Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

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: McGRAW-EDISON

Report Number: P632539

Luminaire Tested: GWS-SA2C-830-U-SLL-W-GRSBK

Issue Date: 1/10/2023

Report Generated By 670246102 / DESKTOP-G35701P

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Scaled Data Report

Test Information

Test Method:	LM-79-2019
Report Number:	P632539
	TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2209-782-38)
Test Lab:	COOPER LIGHTING SOLUTIONS
Issue Date:	1/10/2023
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	McGRAW-EDISON
Catalog Number:	GWS-SA2C-830-U-SLL-W-GRSBK
Description:	GALLEON WALL SLIM LUMINAIRE. (2) LIGHTSQUARES WITH 16 LEDS EACH AND SPILL LIGHT ELIMINATOR LEFT OPTICS W/ FACTORY INSTALLED GLARE SHIELD, BK
Light Source:	(32) 3000K CCT, 80 CRI LEDS
Ballast/Driver:	-

Summary

Lumens per Lamp:	N/A
Luminaire Lumens:	3942.4 lumens
Efficiency:	N/A
Efficacy:	62.4 lumens/watt
Luminous Opening:	Rectangular (W 1' x L: 0.5' x H: 0')
IES Classification:	Type III - Short
BUG Rating:	B1 - U0 - G0

Input Watts (W):	63.2
Input Voltage (V):	120
Input Current (Ain):	NR
Voltage Rise (V):	NR
Power Factor:	NR
Total Harmonic Distortion (THDi):	NR
Frequency (hertz):	0
Stabilization Time:	NR
Operation Time:	NR
Ambient Temperature (°C):	NR
Test Distance:	28.75 FT

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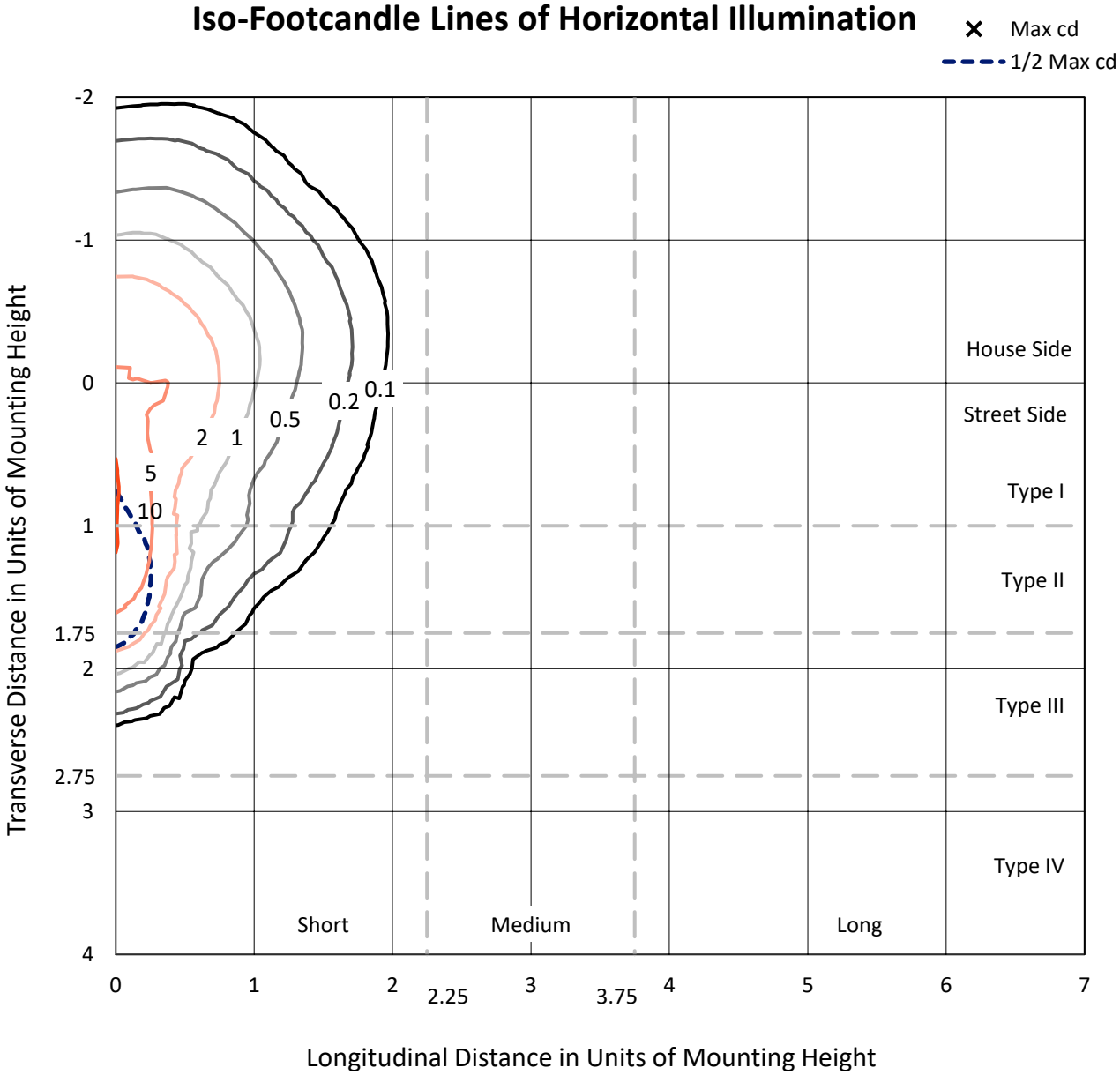
Iso-Footcandle Lines of Horizontal Illumination



