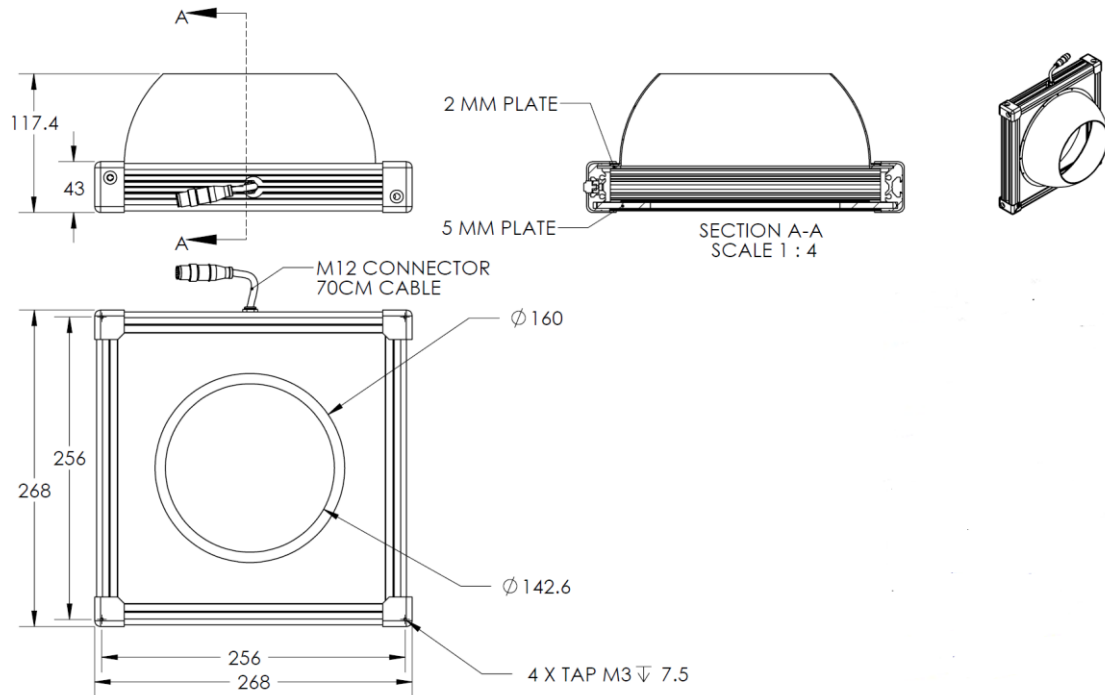




## HDLR-00-200-X-W-24V

### Lighting Dimension

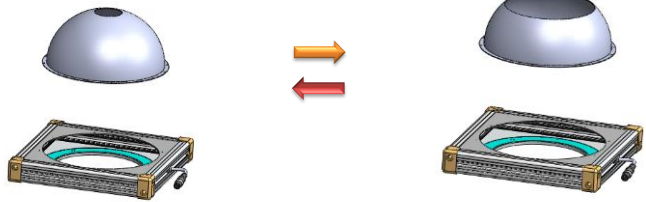
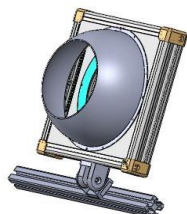
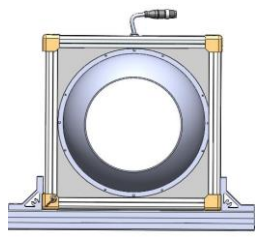
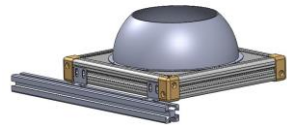


| Mechanical Information                |                              |
|---------------------------------------|------------------------------|
| Casing Material                       | Aluminium                    |
| Storage & Operating Temperature Range | Temp 0-60°C, Humidity 20-85% |
| Weight                                | 2070 g                       |
| Outer Dimension                       | 268 x 268 mm                 |
| Inner Diameter                        | 142.6 mm                     |
| Thickness                             | 117.4 mm                     |

