

Signify Classified - Internal  
Cooper Lighting Solutions Photometric Lab  
1121 Highway 74 South  
Peachtree City, GA 30269



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: LUMARK

Report Number: P1067875

Luminaire Tested: **NAV-SA2C-740-U-LBC**

Issue Date: 08/07/2025

**Test Information**

Test Method: LM-79-08  
Report Number: P1067875  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 08/07/2025  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: LUMARK  
Catalog Number: NAV-SA2C-740-U-LBC  
Description: Navion AREA AND ROADWAY LUMINAIRE 1050mA 2xLight Square PACKAGE  
70CRI 4000K FIXTURE w/ LEFT CORNER BACKLIGHT CONTROL  
Light Source: (28) 4000K CCT, 70 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 9654.1 lumens  
Efficiency: N/A  
Efficacy: 100.4 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')  
IES Classification: Type III - Short  
BUG Rating: B0 - U0 - G2

Input Watts (W): 96.2  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: 0.97  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



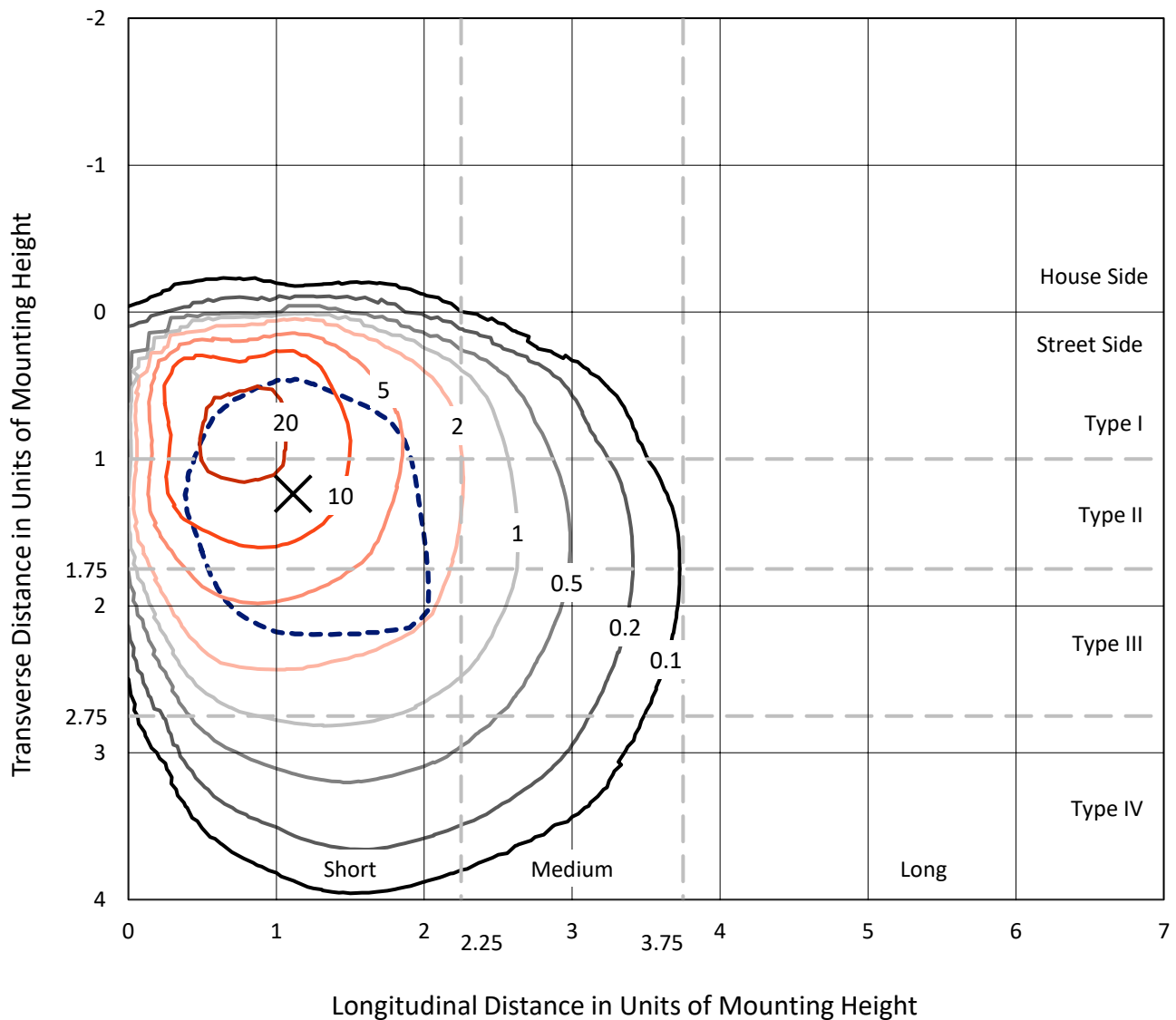
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## Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

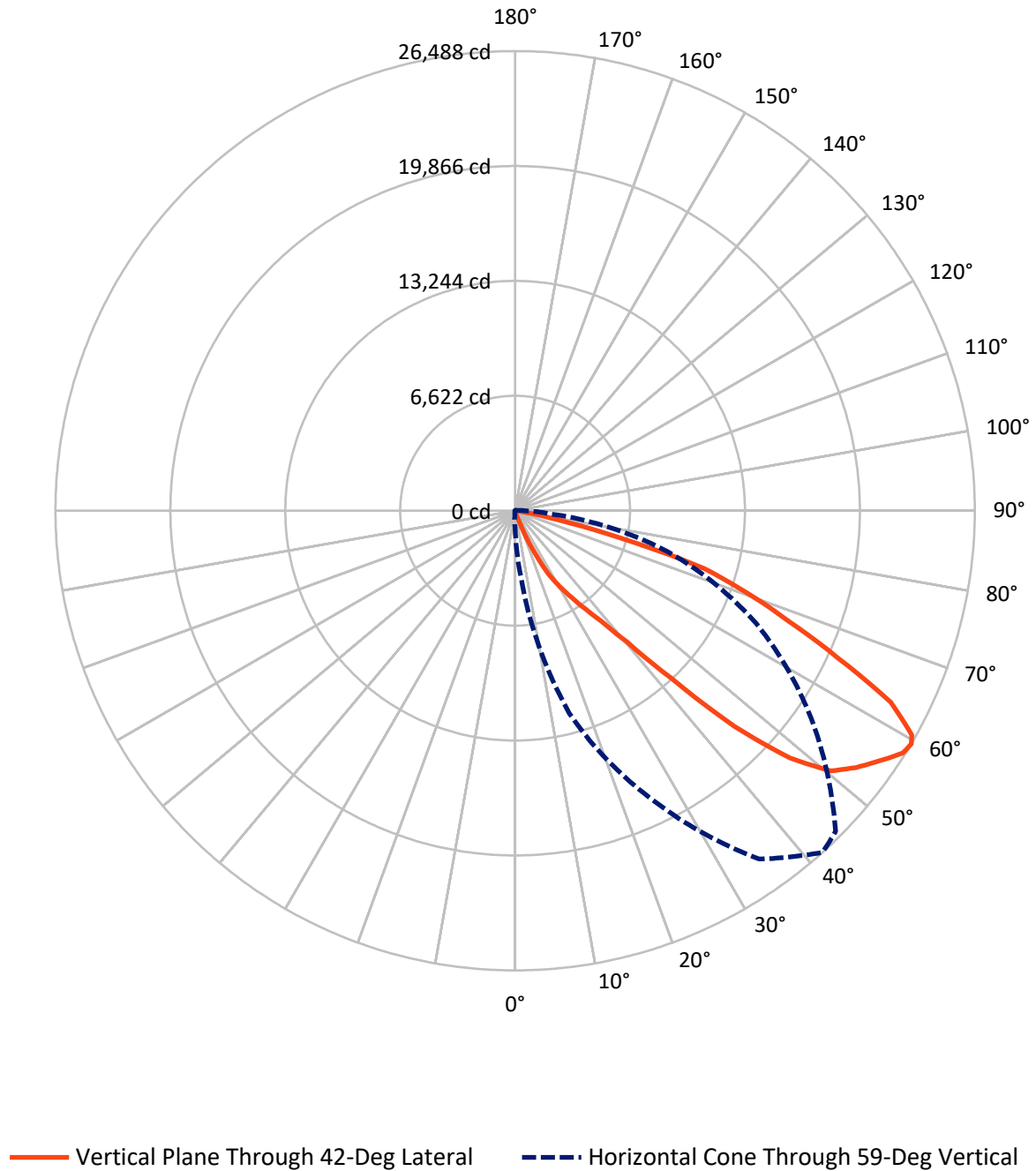


Based on 15 foot mounting height. Maximum calculated value = 28.7 fc  
Type III - Short - N/A