Based on 10 foot mounting height. Maximum calculated value = 10.5 fc
Type III - Short - N/A

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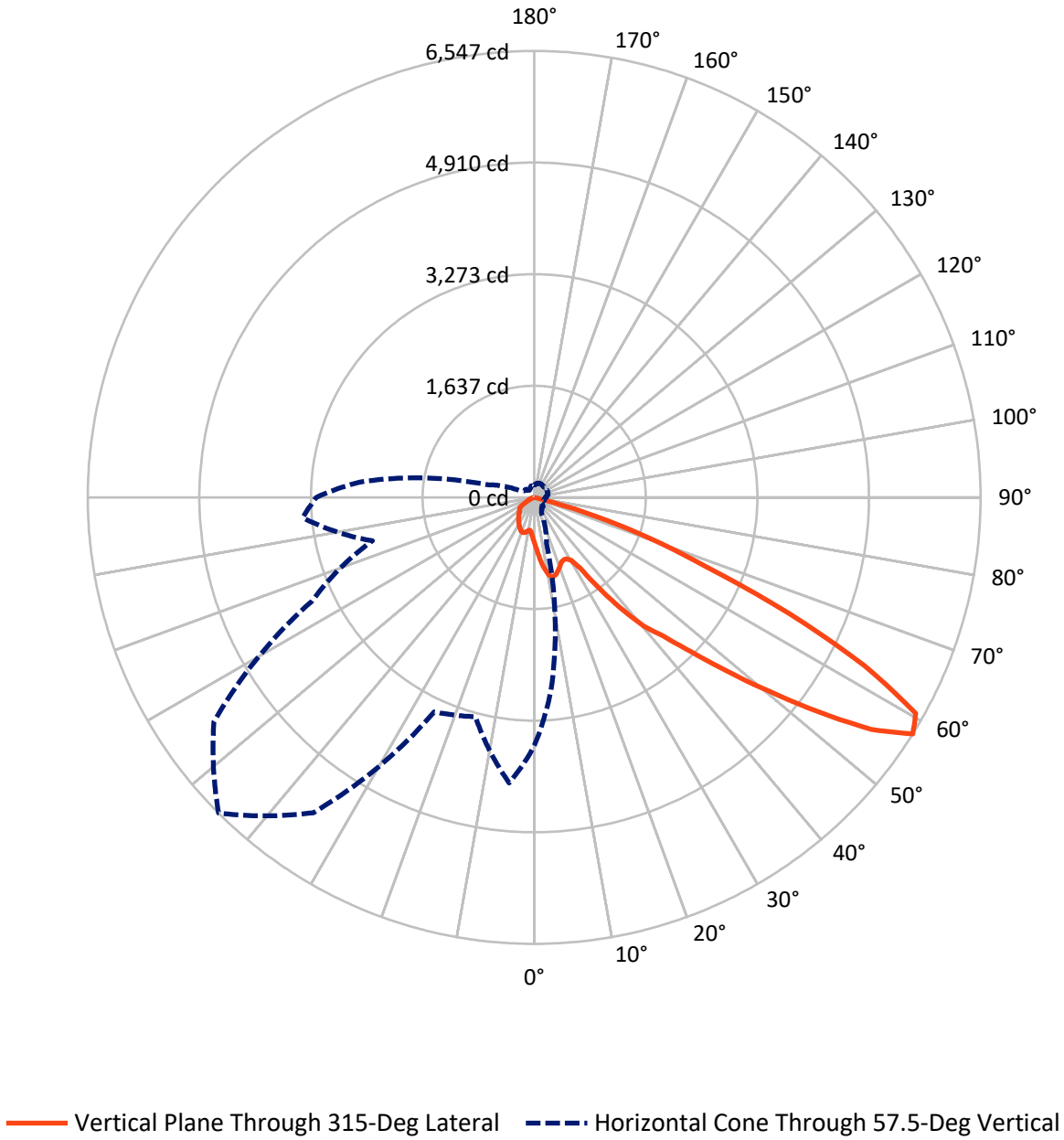
Luminous Intensity Polar Plot



