|  | Light distribution curve type cone     | LS P 1000 RGBW 940 5 LEDV          |
|  | Light distribution curve type polar    | LS P 1000 RGBW 940 5 LEDV          |

| Tender texts                                                                      |                  | Document name                                            |
|-----------------------------------------------------------------------------------|------------------|----------------------------------------------------------|
|  | Tender documents | LED STRIP PERFORMANCE 1000 RGBW GEN 2 1000 RGBW 940 5-en |
|                                                                                   |                  |                                                          |

LOGISTICAL DATA

| Product code  | Packaging unit (Pieces/Unit) | Dimensions (length x width x height) | Gross weight | Volume                |
|---------------|------------------------------|--------------------------------------|--------------|-----------------------|
| 4099854358296 | Folding box<br>1             | 24 mm x 204 mm x 214 mm              | 252.00 g     | 1.05 dm <sup>3</sup>  |
| 4099854358302 | Shipping box<br>30           | 440 mm x 420 mm x 220 mm             | 8430.00 g    | 40.66 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.

DISCLAIMER

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