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## Luminous Intensity Polar Plot



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**FLUX DISTRIBUTION:**

|                    |           | Downward | Upward | Total  |
|--------------------|-----------|----------|--------|--------|
| <b>House Side</b>  | Lumens    | 46.5     | 0.0    | 46.5   |
|                    | % Fixture | 0.5      | 0.0    | 0.5    |
| <b>Street Side</b> | Lumens    | 9607.6   | 0.0    | 9607.6 |
|                    | % Fixture | 99.5     | 0.0    | 99.5   |
| <b>Total</b>       | Lumens    | 9654.1   | 0.0    | 9654.1 |
|                    | % Fixture | 100.0    | 0.0    | 100.0  |

**Coefficient of Utilization**

**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 2.8    | 0.0       |
| 10°-20°   | 14.1   | 0.1       |
| 20°-30°   | 180.1  | 1.9       |
| 30°-40°   | 607.1  | 6.3       |
| 40°-50°   | 1833.8 | 19.0      |
| 50°-60°   | 3237.0 | 33.5      |
| 60°-70°   | 2850.3 | 29.5      |
| 70°-80°   | 907.2  | 9.4       |
| 80°-90°   | 21.7   | 0.2       |
| 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°-90°    | 9654.1 | 100.0     |
| 0°-180°   | 9654.1 | 100.0     |



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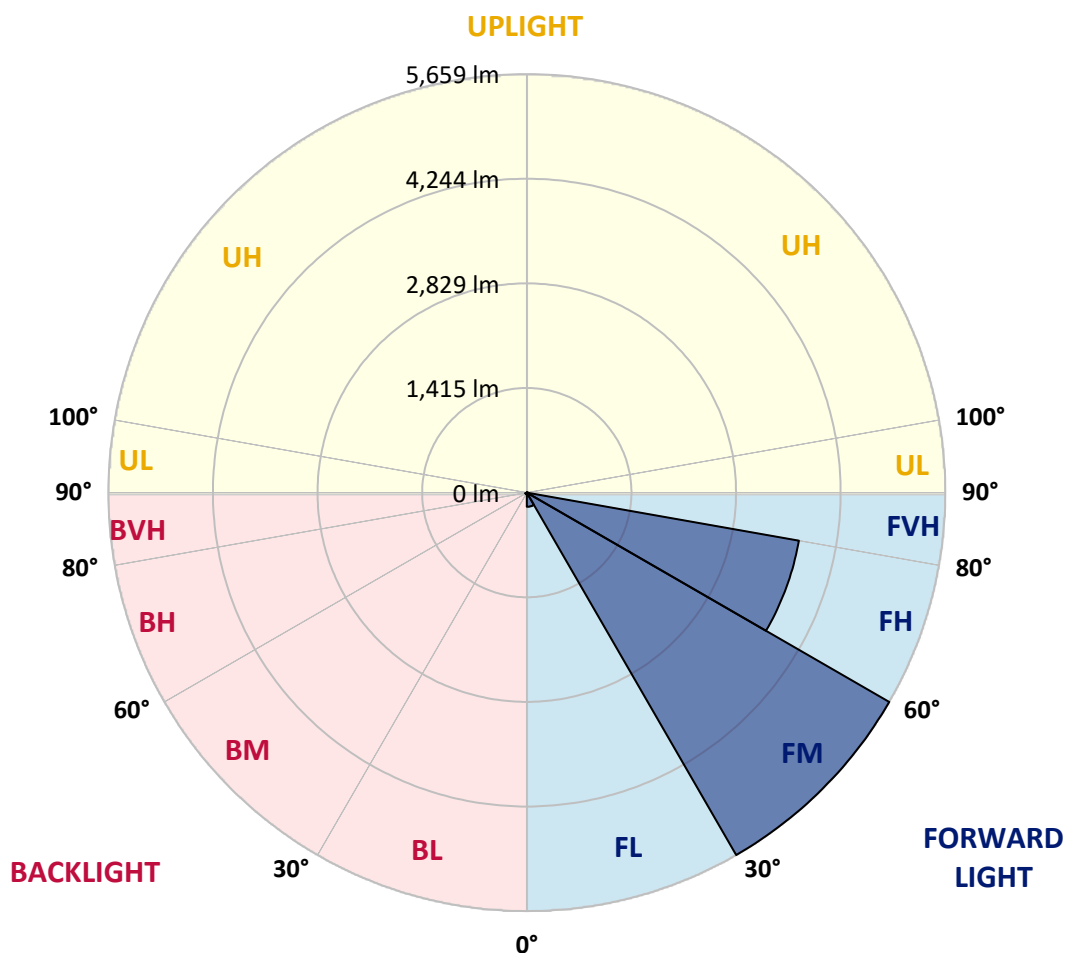
CATALOG NUMBER: NAV-SA2C-740-U-LBC

**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

| Zone |             | Lumens | % Fixture | Zone Rating/Lumen Limit |      |         |
|------|-------------|--------|-----------|-------------------------|------|---------|
|      |             |        |           | B                       | U    | G       |
| FL   | (0°-30°)    | 191.8  | 2.0       |                         |      |         |
| FM   | (30°-60°)   | 5658.9 | 58.6      |                         |      |         |
| FH   | (60°-80°)   | 3736.2 | 38.7      |                         |      | G2/5000 |
| FVH  | (80°-90°)   | 20.7   | 0.2       |                         |      | G1/100  |
| BL   | (0°-30°)    | 5.2    | 0.1       | B0/110                  |      |         |
| BM   | (30°-60°)   | 19.0   | 0.2       | B0/220                  |      |         |
| BH   | (60°-80°)   | 21.3   | 0.2       | B0/110                  |      | G0/110  |
| BVH  | (80°-90°)   | 1.0    | 0.0       |                         |      | G0/10   |
| UL   | (90°-100°)  | 0.0    | 0.0       |                         | U0/0 |         |
| UH   | (100°-180°) | 0.0    | 0.0       |                         | U0/0 |         |

**BUG Rating: B0-U0-G2**

Type III Short





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**CANDELA DISTRIBUTION (FULL):**

