

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: PrentaLux

Report Number: P867159

Luminaire Tested: PRLX-2002-L-940-67L-L-X-X-WHHR-X

Issue Date: 8/20/2024

Test Information

Test Method: LM-79-2019
Report Number: P867159
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2304-993-80)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 8/20/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: Prenalux
Catalog Number: PRLX-2002-L-940-67L-L-X-X-WHHR-X
Description: PRENTALUX 3D PRINTED PENDANT LED LUMINAIRE, LARGE LIGHT ENGINE, FLAT LENS, TRUNCATED DOME WITH WHITE INTERIOR SHADE.
LIGHT LEVEL 4
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

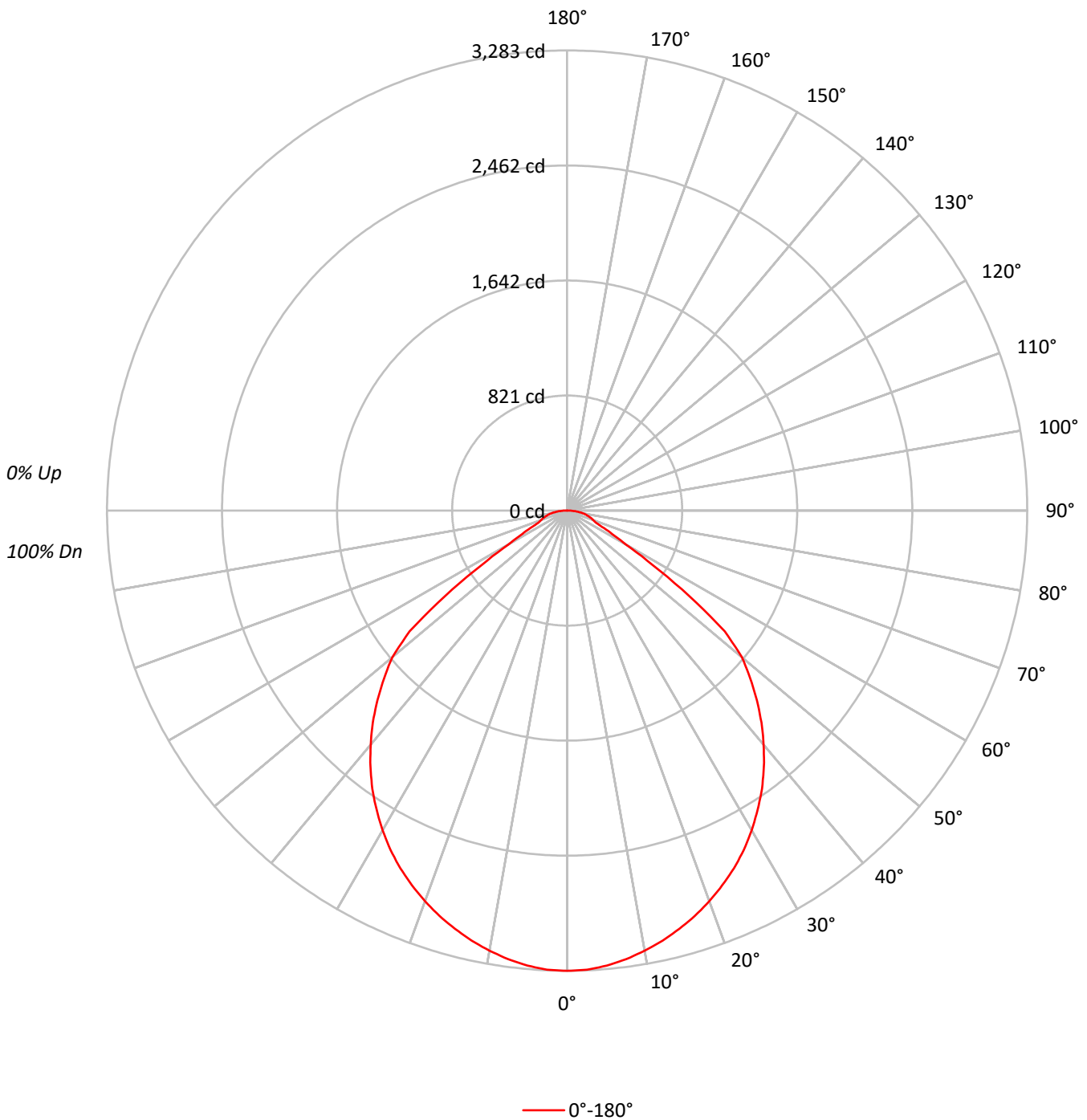
Lumens per Lamp: N/A
Luminaire Lumens: 6935.4 lumens
Efficiency: N/A
Efficacy: 137.6 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.2 / 1.3
Luminous Opening: Circular (Dia: 1.67' x H: 0')
CIE Type: Direct