## HDLR-00-200-X-W-24V

| Optical Information  |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|--|--------|---|--------|-------|--|--------------|---|-------|-------|-------|-------|---|-------|-------|-------|-------|---|--|--|--|--|---|-------|-------|------|------|---|-------|-------|-------|-------|
| Part Number  |        | HDLR-00-200-X-W-24V   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| LED Colour   |        | WHITE   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Wavelength   | (nm)   | *CHROMATICITY TABLE   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Intensity ( ±15%)  | (Lux)  | 6777  |        |       |  | 6035         |   |       | 5333  |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Working Distance   | (mm)   | 87  |        |       |  | 97           |   |       | 107   |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Illumination (number of rows)  |        | 1   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Illumination Active Area   |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Active Outer Diameter  | (mm)   | 160   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Active Inner Diameter  | (mm)   | 142.6   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Emission Angle   | (deg.) | 0   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Eye Safety Class ( IEC62471)   |        | EXEMPT  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| *CHROMATICITY TABLE  |        | <table><tr><td>X</td><td>0.296</td><td>0.287</td><td>0.307</td><td>0.311</td></tr><tr><td>Y</td><td>0.276</td><td>0.295</td><td>0.315</td><td>0.294</td></tr></table> |        |       |  |              | X | 0.296 | 0.287 | 0.307 | 0.311 | Y | 0.276 | 0.295 | 0.315 | 0.294 | <table><tr><td>X</td><td>0.311</td><td>0.307</td><td>0.33</td><td>0.33</td></tr><tr><td>Y</td><td>0.294</td><td>0.315</td><td>0.339</td><td>0.318</td></tr></table> |  |  |  |  | X | 0.311 | 0.307 | 0.33 | 0.33 | Y | 0.294 | 0.315 | 0.339 | 0.318 |
| X  | 0.296  | 0.287   | 0.307  | 0.311 |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Y  | 0.276  | 0.295   | 0.315  | 0.294 |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| X  | 0.311  | 0.307   | 0.33   | 0.33  |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Y  | 0.294  | 0.315   | 0.339  | 0.318 |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Electrical Information   |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Lighting Supply Voltage<br>(constant voltage mode)                                   |        | 24V ± 2%  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Continuous Current   | (mA)   | 728   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Power Consumption  | (W)    | 17.47   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Lighting Casing Temperature,<br>Operating after 60 minutes                           | °C     | 40.7  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Strobe Mode Specification  |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Pulse Operation  |        | YES   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Max. Lighting Supply Voltage<br>(constant voltage power supply)                      | (V)    | Pulsing at 24VDC to 48VDC, 0-10% Duty Cycle<br>Recommended at 36VDC   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Pulse Current, (Max. 10 msec)<br>(constant current power supply)                     | (mA)   | 2184  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Max. Trigger Pulse Duration  | (msec) | 10  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Duty Cycle   |        | 0-10%   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Additional Information   |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Additional Cooling Method  |        | Attached to machine part for better heat dissipation  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Lifespan in Continuous Mode  |        | 20,000 hours (drop to 50% intensity) at 25°C  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Lifespan in Strobe Mode  |        | Est. >50,000 hours (drop to 50% intensity) at 25°C  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Intensity Controller Selection   |        | SD/SDA-Series   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| CE Conformity  |        | YES   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| RoHS Compliance  |        | YES   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Connection   |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Connector Type (default)   |        | M12 5 PIN CONNECTOR (MALE)  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Cable Length (out from lighting)   | ( mm ) | 700   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Pin Configuration  |        | Pin   | Signal |       |  | Cable Colour |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        | 1   | 24V    |       |  | BROWN        |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        | 2   | -      |       |  | WHITE        |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        | 3   | GND    |       |  | BLUE         |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        | 4   | -      |       |  | BLACK        |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        | 5   | -      |       |  | GRAY         |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
|  |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Extension Cable  |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Connector Type (default)   |        | M12 5 PIN CONNECTOR (FEMALE)  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Part Number  |        | EXT-FL-M12F-3M-24V  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Cable Length (out from female connector)   | (mm)   | 3000  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Extension Cable<br>(connect to M12 5 Pin Male Connector from lighting)               |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Application  |        |   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Illumination Type  |        | Angular Dark Field Illumination   |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |
| Application Use  |        | Inspecting flat, reflective surfaces  |        |       |  |              |   |       |       |       |       |   |       |       |       |       |   |  |  |  |  |   |       |       |      |      |   |       |       |       |       |

## HDLR-00-200-X-W-24V

| Advantages           |  |  |   |
|----------------------|--|--|---|
| Flexible Illuminator | Full Dome Cover  |  | Half Dome Cover   |
|                      |  |  |   |
| Easy Mounting        | Join Bracket<br>(Angle Mount)  | L Bracket<br>(Vertical Mount)  | L-shaped Plate<br>(Horizontal Mount)  |
|                      |   |  |  |

Uniformity Graph (Relative Irradiation Strength) - Representative Pattern

LENS FOCAL LENGTH, F = 8 mm

CWD = 200 mm

LWD = 50 mm

| COLOUR | TOLERANCE | L X W     |
|--------|-----------|-----------|
| Orange | ± 10 %    | 105 X 110 |
| Yellow | ± 15 %    | 115 X 120 |
| Green  | ± 20 %    | 125 X 120 |
| Blue   | ± 25 %    | 135 X 120 |
| Purple | ± 30 %    | 160 X 120 |

CWD = 250 mm

LWD = 100 mm

| COLOUR | TOLERANCE | L X W     |
|--------|-----------|-----------|
| Orange | ± 10 %    | 80 X 80   |
| Yellow | ± 15 %    | 95 X 95   |
| Green  | ± 20 %    | 110 X 112 |
| Blue   | ± 25 %    | 125 X 130 |
| Purple | ± 30 %    | 200 X 150 |

\* Each individual box is 5 X 5 mm.

\*Disclaimer : The graphs portrayed are for reference only and does not in any way guarantee the quality of this product.