|       | 0°     | 5°     | 15°     | 25°     | 35°     | 42°     | 45°     | 55°     | 65°     | 75°     | 85°    |
|-------|--------|--------|---------|---------|---------|---------|---------|---------|---------|---------|--------|
| 0°    | 27.2   | 27.2   | 27.2    | 27.2    | 27.2    | 27.2    | 27.2    | 27.2    | 27.2    | 27.2    | 27.2   |
| 2.5°  | 42.4   | 42.4   | 39.3    | 36.3    | 33.3    | 30.3    | 30.3    | 30.3    | 27.2    | 27.2    | 24.2   |
| 5°    | 48.4   | 48.4   | 45.4    | 42.4    | 42.4    | 39.3    | 39.3    | 36.3    | 33.3    | 33.3    | 30.3   |
| 7.5°  | 51.5   | 51.5   | 51.5    | 51.5    | 48.4    | 48.4    | 48.4    | 45.4    | 42.4    | 39.3    | 36.3   |
| 10°   | 54.5   | 57.5   | 60.5    | 60.5    | 60.5    | 60.5    | 60.5    | 57.5    | 51.5    | 48.4    | 42.4   |
| 12.5° | 60.5   | 63.6   | 69.6    | 75.7    | 75.7    | 78.7    | 75.7    | 72.6    | 66.6    | 57.5    | 48.4   |
| 15°   | 66.6   | 72.6   | 81.7    | 93.8    | 105.9   | 109.0   | 109.0   | 99.9    | 87.8    | 69.6    | 57.5   |
| 17.5° | 75.7   | 84.8   | 109.0   | 148.3   | 190.7   | 224.0   | 224.0   | 199.8   | 139.2   | 90.8    | 66.6   |
| 20°   | 81.7   | 99.9   | 175.6   | 357.2   | 544.8   | 684.1   | 656.8   | 581.2   | 311.8   | 142.3   | 72.6   |
| 22.5° | 90.8   | 127.1  | 372.3   | 938.3   | 1452.9  | 1707.2  | 1646.6  | 1250.1  | 699.2   | 254.3   | 87.8   |
| 25°   | 102.9  | 184.6  | 738.6   | 1758.6  | 2700.0  | 2975.4  | 2936.1  | 2333.7  | 1274.3  | 426.8   | 112.0  |
| 27.5° | 127.1  | 272.4  | 1183.5  | 2666.7  | 3983.4  | 4219.5  | 4204.3  | 3417.4  | 2037.1  | 687.1   | 145.3  |
| 30°   | 160.4  | 396.5  | 1755.6  | 3623.2  | 4833.9  | 5073.1  | 4997.4  | 4210.4  | 2748.4  | 1050.3  | 187.7  |
| 32.5° | 199.8  | 553.9  | 2273.2  | 4328.4  | 5617.9  | 5932.7  | 5841.9  | 4900.5  | 3320.5  | 1359.1  | 278.5  |
| 35°   | 260.3  | 708.3  | 2784.7  | 4952.0  | 6522.9  | 6922.5  | 6771.1  | 5611.8  | 3813.9  | 1707.2  | 336.0  |
| 37.5° | 290.6  | 799.1  | 3253.9  | 5630.0  | 7540.0  | 8084.8  | 7969.8  | 6510.8  | 4316.3  | 2152.1  | 411.7  |
| 40°   | 293.6  | 908.1  | 3741.2  | 6513.9  | 8977.7  | 9949.4  | 9743.6  | 8054.5  | 5251.6  | 2724.2  | 529.7  |
| 42.5° | 302.7  | 1071.5 | 4373.9  | 8021.3  | 11801.8 | 13197.2 | 12964.2 | 10893.8 | 7373.5  | 3871.4  | 750.7  |
| 45°   | 345.1  | 1380.3 | 5663.3  | 10839.3 | 15679.3 | 17725.5 | 17456.1 | 14849.9 | 10336.8 | 6029.6  | 1280.4 |
| 47.5° | 493.4  | 2076.4 | 7924.4  | 13881.3 | 19644.5 | 21276.0 | 21209.4 | 17967.6 | 13021.7 | 8242.2  | 2170.3 |
| 50°   | 793.0  | 3187.3 | 10497.2 | 16439.0 | 22168.9 | 23570.4 | 23403.9 | 19269.2 | 14553.3 | 9752.6  | 2781.7 |
| 52.5° | 1059.4 | 4249.7 | 12113.6 | 17380.4 | 22922.6 | 24593.5 | 24390.7 | 19744.4 | 14955.9 | 10197.6 | 2951.2 |
| 55°   | 1126.0 | 4634.2 | 12594.9 | 17671.0 | 23422.1 | 25459.2 | 25165.5 | 20062.2 | 15007.3 | 9879.8  | 2669.7 |
| 57.5° | 1092.7 | 4270.9 | 12283.1 | 17955.5 | 24118.2 | 26349.1 | 25958.6 | 20682.7 | 15179.8 | 9341.0  | 2221.7 |
| 59°   | 1035.2 | 3823.0 | 12089.4 | 18182.5 | 24502.7 | 26488.3 | 26122.0 | 20818.9 | 15294.9 | 9095.8  | 1949.3 |
| 60°   | 968.6  | 3520.3 | 11938.0 | 18330.8 | 24478.4 | 26270.4 | 25892.0 | 20755.4 | 15340.3 | 8883.9  | 1819.2 |
| 62.5° | 747.6  | 2809.0 | 11720.1 | 18224.9 | 22949.9 | 24281.7 | 24066.8 | 19199.5 | 14674.4 | 8205.9  | 1434.7 |
| 65°   | 581.2  | 2149.1 | 10921.0 | 16254.4 | 19529.5 | 20425.4 | 20358.8 | 16257.4 | 12349.7 | 7073.8  | 1035.2 |
| 67.5° | 460.1  | 1567.9 | 9235.0  | 13163.9 | 15712.6 | 16986.9 | 16938.5 | 13197.2 | 9374.3  | 5406.0  | 744.6  |
| 70°   | 375.3  | 1116.9 | 6332.2  | 9925.2  | 12567.6 | 14171.9 | 14102.3 | 10621.3 | 6946.7  | 3429.5  | 541.8  |
| 72.5° | 317.8  | 714.3  | 3841.1  | 7482.5  | 10488.2 | 11405.3 | 11202.5 | 8569.1  | 5051.9  | 1867.6  | 429.8  |
| 75°   | 269.4  | 438.9  | 1903.9  | 4664.4  | 6247.5  | 6241.4  | 6038.6  | 4537.3  | 2712.1  | 914.1   | 342.0  |
| 77.5° | 217.9  | 308.7  | 747.6   | 1280.4  | 1970.5  | 2439.7  | 2400.3  | 1607.3  | 811.2   | 266.4   | 211.9  |
| 80°   | 142.3  | 145.3  | 199.8   | 351.1   | 541.8   | 599.3   | 681.0   | 490.4   | 236.1   | 127.1   | 87.8   |
| 82.5° | 63.6   | 69.6   | 90.8    | 115.0   | 115.0   | 105.9   | 93.8    | 69.6    | 51.5    | 42.4    | 21.2   |
| 85°   | 15.1   | 21.2   | 15.1    | 18.2    | 15.1    | 12.1    | 12.1    | 6.1     | 0.0     | 0.0     | 0.0    |
| 87.5° | 3.0    | 0.0    | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0    |
| 90°   | 0.0    | 0.0    | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0    |

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**CANDELA DISTRIBUTION (continued):**