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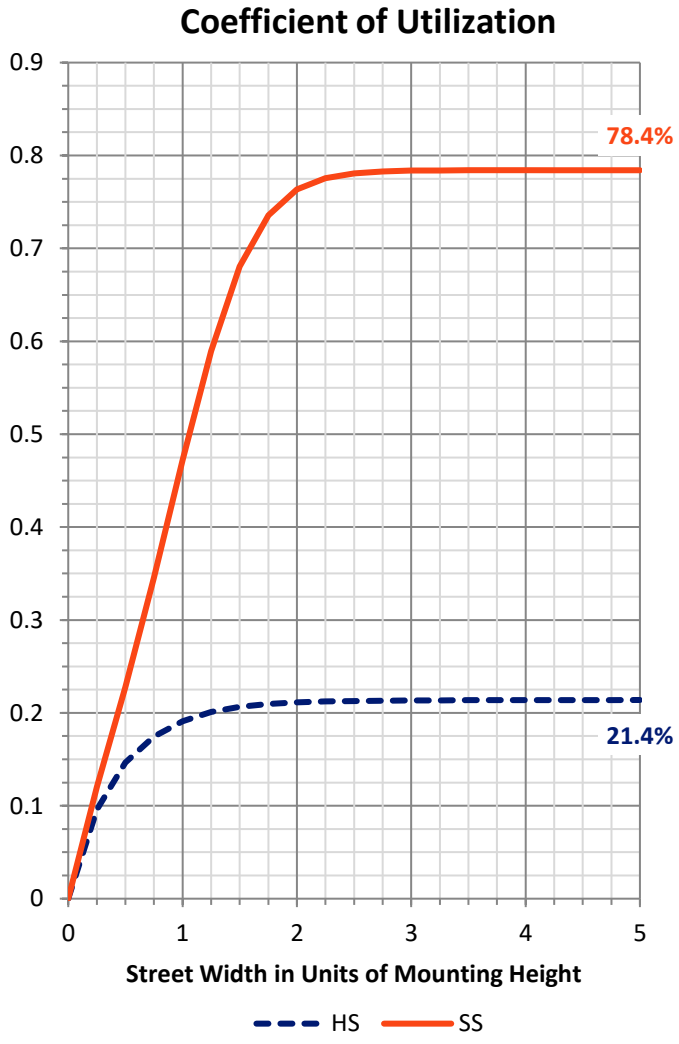
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	849.3	0.0	849.3
	% Fixture	21.5	0.0	21.5
Street Side	Lumens	3093.1	0.0	3093.1
	% Fixture	78.5	0.0	78.5
Total	Lumens	3942.4	0.0	3942.4
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	66.2	1.7
10°-20°	217.9	5.5
20°-30°	353.6	9.0
30°-40°	542.6	13.8
40°-50°	866.6	22.0
50°-60°	1213.4	30.8
60°-70°	622.2	15.8
70°-80°	59.9	1.5
80°-90°	0.0	0.0
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-90°	3942.4	100.0
0°-180°	3942.4	100.0



