OMC The Optoelectronic Manufacturing Corporation



5mm Oval LED Strip



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INC The Optoelectronic Manufacturing Corporation

Technical Datasheet

Versatile, linkable LED light strips with on-board current limiting for 12V DC operation. Low cost, easy to use design simplifies the application of high brightness LED lighting within product designs, as well as to architectural and industrial lighting. Elliptical beam angle.

Key Features:

- Highly energy efficient 12V DC design
- Closely spaced LEDs (c. 16.5mm spacing)
- Compact and low profile
- Fitted with convenient, miniature latching plug and sockets for easy linking
- Output characterised for lighting applications
- Superflux LED version also available
- Screw holes for easy mounting
- Oval LED has intense, profiled output
- Up to 10 strips can be powered from one end
- Built-in antistatic protection
- Built-in reverse polarity protection
- Low cost LED lighting solution
- RoHS Compliant

Typical Applications:

- Replacement of fluorescent light sources
- Light box illumination
- Accent lighting
- Edge lighting of acrylic lightguides
- Backlighting
- Lighting for machinery
- Strip lights
- Furniture illumination
- Illumination for equipment
- Low energy lighting
- Lighting for point-of-sale applications
- General LED lighting

All specifications correct at time of publishing. In the interests of continual improvement, OMC reserve the right to alter specifications without notice.





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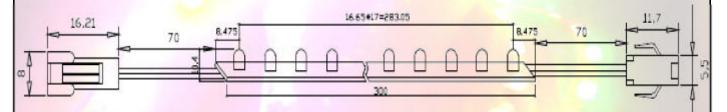
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Part no.	LEDs per 300mm strip	Light output per 300mm strip	Beam angle 201/2	LEDs per meter
LSDCRSW1	18 x Ultrabright White	40 lumens	30°x60°	60
LSDCRSR1	18 x Ultrabright Red	14 lumens	30°x60°	60
LSDCRSG1	18 x Ultrabright Green	37 lumens	30°x60°	60
LSDCRSB1	18 x Ultrabright Blue	14 lumens	30°x60°	60
LSDCRSY1	18 x Ultrabright Amber	30 lumens	30°x60°	60

Colours are for ease of reference only and do not indicate exact shade of LED output.

Mechanical information

- Strip length 300mm
- Strip width 10mm
- Strip height 12mm
- 18 LEDs per 300mm strip
- Latching connector at each end on 70mm tails
- Wires easily desoldered if seamless runs required
- Elliptical output beam follows strip profile



Absolute maximum ratings (Ta=25°C where applicable)

Quantity	Rating
Strip Applied Voltage	12V DC
LED Reverse Voltage	5V
Operating Temperature Range	-35°C to +65°C
LED Forward Current	20mA
Temperature Range in Storage	-35°C to +100°C
Strip Forward DC Current	120mA

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Application notes

- Do not apply voltages greater than 12V DC to this product or damage may occur.
- Although electrostatic protection is built into this product, as with any semiconductor device it is recommended to avoid unecessary electrostatic discharge.
- Connect supply anode to red wire, cathode to black wire.
- Latching connectors are designed to be a convenient linking system. For connection to power supply, we recommend removing the end connector.
- For series lengths greater than 10 strips, wiring in a "ring main" style configuration (i.e. a power feed at each end) is strongly recommended to reduce voltage drop. For very long lengths it is recommended to connect a power feed back to the supply after every 20 full strips.
- This product is not designed to be cut.
- Use of a regulated 12V DC supply is recommended.
- Do not expose to moisture unless product has been damp protected.
- Product may be fixed in place using double sided adhesive foam or screws.
- For soldering, use of a small 25W general purpose mains soldering iron is recommended, recommended soldering temperature is 260°C for maximum 5 seconds.

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