|       | 90°   | 95°   | 105°  | 115° | 125° | 135° | 145° | 155° | 165° | 175° | 180° |
|-------|-------|-------|-------|------|------|------|------|------|------|------|------|
| 0°    | 27.2  | 27.2  | 27.2  | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 |
| 2.5°  | 24.2  | 24.2  | 24.2  | 21.2 | 21.2 | 21.2 | 18.2 | 18.2 | 18.2 | 15.1 | 15.1 |
| 5°    | 30.3  | 27.2  | 24.2  | 24.2 | 21.2 | 21.2 | 18.2 | 15.1 | 15.1 | 15.1 | 12.1 |
| 7.5°  | 33.3  | 30.3  | 27.2  | 24.2 | 21.2 | 18.2 | 18.2 | 15.1 | 12.1 | 12.1 | 12.1 |
| 10°   | 39.3  | 36.3  | 30.3  | 24.2 | 21.2 | 18.2 | 15.1 | 15.1 | 12.1 | 9.1  | 9.1  |
| 12.5° | 45.4  | 39.3  | 33.3  | 27.2 | 21.2 | 18.2 | 15.1 | 15.1 | 12.1 | 9.1  | 6.1  |
| 15°   | 51.5  | 45.4  | 36.3  | 27.2 | 21.2 | 18.2 | 15.1 | 15.1 | 9.1  | 6.1  | 3.0  |
| 17.5° | 57.5  | 48.4  | 36.3  | 30.3 | 21.2 | 18.2 | 15.1 | 12.1 | 6.1  | 3.0  | 0.0  |
| 20°   | 60.5  | 51.5  | 39.3  | 30.3 | 21.2 | 18.2 | 15.1 | 9.1  | 3.0  | 0.0  | 0.0  |
| 22.5° | 66.6  | 57.5  | 42.4  | 30.3 | 21.2 | 15.1 | 9.1  | 3.0  | 0.0  | 0.0  | 0.0  |
| 25°   | 78.7  | 60.5  | 42.4  | 30.3 | 21.2 | 15.1 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  |
| 27.5° | 87.8  | 66.6  | 42.4  | 30.3 | 21.2 | 12.1 | 3.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 30°   | 102.9 | 72.6  | 45.4  | 30.3 | 21.2 | 9.1  | 3.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 32.5° | 127.1 | 78.7  | 45.4  | 30.3 | 18.2 | 9.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 35°   | 154.4 | 90.8  | 45.4  | 30.3 | 18.2 | 9.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 37.5° | 157.4 | 96.9  | 45.4  | 30.3 | 18.2 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 40°   | 163.5 | 90.8  | 48.4  | 30.3 | 18.2 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 42.5° | 187.7 | 84.8  | 51.5  | 30.3 | 18.2 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 45°   | 278.5 | 87.8  | 51.5  | 33.3 | 18.2 | 9.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 47.5° | 484.3 | 90.8  | 48.4  | 33.3 | 18.2 | 9.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 50°   | 620.5 | 105.9 | 48.4  | 36.3 | 21.2 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 52.5° | 659.9 | 124.1 | 48.4  | 39.3 | 27.2 | 3.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 55°   | 641.7 | 145.3 | 51.5  | 42.4 | 33.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 57.5° | 593.3 | 157.4 | 54.5  | 45.4 | 36.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 59°   | 541.8 | 166.5 | 63.6  | 48.4 | 36.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 60°   | 499.4 | 175.6 | 66.6  | 51.5 | 36.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 62.5° | 402.6 | 187.7 | 72.6  | 60.5 | 30.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 65°   | 351.1 | 196.7 | 75.7  | 66.6 | 27.2 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 67.5° | 320.9 | 202.8 | 81.7  | 69.6 | 24.2 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 70°   | 296.6 | 199.8 | 87.8  | 66.6 | 21.2 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 72.5° | 269.4 | 190.7 | 105.9 | 60.5 | 18.2 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 75°   | 242.2 | 172.5 | 115.0 | 54.5 | 12.1 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 77.5° | 175.6 | 145.3 | 105.9 | 48.4 | 6.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 80°   | 75.7  | 78.7  | 75.7  | 36.3 | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 82.5° | 15.1  | 18.2  | 15.1  | 9.1  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 85°   | 0.0   | 0.0   | 0.0   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 87.5° | 0.0   | 0.0   | 0.0   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |
| 90°   | 0.0   | 0.0   | 0.0   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |



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**CANDELA DISTRIBUTION (continued):**

|       | 185° | 195° | 205° | 215° | 225° | 235° | 245° | 255° | 265° | 270° | 275° |
|-------|------|------|------|------|------|------|------|------|------|------|------|
| 0°    | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 |
| 2.5°  | 15.1 | 15.1 | 15.1 | 15.1 | 18.2 | 18.2 | 24.2 | 30.3 | 36.3 | 39.3 | 39.3 |
| 5°    | 12.1 | 12.1 | 12.1 | 12.1 | 12.1 | 15.1 | 18.2 | 24.2 | 33.3 | 36.3 | 36.3 |
| 7.5°  | 9.1  | 9.1  | 9.1  | 9.1  | 9.1  | 9.1  | 15.1 | 21.2 | 30.3 | 33.3 | 36.3 |
| 10°   | 9.1  | 6.1  | 6.1  | 3.0  | 3.0  | 6.1  | 9.1  | 18.2 | 27.2 | 30.3 | 33.3 |
| 12.5° | 6.1  | 3.0  | 3.0  | 0.0  | 0.0  | 3.0  | 6.1  | 15.1 | 24.2 | 27.2 | 30.3 |
| 15°   | 3.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 12.1 | 21.2 | 24.2 | 30.3 |
| 17.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 9.1  | 18.2 | 24.2 | 27.2 |
| 20°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 6.1  | 15.1 | 21.2 | 24.2 |
| 22.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 12.1 | 18.2 | 21.2 |
| 25°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 9.1  | 12.1 | 15.1 |
| 27.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 6.1  | 9.1  | 12.1 |
| 30°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 6.1  | 9.1  | 12.1 |
| 32.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  | 9.1  |
| 35°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  | 9.1  |
| 37.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  | 6.1  |
| 40°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 42.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 45°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 47.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 50°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 52.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 55°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 57.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 59°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 60°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 62.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 65°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 67.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 70°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 72.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  |
| 75°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 77.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 80°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 6.1  |
| 82.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 85°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 87.5° | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 3.0  | 3.0  |
| 90°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  |

REPORT NUMBER: P1067875

CATALOG NUMBER: NAV-SA2C-740-U-LBC

**CANDELA DISTRIBUTION (continued):**

|       | 285° | 295° | 305° | 315° | 318° | 325° | 335° | 345°  | 355°  | 360°   |
|-------|------|------|------|------|------|------|------|-------|-------|--------|
| 0°    | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2 | 27.2  | 27.2  | 27.2   |
| 2.5°  | 42.4 | 42.4 | 39.3 | 36.3 | 36.3 | 36.3 | 39.3 | 42.4  | 42.4  | 42.4   |
| 5°    | 39.3 | 39.3 | 36.3 | 36.3 | 36.3 | 36.3 | 39.3 | 45.4  | 48.4  | 48.4   |
| 7.5°  | 39.3 | 39.3 | 36.3 | 36.3 | 36.3 | 36.3 | 39.3 | 45.4  | 48.4  | 51.5   |
| 10°   | 36.3 | 36.3 | 36.3 | 36.3 | 33.3 | 36.3 | 39.3 | 45.4  | 54.5  | 54.5   |
| 12.5° | 36.3 | 36.3 | 36.3 | 36.3 | 33.3 | 36.3 | 42.4 | 48.4  | 57.5  | 60.5   |
| 15°   | 36.3 | 36.3 | 36.3 | 33.3 | 33.3 | 36.3 | 42.4 | 51.5  | 60.5  | 66.6   |
| 17.5° | 33.3 | 36.3 | 36.3 | 33.3 | 33.3 | 36.3 | 42.4 | 51.5  | 66.6  | 75.7   |
| 20°   | 30.3 | 33.3 | 36.3 | 33.3 | 33.3 | 33.3 | 42.4 | 51.5  | 69.6  | 81.7   |
| 22.5° | 27.2 | 30.3 | 33.3 | 33.3 | 30.3 | 33.3 | 42.4 | 54.5  | 75.7  | 90.8   |
| 25°   | 24.2 | 27.2 | 27.2 | 30.3 | 30.3 | 33.3 | 42.4 | 54.5  | 78.7  | 102.9  |
| 27.5° | 18.2 | 21.2 | 24.2 | 27.2 | 27.2 | 33.3 | 42.4 | 57.5  | 84.8  | 127.1  |
| 30°   | 15.1 | 18.2 | 21.2 | 24.2 | 27.2 | 33.3 | 42.4 | 57.5  | 90.8  | 160.4  |
| 32.5° | 15.1 | 18.2 | 21.2 | 24.2 | 27.2 | 30.3 | 42.4 | 60.5  | 99.9  | 199.8  |
| 35°   | 12.1 | 15.1 | 18.2 | 24.2 | 24.2 | 30.3 | 42.4 | 60.5  | 109.0 | 260.3  |
| 37.5° | 12.1 | 15.1 | 18.2 | 24.2 | 24.2 | 30.3 | 42.4 | 60.5  | 133.2 | 290.6  |
| 40°   | 9.1  | 12.1 | 15.1 | 24.2 | 24.2 | 30.3 | 45.4 | 63.6  | 136.2 | 293.6  |
| 42.5° | 9.1  | 12.1 | 15.1 | 21.2 | 24.2 | 30.3 | 45.4 | 63.6  | 127.1 | 302.7  |
| 45°   | 9.1  | 12.1 | 15.1 | 24.2 | 27.2 | 33.3 | 45.4 | 66.6  | 124.1 | 345.1  |
| 47.5° | 9.1  | 12.1 | 15.1 | 24.2 | 30.3 | 33.3 | 45.4 | 66.6  | 127.1 | 493.4  |
| 50°   | 9.1  | 12.1 | 15.1 | 24.2 | 33.3 | 33.3 | 45.4 | 66.6  | 139.2 | 793.0  |
| 52.5° | 6.1  | 9.1  | 12.1 | 21.2 | 27.2 | 36.3 | 48.4 | 63.6  | 148.3 | 1059.4 |
| 55°   | 6.1  | 6.1  | 9.1  | 18.2 | 24.2 | 39.3 | 51.5 | 63.6  | 172.5 | 1126.0 |
| 57.5° | 6.1  | 6.1  | 9.1  | 15.1 | 21.2 | 42.4 | 54.5 | 63.6  | 199.8 | 1092.7 |
| 59°   | 6.1  | 6.1  | 6.1  | 15.1 | 18.2 | 42.4 | 54.5 | 66.6  | 202.8 | 1035.2 |
| 60°   | 6.1  | 6.1  | 6.1  | 12.1 | 18.2 | 42.4 | 57.5 | 69.6  | 205.8 | 968.6  |
| 62.5° | 3.0  | 3.0  | 3.0  | 12.1 | 15.1 | 42.4 | 63.6 | 84.8  | 211.9 | 747.6  |
| 65°   | 6.1  | 6.1  | 3.0  | 9.1  | 15.1 | 36.3 | 72.6 | 90.8  | 214.9 | 581.2  |
| 67.5° | 6.1  | 6.1  | 6.1  | 12.1 | 15.1 | 36.3 | 75.7 | 93.8  | 214.9 | 460.1  |
| 70°   | 6.1  | 6.1  | 6.1  | 12.1 | 18.2 | 36.3 | 75.7 | 96.9  | 211.9 | 375.3  |
| 72.5° | 6.1  | 6.1  | 6.1  | 12.1 | 18.2 | 33.3 | 69.6 | 99.9  | 202.8 | 317.8  |
| 75°   | 6.1  | 6.1  | 6.1  | 9.1  | 15.1 | 30.3 | 66.6 | 109.0 | 184.6 | 269.4  |
| 77.5° | 6.1  | 6.1  | 6.1  | 6.1  | 12.1 | 24.2 | 60.5 | 121.1 | 163.5 | 217.9  |
| 80°   | 9.1  | 6.1  | 6.1  | 6.1  | 9.1  | 21.2 | 57.5 | 118.0 | 136.2 | 142.3  |
| 82.5° | 9.1  | 6.1  | 6.1  | 3.0  | 6.1  | 15.1 | 45.4 | 90.8  | 69.6  | 63.6   |
| 85°   | 6.1  | 6.1  | 6.1  | 3.0  | 3.0  | 9.1  | 21.2 | 27.2  | 21.2  | 15.1   |
| 87.5° | 6.1  | 6.1  | 6.1  | 3.0  | 3.0  | 3.0  | 3.0  | 3.0   | 3.0   | 3.0    |
| 90°   | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0  | 0.0   | 0.0   | 0.0    |

