

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: G2-1802-569-23

Luminaire Tested: **203-FL-8LED4036-12-BK-OSL**

Test Date: 04/07/18

Test Information

Test Method: LM-79-08
Report Number: G2-1802-569-23
Test Lab: INNOVATION CENTER(G2)
Test Date: 04/07/18
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMIERE
Catalog Number: 203-FL-8LED4036-12-BK-OSL
Description: CAMBRIA 203 LED LUMINAIRE, 8 WATT, 4000K CCT, 36 DEGREE WIDE OPTIC, FLUSH HOOD BLACK, OVERALL SPREAD LENS
Light Source: (1) SORAA 4000K 95 CRI LED
SM16-07-36D-940-03
Ballast/Driver: (1) CHROMA POWER SUPPLY IN0004

Summary

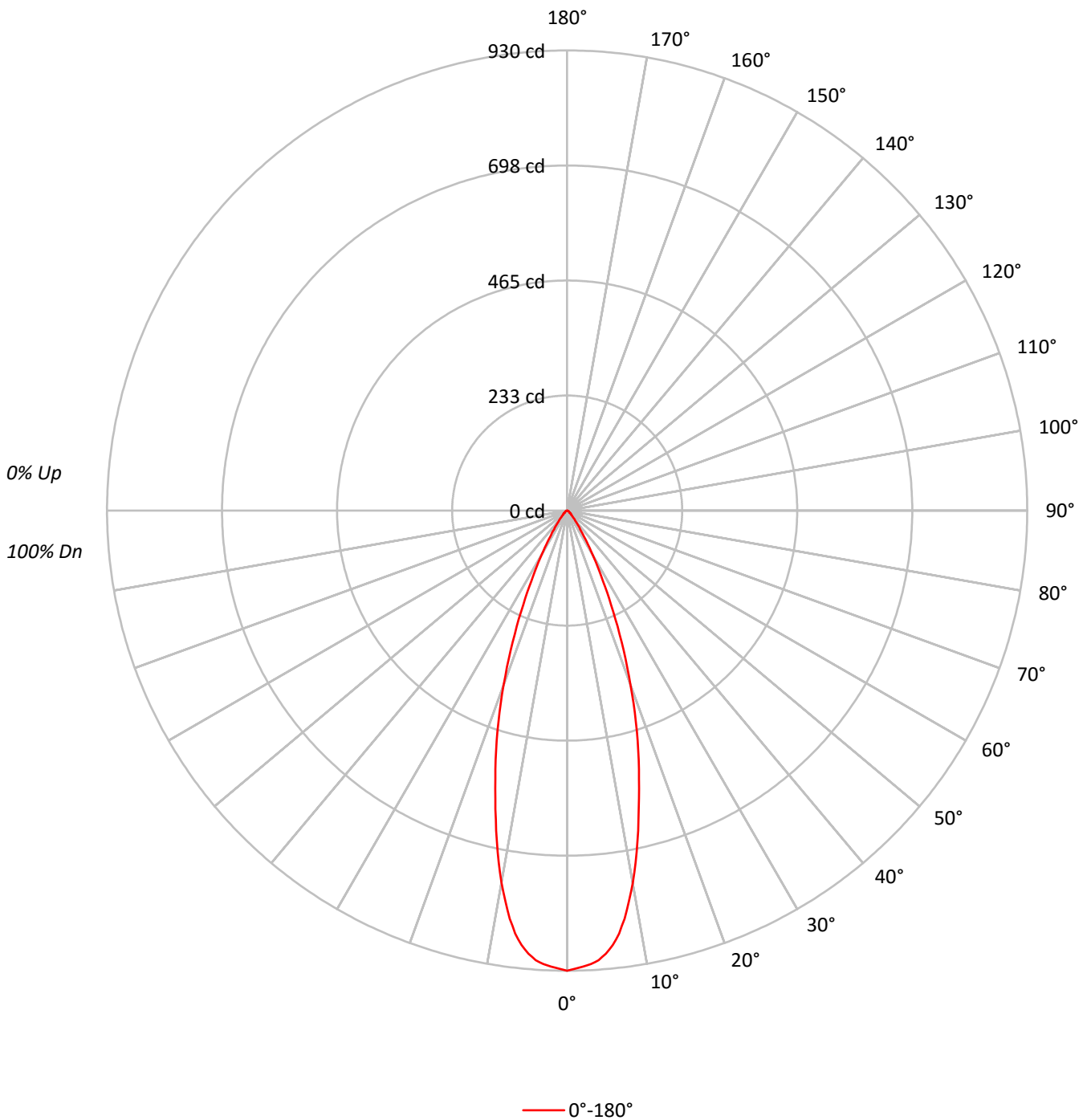
Lumens per Lamp: N/A
Luminaire Lumens: 384.3 lumens
Efficiency: N/A
Efficacy: 49.9 lumens/watt
Spacing Criteria (0/90/45): 0.57 / 0.57 / 0.58
Luminous Opening: Circular (Dia: 0.17' x H: 0')
CIE Type: Direct

Input Watts (W): 7.7
Input Voltage (V): 12.0
Input Current (A_{in}): 0.677
Voltage Rise (V): NR
Power Factor: 0.9909
Total Harmonic Distortion (THDi): 27.3%
Frequency (hertz): 60
Stabilization Time: 0.5 HR
Operation Time: 3 HR
Ambient Temperature (°C): 24.8
Test Distance: 25 FT