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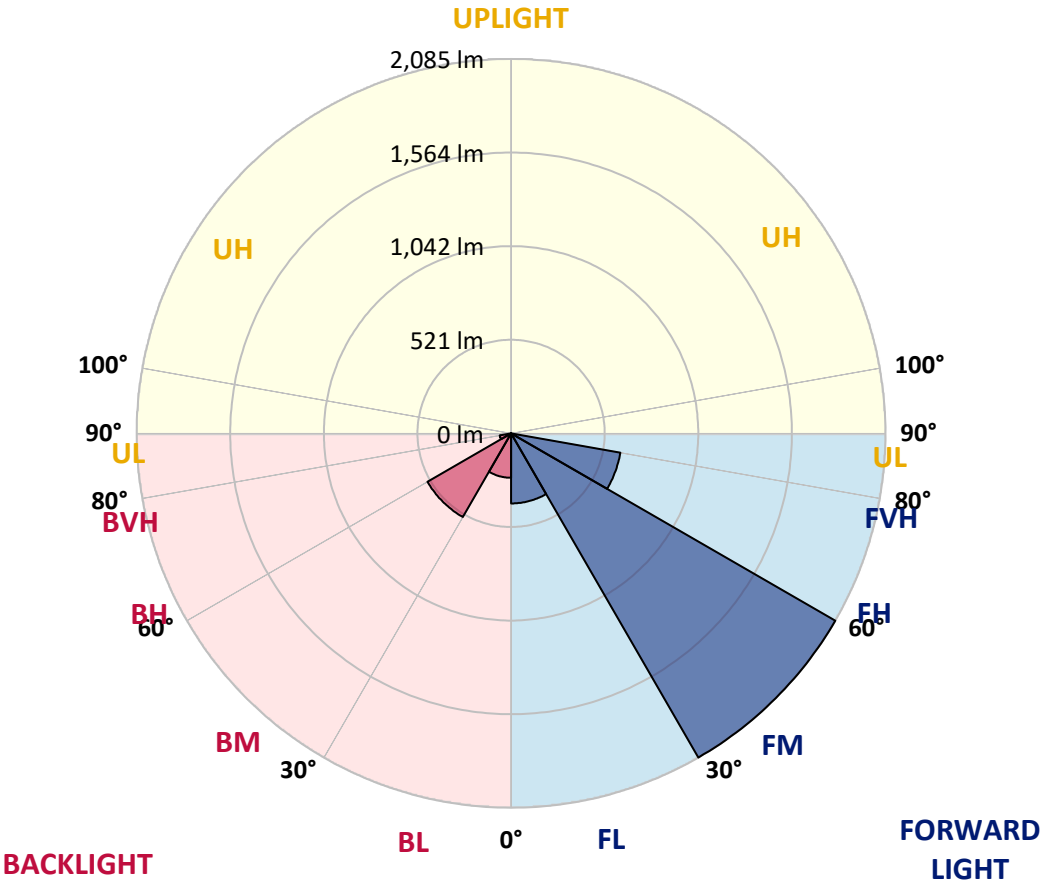
LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit B	U	G
FL	(0°-30°)	390.3	9.9			
FM	(30°-60°)	2084.8	52.9			
FH	(60°-80°)	617.9	15.7			G0/660
FVH	(80°-90°)	0.0	0.0			G0/10
BL	(0°-30°)	247.3	6.3	B1/500		
BM	(30°-60°)	537.9	13.6	B1/1000		
BH	(60°-80°)	64.1	1.6	B0/110		G0/110
BVH	(80°-90°)	0.0	0.0			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G0
Type III Short



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CANDELA DISTRIBUTION (FULL):

