

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: NEO-RAY

Report Number: P1009105

Luminaire Tested: S122DIP-B485D530UB40-4F0-XX-W2A-D

Issue Date: 5/6/2025

**Test Information**

Test Method: LM-79-2019  
Report Number: P1009105  
REPORT IS A COMBINATION OF REPORTS P984283 AND P1007351  
Test Lab: INNOVATION CENTER  
Issue Date: 5/6/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: NEO-RAY  
Catalog Number: S122DIP-B485D530UB40-4F0-XX-W2A-D  
Description: Define 2 Direct/Indirect Pendant with 4000K BioUP LEDs {m-DER=0.865} {m-EER=0.951}  
Light Source: -  
Ballast/Driver: -

**Summary**

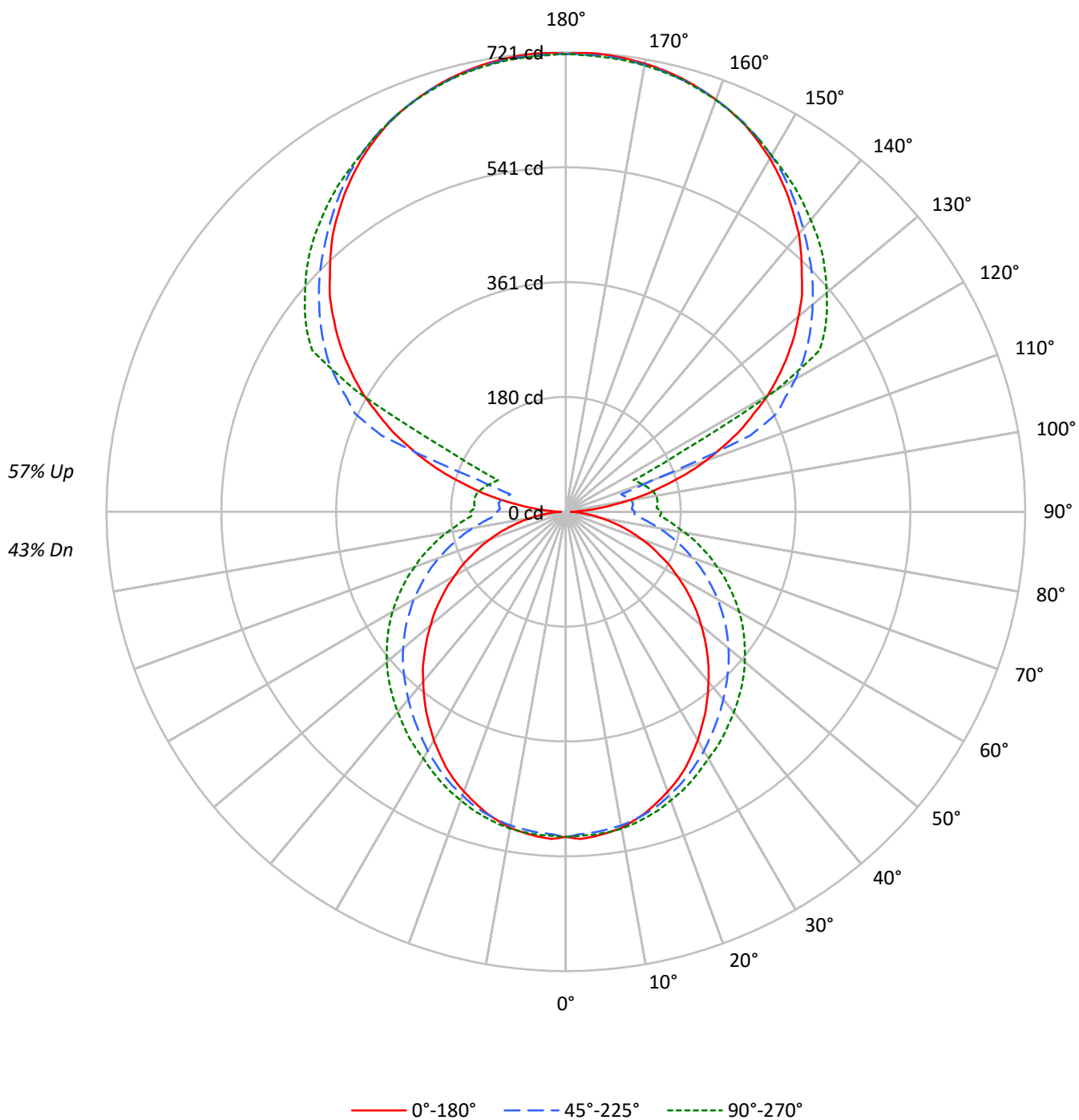
Lumens per Lamp: N/A  
Luminaire Lumens: 4055.0 lumens  
Efficiency: N/A  
Efficacy: 102.9 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.31 / 1.42  
Luminous Opening: Rectangular w/ Sides (W: 0.17' x L: 4' x H: 0.1')  
CIE Type: General Diffuse