LM-79-2019: Approved Method: Electrical and Photometric Measurements of Solid-State Lighting Products

Report Prepared for

Cooper Lighting Solutions

McGraw-Edison

Report Number: SP1-2407-184-1

Test Date: 10/09/2024

Luminaire Tested: GSS-SB1A-740-U-5WQ

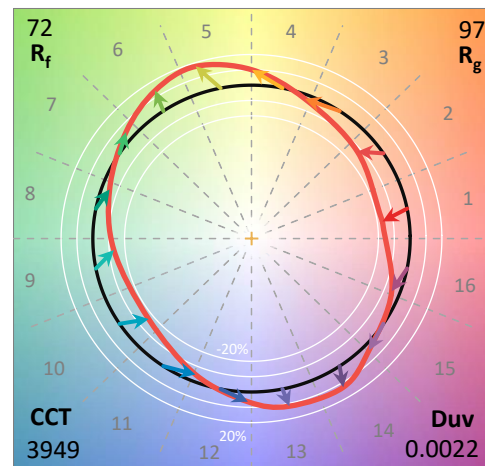
Data in this report applies to families of products including GSS-SB1A-740-U-5WQ

### Test Information

Test Method: LM-79-2019  
 Report Number: SP1-2407-184-1  
 Test Lab: COOPER LIGHTING SOLUTIONS  
 Photometer: SP1 - 76IN SPHERE  
 Measurement Geometry:  $4\pi$   
 Issue Date: 10/15/2024  
 Manufacturer: COOPER LIGHTING SOLUTIONS  
 Product Line: McGraw-Edison  
 Catalog Number: **GSS-SB1A-740-U-5WQ**  
 Description: GALLEON II SITE SLIM 1SQ 350MA 5WQ HIGH DENSITY LIGHTSQUARE WITH 70 CRI  
 4000K CCT 26 LEDS

### Spectral Parameters

|                           |          |           |      |      |       |
|---------------------------|----------|-----------|------|------|-------|
| CCT (K):                  | 3949     | CRI (Ra): | 70.7 |      |       |
| CIE u':                   | 0.2248   | R1:       | 68.0 | R9:  | -36.7 |
| CIE v':                   | 0.5053   | R2:       | 76.0 | R10: | 45.1  |
| Duv:                      | 0.0022   | R3:       | 84.3 | R11: | 70.7  |
| CIE x:                    | 0.3844   | R4:       | 72.0 | R12: | 47.1  |
| CIE y:                    | 0.3840   | R5:       | 68.6 | R13: | 68.5  |
| CIE z:                    | 0.2316   | R6:       | 68.3 | R14: | 91.1  |
| Peak Wavelength (nm):     | 440      | R7:       | 77.9 | R15: | 58.7  |
| Dominant Wavelength (nm): | 578      | R8:       | 50.3 |      |       |
| Purity:                   | 30.60026 |           |      |      |       |
| Rf:                       | 71.8     |           |      |      |       |
| Rg:                       | 96.5     |           |      |      |       |



### Test Conditions

Stabilization Time: 34M  
 Operation Time: 1H 34M  
 Sphere Temperature (°C): 25.2

REPORT NUMBER: SP1-2407-184-1

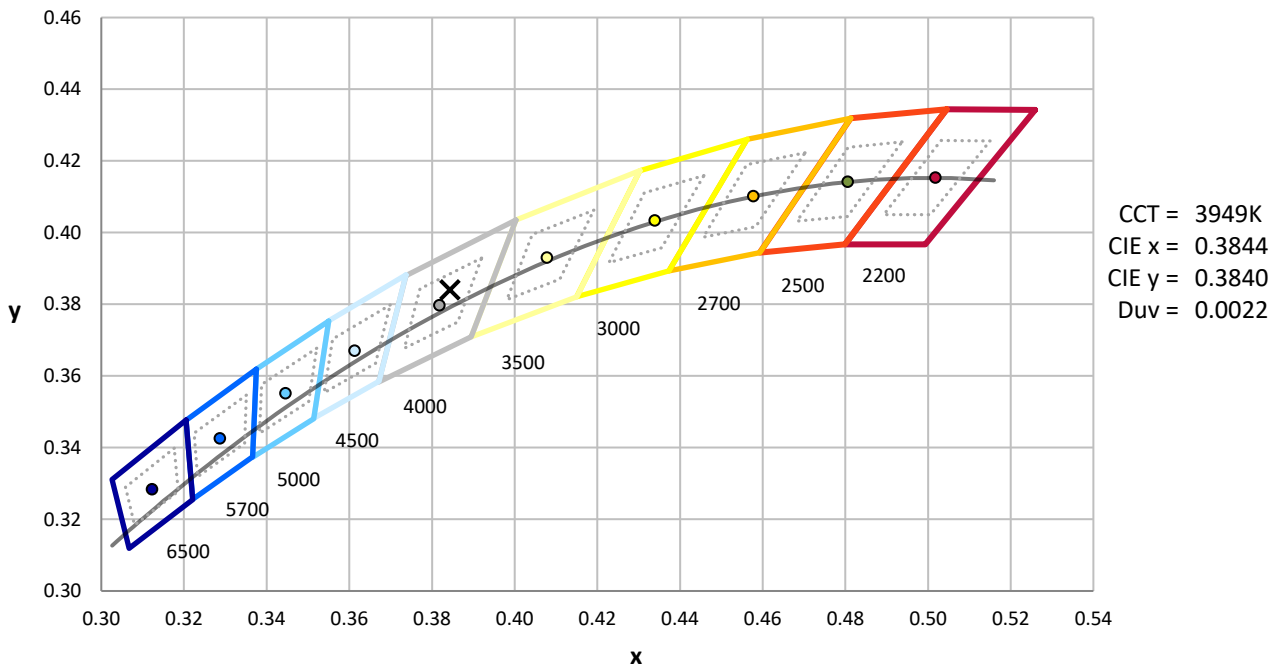
| Measurement and Test Equipment |                       |                  |                      |
|--------------------------------|-----------------------|------------------|----------------------|
| Instrument                     | Identification Number | Calibration Date | Calibration Due Date |
| Photometer                     | IN0058                | 6/18/2024        | 12/18/2024           |
| Power Meter                    | INXT2011004           | 2/8/2024         | 2/8/2025             |
| AC Power Source                | IN0063                | 10/24/2023       | 10/24/2024           |
| DC Power Source                | IN0208                | 10/24/2023       | 10/24/2024           |
| Sphere Thermometer             | IN0085                | 10/24/2023       | 10/24/2024           |
| Room Thermometer               | IN0046                | 10/24/2023       | 10/24/2024           |

