

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: McGRAW-EDISON

Report Number: P1050014

Luminaire Tested: **GALN-SA4B-940-U-LBC**

Issue Date: 07/10/2025

Test Information

Test Method: LM-79-08
Report Number: P1050014
Test Lab: INNOVATION CENTER(G3)
Issue Date: 07/10/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: GALN-SA4B-940-U-LBC
Description: GALLEON II AREA AND ROADWAY LUMINAIRE 800mA 4xLight Square PACKAGE
90CRI 4000K FIXTURE w/ LEFT CORNER BACKLIGHT CONTROL
Light Source: (56) 4000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 12021.5 lumens
Efficiency: N/A
Efficacy: 83.4 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1' x H: 0')
IES Classification: Type III - Short
BUG Rating: B0 - U0 - G2

Input Watts (W): 144.1
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

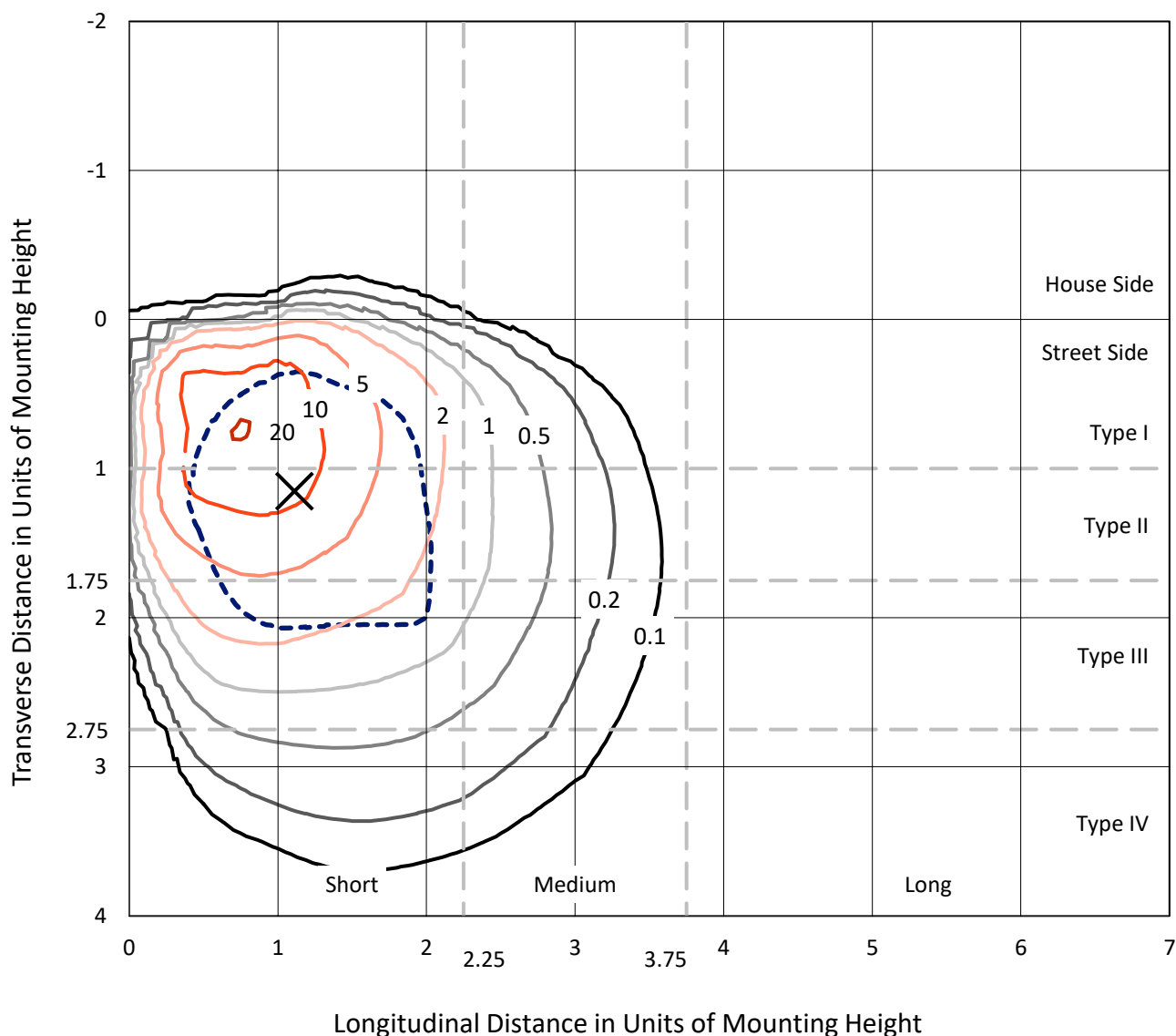
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Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

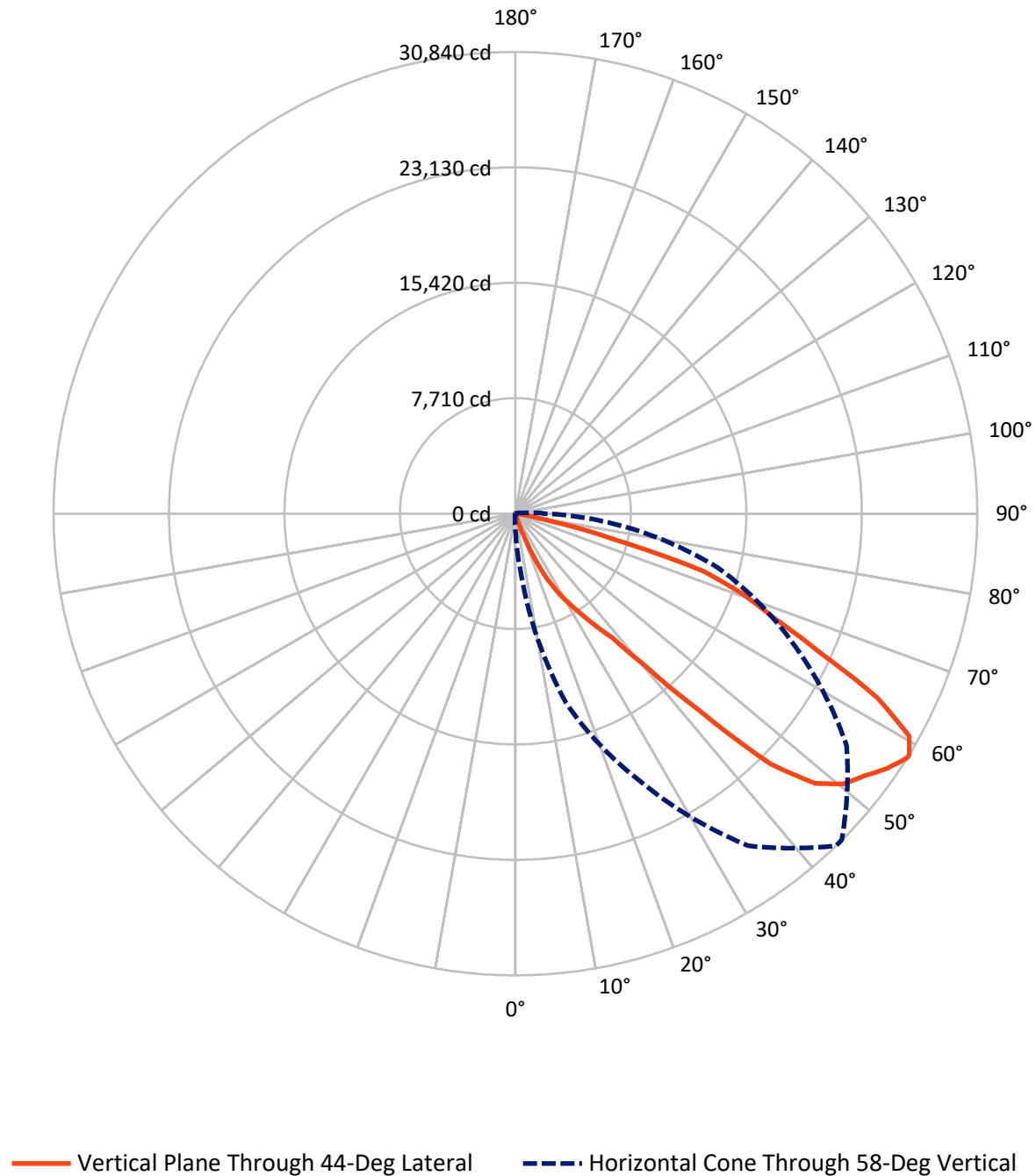


Based on 20 foot mounting height. Maximum calculated value = 20.9 fc

Type III - Short - N/A

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Luminous Intensity Polar Plot