Input Watts (W): 39.4  
Input Voltage (V):  
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: 24 FT

TEST NUMBER: P1009105

CATALOG NUMBER: S122DIP-B485D530UB40-4F0-XX-W2A-D

### Luminous Intensity Polar Plot



TEST NUMBER: P1009105

CATALOG NUMBER: S122DIP-B485D530UB40-4F0-XX-W2A-D

**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

|     |     |     |     |     |    |    |    |    |    |    |    |    |    |    |    |    |    |
|-----|-----|-----|-----|-----|----|----|----|----|----|----|----|----|----|----|----|----|----|
| RF  | 20  |     |     |     | 20 |    |    |    | 20 |    |    |    | 20 |    |    |    | 20 |
| RC  | 80  |     |     |     | 70 |    |    |    | 50 |    |    |    | 30 |    |    |    | 10 |
| RW  | 70  | 50  | 30  | 10  | 70 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 |
| RCR |     |     |     |     |    |    |    |    |    |    |    |    |    |    |    |    |    |
| 0   | 105 | 105 | 105 | 105 | 96 | 96 | 96 | 96 | 79 | 79 | 79 | 64 | 64 | 64 | 49 | 49 | 49 |
| 1   | 95  | 90  | 86  | 82  | 86 | 82 | 78 | 75 | 68 | 65 | 62 | 54 | 52 | 50 | 42 | 40 | 39 |
| 2   | 86  | 78  | 71  | 66  | 78 | 71 | 65 | 61 | 58 | 54 | 51 | 47 | 44 | 41 | 36 | 34 | 32 |
| 3   | 78  | 68  | 60  | 54  | 71 | 62 | 55 | 50 | 51 | 46 | 42 | 41 | 37 | 34 | 31 | 29 | 27 |
| 4   | 71  | 60  | 52  | 45  | 64 | 55 | 48 | 42 | 45 | 40 | 35 | 36 | 32 | 29 | 28 | 25 | 23 |
| 5   | 65  | 53  | 45  | 39  | 59 | 49 | 41 | 36 | 40 | 34 | 30 | 32 | 28 | 25 | 25 | 22 | 19 |
| 6   | 60  | 47  | 39  | 33  | 54 | 44 | 36 | 31 | 36 | 30 | 26 | 29 | 25 | 21 | 22 | 19 | 17 |
| 7   | 55  | 43  | 35  | 29  | 50 | 39 | 32 | 27 | 33 | 27 | 23 | 26 | 22 | 19 | 20 | 17 | 15 |
| 8   | 51  | 39  | 31  | 25  | 46 | 36 | 28 | 24 | 30 | 24 | 20 | 24 | 20 | 17 | 19 | 16 | 13 |
| 9   | 48  | 35  | 28  | 22  | 43 | 32 | 26 | 21 | 27 | 22 | 18 | 22 | 18 | 15 | 17 | 14 | 12 |
| 10  | 44  | 32  | 25  | 20  | 40 | 30 | 23 | 19 | 25 | 20 | 16 | 20 | 16 | 13 | 16 | 13 | 11 |