REPORT NUMBER: SP1-2407-184-1

**CIE 1931 Chromaticity Diagram**



**CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles**



Point lies inside the ANSI 4000K 4-step quadrangle

REPORT NUMBER: SP1-2407-184-1

### Photopic Flux vs. Wavelength



### Photopic Lumens: NR

| $\lambda$<br>(nm) | Power<br>$\text{W}/\text{nm}$ | Lumens<br>$(\phi)/\text{nm}$ | $\lambda$<br>(nm) | Power<br>$\text{W}/\text{nm}$ | Lumens<br>$(\phi)/\text{nm}$ | $\lambda$<br>(nm) | Power<br>$\text{W}/\text{nm}$ | Lumens<br>$(\phi)/\text{nm}$ | $\lambda$<br>(nm) | Power<br>$\text{W}/\text{nm}$ | Lumens<br>$(\phi)/\text{nm}$ | $\lambda$<br>(nm) | Power<br>$\text{W}/\text{nm}$ | Lumens<br>$(\phi)/\text{nm}$ |
|-------------------|-------------------------------|------------------------------|-------------------|-------------------------------|------------------------------|-------------------|-------------------------------|------------------------------|-------------------|-------------------------------|------------------------------|-------------------|-------------------------------|------------------------------|
| 360               | 0                             | NR                           | 490               | 139                           | NR                           | 620               | 607                           | NR                           | 750               | 15                            | NR                           | 880               | 0                             | NR                           |
| 365               | 0                             | NR                           | 495               | 198                           | NR                           | 625               | 554                           | NR                           | 755               | 13                            | NR                           | 885               | 0                             | NR                           |
| 370               | 0                             | NR                           | 500               | 267                           | NR                           | 630               | 504                           | NR                           | 760               | 11                            | NR                           | 890               | 0                             | NR                           |
| 375               | 0                             | NR                           | 505               | 343                           | NR                           | 635               | 452                           | NR                           | 765               | 10                            | NR                           | 895               | 0                             | NR                           |
| 380               | 0                             | NR                           | 510               | 410                           | NR                           | 640               | 403                           | NR                           | 770               | 8                             | NR                           | 900               | 0                             | NR                           |
| 385               | 2                             | NR                           | 515               | 470                           | NR                           | 645               | 357                           | NR                           | 775               | 7                             | NR                           | 905               | 0                             | NR                           |
| 390               | 4                             | NR                           | 520               | 516                           | NR                           | 650               | 314                           | NR                           | 780               | 6                             | NR                           | 910               | 0                             | NR                           |
| 395               | 7                             | NR                           | 525               | 550                           | NR                           | 655               | 275                           | NR                           | 785               | 5                             | NR                           | 915               | 0                             | NR                           |
| 400               | 10                            | NR                           | 530               | 578                           | NR                           | 660               | 240                           | NR                           | 790               | 5                             | NR                           | 920               | 0                             | NR                           |
| 405               | 17                            | NR                           | 535               | 601                           | NR                           | 665               | 208                           | NR                           | 795               | 4                             | NR                           | 925               | 0                             | NR                           |
| 410               | 35                            | NR                           | 540               | 620                           | NR                           | 670               | 179                           | NR                           | 800               | 4                             | NR                           | 930               | 0                             | NR                           |
| 415               | 70                            | NR                           | 545               | 641                           | NR                           | 675               | 155                           | NR                           | 805               | 3                             | NR                           | 935               | 0                             | NR                           |
| 420               | 147                           | NR                           | 550               | 664                           | NR                           | 680               | 133                           | NR                           | 810               | 3                             | NR                           | 940               | 0                             | NR                           |
| 425               | 285                           | NR                           | 555               | 689                           | NR                           | 685               | 114                           | NR                           | 815               | 2                             | NR                           | 945               | 0                             | NR                           |
| 430               | 487                           | NR                           | 560               | 715                           | NR                           | 690               | 98                            | NR                           | 820               | 2                             | NR                           | 950               | 0                             | NR                           |
| 435               | 787                           | NR                           | 565               | 743                           | NR                           | 695               | 84                            | NR                           | 825               | 2                             | NR                           | 955               | 0                             | NR                           |
| 440               | 1000                          | NR                           | 570               | 771                           | NR                           | 700               | 72                            | NR                           | 830               | 2                             | NR                           | 960               | 0                             | NR                           |
| 445               | 783                           | NR                           | 575               | 794                           | NR                           | 705               | 61                            | NR                           | 835               | 1                             | NR                           | 965               | 0                             | NR                           |
| 450               | 417                           | NR                           | 580               | 811                           | NR                           | 710               | 52                            | NR                           | 840               | 1                             | NR                           | 970               | 0                             | NR                           |
| 455               | 261                           | NR                           | 585               | 817                           | NR                           | 715               | 45                            | NR                           | 845               | 1                             | NR                           | 975               | 0                             | NR                           |
| 460               | 167                           | NR                           | 590               | 815                           | NR                           | 720               | 39                            | NR                           | 850               | 1                             | NR                           | 980               | 0                             | NR                           |
| 465               | 104                           | NR                           | 595               | 801                           | NR                           | 725               | 33                            | NR                           | 855               | 1                             | NR                           | 985               | 0                             | NR                           |
| 470               | 79                            | NR                           | 600               | 777                           | NR                           | 730               | 28                            | NR                           | 860               | 1                             | NR                           | 990               | 0                             | NR                           |
| 475               | 73                            | NR                           | 605               | 744                           | NR                           | 735               | 24                            | NR                           | 865               | 1                             | NR                           | 995               | 0                             | NR                           |
| 480               | 76                            | NR                           | 610               | 704                           | NR                           | 740               | 21                            | NR                           | 870               | 1                             | NR                           | 1000              | 0                             | NR                           |
| 485               | 98                            | NR                           | 615               | 657                           | NR                           | 745               | 18                            | NR                           | 875               | 1                             | NR                           |                   |                               |                              |