Input Watts (W): 50.4
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: 0.333 HR
Operation Time: 3 HR
Ambient Temperature (°C): NR
Test Distance: 24 FT

TEST NUMBER: P867159

CATALOG NUMBER: PRLX-2002-L-940-67L-L-X-X-WHHR-X

Luminous Intensity Polar Plot





TEST NUMBER: P867159

CATALOG NUMBER: PRLX-2002-L-940-67L-L-X-X-WHHR-X

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

| | | | | | | | | | | | | | | | | | | |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| RF | 20 | | | | 20 | | | | 20 | | | | 20 | | | | 20 | |
| RC | 80 | | | | 70 | | | | 50 | | | | 30 | | | | 10 | 0 |
| RW | 70 | 50 | 30 | 10 | 70 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 | 0 |
| RCR | | | | | | | | | | | | | | | | | | |
| 0 | 119 | 119 | 119 | 119 | 116 | 116 | 116 | 116 | 111 | 111 | 111 | 106 | 106 | 106 | 102 | 102 | 102 | 100 |
| 1 | 111 | 107 | 103 | 100 | 108 | 105 | 101 | 99 | 101 | 98 | 96 | 97 | 95 | 93 | 93 | 91 | 90 | 88 |
| 2 | 103 | 96 | 90 | 85 | 100 | 94 | 89 | 84 | 90 | 86 | 82 | 87 | 84 | 80 | 84 | 81 | 79 | 77 |
| 3 | 95 | 86 | 79 | 73 | 92 | 84 | 78 | 73 | 81 | 76 | 71 | 79 | 74 | 70 | 76 | 72 | 69 | 67 |
| 4 | 88 | 77 | 69 | 64 | 85 | 76 | 69 | 63 | 73 | 67 | 62 | 71 | 66 | 62 | 69 | 65 | 61 | 59 |
| 5 | 81 | 70 | 62 | 56 | 79 | 69 | 61 | 56 | 67 | 60 | 55 | 65 | 59 | 54 | 63 | 58 | 54 | 52 |
| 6 | 75 | 63 | 55 | 49 | 74 | 62 | 55 | 49 | 61 | 54 | 49 | 59 | 53 | 48 | 58 | 52 | 48 | 46 |
| 7 | 70 | 58 | 50 | 44 | 69 | 57 | 49 | 44 | 56 | 49 | 44 | 54 | 48 | 43 | 53 | 47 | 43 | 41 |
| 8 | 66 | 53 | 45 | 40 | 64 | 52 | 45 | 40 | 51 | 44 | 39 | 50 | 44 | 39 | 49 | 43 | 39 | 37 |
| 9 | 61 | 49 | 41 | 36 | 60 | 48 | 41 | 36 | 47 | 40 | 36 | 46 | 40 | 36 | 45 | 40 | 35 | 34 |
| 10 | 58 | 45 | 38 | 33 | 56 | 45 | 38 | 33 | 44 | 37 | 33 | 43 | 37 | 33 | 42 | 36 | 32 | 31 |