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

|     | 0°   | 45°  | 90°  |
|-----|------|------|------|
| 0°  | 8078 | 8078 | 8078 |
| 5°  | 8113 | 7733 | 7689 |
| 10° | 8059 | 7464 | 7356 |
| 15° | 7946 | 7188 | 7014 |
| 20° | 7802 | 6896 | 6690 |
| 25° | 7660 | 6618 | 6395 |
| 30° | 7461 | 6336 | 6104 |
| 35° | 7260 | 6063 | 5891 |
| 40° | 7049 | 5826 | 5678 |
| 45° | 6849 | 5612 | 5493 |
| 50° | 6631 | 5415 | 5310 |
| 55° | 6403 | 5205 | 5125 |
| 60° | 6127 | 4986 | 4929 |
| 65° | 5837 | 4736 | 4704 |
| 70° | 5509 | 4467 | 4462 |
| 75° | 5091 | 4198 | 4232 |
| 80° | 4431 | 3916 | 3996 |
| 85° | 3757 | 3653 | 3791 |

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 6849 cd/sqm

TEST NUMBER: P1009105

CATALOG NUMBER: S122DIP-B485D530UB40-4F0-XX-W2A-D

**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 48.4   | 1.2       |
| 10°-20°   | 138.7  | 3.4       |
| 20°-30°   | 210.2  | 5.2       |
| 30°-40°   | 256.0  | 6.3       |
| 40°-50°   | 275.4  | 6.8       |
| 50°-60°   | 267.5  | 6.6       |
| 60°-70°   | 233.6  | 5.8       |
| 70°-80°   | 179.8  | 4.4       |
| 80°-90°   | 121.7  | 3.0       |
| 90°-100°  | 106.8  | 2.6       |
| 100°-110° | 149.0  | 3.7       |
| 110°-120° | 274.3  | 6.8       |
| 120°-130° | 410.9  | 10.1      |
| 130°-140° | 422.1  | 10.4      |
| 140°-150° | 385.2  | 9.5       |
| 150°-160° | 308.4  | 7.6       |
| 160°-170° | 198.7  | 4.9       |
| 170°-180° | 68.4   | 1.7       |
| 0°-30°    | 397.3  | 9.8       |
| 0°-40°    | 653.3  | 16.1      |
| 0°-60°    | 1196.2 | 29.5      |
| 0°-90°    | 1731.2 | 42.7      |
| 90°-120°  | 530.1  | 13.1      |
| 90°-150°  | 1748.3 | 43.1      |
| 90°-180°  | 2324.0 | 57.3      |
| 0°-180°   | 4055.0 | 100.0     |

**CANDELA DISTRIBUTION:**

|      | 0°  | 22.5° | 45° | 67.5° | 90° | Flux |
|------|-----|-------|-----|-------|-----|------|
| 0°   | 510 | 510   | 510 | 510   | 510 |      |
| 5°   | 512 | 510   | 505 | 510   | 509 | 49   |
| 15°  | 488 | 490   | 490 | 496   | 496 | 137  |
| 25°  | 444 | 449   | 456 | 464   | 467 | 204  |
| 35°  | 382 | 395   | 409 | 425   | 430 | 239  |
| 45°  | 314 | 334   | 359 | 382   | 390 | 242  |
| 55°  | 240 | 267   | 305 | 332   | 342 | 215  |
| 65°  | 164 | 200   | 244 | 274   | 284 | 163  |
| 75°  | 91  | 132   | 180 | 212   | 221 | 96   |
| 85°  | 27  | 72    | 120 | 151   | 161 | 28   |
| 90°  | 8   | 56    | 108 | 140   | 150 | 7    |
| 95°  | 40  | 57    | 105 | 136   | 144 | 45   |
| 105° | 162 | 199   | 95  | 127   | 137 | 173  |
| 115° | 302 | 319   | 365 | 147   | 117 | 297  |
| 125° | 424 | 431   | 464 | 488   | 496 | 379  |
| 135° | 524 | 532   | 544 | 565   | 570 | 405  |
| 145° | 607 | 606   | 615 | 623   | 624 | 380  |
| 155° | 668 | 664   | 670 | 673   | 669 | 308  |
| 165° | 704 | 701   | 702 | 706   | 702 | 199  |
| 175° | 720 | 716   | 718 | 721   | 716 | 69   |
| 180° | 719 | 719   | 719 | 719   | 719 |      |