REPORT NUMBER: SP1-2407-184-1

### Scotopic Flux vs. Wavelength



Scotopic Lumens: NR

S/P: 1.47

| λ (nm) | Power W <sup>^</sup> /nm | Lumens (Φ/nm) | λ (nm) | Power W <sup>^</sup> /nm | Lumens (Φ/nm) | λ (nm) | Power W <sup>^</sup> /nm | Lumens (Φ/nm) | λ (nm) | Power W <sup>^</sup> /nm | Lumens (Φ/nm) | λ (nm) | Power W <sup>^</sup> /nm | Lumens (Φ/nm) |
|--------|--------------------------|---------------|--------|--------------------------|---------------|--------|--------------------------|---------------|--------|--------------------------|---------------|--------|--------------------------|---------------|
| 360    | 0                        | NR            | 490    | 139                      | NR            | 620    | 607                      | NR            | 750    | 15                       | NR            | 880    | 0                        | NR            |
| 365    | 0                        | NR            | 495    | 198                      | NR            | 625    | 554                      | NR            | 755    | 13                       | NR            | 885    | 0                        | NR            |
| 370    | 0                        | NR            | 500    | 267                      | NR            | 630    | 504                      | NR            | 760    | 11                       | NR            | 890    | 0                        | NR            |
| 375    | 0                        | NR            | 505    | 343                      | NR            | 635    | 452                      | NR            | 765    | 10                       | NR            | 895    | 0                        | NR            |
| 380    | 0                        | NR            | 510    | 410                      | NR            | 640    | 403                      | NR            | 770    | 8                        | NR            | 900    | 0                        | NR            |
| 385    | 2                        | NR            | 515    | 470                      | NR            | 645    | 357                      | NR            | 775    | 7                        | NR            | 905    | 0                        | NR            |
| 390    | 4                        | NR            | 520    | 516                      | NR            | 650    | 314                      | NR            | 780    | 6                        | NR            | 910    | 0                        | NR            |
| 395    | 7                        | NR            | 525    | 550                      | NR            | 655    | 275                      | NR            | 785    | 5                        | NR            | 915    | 0                        | NR            |
| 400    | 10                       | NR            | 530    | 578                      | NR            | 660    | 240                      | NR            | 790    | 5                        | NR            | 920    | 0                        | NR            |
| 405    | 17                       | NR            | 535    | 601                      | NR            | 665    | 208                      | NR            | 795    | 4                        | NR            | 925    | 0                        | NR            |
| 410    | 35                       | NR            | 540    | 620                      | NR            | 670    | 179                      | NR            | 800    | 4                        | NR            | 930    | 0                        | NR            |
| 415    | 70                       | NR            | 545    | 641                      | NR            | 675    | 155                      | NR            | 805    | 3                        | NR            | 935    | 0                        | NR            |
| 420    | 147                      | NR            | 550    | 664                      | NR            | 680    | 133                      | NR            | 810    | 3                        | NR            | 940    | 0                        | NR            |
| 425    | 285                      | NR            | 555    | 689                      | NR            | 685    | 114                      | NR            | 815    | 2                        | NR            | 945    | 0                        | NR            |
| 430    | 487                      | NR            | 560    | 715                      | NR            | 690    | 98                       | NR            | 820    | 2                        | NR            | 950    | 0                        | NR            |
| 435    | 787                      | NR            | 565    | 743                      | NR            | 695    | 84                       | NR            | 825    | 2                        | NR            | 955    | 0                        | NR            |
| 440    | 1000                     | NR            | 570    | 771                      | NR            | 700    | 72                       | NR            | 830    | 2                        | NR            | 960    | 0                        | NR            |
| 445    | 783                      | NR            | 575    | 794                      | NR            | 705    | 61                       | NR            | 835    | 1                        | NR            | 965    | 0                        | NR            |
| 450    | 417                      | NR            | 580    | 811                      | NR            | 710    | 52                       | NR            | 840    | 1                        | NR            | 970    | 0                        | NR            |
| 455    | 261                      | NR            | 585    | 817                      | NR            | 715    | 45                       | NR            | 845    | 1                        | NR            | 975    | 0                        | NR            |
| 460    | 167                      | NR            | 590    | 815                      | NR            | 720    | 39                       | NR            | 850    | 1                        | NR            | 980    | 0                        | NR            |
| 465    | 104                      | NR            | 595    | 801                      | NR            | 725    | 33                       | NR            | 855    | 1                        | NR            | 985    | 0                        | NR            |
| 470    | 79                       | NR            | 600    | 777                      | NR            | 730    | 28                       | NR            | 860    | 1                        | NR            | 990    | 0                        | NR            |
| 475    | 73                       | NR            | 605    | 744                      | NR            | 735    | 24                       | NR            | 865    | 1                        | NR            | 995    | 0                        | NR            |
| 480    | 76                       | NR            | 610    | 704                      | NR            | 740    | 21                       | NR            | 870    | 1                        | NR            | 1000   | 0                        | NR            |
| 485    | 98                       | NR            | 615    | 657                      | NR            | 745    | 18                       | NR            | 875    | 1                        | NR            |        |                          |               |

REPORT NUMBER: SP1-2407-184-1

### Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 2.78

| λ<br>(nm) | Power<br>W <sup>λ</sup> /nm | Lumens<br>(φ/nm) | λ<br>(nm) | Power<br>W <sup>λ</sup> /nm | Lumens<br>(φ/nm) | λ<br>(nm) | Power<br>W <sup>λ</sup> /nm | Lumens<br>(φ/nm) | λ<br>(nm) | Power<br>W <sup>λ</sup> /nm | Lumens<br>(φ/nm) | λ<br>(nm) | Power<br>W <sup>λ</sup> /nm | Lumens<br>(φ/nm) |
|-----------|-----------------------------|------------------|-----------|-----------------------------|------------------|-----------|-----------------------------|------------------|-----------|-----------------------------|------------------|-----------|-----------------------------|------------------|
| 360       | 0                           | NR               | 490       | 139                         | NR               | 620       | 607                         | NR               | 750       | 15                          | NR               | 880       | 0                           | NR               |
| 365       | 0                           | NR               | 495       | 198                         | NR               | 625       | 554                         | NR               | 755       | 13                          | NR               | 885       | 0                           | NR               |
| 370       | 0                           | NR               | 500       | 267                         | NR               | 630       | 504                         | NR               | 760       | 11                          | NR               | 890       | 0                           | NR               |
| 375       | 0                           | NR               | 505       | 343                         | NR               | 635       | 452                         | NR               | 765       | 10                          | NR               | 895       | 0                           | NR               |
| 380       | 0                           | NR               | 510       | 410                         | NR               | 640       | 403                         | NR               | 770       | 8                           | NR               | 900       | 0                           | NR               |
| 385       | 2                           | NR               | 515       | 470                         | NR               | 645       | 357                         | NR               | 775       | 7                           | NR               | 905       | 0                           | NR               |
| 390       | 4                           | NR               | 520       | 516                         | NR               | 650       | 314                         | NR               | 780       | 6                           | NR               | 910       | 0                           | NR               |
| 395       | 7                           | NR               | 525       | 550                         | NR               | 655       | 275                         | NR               | 785       | 5                           | NR               | 915       | 0                           | NR               |
| 400       | 10                          | NR               | 530       | 578                         | NR               | 660       | 240                         | NR               | 790       | 5                           | NR               | 920       | 0                           | NR               |
| 405       | 17                          | NR               | 535       | 601                         | NR               | 665       | 208                         | NR               | 795       | 4                           | NR               | 925       | 0                           | NR               |
| 410       | 35                          | NR               | 540       | 620                         | NR               | 670       | 179                         | NR               | 800       | 4                           | NR               | 930       | 0                           | NR               |
| 415       | 70                          | NR               | 545       | 641                         | NR               | 675       | 155                         | NR               | 805       | 3                           | NR               | 935       | 0                           | NR               |
| 420       | 147                         | NR               | 550       | 664                         | NR               | 680       | 133                         | NR               | 810       | 3                           | NR               | 940       | 0                           | NR               |
| 425       | 285                         | NR               | 555       | 689                         | NR               | 685       | 114                         | NR               | 815       | 2                           | NR               | 945       | 0                           | NR               |
| 430       | 487                         | NR               | 560       | 715                         | NR               | 690       | 98                          | NR               | 820       | 2                           | NR               | 950       | 0                           | NR               |
| 435       | 787                         | NR               | 565       | 743                         | NR               | 695       | 84                          | NR               | 825       | 2                           | NR               | 955       | 0                           | NR               |
| 440       | 1000                        | NR               | 570       | 771                         | NR               | 700       | 72                          | NR               | 830       | 2                           | NR               | 960       | 0                           | NR               |
| 445       | 783                         | NR               | 575       | 794                         | NR               | 705       | 61                          | NR               | 835       | 1                           | NR               | 965       | 0                           | NR               |
| 450       | 417                         | NR               | 580       | 811                         | NR               | 710       | 52                          | NR               | 840       | 1                           | NR               | 970       | 0                           | NR               |
| 455       | 261                         | NR               | 585       | 817                         | NR               | 715       | 45                          | NR               | 845       | 1                           | NR               | 975       | 0                           | NR               |
| 460       | 167                         | NR               | 590       | 815                         | NR               | 720       | 39                          | NR               | 850       | 1                           | NR               | 980       | 0                           | NR               |
| 465       | 104                         | NR               | 595       | 801                         | NR               | 725       | 33                          | NR               | 855       | 1                           | NR               | 985       | 0                           | NR               |
| 470       | 79                          | NR               | 600       | 777                         | NR               | 730       | 28                          | NR               | 860       | 1                           | NR               | 990       | 0                           | NR               |
| 475       | 73                          | NR               | 605       | 744                         | NR               | 735       | 24                          | NR               | 865       | 1                           | NR               | 995       | 0                           | NR               |
| 480       | 76                          | NR               | 610       | 704                         | NR               | 740       | 21                          | NR               | 870       | 1                           | NR               | 1000      | 0                           | NR               |
| 485       | 98                          | NR               | 615       | 657                         | NR               | 745       | 18                          | NR               | 875       | 1                           | NR               |           |                             |                  |