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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	82.1	0.0	82.1
	% Fixture	0.7	0.0	0.7
Street Side	Lumens	11939.4	0.0	11939.4
	% Fixture	99.3	0.0	99.3
Total	Lumens	12021.5	0.0	12021.5
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	4.7	0.0
10°-20°	26.4	0.2
20°-30°	284.8	2.4
30°-40°	842.2	7.0
40°-50°	2510.3	20.9
50°-60°	3983.2	33.1
60°-70°	3322.5	27.6
70°-80°	1024.7	8.5
80°-90°	22.8	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°	12021.5	100.0
0°-180°	12021.5	100.0

Coefficient of Utilization



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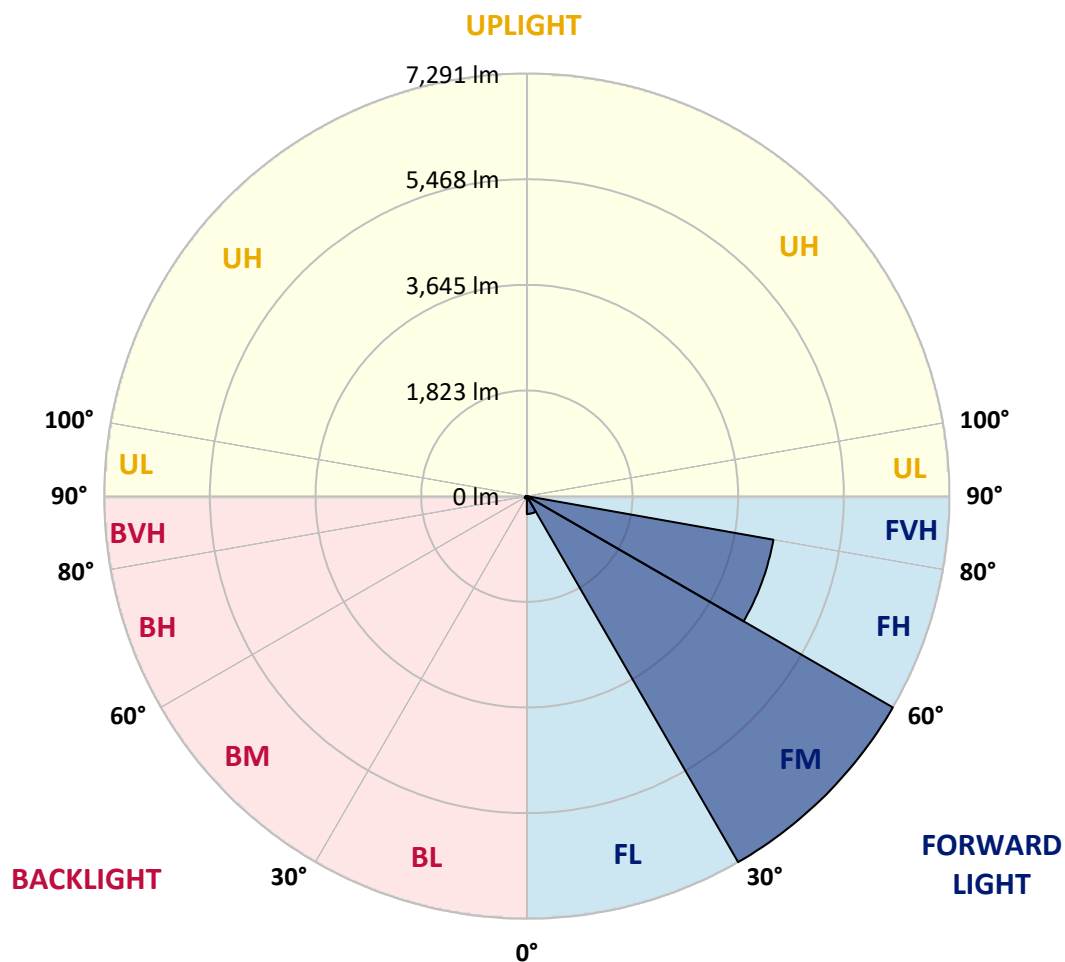
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	307.8	2.6			
FM	(30°-60°)	7290.8	60.6			
FH	(60°-80°)	4319.1	35.9			G2/5000
FVH	(80°-90°)	21.7	0.2			G1/100
BL	(0°-30°)	8.0	0.1	B0/110		
BM	(30°-60°)	44.9	0.4	B0/220		
BH	(60°-80°)	28.0	0.2	B0/110		G0/110
BVH	(80°-90°)	1.1	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°	44°	45°	55°	65°	75°
0°	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7
2.5°	68.1	68.1	65.4	61.8	58.1	54.5	53.6	51.8	50.9	49.9
5°	70.8	70.8	69.9	67.2	63.6	60.8	60.8	58.1	56.3	54.5
7.5°	72.6	73.6	75.4	74.5	72.6	69.9	69.9	68.1	65.4	60.8
10°	75.4	78.1	81.7	83.5	84.5	84.5	83.5	82.6	78.1	71.7
12.5°	78.1	83.5	92.6	101.7	107.2	114.4	113.5	111.7	99.9	86.3
15°	83.5	91.7	110.8	137.1	178.0	203.4	213.4	204.3	165.3	116.2
17.5°	89.9	103.5	160.7	287.0	470.4	557.6	610.3	567.6	376.0	220.7
20°	96.3	126.2	298.8	743.8	1220.5	1505.7	1584.7	1461.2	938.1	420.5
22.5°	107.2	177.1	605.7	1537.4	2629.9	3057.6	3138.5	2743.4	1771.7	830.0
25°	129.9	257.0	1044.3	2505.5	3924.9	4646.8	4613.2	4095.6	2874.2	1325.9
27.5°	162.6	374.1	1579.2	3559.8	5165.4	5802.0	5878.3	5238.0	3831.4	1949.7
30°	209.8	518.5	2153.2	4404.4	6159.8	6848.1	6860.8	6198.8	4687.7	2497.3
32.5°	255.2	654.8	2655.3	5220.8	7139.6	7894.3	7950.6	7136.0	5327.0	3067.6
35°	289.7	743.8	3163.9	5938.2	8127.7	9167.5	9163.8	8196.7	6084.4	3577.1
37.5°	292.4	832.7	3624.3	6672.0	9379.1	10543.3	10658.6	9592.5	6999.8	4207.3
40°	286.1	932.6	4207.3	7816.2	11633.9	13420.2	13521.9	12177.9	8836.0	5286.2
42.5°	293.3	1106.1	5153.6	9929.4	15378.1	17943.5	18139.7	16726.7	12211.5	7487.4
45°	331.5	1432.1	7136.0	13464.7	20715.1	23842.7	23777.3	21742.2	16139.1	10838.4
47.5°	457.7	2230.3	10074.7	16905.6	24126.0	26911.2	26967.5	24480.2	18431.2	13414.7
50°	703.8	3412.7	12543.9	18724.5	25592.6	28386.9	28334.2	25460.0	19302.1	14683.4
52.5°	915.4	4268.2	13782.5	19362.9	25780.6	29116.1	29112.5	25718.0	19437.4	14792.4
55°	968.1	4332.6	13792.5	19397.4	26202.0	30070.6	30190.4	26352.7	19612.7	14316.5
57.5°	947.2	3835.9	13216.8	19597.2	26952.1	30808.9	30815.2	26967.5	20057.6	14025.0
58°	929.0	3757.8	13100.5	19710.7	27081.0	30839.7	30824.3	26995.7	20420.0	14014.1
60°	827.3	3262.9	12647.4	20000.4	26889.4	30205.9	30061.5	26380.9	20366.4	13902.4
62.5°	650.2	2545.5	12201.5	19665.3	24835.3	27137.3	27197.3	23355.9	18566.5	13251.3
65°	517.6	1897.1	11271.6	17249.7	20450.9	22285.3	22508.7	18992.4	15497.1	11220.7
67.5°	412.3	1371.3	9455.3	13733.5	16182.7	18599.2	18761.8	15945.7	12006.3	8597.2
70°	335.1	927.2	6526.7	10043.8	13347.5	16064.6	16074.6	13246.7	8961.3	5633.1
72.5°	297.0	642.0	3788.7	7324.9	10823.0	13090.5	12826.3	10749.4	6887.2	3336.4
75°	257.0	425.9	1858.0	4477.9	6562.1	6606.6	6707.4	4986.5	3442.7	1586.5
77.5°	211.6	302.4	731.9	1223.2	1967.9	2519.1	2612.7	1979.7	1145.1	390.5
80°	145.3	143.5	197.1	375.1	563.0	705.6	658.4	509.5	299.7	149.8
82.5°	62.7	68.1	89.0	107.2	87.2	84.5	80.8	51.8	40.0	30.9
85°	20.0	18.2	19.1	19.1	15.4	11.8	11.8	5.4	0.0	0.0
87.5°	10.0	8.2	8.2	7.3	4.5	1.8	0.9	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