TEST NUMBER: G2-1802-569-23
CATALOG NUMBER: 203-FL-8LED4036-12-BK-OSL

Luminous Intensity Polar Plot





TEST NUMBER: G2-1802-569-23

CATALOG NUMBER: 203-FL-8LED4036-12-BK-OSL

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 | 114 | 112 | 110 | 108 | 112 | 110 | 108 | 106 | 106 | 104 | 103 | 102 | 101 | 100 | 99 | 98 | 97 | 95 |
| 2 | 110 | 105 | 102 | 99 | 107 | 104 | 100 | 98 | 100 | 98 | 96 | 97 | 95 | 94 | 95 | 93 | 92 | 90 |
| 3 | 105 | 100 | 95 | 92 | 103 | 98 | 94 | 91 | 96 | 92 | 90 | 93 | 91 | 88 | 91 | 89 | 87 | 86 |
| 4 | 101 | 94 | 90 | 86 | 99 | 93 | 89 | 86 | 91 | 88 | 85 | 89 | 86 | 84 | 88 | 85 | 83 | 81 |
| 5 | 97 | 90 | 85 | 81 | 95 | 89 | 84 | 81 | 87 | 83 | 80 | 86 | 82 | 79 | 84 | 81 | 79 | 78 |
| 6 | 93 | 86 | 81 | 77 | 92 | 85 | 80 | 77 | 84 | 79 | 76 | 82 | 79 | 76 | 81 | 78 | 75 | 74 |
| 7 | 90 | 82 | 77 | 73 | 88 | 81 | 77 | 73 | 80 | 76 | 73 | 79 | 75 | 72 | 78 | 75 | 72 | 71 |
| 8 | 86 | 78 | 73 | 70 | 85 | 78 | 73 | 70 | 77 | 73 | 70 | 76 | 72 | 69 | 75 | 72 | 69 | 68 |
| 9 | 83 | 75 | 70 | 67 | 82 | 75 | 70 | 67 | 74 | 70 | 67 | 73 | 69 | 66 | 72 | 69 | 66 | 65 |
| 10 | 80 | 72 | 67 | 64 | 80 | 72 | 67 | 64 | 71 | 67 | 64 | 71 | 67 | 64 | 70 | 66 | 64 | 63 |

AVERAGE LUMINANCE (cd/sqm):

| | |
|-----|--------|
| | 0° |
| 0° | 458843 |
| 5° | 445242 |
| 10° | 382757 |
| 15° | 286550 |
| 20° | 196891 |
| 25° | 114321 |
| 30° | 57540 |
| 35° | 27706 |
| 40° | 14169 |
| 45° | 8373 |
| 50° | 6140 |
| 55° | 4301 |
| 60° | 3947 |
| 65° | 3502 |
| 70° | 2885 |
| 75° | 1906 |
| 80° | 2841 |
| 85° | 0 |



TEST NUMBER: G2-1802-569-23

CATALOG NUMBER: 203-FL-8LED4036-12-BK-OSL

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 81.5 | 21.2 |
| 10°-20° | 154.3 | 40.1 |
| 20°-30° | 98.2 | 25.5 |
| 30°-40° | 31.5 | 8.2 |
| 40°-50° | 10.1 | 2.6 |
| 50°-60° | 4.7 | 1.2 |
| 60°-70° | 2.7 | 0.7 |
| 70°-80° | 1.2 | 0.3 |
| 80°-90° | 0.1 | 0.0 |
| 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° | 334.0 | 86.9 |
| 0°-40° | 365.5 | 95.1 |
| 0°-60° | 380.3 | 98.9 |
| 0°-90° | 384.3 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 384.3 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | Flux |
|-----|-----|------|
| 0° | 930 | |
| 5° | 899 | 82 |
| 15° | 561 | 154 |
| 25° | 210 | 98 |
| 35° | 46 | 31 |
| 45° | 12 | 10 |
| 55° | 5 | 5 |
| 65° | 3 | 3 |
| 75° | 1 | 1 |
| 85° | 0 | 0 |
| 90° | 0 | |



TEST NUMBER: G2-1802-569-23

CATALOG NUMBER: 203-FL-8LED4036-12-BK-OSL

CANDELA DISTRIBUTION (FULL):

| 0° | |
|-------|-----|
| 0° | 930 |
| 1° | 926 |
| 2° | 922 |
| 3° | 918 |
| 4° | 911 |
| 5° | 899 |
| 6° | 883 |
| 7° | 861 |
| 8° | 833 |
| 9° | 799 |
| 10° | 764 |
| 11° | 724 |
| 12° | 684 |
| 13° | 641 |
| 14° | 600 |
| 15° | 561 |
| 16° | 524 |
| 17° | 487 |
| 18° | 450 |
| 19° | 412 |
| 20° | 375 |
| 21° | 339 |
| 22° | 306 |
| 23° | 271 |
| 24° | 240 |
| 25° | 210 |
| 26° | 184 |
| 27° | 160 |
| 28° | 139 |
| 29° | 119 |
| 30° | 101 |
| 32.5° | 68 |
| 35° | 46 |
| 37.5° | 31 |
| 40° | 22 |
| 42.5° | 16 |
| 45° | 12 |
| 47.5° | 10 |
| 50° | 8 |
| 52.5° | 6 |
| 55° | 5 |
| 57.5° | 4 |
| 60° | 4 |
| 62.5° | 3 |
| 65° | 3 |



TEST NUMBER: G2-1802-569-23

CATALOG NUMBER: 203-FL-8LED4036-12-BK-OSL

CANDELA DISTRIBUTION (continued):

| | 0° |
|-------|----|
| 67.5° | 2 |
| 70° | 2 |
| 72.5° | 1 |
| 75° | 1 |
| 77.5° | 1 |
| 80° | 1 |
| 82.5° | 0 |
| 85° | 0 |
| 87.5° | 0 |
| 90° | 0 |

(END OF REPORT)