	0°	1°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9
2.5°	744.2	742.6	737.3	719.4	708.3	691.0	678.3	662.0	644.0	633.0	621.9
5°	823.2	819.0	804.8	763.7	732.1	697.8	670.4	640.4	608.2	587.1	567.6
7.5°	899.1	892.8	873.8	804.3	756.3	707.3	668.3	624.5	579.2	547.6	523.4
10°	973.4	959.2	929.2	843.8	779.0	719.9	674.1	624.0	570.8	530.7	503.9
12.5°	1034.6	1024.0	982.9	881.2	797.9	722.6	666.2	619.8	584.0	557.1	532.3
15°	1087.3	1075.7	1036.7	914.9	814.3	712.0	633.0	592.4	598.2	608.7	587.7
17.5°	1135.8	1123.7	1081.5	942.9	820.6	686.2	586.6	567.1	599.2	638.8	630.9
20°	1185.8	1172.1	1120.5	965.5	818.5	645.6	539.7	545.5	590.8	636.1	640.4
22.5°	1244.3	1230.1	1170.0	994.5	816.9	597.1	499.1	526.5	575.0	613.5	620.9
25°	1321.8	1305.0	1239.1	1037.2	821.1	552.9	470.1	508.1	548.1	582.9	587.1
27.5°	1424.1	1402.5	1318.7	1089.9	830.1	518.1	457.5	482.8	513.9	545.0	548.7
30°	1557.4	1530.0	1409.8	1135.8	825.9	493.8	449.0	457.5	475.9	501.2	501.7
32.5°	1713.4	1676.0	1512.1	1175.3	789.5	475.9	437.4	431.6	435.9	455.4	459.1
35°	1896.8	1848.3	1624.9	1212.7	723.1	441.1	416.4	396.9	395.3	404.8	413.7
37.5°	2107.1	2049.1	1767.2	1260.7	644.6	404.8	385.3	365.8	357.3	362.1	375.8
40°	2301.1	2236.8	1915.8	1318.7	564.5	372.1	348.9	328.9	318.9	320.4	337.3
42.5°	2528.8	2462.3	2097.6	1394.6	498.1	350.0	311.0	290.4	277.2	284.6	304.1
45°	2874.5	2799.1	2362.7	1460.4	445.4	344.7	277.8	248.8	242.4	255.1	278.3
47.5°	3346.7	3254.5	2726.9	1500.5	400.6	349.4	254.6	215.0	216.6	230.8	254.0
50°	3815.3	3715.7	3148.0	1447.8	363.7	339.9	243.0	188.7	198.7	211.3	232.4
52.5°	4137.3	4007.6	3353.1	1295.5	329.9	304.1	241.9	163.9	182.9	187.1	205.0
55°	4149.9	3990.2	3248.2	1021.4	284.1	256.7	230.8	143.4	165.5	167.1	182.4
57.5°	*3637.7*	*3493.2*	*2838.7*	*701.5*	*252.5*	*188.2*	*183.9*	*125.4*	*136.0*	*149.2*	*158.6*
60°	2767.5	2644.7	2122.9	321.5	191.8	119.6	126.0	108.0	101.7	121.2	130.7
62.5°	1695.0	1616.4	1273.3	142.3	122.3	63.8	76.4	85.9	76.4	83.8	91.7
65°	673.0	638.2	483.3	60.6	50.1	32.1	34.8	50.1	53.8	59.0	66.4
67.5°	117.0	110.7	81.2	26.9	20.6	19.5	16.9	23.2	32.7	36.4	42.2
70°	15.3	14.8	13.2	11.1	10.5	9.5	7.4	14.8	22.1	23.2	26.9
72.5°	3.7	3.2	3.2	2.6	3.2	1.1	1.1	7.9	15.8	16.3	19.0
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.6	10.0	11.1	13.2
77.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.5
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	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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9
2.5°	613.0	602.4	598.7	593.5	586.6	588.7	579.2	576.1	580.8	587.1	585.5
5°	557.1	545.5	537.6	525.5	523.4	518.6	515.4	511.2	516.5	523.9	525.5
7.5°	512.8	502.8	494.9	491.2	488.6	486.5	480.1	477.0	477.0	480.1	482.8
10°	493.8	486.5	484.9	485.9	490.2	489.6	483.8	479.6	474.3	471.7	474.9
12.5°	520.2	508.1	506.0	506.5	511.8	511.2	504.9	499.6	498.6	499.6	509.7
15°	565.0	546.5	532.8	530.2	532.8	531.8	527.0	523.9	525.5	540.7	557.6
17.5°	605.0	576.6	551.8	542.3	541.8	540.2	535.5	534.4	542.3	570.8	595.6
20°	616.6	588.7	553.4	541.3	538.6	537.1	531.8	533.4	543.4	577.6	598.7
22.5°	601.4	574.5	537.6	525.5	523.4	522.8	517.6	519.7	528.1	558.1	575.5
25°	572.4	549.7	511.2	500.7	500.7	499.6	494.9	495.9	501.2	527.6	544.4
27.5°	537.1	515.4	483.3	472.8	474.3	475.9	470.1	468.5	472.8	497.5	507.5
30°	496.5	481.2	455.9	446.4	445.9	452.2	444.3	442.2	448.0	467.5	469.6
32.5°	456.9	449.6	431.6	424.3	424.8	425.9	421.6	421.6	426.9	437.4	436.9
35°	418.5	413.7	410.6	405.3	404.8	402.7	402.7	403.7	409.5	413.2	406.4
37.5°	381.6	386.3	390.0	384.7	380.5	380.5	380.5	385.3	390.5	389.0	377.4
40°	348.9	358.9	370.5	364.7	354.7	354.2	356.3	364.2	372.1	362.6	352.1
