

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for  
Cooper Lighting Solutions  
(formerly Eaton)

Brand: LUMIERE

Report Number: P221280

Luminaire Tested: **9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P221280  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29412)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: LUMIERE  
Catalog Number: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV  
Description: LUMIERE LANTERRA 9002 LED WALL LUMINAIRE, RECESSED LENS, WIDE FLOOD OPTIC, WHITE HOUSING.  
Light Source: (1) 4000K CCT, 97 CRI LED  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1612.8 lumens  
Efficiency: N/A  
Efficacy: 80.6 lumens/watt  
Spacing Criteria (0/90/45): 0.87 / 0.87 / 0.86  
Luminous Opening: Circular (Dia: 0.17' x H: 0')  
CIE Type: General Diffuse

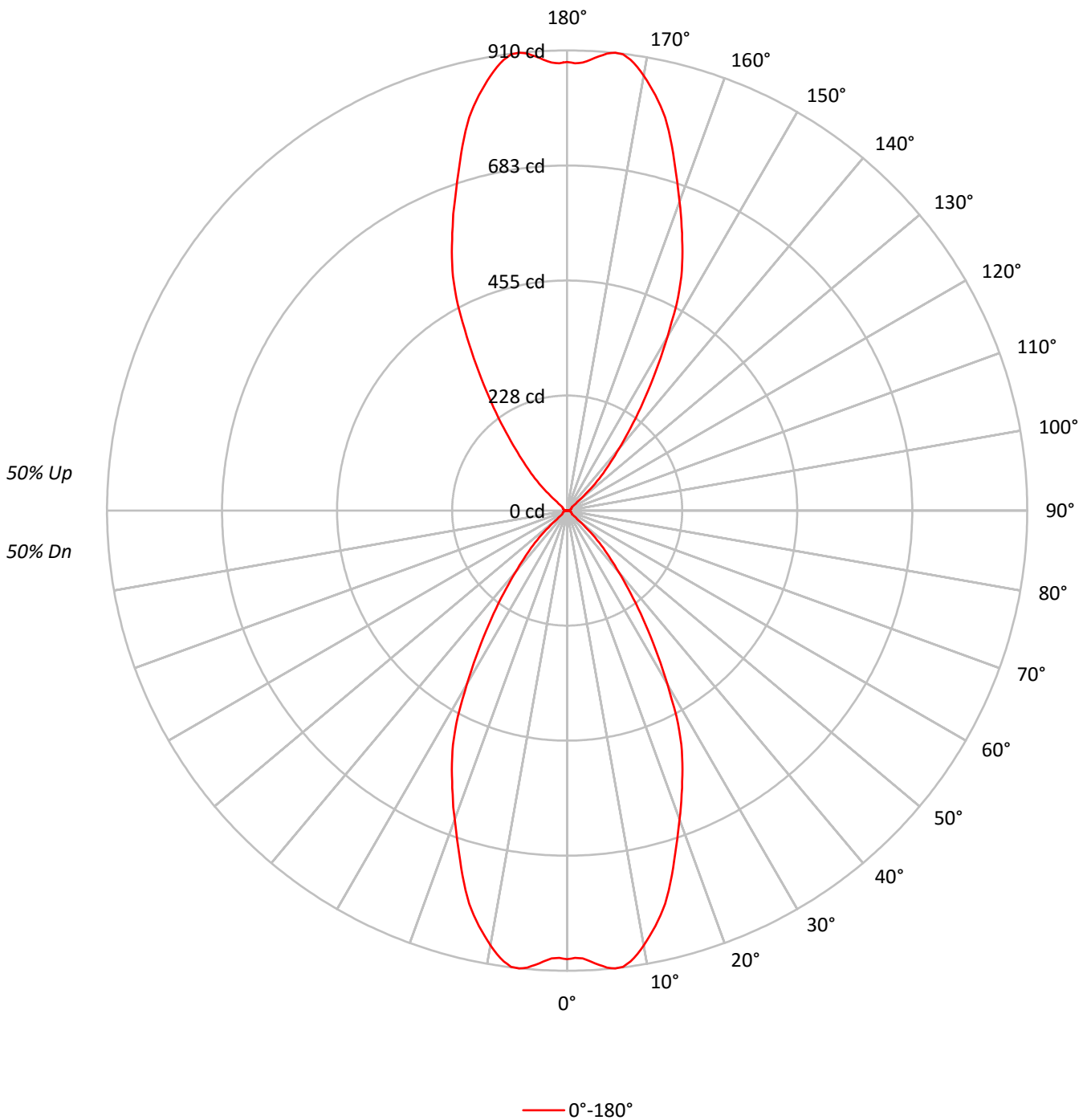
Input Watts (W): 20  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