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CANDELA DISTRIBUTION (continued):

85°		90°	95°	105°	115°	125°	135°	145°	155°	165°	175°
52.7	0°	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7
49.0	2.5°	48.1	48.1	46.3	44.5	43.6	41.8	40.9	40.0	39.0	38.1
52.7	5°	50.9	49.9	47.2	44.5	41.8	39.0	37.2	35.4	33.6	32.7
58.1	7.5°	55.4	53.6	48.1	43.6	40.0	36.3	34.5	31.8	30.0	27.2
64.5	10°	60.8	57.2	49.9	44.5	39.0	34.5	31.8	29.1	26.3	22.7
73.6	12.5°	68.1	61.8	52.7	43.6	37.2	31.8	29.1	25.4	22.7	20.0
85.4	15°	74.5	66.3	53.6	43.6	35.4	29.1	25.4	21.8	19.1	15.4
107.2	17.5°	83.5	69.9	52.7	40.9	32.7	25.4	21.8	19.1	14.5	9.1
158.9	20°	99.0	72.6	50.9	38.1	28.2	20.9	16.3	12.7	6.4	1.8
238.8	22.5°	123.5	79.9	49.0	34.5	24.5	16.3	10.9	4.5	0.0	0.0
363.2	25°	170.7	92.6	49.0	32.7	21.8	11.8	3.6	0.0	0.0	0.0
515.8	27.5°	227.0	109.9	49.0	28.2	17.3	6.4	0.0	0.0	0.0	0.0
702.9	30°	284.2	129.0	49.0	24.5	13.6	0.9	0.0	0.0	0.0	0.0
865.4	32.5°	338.7	145.3	49.9	20.9	9.1	0.0	0.0	0.0	0.0	0.0
1090.7	35°	394.1	148.0	49.0	18.2	5.4	0.0	0.0	0.0	0.0	0.0
1366.7	37.5°	465.0	142.6	46.3	16.3	2.7	0.0	0.0	0.0	0.0	0.0
1798.1	40°	572.1	145.3	43.6	15.4	0.9	0.0	0.0	0.0	0.0	0.0
2567.3	42.5°	770.1	157.1	40.0	15.4	0.0	0.0	0.0	0.0	0.0	0.0
4089.3	45°	1331.3	210.7	36.3	16.3	0.0	0.0	0.0	0.0	0.0	0.0
6138.9	47.5°	2202.2	378.7	35.4	16.3	0.0	0.0	0.0	0.0	0.0	0.0
7394.8	50°	2810.6	476.8	37.2	17.3	0.0	0.0	0.0	0.0	0.0	0.0
7551.9	52.5°	2806.1	531.3	39.0	18.2	3.6	0.0	0.0	0.0	0.0	0.0
6960.7	55°	2494.6	541.2	41.8	20.0	11.8	0.0	0.0	0.0	0.0	0.0
5981.8	57.5°	2085.0	494.0	48.1	24.5	21.8	0.0	0.0	0.0	0.0	0.0
5828.3	58°	2012.4	472.2	49.9	25.4	23.6	0.0	0.0	0.0	0.0	0.0
5055.5	60°	1649.1	385.0	63.6	31.8	31.8	0.0	0.0	0.0	0.0	0.0
4144.7	62.5°	1138.8	336.0	72.6	40.9	32.7	0.0	0.0	0.0	0.0	0.0
3055.8	65°	805.5	303.3	79.0	43.6	26.3	0.0	0.0	0.0	0.0	0.0
2171.3	67.5°	602.1	279.7	87.2	44.5	13.6	0.0	0.0	0.0	0.0	0.0
1362.2	70°	461.3	262.4	107.2	47.2	3.6	0.0	0.0	0.0	0.0	0.0
811.9	72.5°	376.0	242.5	129.9	49.0	0.0	0.0	0.0	0.0	0.0	0.0
486.8	75°	311.5	218.9	125.3	53.6	0.0	0.0	0.0	0.0	0.0	0.0
259.7	77.5°	207.1	169.8	114.4	53.6	0.0	0.0	0.0	0.0	0.0	0.0
92.6	80°	72.6	67.2	89.0	47.2	0.0	0.0	0.0	0.0	0.0	0.0
19.1	82.5°	10.9	9.1	12.7	16.3	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

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CANDELA DISTRIBUTION (continued):

180°		185°	195°	205°	215°	225°	235°	245°	255°	265°	270°
52.7	0°	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7
37.2	2.5°	37.2	37.2	36.3	37.2	37.2	39.0	43.6	49.9	57.2	59.9
31.8	5°	30.9	30.0	29.1	29.1	29.1	31.8	35.4	42.7	50.9	54.5
26.3	7.5°	25.4	24.5	23.6	22.7	22.7	24.5	29.1	37.2	45.4	49.0
21.8	10°	20.9	19.1	18.2	17.3	17.3	19.1	23.6	31.8	40.9	44.5
18.2	12.5°	17.3	14.5	12.7	11.8	10.9	13.6	18.2	25.4	35.4	40.0
13.6	15°	11.8	9.1	6.4	5.4	4.5	7.3	11.8	20.0	30.0	35.4
7.3	17.5°	6.4	2.7	0.9	0.0	0.0	1.8	5.4	14.5	24.5	29.1
0.0	20°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	7.3	18.2	22.7
0.0	22.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	10.9	15.4
0.0	25°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.5	8.2
0.0	27.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.8
0.0	30°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	32.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	35°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	37.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	40°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	42.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	45°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	47.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	50°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	52.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	55°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	57.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	58°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	60°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	62.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	65°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	67.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	70°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	72.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	77.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	80°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	82.5°	0.0	0.0	0.0	0.0	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	2.7
0.0	87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	3.6	7.3
0.0	90°	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):