42.5°	321.0	333.6	350.0	346.8	335.7	334.1	335.7	345.7	352.1	339.9	328.3
45°	293.6	309.4	328.9	328.9	316.8	315.2	315.7	328.9	332.6	318.3	303.6
47.5°	270.4	287.8	308.3	308.3	298.3	295.1	297.8	311.5	314.1	294.1	280.4
50°	248.2	267.2	289.9	288.3	281.4	278.8	283.5	298.3	295.1	273.0	258.8
52.5°	220.3	240.3	271.4	273.0	269.3	269.8	275.6	285.1	276.2	249.3	237.2
55°	195.0	215.6	246.7	255.1	255.1	254.6	257.2	264.6	257.2	225.0	210.3
57.5°	*167.6*	*185.0*	*210.8*	*212.9*	*214.5*	*208.7*	*212.4*	*222.4*	*218.7*	*191.3*	*182.9*
60°	137.6	152.3	167.1	168.7	161.8	149.7	156.5	168.1	170.8	150.2	140.7
62.5°	97.5	111.7	129.1	129.1	122.3	110.2	119.1	129.1	125.4	104.4	98.6
65°	72.7	85.9	99.1	104.9	99.1	90.7	97.5	104.9	99.1	81.7	73.3
67.5°	46.9	55.9	63.8	68.5	69.6	68.5	71.7	69.6	62.7	51.1	46.4
70°	28.5	33.2	37.4	41.6	44.8	46.4	48.0	43.2	36.4	30.0	28.5
72.5°	20.6	24.8	28.5	31.6	35.3	36.4	36.4	33.2	26.9	21.1	19.5
75°	14.2	17.9	21.1	23.2	26.4	27.4	27.4	24.8	20.0	15.3	13.7
77.5°	0.5	3.7	3.7	3.2	4.2	5.3	5.3	6.3	5.8	4.2	3.7
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	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°	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9	669.9
2.5°	588.7	607.7	613.0	632.5	649.8	667.2	688.3	701.0	719.9	733.1	740.5
5°	530.7	546.5	565.5	594.5	624.5	657.8	697.8	732.6	776.3	808.5	819.0
7.5°	488.6	509.1	531.3	567.6	608.7	653.0	709.4	766.3	833.3	877.0	904.9
10°	480.7	501.7	531.3	567.1	610.3	660.9	730.0	803.7	887.5	940.8	972.4
12.5°	518.6	541.3	553.9	570.3	602.9	659.3	747.9	841.7	940.2	998.2	1032.0
15°	574.5	594.5	574.0	553.4	574.5	642.5	757.9	873.3	986.6	1053.6	1088.3
17.5°	613.0	614.5	569.7	526.0	531.8	611.9	761.6	904.9	1036.2	1106.3	1142.6
20°	609.3	596.6	551.3	502.8	484.9	572.4	757.4	932.9	1086.2	1159.5	1195.3
22.5°	580.8	566.0	527.6	480.1	445.4	525.5	750.0	958.2	1132.1	1215.4	1249.1
25°	546.5	530.7	499.1	457.5	420.1	480.1	744.2	992.9	1190.1	1288.1	1314.4
27.5°	506.5	492.8	465.9	435.9	409.5	445.9	742.6	1038.8	1260.2	1376.6	1395.1
30°	467.5	454.8	433.8	416.4	405.3	425.9	737.3	1087.8	1344.0	1478.4	1498.4
32.5°	430.1	417.4	404.2	401.6	402.1	418.5	719.4	1136.3	1443.6	1625.9	1640.7
35°	397.9	383.2	377.9	384.2	395.8	405.8	668.8	1176.4	1550.6	1786.7	1798.8
37.5°	367.3	352.6	352.1	367.3	380.0	386.3	609.3	1215.9	1695.0	1950.1	1965.3
40°	339.4	324.7	329.9	348.4	358.4	361.6	537.1	1276.0	1847.8	2122.4	2114.0
42.5°	315.7	300.4	303.6	327.3	336.3	344.7	470.6	1326.0	1994.9	2285.8	2283.2
45°	292.5	280.9	278.8	304.6	312.5	346.3	422.2	1364.5	2184.1	2494.0	2498.2
47.5°	269.8	260.9	261.4	272.5	292.0	354.2	381.1	1389.8	2458.7	2823.9	2750.6
50°	249.3	242.4	248.2	235.6	278.8	344.2	345.7	1384.5	2765.4	3140.1	2993.1
52.5°	226.6	225.0	227.7	197.1	257.7	303.6	312.5	1314.4	2909.3	3356.2	3272.4
55°	203.4	202.9	181.8	157.6	215.6	242.4	267.7	1096.8	2904.5	3471.1	3572.8
57.5°	*176.0*	*171.8*	*138.1*	*128.6*	*167.6*	*168.7*	*244.0*	*718.4*	*2574.1*	*3196.0*	*3406.8*
60°	133.3	130.2	101.2	104.4	117.0	108.0	194.5	357.9	1923.7	2489.8	2727.4
62.5°	92.2	88.0	75.4	80.6	75.4	61.7	119.1	177.1	1165.3	1572.2	1787.7
65°	67.5	62.7	51.7	44.3	35.3	35.3	45.3	68.0	451.1	668.3	805.8
67.5°	41.6	39.5	30.6	22.1	21.6	23.2	23.7	33.7	72.7	115.9	141.8
70°	26.9	24.8	20.6	14.2	13.2	13.7	14.2	15.8	18.4	20.0	24.2
72.5°	18.4	17.4	14.8	7.9	6.3	6.9	7.4	7.4	9.0	8.4	10.0
75°	13.2	12.1	10.5	3.7	2.1	2.6	3.2	2.6	3.2	2.1	2.6
77.5°	3.7	3.7	2.6	0.5	0.0	0.5	1.1	1.1	0.5	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0	0.0	0.5	0.5	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	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

