

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: METALUX

Report Number: P275848

Luminaire Tested: **14CZ2-25-RDP-UNV-L92765-W2A1-U-3000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P275848  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-43)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14CZ2-25-RDP-UNV-L92765-W2A1-U-3000K  
Description: CRUZE 2.0 1x4 TUNABLE WHITE LED TROFFER WITH RDP LENS  
Light Source: (168) 90 CRI LEDS TUNED TO 3000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1269.0 lumens  
Efficiency: N/A  
Efficacy: 70.3 lumens/watt  
Spacing Criteria (0/90/45): 1.25 / 1.29 / 1.4  
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')  
CIE Type: Direct

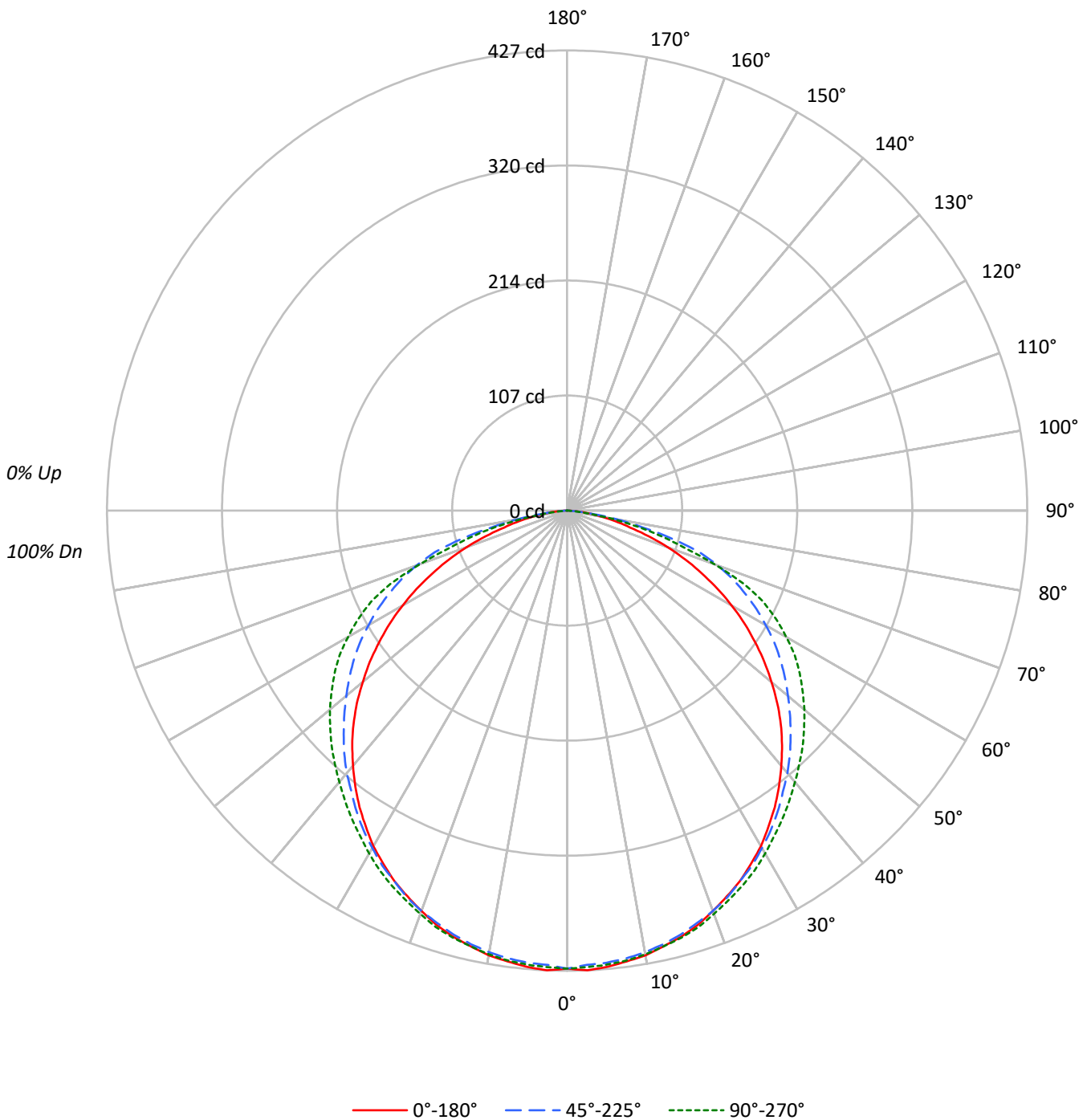
Input Watts (W): 18.042  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Luminous Intensity Polar Plot