TEST NUMBER: P1009105

CATALOG NUMBER: S122DIP-B485D530UB40-4F0-XX-W2A-D

**CANDELA DISTRIBUTION (FULL):**

|        | 0°    | 22.5° | 45°   | 67.5° | 90°   |
|--------|-------|-------|-------|-------|-------|
| 0°     | 510.3 | 510.3 | 510.3 | 510.3 | 510.3 |
| 2.5°   | 514.0 | 511.7 | 506.6 | 510.3 | 508.8 |
| 5°     | 511.7 | 509.5 | 505.1 | 509.5 | 508.8 |
| 7.5°   | 508.0 | 506.6 | 502.9 | 508.0 | 507.3 |
| 10°    | 503.6 | 502.1 | 499.9 | 505.8 | 505.1 |
| 12.5°  | 496.2 | 497.0 | 495.5 | 501.4 | 500.7 |
| 15°    | 488.1 | 489.6 | 489.6 | 496.2 | 495.5 |
| 17.5°  | 477.7 | 480.7 | 482.9 | 489.6 | 489.6 |
| 20°    | 467.4 | 471.1 | 474.0 | 482.2 | 482.2 |
| 22.5°  | 456.3 | 460.7 | 465.2 | 473.3 | 474.8 |
| 25°    | 443.7 | 448.9 | 455.5 | 464.4 | 466.6 |
| 27.5°  | 428.9 | 437.1 | 444.4 | 455.5 | 457.0 |
| 30°    | 414.1 | 423.7 | 433.4 | 445.2 | 447.4 |
| 32.5°  | 397.9 | 409.0 | 420.8 | 434.8 | 439.3 |
| 35°    | 382.3 | 394.9 | 409.0 | 425.2 | 430.4 |
| 37.5°  | 365.3 | 379.4 | 397.1 | 414.9 | 420.0 |
| 40°    | 348.3 | 364.6 | 384.5 | 403.8 | 410.4 |
| 42.5°  | 332.0 | 348.3 | 372.0 | 393.4 | 400.1 |
| 45°    | 313.6 | 333.5 | 359.4 | 382.3 | 389.7 |
| 47.5°  | 295.8 | 317.3 | 346.8 | 370.5 | 378.6 |
| 50°    | 277.3 | 300.2 | 333.5 | 358.7 | 366.8 |
| 52.5°  | 259.6 | 284.0 | 319.5 | 345.4 | 354.2 |
| 55°    | 240.3 | 267.0 | 305.4 | 332.0 | 341.7 |
| 57.5°  | 221.9 | 251.4 | 289.9 | 318.7 | 328.3 |
| 60°    | 201.9 | 233.7 | 275.8 | 303.9 | 314.3 |
| 62.5°  | 184.1 | 217.4 | 259.6 | 289.9 | 299.5 |
| 65°    | 164.2 | 200.4 | 244.0 | 274.4 | 284.0 |
| 67.5°  | 146.4 | 184.1 | 228.5 | 258.8 | 269.2 |
| 70°    | 127.2 | 165.7 | 211.5 | 243.3 | 252.2 |
| 72.5°  | 109.4 | 149.4 | 196.0 | 227.0 | 238.1 |
| 75°    | 91.0  | 132.4 | 179.7 | 211.5 | 221.1 |
| 77.5°  | 73.2  | 116.1 | 164.2 | 196.0 | 206.3 |
| 80°    | 55.5  | 100.6 | 148.6 | 179.7 | 190.1 |
| 82.5°  | 40.7  | 85.0  | 133.9 | 164.9 | 174.5 |
| 85°    | 26.6  | 72.5  | 119.8 | 150.9 | 161.2 |
| 87.5°  | 16.3  | 60.6  | 108.0 | 138.3 | 147.9 |
| 90°    | 7.9   | 56.5  | 108.0 | 140.2 | 150.1 |
| 92.5°  | 19.7  | 56.8  | 103.5 | 133.3 | 142.7 |
| 95°    | 39.7  | 57.3  | 105.3 | 136.0 | 144.4 |
| 97.5°  | 66.0  | 55.2  | 106.4 | 135.3 | 144.7 |
| 100°   | 97.2  | 53.3  | 103.6 | 135.1 | 144.2 |
| 102.5° | 130.8 | 154.1 | 99.5  | 131.8 | 141.5 |
| 105°   | 161.8 | 198.8 | 95.3  | 126.9 | 137.1 |
| 107.5° | 198.7 | 229.4 | 91.2  | 122.1 | 132.3 |
| 110°   | 233.4 | 259.0 | 145.0 | 116.6 | 126.9 |