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report

REPORT NUMBER: P632539
CATALOG NUMBER: GWS-SA2C-830-U-SLL-W-GRSBK

CANDELA DISTRIBUTION (continued):

	285°	295°	305°	315°	325°	335°	345°	355°	359°	360°
0°	669.9	669.9	669.9	*669.9*	669.9	669.9	669.9	669.9	669.9	669.9
2.5°	759.5	771.6	776.3	*769.5*	775.3	765.8	762.1	747.9	746.8	744.2
5°	861.7	889.1	905.5	*915.5*	903.9	891.2	872.3	839.6	829.6	823.2
7.5°	962.4	1005.1	1033.0	*1046.2*	1043.0	1017.2	982.9	928.1	908.6	899.1
10°	1049.9	1102.0	1135.8	*1152.1*	1145.3	1122.6	1073.6	1005.1	979.2	973.4
12.5°	1111.0	1159.0	1182.2	*1196.4*	1196.9	1188.0	1141.6	1072.5	1042.0	1034.6
15°	1149.5	1170.0	1170.6	*1179.0*	1193.8	1213.8	1192.2	1131.0	1098.4	1087.3
17.5°	1173.7	1151.1	1127.9	*1130.0*	1154.2	1207.5	1229.6	1182.7	1147.9	1135.8
20°	1191.1	1119.4	1076.2	*1076.7*	1101.5	1182.2	1255.4	1232.8	1196.9	1185.8
22.5°	1202.2	1091.5	1029.8	*1028.3*	1054.6	1152.1	1279.1	1292.3	1257.0	1244.3
25°	1224.8	1078.3	1001.9	*1010.9*	1034.1	1142.6	1311.3	1371.4	1338.7	1321.8
27.5°	1265.4	1091.5	999.3	*1019.8*	1046.2	1170.6	1367.2	1476.8	1443.0	1424.1
30°	1335.5	1141.0	1039.9	*1068.3*	1099.9	1243.8	1461.0	1623.8	1575.3	1557.4
32.5°	1448.3	1243.8	1165.3	*1226.4*	1257.0	1364.0	1601.7	1788.8	1749.3	1713.4
35°	1603.8	1478.4	1469.4	*1611.7*	1604.3	1591.7	1774.6	1991.2	1931.6	1896.8
37.5°	1817.8	1855.7	1922.1	*2063.4*	2058.6	1962.2	2001.7	2182.5	2151.9	2107.1
40°	2085.0	2165.6	2278.4	*2480.8*	2417.5	2296.3	2280.5	2378.5	2353.8	2301.1
42.5°	2242.6	2381.7	2596.7	*2778.6*	2728.0	2516.1	2498.2	2640.5	2586.2	2528.8
45°	2315.8	2557.7	2979.4	*3225.5*	3072.1	2662.1	2655.2	2982.0	2951.4	2874.5
47.5°	2349.6	2735.4	3427.4	*3800.0*	3513.3	2790.2	2765.4	3477.4	3437.4	3346.7
50°	2387.0	2980.4	3967.1	*4465.6*	4046.1	2935.1	2953.0	3939.1	3922.3	3815.3
52.5°	2469.2	3239.7	4631.7	*5226.7*	4692.3	3162.3	3275.0	4374.5	4260.6	4137.3
55°	2592.5	3522.2	5323.1	*6004.1*	5351.6	3467.4	3623.4	4605.8	4286.4	4149.9
57.5°	*2456.0*	*3592.9*	*5732.7*	*6546.9*	*5644.1*	*3468.5*	*3328.8*	*4204.8*	*3769.9*	*3637.7*
60°	1949.0	3342.5	5575.1	*6429.4*	5394.8	3080.0	2548.8	3283.0	2856.0	2767.5
62.5°	1317.6	2803.3	4907.8	*5437.5*	4617.4	2422.8	1656.5	2135.1	1768.2	1695.0
65°	722.0	2091.3	3965.5	*4113.6*	3613.9	1692.3	852.2	926.5	705.7	673.0
67.5°	199.2	1455.7	2917.7	*2729.0*	2535.6	1102.0	220.3	165.5	118.1	117.0
70°	50.1	962.9	1748.2	*1802.0*	1554.8	705.7	42.2	20.0	15.8	15.3
72.5°	21.1	414.3	829.6	*953.4*	795.8	326.8	15.3	5.8	4.7	3.7
75°	2.6	33.2	70.6	*107.0*	73.3	35.3	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
80°	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
85°	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
90°	0.0	0.0	0.0	*0.0*	0.0	0.0	0.0	0.0	0.0	0.0