REPORT NUMBER: SP1-2407-184-1

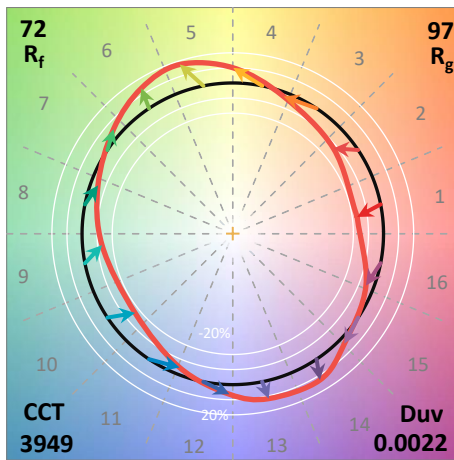
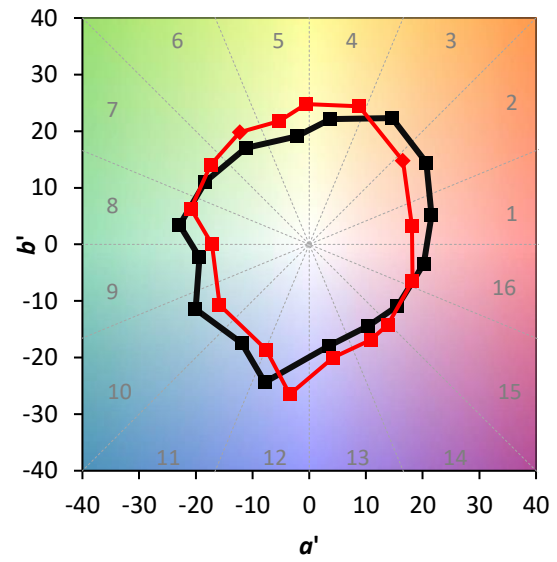
TM-30-18

### Summary

$R_f = 71.8$   
 $R_g = 96.5$   
 CIE  $R_a = 70.7$   
 $R_g = -36.7$



### Color Vector Graphics

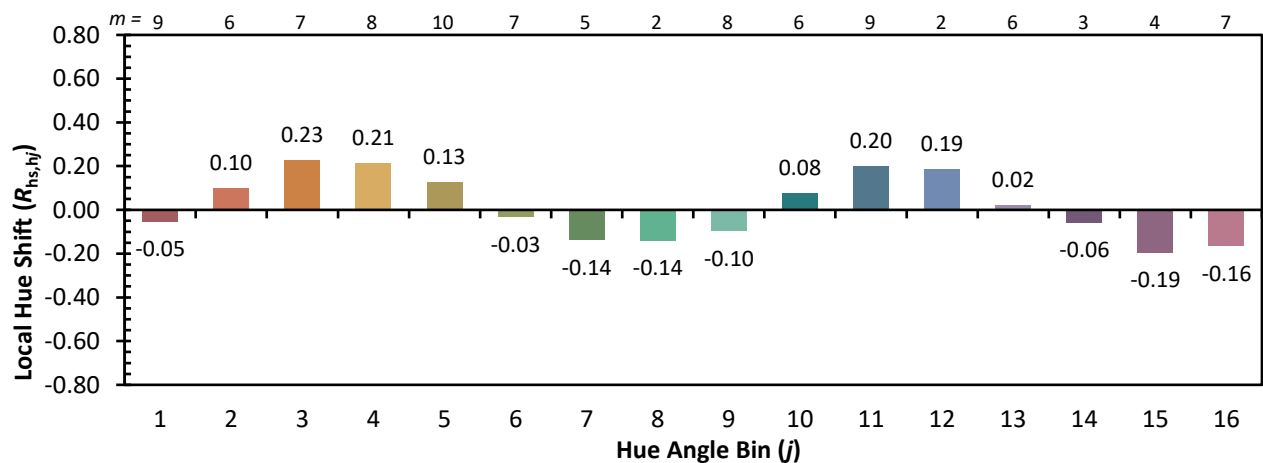


**Individual Sample Fidelity Index ( $R_{f,i}$ )**

|            |            |            |            |
|------------|------------|------------|------------|
| CES01 = 85 | CES26 = 56 | CES51 = 86 | CES76 = 48 |
| CES02 = 61 | CES27 = 79 | CES52 = 88 | CES77 = 71 |
| CES03 = 30 | CES28 = 80 | CES53 = 73 | CES78 = 52 |
| CES04 = 70 | CES29 = 49 | CES54 = 79 | CES79 = 79 |
| CES05 = 47 | CES30 = 53 | CES55 = 77 | CES80 = 77 |
| CES06 = 50 | CES31 = 55 | CES56 = 67 | CES81 = 75 |
| CES07 = 40 | CES32 = 53 | CES57 = 64 | CES82 = 90 |
| CES08 = 39 | CES33 = 59 | CES58 = 67 | CES83 = 84 |
| CES09 = 29 | CES34 = 67 | CES59 = 87 | CES84 = 89 |
| CES10 = 74 | CES35 = 82 | CES60 = 91 | CES85 = 86 |
| CES11 = 57 | CES36 = 86 | CES61 = 87 | CES86 = 71 |
| CES12 = 63 | CES37 = 76 | CES62 = 76 | CES87 = 78 |
| CES13 = 42 | CES38 = 62 | CES63 = 73 | CES88 = 76 |
| CES14 = 74 | CES39 = 91 | CES64 = 71 | CES89 = 72 |
| CES15 = 71 | CES40 = 84 | CES65 = 64 | CES90 = 72 |
| CES16 = 46 | CES41 = 81 | CES66 = 67 | CES91 = 97 |
| CES17 = 49 | CES42 = 76 | CES67 = 65 | CES92 = 66 |
| CES18 = 56 | CES43 = 71 | CES68 = 72 | CES93 = 81 |
| CES19 = 72 | CES44 = 98 | CES69 = 82 | CES94 = 55 |
| CES20 = 65 | CES45 = 80 | CES70 = 61 | CES95 = 73 |
| CES21 = 86 | CES46 = 76 | CES71 = 59 | CES96 = 78 |
| CES22 = 78 | CES47 = 71 | CES72 = 86 | CES97 = 83 |
| CES23 = 92 | CES48 = 61 | CES73 = 52 | CES98 = 72 |
| CES24 = 91 | CES49 = 76 | CES74 = 93 | CES99 = 60 |
| CES25 = 72 | CES50 = 84 | CES75 = 56 |            |



Color Rendition by Hue-Angle Bin



**Measure Comparisons**



(END OF REPORT)