AVERAGE LUMINANCE (cd/sqm):

| | |
|-----|-------|
| | 0° |
| 0° | 16199 |
| 5° | 16140 |
| 10° | 15973 |
| 15° | 15781 |
| 20° | 15567 |
| 25° | 15326 |
| 30° | 15000 |
| 35° | 14591 |
| 40° | 14046 |
| 45° | 13351 |
| 50° | 12493 |
| 55° | 9151 |
| 60° | 4782 |
| 65° | 3187 |
| 70° | 2849 |
| 75° | 3029 |
| 80° | 3313 |
| 85° | 3646 |

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 13351 cd/sqm

TEST NUMBER: P867159

CATALOG NUMBER: PRLX-2002-L-940-67L-L-X-X-WHHR-X

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 308.8 | 4.5 |
| 10°-20° | 871.4 | 12.6 |
| 20°-30° | 1295.8 | 18.7 |
| 30°-40° | 1512.6 | 21.8 |
| 40°-50° | 1473.6 | 21.2 |
| 50°-60° | 944.1 | 13.6 |
| 60°-70° | 294.0 | 4.2 |
| 70°-80° | 167.4 | 2.4 |
| 80°-90° | 67.8 | 1.0 |
| 90°-100° | 0.0 | 0.0 |
| 100°-110° | 0.0 | 0.0 |
| 110°-120° | 0.0 | 0.0 |
| 120°-130° | 0.0 | 0.0 |
| 130°-140° | 0.0 | 0.0 |
| 140°-150° | 0.0 | 0.0 |
| 150°-160° | 0.0 | 0.0 |
| 160°-170° | 0.0 | 0.0 |
| 170°-180° | 0.0 | 0.0 |
| 0°-30° | 2476.0 | 35.7 |
| 0°-40° | 3988.5 | 57.5 |
| 0°-60° | 6406.2 | 92.4 |
| 0°-90° | 6935.4 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 6935.4 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | Flux |
|-----|------|------|
| 0° | 3283 | |
| 5° | 3259 | 309 |
| 15° | 3090 | 871 |
| 25° | 2815 | 1296 |
| 35° | 2423 | 1513 |
| 45° | 1913 | 1474 |
| 55° | 1064 | 944 |
| 65° | 273 | 294 |
| 75° | 159 | 167 |
| 85° | 64 | 68 |
| 90° | 0 | |

TEST NUMBER: P867159

CATALOG NUMBER: PRLX-2002-L-940-67L-L-X-X-WHHR-X

CANDELA DISTRIBUTION (FULL):

| | 0° |
|-------|--------|
| 0° | 3283.3 |
| 2.5° | 3278.4 |
| 5° | 3258.8 |
| 7.5° | 3228.1 |
| 10° | 3188.2 |
| 12.5° | 3143.5 |
| 15° | 3089.5 |
| 17.5° | 3031.8 |
| 20° | 2964.9 |
| 22.5° | 2893.2 |
| 25° | 2815.2 |
| 27.5° | 2729.4 |
| 30° | 2633.0 |
| 32.5° | 2530.6 |
| 35° | 2422.6 |
| 37.5° | 2306.1 |
| 40° | 2180.9 |
| 42.5° | 2051.5 |
| 45° | 1913.4 |
| 47.5° | 1772.3 |
| 50° | 1627.6 |
| 52.5° | 1416.5 |
| 55° | 1063.8 |
| 57.5° | 720.2 |
| 60° | 484.6 |
| 62.5° | 361.3 |
| 65° | 273.0 |
| 67.5° | 216.6 |
| 70° | 197.5 |
| 72.5° | 179.7 |
| 75° | 158.9 |
| 77.5° | 138.6 |
| 80° | 116.6 |
| 82.5° | 92.0 |
| 85° | 64.4 |
| 87.5° | 34.4 |
| 90° | 0.0 |