### Luminous Intensity Polar Plot





TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

**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   | 107 | 107 | 107 | 107 | 99 | 99 | 99 | 99 | 83 | 83 | 83 | 69 | 69 | 69 | 56 | 56 | 56 | 50 |
| 1   | 100 | 96  | 93  | 90  | 92 | 89 | 87 | 84 | 76 | 74 | 73 | 64 | 63 | 62 | 53 | 52 | 51 | 46 |
| 2   | 93  | 87  | 82  | 78  | 86 | 81 | 77 | 73 | 70 | 67 | 64 | 59 | 57 | 55 | 50 | 48 | 47 | 43 |
| 3   | 87  | 79  | 73  | 68  | 80 | 74 | 69 | 65 | 64 | 60 | 57 | 55 | 52 | 50 | 46 | 45 | 43 | 40 |
| 4   | 81  | 72  | 66  | 61  | 75 | 67 | 62 | 58 | 59 | 55 | 52 | 51 | 48 | 46 | 44 | 42 | 40 | 37 |
| 5   | 75  | 66  | 59  | 54  | 70 | 62 | 56 | 52 | 54 | 50 | 47 | 47 | 44 | 42 | 41 | 39 | 37 | 34 |
| 6   | 71  | 61  | 54  | 49  | 66 | 57 | 51 | 47 | 50 | 46 | 43 | 44 | 41 | 38 | 39 | 36 | 34 | 32 |
| 7   | 66  | 56  | 49  | 44  | 62 | 53 | 47 | 43 | 47 | 42 | 39 | 41 | 38 | 36 | 36 | 34 | 32 | 30 |
| 8   | 62  | 52  | 45  | 41  | 58 | 49 | 43 | 39 | 44 | 39 | 36 | 39 | 35 | 33 | 34 | 32 | 30 | 28 |
| 9   | 59  | 48  | 42  | 37  | 55 | 46 | 40 | 36 | 41 | 36 | 33 | 37 | 33 | 31 | 32 | 30 | 28 | 26 |
| 10  | 55  | 45  | 39  | 34  | 52 | 43 | 37 | 33 | 38 | 34 | 31 | 34 | 31 | 29 | 31 | 28 | 26 | 25 |

**AVERAGE LUMINANCE (cd/sqm):**

|     |        |
|-----|--------|
|     | 0°     |
| 0°  | 437726 |
| 5°  | 449304 |
| 10° | 437415 |
| 15° | 396981 |
| 20° | 341173 |
| 25° | 292988 |
| 30° | 225888 |
| 35° | 157563 |
| 40° | 101955 |
| 45° | 62797  |
| 50° | 19803  |
| 55° | 10064  |
| 60° | 9868   |
| 65° | 10740  |
| 70° | 10819  |
| 75° | 12772  |
| 80° | 11933  |
| 85° | 14152  |



TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 85.7   | 5.3       |
| 10°-20°   | 214.8  | 13.3      |
| 20°-30°   | 243.1  | 15.1      |
| 30°-40°   | 165.1  | 10.2      |
| 40°-50°   | 68.2   | 4.2       |
| 50°-60°   | 11.8   | 0.7       |
| 60°-70°   | 8.8    | 0.5       |
| 70°-80°   | 6.6    | 0.4       |
| 80°-90°   | 2.4    | 0.1       |
| 90°-100°  | 2.4    | 0.1       |
| 100°-110° | 6.6    | 0.4       |
| 110°-120° | 8.8    | 0.5       |
| 120°-130° | 11.8   | 0.7       |
| 130°-140° | 68.2   | 4.2       |
| 140°-150° | 165.1  | 10.2      |
| 150°-160° | 243.1  | 15.1      |
| 160°-170° | 214.8  | 13.3      |
| 170°-180° | 85.7   | 5.3       |
| 0°-30°    | 543.6  | 33.7      |
| 0°-40°    | 708.7  | 43.9      |
| 0°-60°    | 788.6  | 48.9      |
| 0°-90°    | 806.4  | 50.0      |
| 90°-120°  | 17.8   | 1.1       |
| 90°-150°  | 262.8  | 16.3      |
| 90°-180°  | 806.0  | 50.0      |
| 0°-180°   | 1612.8 | 100.0     |