275°		285°	295°	305°	315°	316°	325°	335°	345°	355°	360°
52.7	0°	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7	52.7
62.7	2.5°	64.5	63.6	61.8	59.9	59.9	59.9	62.7	65.4	68.1	68.1
56.3	5°	59.9	59.9	59.0	57.2	57.2	58.1	61.8	66.3	69.9	70.8
51.8	7.5°	55.4	57.2	55.4	54.5	55.4	56.3	59.9	65.4	70.8	72.6
48.1	10°	52.7	53.6	53.6	52.7	52.7	54.5	58.1	65.4	72.6	75.4
43.6	12.5°	49.0	50.9	49.9	49.9	49.9	51.8	56.3	64.5	74.5	78.1
39.0	15°	45.4	48.1	48.1	47.2	47.2	48.1	54.5	63.6	77.2	83.5
33.6	17.5°	41.8	44.5	45.4	43.6	43.6	45.4	51.8	63.6	79.0	89.9
27.2	20°	34.5	39.0	41.8	39.0	39.0	40.9	47.2	59.9	79.9	96.3
20.0	22.5°	27.2	31.8	35.4	34.5	34.5	35.4	43.6	57.2	80.8	107.2
11.8	25°	20.0	24.5	27.2	29.1	29.1	31.8	40.0	55.4	84.5	129.9
5.4	27.5°	11.8	17.3	20.9	22.7	23.6	27.2	37.2	53.6	90.8	162.6
0.0	30°	5.4	10.0	14.5	18.2	18.2	24.5	34.5	51.8	99.0	209.8
0.0	32.5°	0.0	4.5	7.3	12.7	13.6	20.0	31.8	49.9	110.8	255.2
0.0	35°	0.0	0.0	3.6	10.0	10.0	16.3	29.1	48.1	129.0	289.7
0.0	37.5°	0.0	0.0	0.0	7.3	8.2	14.5	28.2	47.2	132.6	292.4
0.0	40°	0.0	0.0	0.0	5.4	6.4	13.6	28.2	48.1	119.9	286.1
0.0	42.5°	0.0	0.0	0.0	3.6	4.5	13.6	28.2	49.9	108.1	293.3
0.0	45°	0.0	0.0	0.0	2.7	3.6	14.5	27.2	49.0	101.7	331.5
0.0	47.5°	0.0	0.0	0.0	3.6	5.4	14.5	26.3	48.1	102.6	457.7
0.0	50°	0.0	0.0	0.0	4.5	6.4	14.5	27.2	46.3	112.6	703.8
0.0	52.5°	0.0	0.0	0.0	3.6	5.4	16.3	30.0	45.4	122.6	915.4
0.0	55°	0.0	0.0	0.0	0.9	2.7	20.9	32.7	45.4	138.0	968.1
0.0	57.5°	0.0	0.0	0.0	0.0	0.0	23.6	37.2	48.1	163.5	947.2
0.0	58°	0.0	0.0	0.0	0.0	0.0	23.6	38.1	48.1	165.3	929.0
0.0	60°	0.0	0.0	0.0	0.0	0.0	23.6	41.8	53.6	178.0	827.3
0.0	62.5°	0.0	0.0	0.0	0.0	0.0	20.0	49.9	67.2	185.3	650.2
0.0	65°	0.0	0.0	0.0	0.0	0.0	16.3	59.0	73.6	190.7	517.6
0.0	67.5°	0.0	0.0	0.0	0.0	0.0	15.4	60.8	74.5	193.4	412.3
0.0	70°	0.0	0.0	0.0	0.0	0.0	16.3	59.9	79.9	202.5	335.1
0.0	72.5°	0.0	0.0	0.0	0.0	0.0	18.2	54.5	88.1	202.5	297.0
0.0	75°	0.0	0.0	0.0	0.0	0.0	19.1	50.9	99.0	184.3	257.0
0.0	77.5°	0.0	0.0	0.0	0.0	0.0	18.2	49.9	115.3	164.4	211.6
0.0	80°	1.8	2.7	2.7	1.8	1.8	15.4	49.0	117.1	139.9	145.3
0.9	82.5°	5.4	7.3	6.4	4.5	4.5	13.6	43.6	98.1	72.6	62.7
5.4	85°	10.0	11.8	11.8	10.0	10.0	12.7	27.2	35.4	24.5	20.0
10.0	87.5°	13.6	15.4	15.4	13.6	13.6	12.7	11.8	10.9	10.0	10.0
0.0	90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF RI

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

Report Prepared for

Cooper Lighting Solutions

McGraw-Edison

Report Number: SP1-2407-184-16

Test Date: 10/11/2024

Luminaire Tested: GSS-SB1A-940-U-5WQ

Data in this report applies to families of products including GSS-SB1A-940-U-5WQ

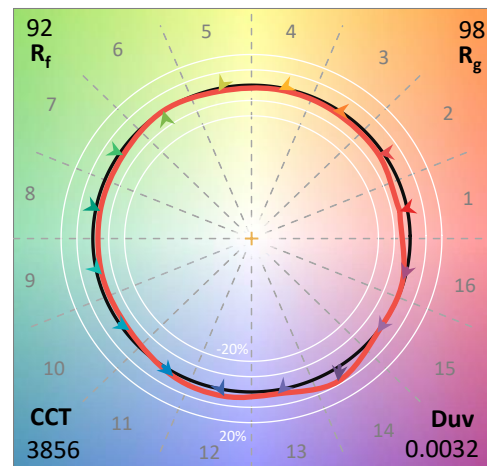
Test Information

Test Method: LM-79-2019
 Report Number: SP1-2407-184-16
 Test Lab: COOPER LIGHTING SOLUTIONS
 Photometer: SP1 - 76IN SPHERE
 Measurement Geometry: 4π
 Issue Date: 10/15/2024
 Manufacturer: COOPER LIGHTING SOLUTIONS
 Product Line: McGraw-Edison
 Catalog Number: **GSS-SB1A-940-U-5WQ**
 Description: GALLEON II SITE SLIM 1SQ 350MA 5WQ HIGH DENSITY LIGHTSQUARE WITH 90 CRI 4000K CCT 26 LEDS

Spectral Parameters

CCT (K): 3856
 CIE u' : 0.2261
 CIE v' : 0.5084
 Duv: 0.0032
 CIE x: 0.3896
 CIE y: 0.3894
 CIE z: 0.2211
 Peak Wavelength (nm): 614
 Dominant Wavelength (nm): 578
 Purity: 33.77304
 R_f: 91.8
 R_g: 98.4

CRI (Ra): 92.1
 R1: 91.8
 R2: 94.1
 R3: 95.3
 R4: 92.8
 R5: 91.0
 R6: 91.6
 R7: 95.0
 R8: 85.2
 R9: 60.7
 R10: 85.2
 R11: 92.4
 R12: 74.5
 R13: 92.3
 R14: 97.0
 R15: 88.5



Test Conditions

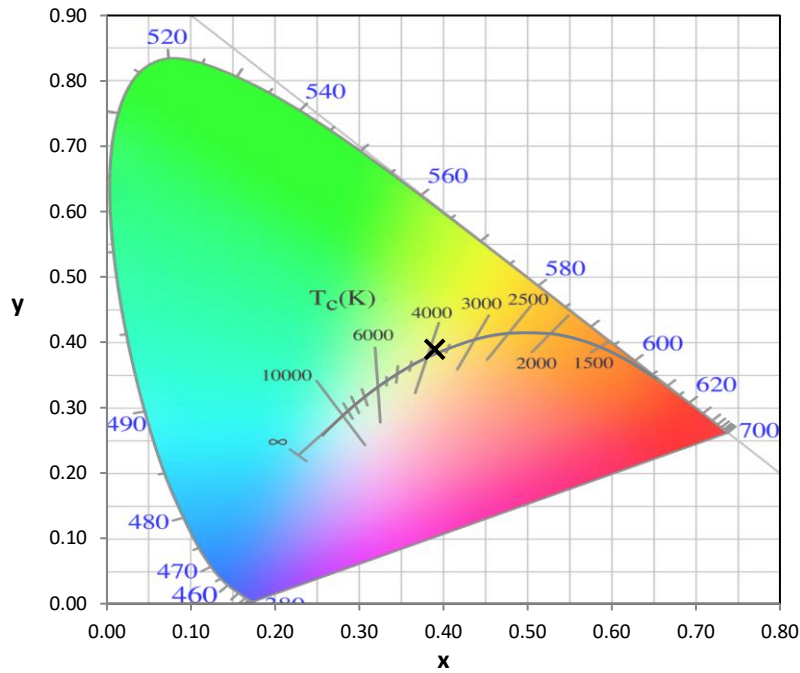
Stabilization Time: 23M
 Operation Time: 1H 23M
 Sphere Temperature (°C): 25.2