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**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   | 109 | 104 | 100 | 96  | 106 | 102 | 98  | 94  | 97  | 94  | 91  | 93  | 91  | 88  | 90  | 88  | 86  | 84  |
| 2   | 99  | 90  | 83  | 77  | 96  | 88  | 82  | 76  | 85  | 79  | 75  | 81  | 77  | 73  | 78  | 75  | 71  | 69  |
| 3   | 90  | 79  | 71  | 64  | 87  | 77  | 70  | 63  | 74  | 68  | 62  | 71  | 66  | 61  | 69  | 64  | 60  | 58  |
| 4   | 82  | 70  | 61  | 54  | 80  | 68  | 60  | 53  | 66  | 58  | 53  | 63  | 57  | 52  | 61  | 56  | 51  | 49  |
| 5   | 75  | 62  | 53  | 46  | 73  | 61  | 52  | 46  | 59  | 51  | 45  | 57  | 50  | 45  | 55  | 49  | 44  | 42  |
| 6   | 69  | 56  | 47  | 40  | 67  | 55  | 46  | 40  | 53  | 45  | 40  | 51  | 44  | 39  | 50  | 44  | 39  | 37  |
| 7   | 64  | 50  | 42  | 35  | 62  | 50  | 41  | 35  | 48  | 40  | 35  | 47  | 40  | 35  | 45  | 39  | 34  | 32  |
| 8   | 60  | 46  | 37  | 31  | 58  | 45  | 37  | 31  | 44  | 36  | 31  | 43  | 36  | 31  | 41  | 35  | 31  | 29  |
| 9   | 56  | 42  | 34  | 28  | 54  | 42  | 34  | 28  | 40  | 33  | 28  | 39  | 33  | 28  | 38  | 32  | 28  | 26  |
| 10  | 52  | 39  | 31  | 25  | 51  | 38  | 31  | 25  | 37  | 30  | 25  | 36  | 30  | 25  | 35  | 29  | 25  | 23  |

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

|     | 0°   | 45°  | 90°  |
|-----|------|------|------|
| 0°  | 1144 | 1144 | 1144 |
| 5°  | 1148 | 1137 | 1143 |
| 10° | 1145 | 1137 | 1142 |
| 15° | 1140 | 1134 | 1143 |
| 20° | 1132 | 1132 | 1141 |
| 25° | 1127 | 1127 | 1141 |
| 30° | 1117 | 1124 | 1142 |
| 35° | 1103 | 1120 | 1146 |
| 40° | 1086 | 1117 | 1155 |
| 45° | 1067 | 1116 | 1176 |
| 50° | 1037 | 1120 | 1203 |
| 55° | 999  | 1134 | 1236 |
| 60° | 949  | 1146 | 1264 |
| 65° | 877  | 1161 | 1280 |
| 70° | 780  | 1169 | 1146 |
| 75° | 628  | 1051 | 917  |
| 80° | 491  | 738  | 598  |
| 85° | 337  | 213  | 154  |



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**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 40.2   | 3.2       |
| 10°-20°   | 115.4  | 9.1       |
| 20°-30°   | 175.7  | 13.8      |
| 30°-40°   | 214.1  | 16.9      |
| 40°-50°   | 227.1  | 17.9      |
| 50°-60°   | 214.3  | 16.9      |
| 60°-70°   | 173.0  | 13.6      |
| 70°-80°   | 93.9   | 7.4       |
| 80°-90°   | 15.2   | 1.2       |
| 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°    | 331.4  | 26.1      |
| 0°-40°    | 545.4  | 43.0      |
| 0°-60°    | 986.9  | 77.8      |
| 0°-90°    | 1269.0 | 100.0     |
| 90°-120°  | 0.0    | 0.0       |
| 90°-150°  | 0.0    | 0.0       |
| 90°-180°  | 0.0    | 0.0       |
| 0°-180°   | 1269.0 | 100.0     |