TEST NUMBER: P1009105

CATALOG NUMBER: S122DIP-B485D530UB40-4F0-XX-W2A-D

**CANDELA DISTRIBUTION (continued):**

|        | 0°    | 22.5° | 45°   | 67.5° | 90°   |
|--------|-------|-------|-------|-------|-------|
| 112.5° | 266.6 | 287.8 | 313.0 | 112.5 | 122.2 |
| 115°   | 302.0 | 318.9 | 365.2 | 146.7 | 117.3 |
| 117.5° | 331.9 | 348.2 | 388.1 | 336.0 | 207.1 |
| 120°   | 366.2 | 377.0 | 415.9 | 442.9 | 380.8 |
| 122.5° | 395.3 | 404.4 | 442.1 | 465.2 | 472.4 |
| 125°   | 424.2 | 431.0 | 464.5 | 488.1 | 496.4 |
| 127.5° | 451.3 | 457.8 | 485.6 | 509.3 | 516.5 |
| 130°   | 476.8 | 484.3 | 505.6 | 529.0 | 534.4 |
| 132.5° | 502.8 | 508.7 | 525.5 | 547.2 | 552.7 |
| 135°   | 523.8 | 532.1 | 544.2 | 565.0 | 569.9 |
| 137.5° | 546.7 | 552.9 | 561.8 | 581.1 | 584.8 |
| 140°   | 569.0 | 572.5 | 579.7 | 596.2 | 598.0 |
| 142.5° | 587.8 | 590.7 | 597.5 | 610.5 | 611.6 |
| 145°   | 606.8 | 606.3 | 615.1 | 623.2 | 624.3 |
| 147.5° | 624.0 | 622.4 | 631.3 | 634.6 | 634.8 |
| 150°   | 640.6 | 637.0 | 645.3 | 648.4 | 645.8 |
| 152.5° | 654.7 | 650.5 | 658.3 | 661.4 | 657.8 |
| 155°   | 668.2 | 663.5 | 669.7 | 672.9 | 668.7 |
| 157.5° | 679.1 | 674.9 | 679.6 | 683.3 | 679.1 |
| 160°   | 688.5 | 685.3 | 688.5 | 691.6 | 687.9 |
| 162.5° | 696.8 | 693.7 | 696.3 | 699.9 | 695.2 |
| 165°   | 704.1 | 700.9 | 702.5 | 706.1 | 702.5 |
| 167.5° | 709.8 | 706.7 | 708.2 | 711.9 | 707.2 |
| 170°   | 714.5 | 711.3 | 712.4 | 716.0 | 711.3 |
| 172.5° | 717.6 | 714.5 | 715.5 | 719.1 | 714.5 |
| 175°   | 720.2 | 716.5 | 717.6 | 721.2 | 716.0 |
| 177.5° | 721.2 | 717.6 | 718.1 | 721.7 | 717.1 |
| 180°   | 718.6 | 718.6 | 718.6 | 718.6 | 718.6 |

(END OF REPORT)