**CANDELA DISTRIBUTION:**

|      | 0°  | Flux |
|------|-----|------|
| 0°   | 887 |      |
| 5°   | 907 | 86   |
| 15°  | 777 | 215  |
| 25°  | 538 | 243  |
| 35°  | 262 | 165  |
| 45°  | 90  | 68   |
| 55°  | 12  | 12   |
| 65°  | 9   | 9    |
| 75°  | 7   | 7    |
| 85°  | 2   | 2    |
| 90°  | 0   | 0    |
| 95°  | 2   | 2    |
| 105° | 7   | 7    |
| 115° | 9   | 9    |
| 125° | 12  | 12   |
| 135° | 90  | 68   |
| 145° | 262 | 165  |
| 155° | 538 | 243  |
| 165° | 777 | 215  |
| 175° | 907 | 86   |
| 180° | 887 |      |



TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

**CANDELA DISTRIBUTION (FULL):**

| 0°    |       |
|-------|-------|
| 0°    | 887.2 |
| 1°    | 884.7 |
| 2°    | 886.4 |
| 3°    | 893.0 |
| 4°    | 900.5 |
| 5°    | 907.2 |
| 6°    | 910.5 |
| 7°    | 908.9 |
| 8°    | 900.5 |
| 9°    | 888.0 |
| 10°   | 873.1 |
| 11°   | 856.4 |
| 12°   | 839.7 |
| 13°   | 821.4 |
| 14°   | 801.4 |
| 15°   | 777.2 |
| 16°   | 750.6 |
| 17°   | 723.9 |
| 18°   | 698.1 |
| 19°   | 673.1 |
| 20°   | 649.8 |
| 21°   | 628.1 |
| 22°   | 604.8 |
| 23°   | 582.3 |
| 24°   | 560.7 |
| 25°   | 538.2 |
| 26°   | 514.8 |
| 27°   | 489.0 |
| 28°   | 460.7 |
| 29°   | 426.5 |
| 30°   | 396.5 |
| 32.5° | 324.9 |
| 35°   | 261.6 |
| 37.5° | 205.8 |
| 40°   | 158.3 |
| 42.5° | 121.6 |
| 45°   | 90.0  |
| 47.5° | 55.8  |
| 50°   | 25.8  |
| 52.5° | 12.5  |
| 55°   | 11.7  |
| 57.5° | 10.8  |
| 60°   | 10.0  |
| 62.5° | 9.2   |
| 65°   | 9.2   |



TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

**CANDELA DISTRIBUTION (continued):**

|        | 0°    |
|--------|-------|
| 67.5°  | 8.3   |
| 70°    | 7.5   |
| 72.5°  | 6.7   |
| 75°    | 6.7   |
| 77.5°  | 5.8   |
| 80°    | 4.2   |
| 82.5°  | 3.3   |
| 85°    | 2.5   |
| 87.5°  | 0.8   |
| 90°    | 0.0   |
| 92.5°  | 0.8   |
| 95°    | 2.5   |
| 97.5°  | 3.3   |
| 100°   | 4.2   |
| 102.5° | 5.8   |
| 105°   | 6.7   |
| 107.5° | 6.7   |
| 110°   | 7.5   |
| 112.5° | 8.3   |
| 115°   | 9.2   |
| 117.5° | 9.2   |
| 120°   | 10.0  |
| 122.5° | 10.8  |
| 125°   | 11.7  |
| 127.5° | 12.5  |
| 130°   | 25.8  |
| 132.5° | 55.8  |
| 135°   | 90.0  |
| 137.5° | 121.6 |
| 140°   | 158.3 |
| 142.5° | 205.8 |
| 145°   | 261.6 |
| 147.5° | 324.9 |
| 150°   | 396.5 |
| 151°   | 426.5 |
| 152°   | 460.7 |
| 153°   | 489.0 |
| 154°   | 514.8 |
| 155°   | 538.2 |
| 156°   | 560.7 |
| 157°   | 582.3 |
| 158°   | 604.8 |
| 159°   | 628.1 |
| 160°   | 649.8 |
| 161°   | 673.1 |



TEST NUMBER: P221280

CATALOG NUMBER: 9002-W2-[RW, RI]-LED4097-W-WT-L1-UNV

**CANDELA DISTRIBUTION (continued):**

|      | 0°    |
|------|-------|
| 162° | 698.1 |
| 163° | 723.9 |
| 164° | 750.6 |
| 165° | 777.2 |
| 166° | 801.4 |
| 167° | 821.4 |
| 168° | 839.7 |
| 169° | 856.4 |
| 170° | 873.1 |
| 171° | 888.0 |
| 172° | 900.5 |
| 173° | 908.9 |
| 174° | 910.5 |
| 175° | 907.2 |
| 176° | 900.5 |
| 177° | 893.0 |
| 178° | 886.4 |
| 179° | 884.7 |
| 180° | 887.2 |

(END OF REPORT)