**CANDELA DISTRIBUTION:**

|     | 0°  | 22.5° | 45° | 67.5° | 90° | Flux |
|-----|-----|-------|-----|-------|-----|------|
| 0°  | 425 | 425   | 425 | 425   | 425 |      |
| 5°  | 425 | 424   | 421 | 424   | 423 | 40   |
| 15° | 409 | 408   | 407 | 410   | 410 | 115  |
| 25° | 379 | 378   | 379 | 383   | 384 | 175  |
| 35° | 336 | 338   | 341 | 348   | 349 | 210  |
| 45° | 280 | 284   | 293 | 304   | 309 | 216  |
| 55° | 213 | 222   | 242 | 258   | 264 | 190  |
| 65° | 138 | 155   | 182 | 197   | 201 | 136  |
| 75° | 60  | 88    | 101 | 91    | 88  | 66   |
| 85° | 11  | 12    | 7   | 6     | 5   | 14   |
| 90° | 0   | 0     | 0   | 0     | 0   |      |



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**CANDELA DISTRIBUTION (FULL):**

|       | 0°    | 22.5° | 45°   | 67.5° | 90°   |
|-------|-------|-------|-------|-------|-------|
| 0°    | 425.0 | 425.0 | 425.0 | 425.0 | 425.0 |
| 2.5°  | 427.0 | 425.0 | 422.0 | 425.0 | 424.0 |
| 5°    | 425.0 | 424.0 | 421.1 | 424.0 | 423.0 |
| 7.5°  | 422.0 | 422.0 | 419.1 | 421.1 | 421.1 |
| 10°   | 419.1 | 418.1 | 416.1 | 419.1 | 418.1 |
| 12.5° | 414.1 | 413.1 | 412.1 | 415.1 | 414.1 |
| 15°   | 409.2 | 408.2 | 407.2 | 410.2 | 410.2 |
| 17.5° | 403.2 | 402.2 | 401.2 | 405.2 | 405.2 |
| 20°   | 395.3 | 395.3 | 395.3 | 399.3 | 398.3 |
| 22.5° | 387.4 | 387.4 | 388.4 | 392.3 | 391.3 |
| 25°   | 379.4 | 378.5 | 379.4 | 383.4 | 384.4 |
| 27.5° | 369.5 | 370.5 | 371.5 | 375.5 | 376.5 |
| 30°   | 359.6 | 360.6 | 361.6 | 366.6 | 367.6 |
| 32.5° | 347.7 | 349.7 | 351.7 | 357.7 | 357.7 |
| 35°   | 335.9 | 337.8 | 340.8 | 347.7 | 348.7 |
| 37.5° | 323.0 | 325.0 | 328.9 | 336.8 | 338.8 |
| 40°   | 309.1 | 312.1 | 318.0 | 325.9 | 328.9 |
| 42.5° | 295.2 | 299.2 | 306.1 | 315.1 | 319.0 |
| 45°   | 280.4 | 284.3 | 293.3 | 304.2 | 309.1 |
| 47.5° | 264.5 | 269.5 | 280.4 | 294.2 | 298.2 |
| 50°   | 247.7 | 254.6 | 267.5 | 282.4 | 287.3 |
| 52.5° | 230.8 | 238.8 | 254.6 | 270.5 | 275.4 |
| 55°   | 213.0 | 221.9 | 241.7 | 257.6 | 263.5 |
| 57.5° | 195.2 | 205.1 | 227.9 | 244.7 | 250.7 |
| 60°   | 176.3 | 188.2 | 213.0 | 229.8 | 234.8 |
| 62.5° | 157.5 | 171.4 | 198.1 | 215.0 | 218.9 |
| 65°   | 137.7 | 154.6 | 182.3 | 197.2 | 201.1 |
| 67.5° | 118.9 | 138.7 | 166.4 | 177.3 | 177.3 |
| 70°   | 99.1  | 120.9 | 148.6 | 151.6 | 145.6 |
| 72.5° | 79.3  | 104.0 | 128.8 | 117.9 | 112.9 |
| 75°   | 60.4  | 88.2  | 101.1 | 91.1  | 88.2  |
| 77.5° | 45.6  | 71.3  | 71.3  | 65.4  | 63.4  |
| 80°   | 31.7  | 54.5  | 47.6  | 41.6  | 38.6  |
| 82.5° | 20.8  | 30.7  | 24.8  | 19.8  | 16.8  |
| 85°   | 10.9  | 11.9  | 6.9   | 5.9   | 5.0   |
| 87.5° | 4.0   | 2.0   | 1.0   | 2.0   | 1.0   |
| 90°   | 0.0   | 0.0   | 0.0   | 0.0   | 0.0   |

(END OF REPORT)