REPORT NUMBER: SP1-2407-184-16

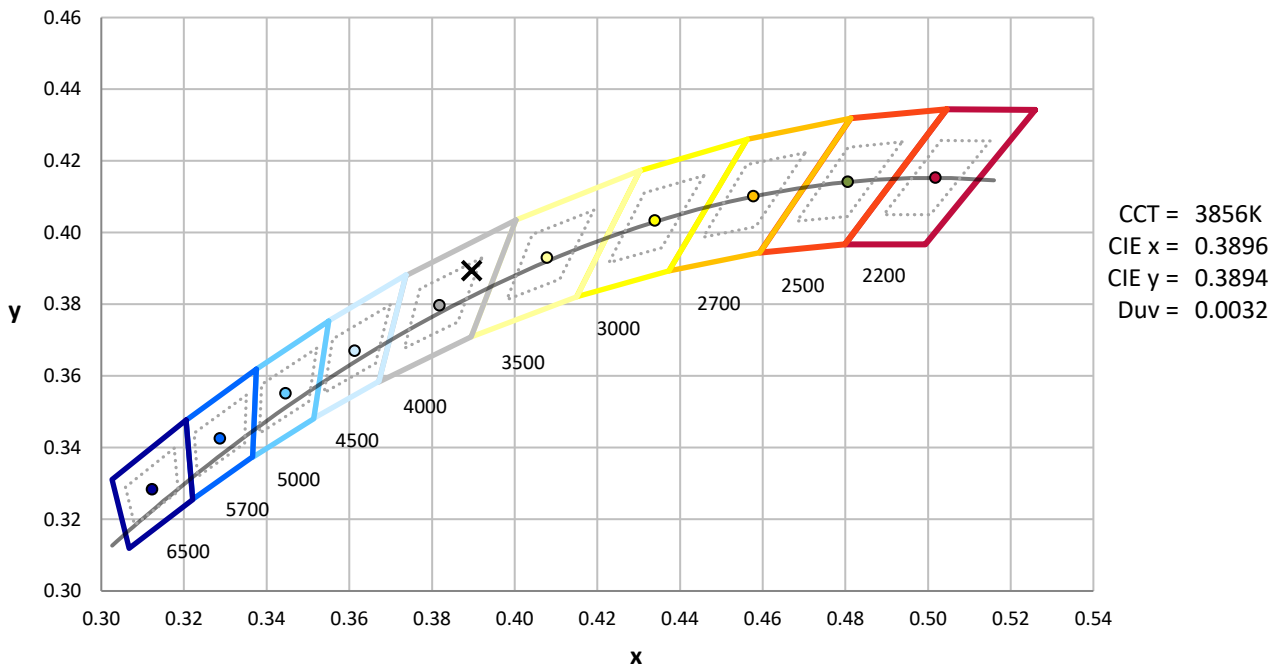
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	IN0058	6/18/2024	12/18/2024
Power Meter	INXT2011004	2/8/2024	2/8/2025
AC Power Source	IN0063	10/24/2023	10/24/2024
DC Power Source	IN0208	10/24/2023	10/24/2024
Sphere Thermometer	IN0085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

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CIE 1931 Chromaticity Diagram



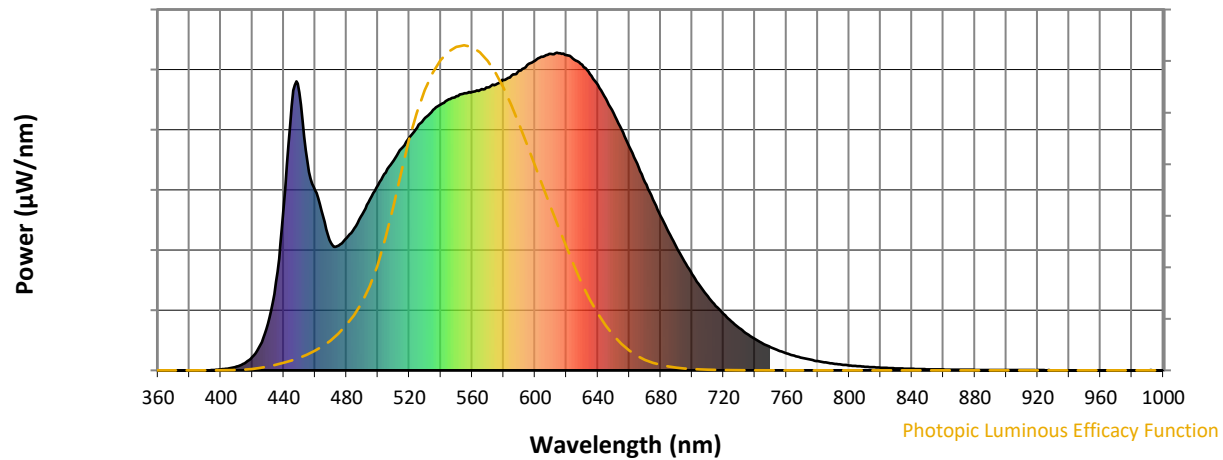
CIE 1931 Chromaticity Diagram with 2017 ANSI 7-Step and 4-Step Quadrangles



Point lies inside the ANSI 4000K 4-step quadrangle

REPORT NUMBER: SP1-2407-184-16

Photopic Flux vs. Wavelength

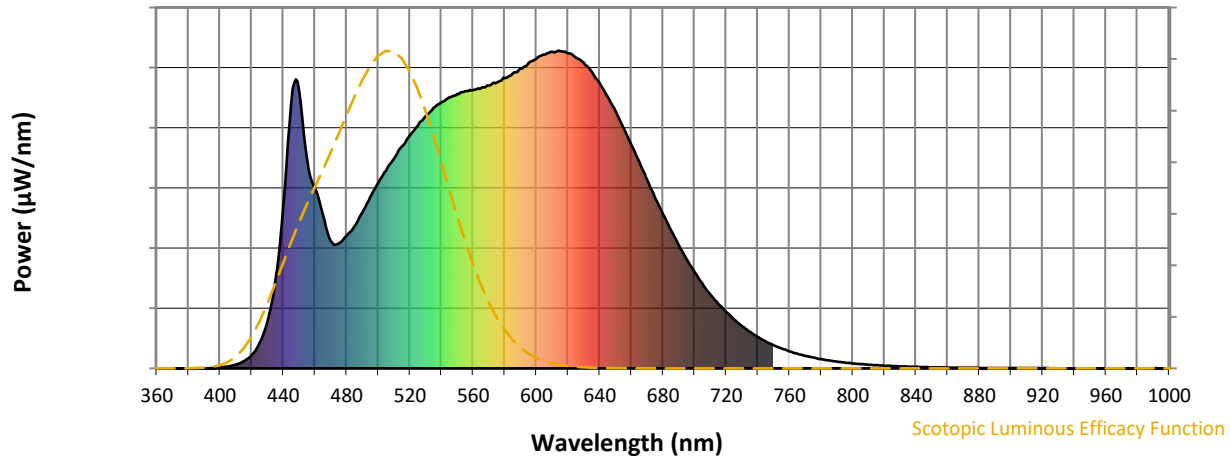


Photopic Lumens: NR

λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)	λ (nm)	Power W ^λ /nm	Lumens (φ/nm)
360	0	NR	490	492	NR	620	993	NR	750	73	NR	880	1	NR
365	0	NR	495	539	NR	625	978	NR	755	62	NR	885	1	NR
370	0	NR	500	583	NR	630	962	NR	760	54	NR	890	1	NR
375	0	NR	505	623	NR	635	933	NR	765	46	NR	895	1	NR
380	0	NR	510	661	NR	640	898	NR	770	39	NR	900	1	NR
385	0	NR	515	698	NR	645	855	NR	775	34	NR	905	1	NR
390	0	NR	520	733	NR	650	810	NR	780	29	NR	910	1	NR
395	1	NR	525	764	NR	655	759	NR	785	25	NR	915	1	NR
400	3	NR	530	794	NR	660	704	NR	790	21	NR	920	1	NR
405	6	NR	535	820	NR	665	651	NR	795	18	NR	925	1	NR
410	12	NR	540	837	NR	670	592	NR	800	16	NR	930	1	NR
415	22	NR	545	853	NR	675	538	NR	805	13	NR	935	0	NR
420	42	NR	550	864	NR	680	486	NR	810	12	NR	940	0	NR
425	79	NR	555	872	NR	685	435	NR	815	10	NR	945	0	NR
430	147	NR	560	876	NR	690	389	NR	820	9	NR	950	0	NR
435	278	NR	565	883	NR	695	344	NR	825	7	NR	955	0	NR
440	515	NR	570	891	NR	700	303	NR	830	6	NR	960	0	NR
445	832	NR	575	900	NR	705	266	NR	835	5	NR	965	0	NR
450	874	NR	580	914	NR	710	233	NR	840	5	NR	970	0	NR
455	659	NR	585	927	NR	715	203	NR	845	4	NR	975	0	NR
460	567	NR	590	944	NR	720	178	NR	850	4	NR	980	0	NR
465	485	NR	595	961	NR	725	154	NR	855	3	NR	985	0	NR
470	401	NR	600	975	NR	730	133	NR	860	3	NR	990	0	NR
475	393	NR	605	988	NR	735	115	NR	865	2	NR	995	1	NR
480	417	NR	610	996	NR	740	98	NR	870	2	NR	1000	0	NR
485	448	NR	615	998	NR	745	85	NR	875	2	NR			