TEST NUMBER: P867159
 CATALOG NUMBER: PRLX-2002-L-940-67L-L-X-X-WHHR-X

CIE UGR TABLE:

| Reflectances: | | | | | | | | | | | |
|-----------------|------|------------------|-------|-------|-------|-------|----------------|-------|-------|-------|-------|
| Ceiling | | 0.7 | 0.7 | 0.5 | 0.5 | 0.3 | 0.7 | 0.7 | 0.5 | 0.5 | 0.3 |
| Wall | | 0.5 | 0.3 | 0.5 | 0.3 | 0.3 | 0.5 | 0.3 | 0.5 | 0.3 | 0.3 |
| Reference plane | | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Room dimensions | | Viewed crosswise | | | | | Viewed endwise | | | | |
| X=2H | Y=2H | 17.23 | 18.68 | 17.59 | 18.99 | 19.31 | 17.23 | 18.68 | 17.59 | 18.99 | 19.31 |
| | 3H | 17.64 | 18.93 | 18.02 | 19.26 | 19.62 | 17.64 | 18.93 | 18.02 | 19.26 | 19.62 |
| | 4H | 17.93 | 19.13 | 18.33 | 19.48 | 19.86 | 17.93 | 19.13 | 18.33 | 19.48 | 19.86 |
| | 6H | 18.25 | 19.35 | 18.66 | 19.72 | 20.11 | 18.25 | 19.35 | 18.66 | 19.72 | 20.11 |
| | 8H | 18.39 | 19.44 | 18.82 | 19.83 | 20.24 | 18.39 | 19.44 | 18.82 | 19.83 | 20.24 |
| | 12H | 18.52 | 19.52 | 18.95 | 19.91 | 20.34 | 18.52 | 19.52 | 18.95 | 19.91 | 20.34 |
| 4H | 2H | 17.28 | 18.49 | 17.68 | 18.84 | 19.22 | 17.28 | 18.49 | 17.68 | 18.84 | 19.22 |
| | 3H | 17.90 | 18.88 | 18.31 | 19.28 | 19.69 | 17.90 | 18.88 | 18.31 | 19.28 | 19.69 |
| | 4H | 18.32 | 19.20 | 18.76 | 19.62 | 20.06 | 18.32 | 19.20 | 18.76 | 19.62 | 20.06 |
| | 6H | 18.81 | 19.58 | 19.27 | 20.02 | 20.48 | 18.81 | 19.58 | 19.27 | 20.02 | 20.48 |
| | 8H | 19.04 | 19.75 | 19.50 | 20.20 | 20.66 | 19.04 | 19.75 | 19.50 | 20.20 | 20.66 |
| | 12H | 19.24 | 19.87 | 19.72 | 20.35 | 20.83 | 19.24 | 19.87 | 19.72 | 20.35 | 20.83 |
| 8H | 4H | 18.47 | 19.18 | 18.93 | 19.63 | 20.10 | 18.47 | 19.18 | 18.93 | 19.63 | 20.10 |
| | 6H | 19.10 | 19.69 | 19.60 | 20.19 | 20.66 | 19.10 | 19.69 | 19.60 | 20.19 | 20.66 |
| | 8H | 19.42 | 19.95 | 19.93 | 20.47 | 20.96 | 19.42 | 19.95 | 19.93 | 20.47 | 20.96 |
| | 12H | 19.73 | 20.21 | 20.24 | 20.70 | 21.27 | 19.73 | 20.21 | 20.24 | 20.70 | 21.27 |
| 12H | 4H | 18.48 | 19.12 | 18.97 | 19.60 | 20.07 | 18.48 | 19.12 | 18.97 | 19.60 | 20.07 |
| | 6H | 19.15 | 19.68 | 19.66 | 20.19 | 20.68 | 19.15 | 19.68 | 19.66 | 20.19 | 20.68 |
| | 8H | 19.53 | 20.01 | 20.04 | 20.50 | 21.07 | 19.53 | 20.01 | 20.04 | 20.50 | 21.07 |