REPORT NUMBER: SP1-2407-184-16

Scotopic Flux vs. Wavelength



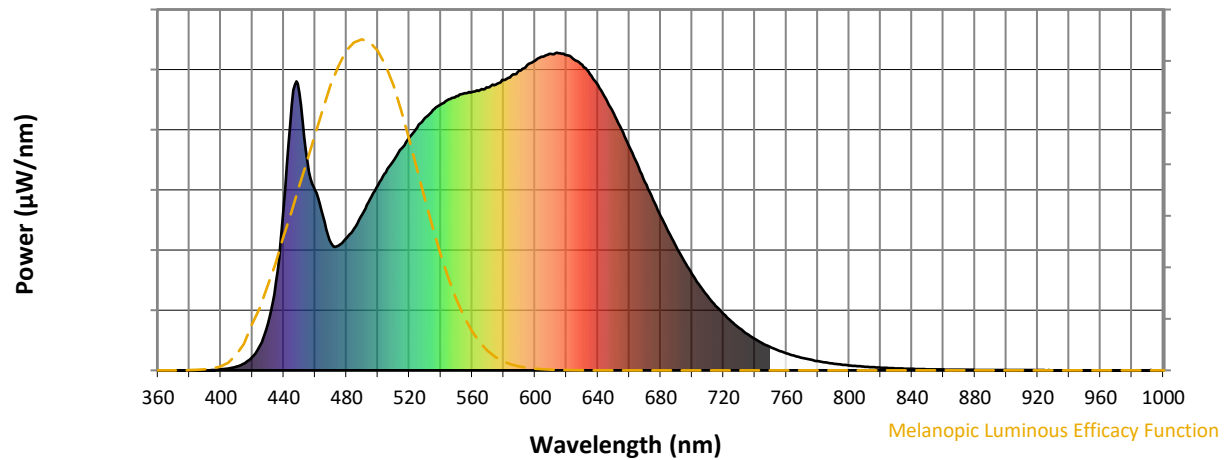
Scotopic Lumens: NR

S/P: 1.72

λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)
360	0	NR	490	492	NR	620	993	NR	750	73	NR	880	1	NR
365	0	NR	495	539	NR	625	978	NR	755	62	NR	885	1	NR
370	0	NR	500	583	NR	630	962	NR	760	54	NR	890	1	NR
375	0	NR	505	623	NR	635	933	NR	765	46	NR	895	1	NR
380	0	NR	510	661	NR	640	898	NR	770	39	NR	900	1	NR
385	0	NR	515	698	NR	645	855	NR	775	34	NR	905	1	NR
390	0	NR	520	733	NR	650	810	NR	780	29	NR	910	1	NR
395	1	NR	525	764	NR	655	759	NR	785	25	NR	915	1	NR
400	3	NR	530	794	NR	660	704	NR	790	21	NR	920	1	NR
405	6	NR	535	820	NR	665	651	NR	795	18	NR	925	1	NR
410	12	NR	540	837	NR	670	592	NR	800	16	NR	930	1	NR
415	22	NR	545	853	NR	675	538	NR	805	13	NR	935	0	NR
420	42	NR	550	864	NR	680	486	NR	810	12	NR	940	0	NR
425	79	NR	555	872	NR	685	435	NR	815	10	NR	945	0	NR
430	147	NR	560	876	NR	690	389	NR	820	9	NR	950	0	NR
435	278	NR	565	883	NR	695	344	NR	825	7	NR	955	0	NR
440	515	NR	570	891	NR	700	303	NR	830	6	NR	960	0	NR
445	832	NR	575	900	NR	705	266	NR	835	5	NR	965	0	NR
450	874	NR	580	914	NR	710	233	NR	840	5	NR	970	0	NR
455	659	NR	585	927	NR	715	203	NR	845	4	NR	975	0	NR
460	567	NR	590	944	NR	720	178	NR	850	4	NR	980	0	NR
465	485	NR	595	961	NR	725	154	NR	855	3	NR	985	0	NR
470	401	NR	600	975	NR	730	133	NR	860	3	NR	990	0	NR
475	393	NR	605	988	NR	735	115	NR	865	2	NR	995	1	NR
480	417	NR	610	996	NR	740	98	NR	870	2	NR	1000	0	NR
485	448	NR	615	998	NR	745	85	NR	875	2	NR			

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Melanopic Flux vs. Wavelength



Melanopic Lumens: NR

M/P: 3.52

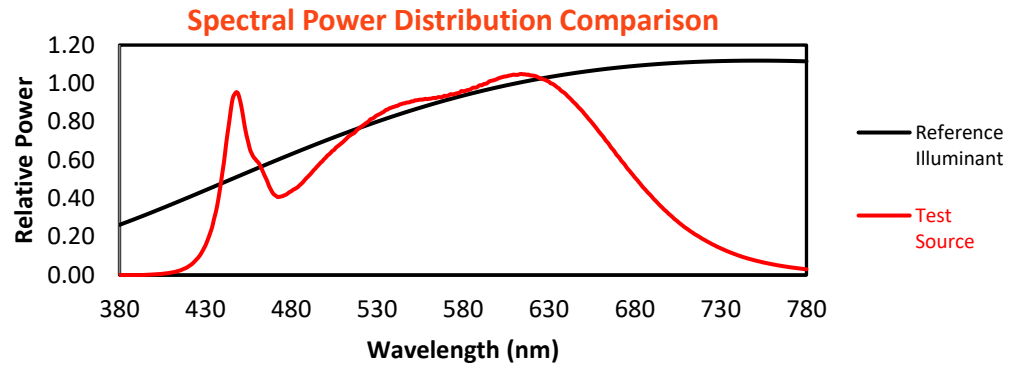
λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)	λ (nm)	Power $\text{W}^{\wedge}/\text{nm}$	Lumens (ϕ/nm)
360	0	NR	490	492	NR	620	993	NR	750	73	NR	880	1	NR
365	0	NR	495	539	NR	625	978	NR	755	62	NR	885	1	NR
370	0	NR	500	583	NR	630	962	NR	760	54	NR	890	1	NR
375	0	NR	505	623	NR	635	933	NR	765	46	NR	895	1	NR
380	0	NR	510	661	NR	640	898	NR	770	39	NR	900	1	NR
385	0	NR	515	698	NR	645	855	NR	775	34	NR	905	1	NR
390	0	NR	520	733	NR	650	810	NR	780	29	NR	910	1	NR
395	1	NR	525	764	NR	655	759	NR	785	25	NR	915	1	NR
400	3	NR	530	794	NR	660	704	NR	790	21	NR	920	1	NR
405	6	NR	535	820	NR	665	651	NR	795	18	NR	925	1	NR
410	12	NR	540	837	NR	670	592	NR	800	16	NR	930	1	NR
415	22	NR	545	853	NR	675	538	NR	805	13	NR	935	0	NR
420	42	NR	550	864	NR	680	486	NR	810	12	NR	940	0	NR
425	79	NR	555	872	NR	685	435	NR	815	10	NR	945	0	NR
430	147	NR	560	876	NR	690	389	NR	820	9	NR	950	0	NR
435	278	NR	565	883	NR	695	344	NR	825	7	NR	955	0	NR
440	515	NR	570	891	NR	700	303	NR	830	6	NR	960	0	NR
445	832	NR	575	900	NR	705	266	NR	835	5	NR	965	0	NR
450	874	NR	580	914	NR	710	233	NR	840	5	NR	970	0	NR
455	659	NR	585	927	NR	715	203	NR	845	4	NR	975	0	NR
460	567	NR	590	944	NR	720	178	NR	850	4	NR	980	0	NR
465	485	NR	595	961	NR	725	154	NR	855	3	NR	985	0	NR
470	401	NR	600	975	NR	730	133	NR	860	3	NR	990	0	NR
475	393	NR	605	988	NR	735	115	NR	865	2	NR	995	1	NR
480	417	NR	610	996	NR	740	98	NR	870	2	NR	1000	0	NR
485	448	NR	615	998	NR	745	85	NR	875	2	NR			

REPORT NUMBER: SP1-2407-184-16

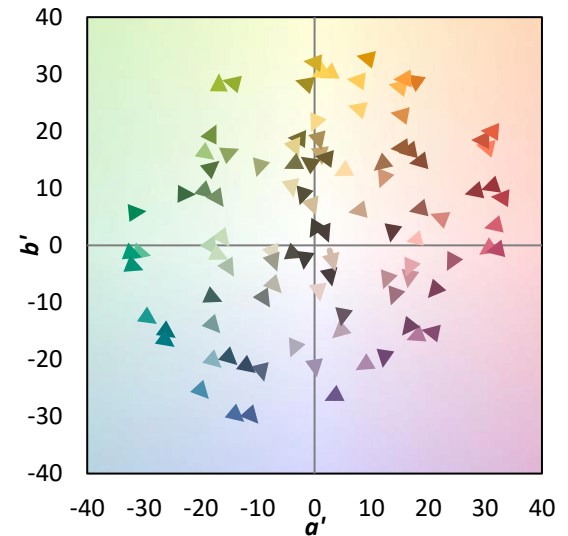
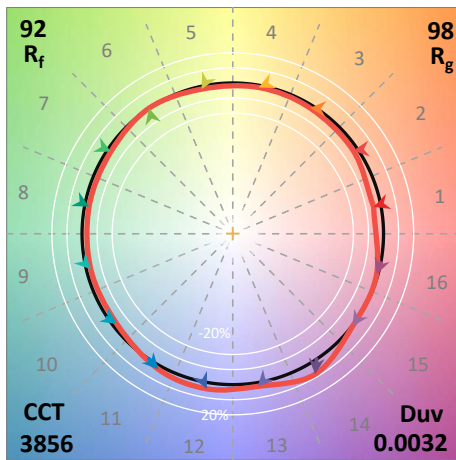
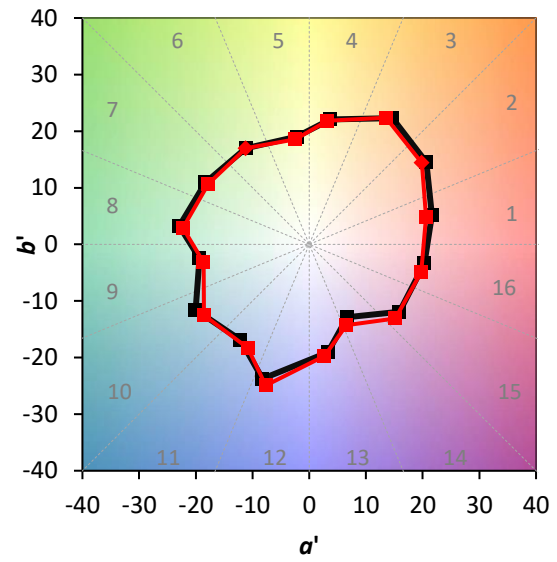
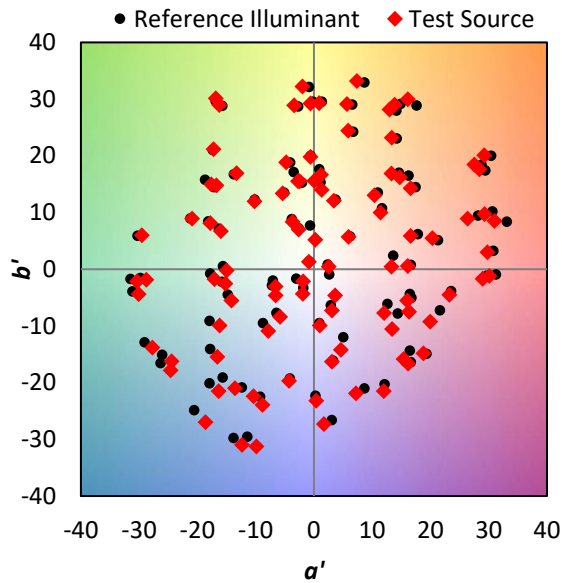
TM-30-18

Summary

$R_f = 91.8$
 $R_g = 98.4$
 $CIE R_a = 92.1$
 $R_9 = 60.7$

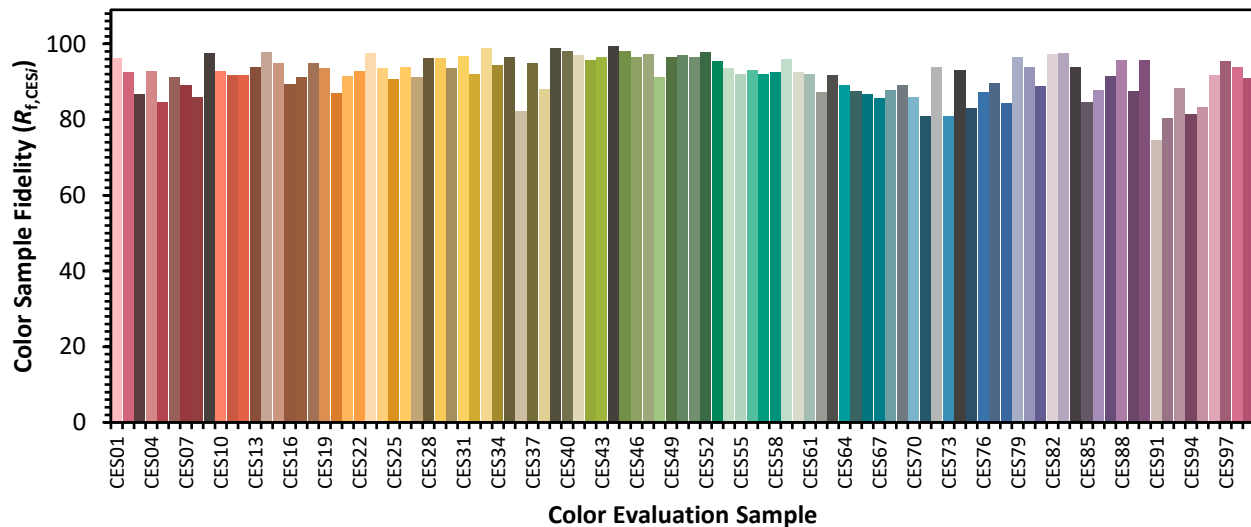


Color Vector Graphics

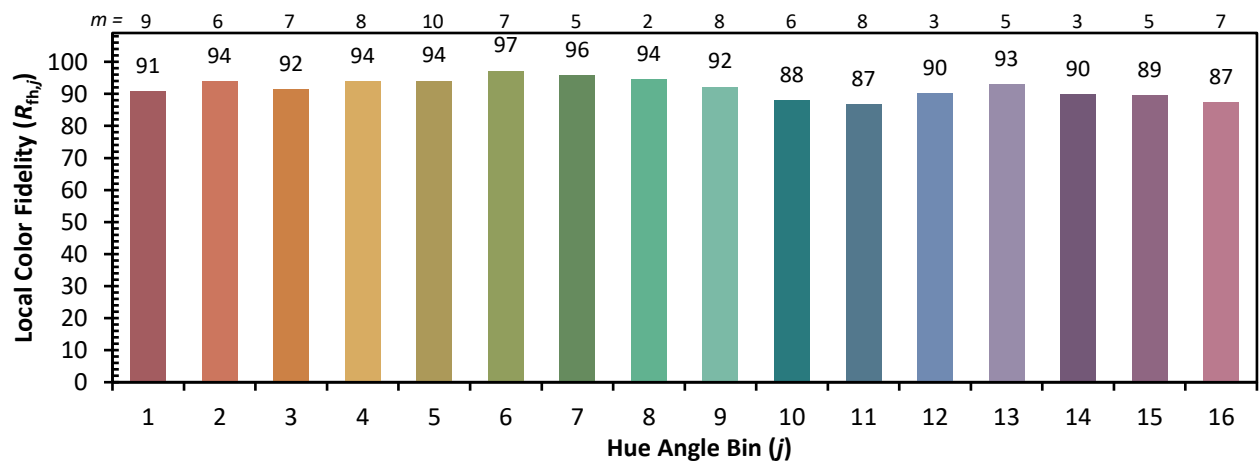
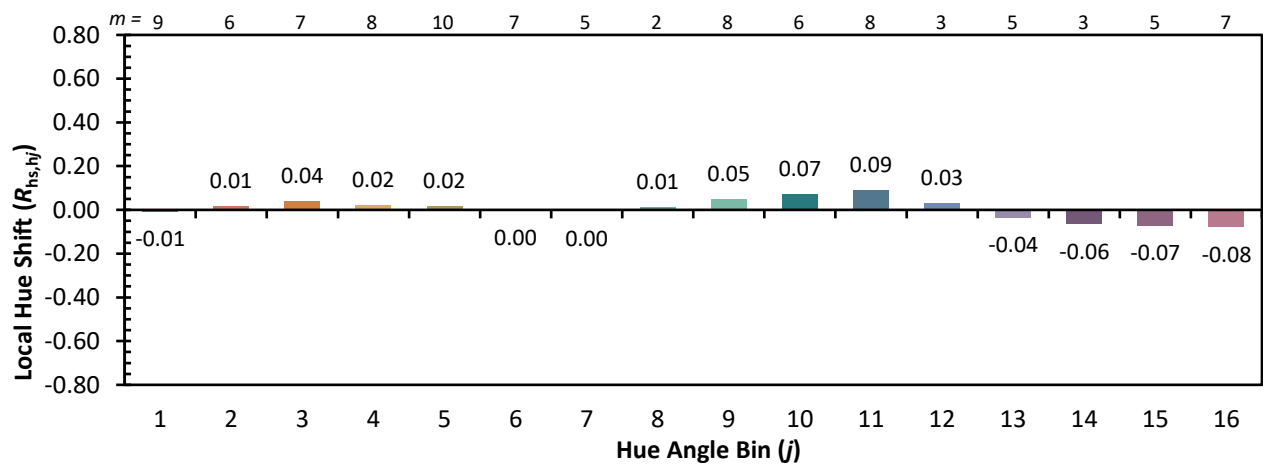
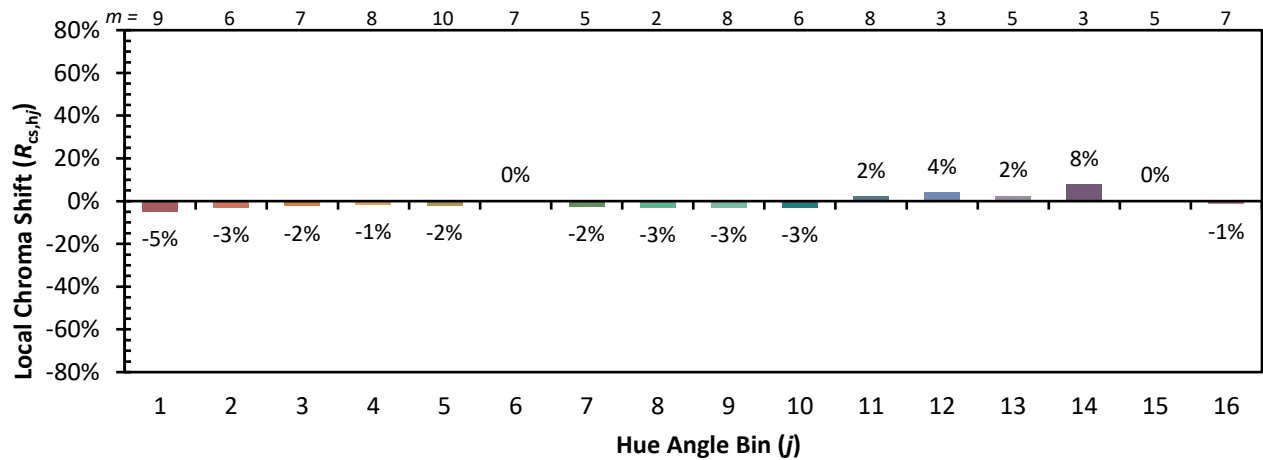


Individual Sample Fidelity Index ($R_{f,i}$)

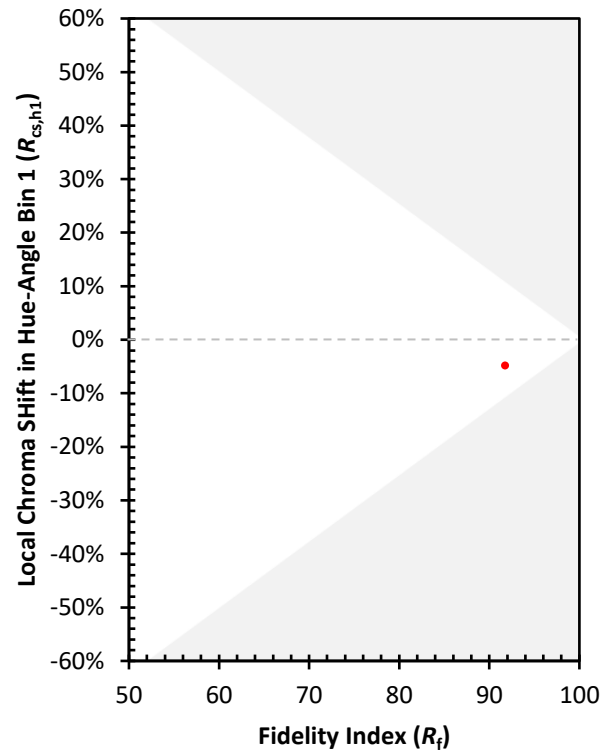
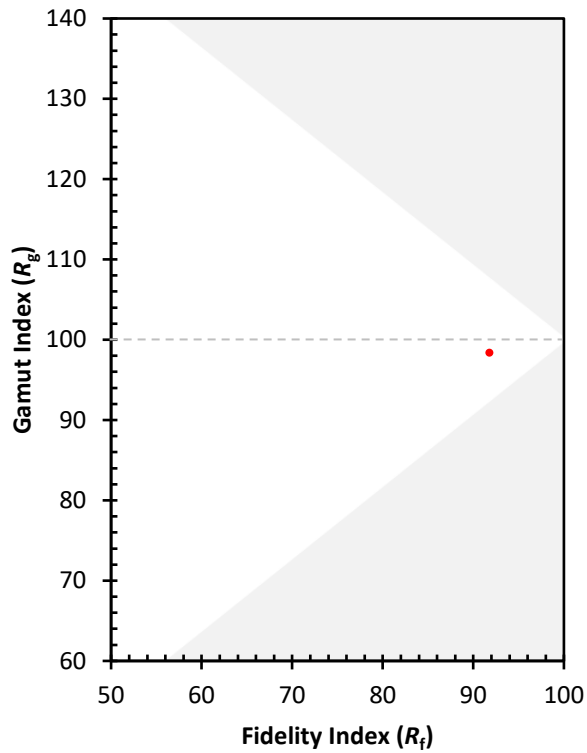
CES01 = 86	CES26 = 94	CES51 = 96	CES76 = 87
CES02 = 62	CES27 = 91	CES52 = 98	CES77 = 90
CES03 = 31	CES28 = 96	CES53 = 95	CES78 = 84
CES04 = 69	CES29 = 96	CES54 = 94	CES79 = 96
CES05 = 49	CES30 = 93	CES55 = 92	CES80 = 94
CES06 = 50	CES31 = 97	CES56 = 93	CES81 = 89
CES07 = 42	CES32 = 92	CES57 = 92	CES82 = 97
CES08 = 41	CES33 = 99	CES58 = 92	CES83 = 98
CES09 = 29	CES34 = 94	CES59 = 96	CES84 = 94
CES10 = 74	CES35 = 96	CES60 = 93	CES85 = 85
CES11 = 57	CES36 = 82	CES61 = 92	CES86 = 88
CES12 = 63	CES37 = 95	CES62 = 87	CES87 = 92
CES13 = 43	CES38 = 88	CES63 = 92	CES88 = 96
CES14 = 74	CES39 = 99	CES64 = 89	CES89 = 87
CES15 = 71	CES40 = 98	CES65 = 88	CES90 = 96
CES16 = 47	CES41 = 97	CES66 = 87	CES91 = 74
CES17 = 49	CES42 = 96	CES67 = 86	CES92 = 80
CES18 = 56	CES43 = 96	CES68 = 88	CES93 = 88
CES19 = 71	CES44 = 99	CES69 = 89	CES94 = 82
CES20 = 66	CES45 = 98	CES70 = 86	CES95 = 83
CES21 = 85	CES46 = 97	CES71 = 81	CES96 = 92
CES22 = 78	CES47 = 97	CES72 = 94	CES97 = 95
CES23 = 91	CES48 = 91	CES73 = 81	CES98 = 94
CES24 = 90	CES49 = 96	CES74 = 93	CES99 = 91
CES25 = 71	CES50 = 97	CES75 = 83	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)