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

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

Report Prepared for

Cooper Lighting Solutions

MCGRAW EDISON

Report Number: SP1-2408-195-9

Test Date: 08/07/2024

Luminaire Tested: GALN-SB1A-830-U-5WQ

Data in this report applies to families of products including GALN-SB1A-830-U-5WQ.

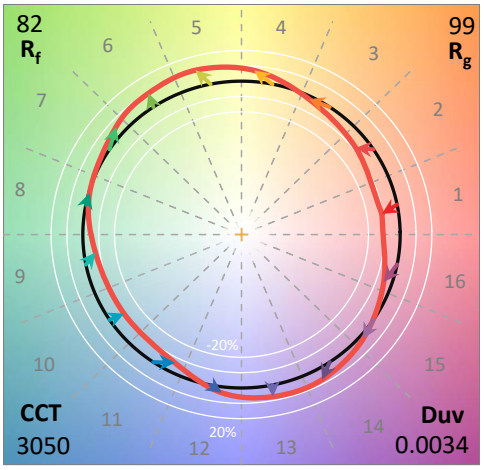
Report Generated By FNC07603 / LDUCLS01DT446
Version: v7.04

Test Information

Test Method:	LM-79-2019
Report Number:	SP1-2408-195-9
Test Lab:	COOPER LIGHTING SOLUTIONS
Photometer:	SP1 - 76IN SPHERE
Measurement Geometry:	4π
Issue Date:	08/07/2024
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	MCGRAW EDISON
Catalog Number:	**GALN-SB1A-830-U-5WQ**
Description:	GALLEON AREA AND ROADWAY LUMINAIRE. (1) 80 CRI, 3000K, 350MA HIGH DENSITY LIGHTSQUARE WITH 26 LEDS AND TYPE V WIDE OPTICS

Spectral Parameters

CCT (K):	3050	CRI (Ra):	81.0		
CIE u':	0.2476	R1:	79.6	R9:	7.1
CIE v':	0.5251	R2:	85.6	R10:	67.0
Duv:	0.0034	R3:	92.0	R11:	82.7
CIE x:	0.4383	R4:	82.6	R12:	63.2
CIE y:	0.4131	R5:	78.9	R13:	80.3
CIE z:	0.1487	R6:	81.7	R14:	95.0
Peak Wavelength (nm):	603	R7:	85.2	R15:	71.7
Dominant Wavelength (nm):	581	R8:	62.0		
Purity:	55.55201				
Rf:	81.5				
Rg:	99.2				



Test Conditions

Stabilization Time:	20M
Operation Time:	1H 20M
Sphere Temperature (°C):	24.2

REPORT NUMBER: SP1-2408-195-9

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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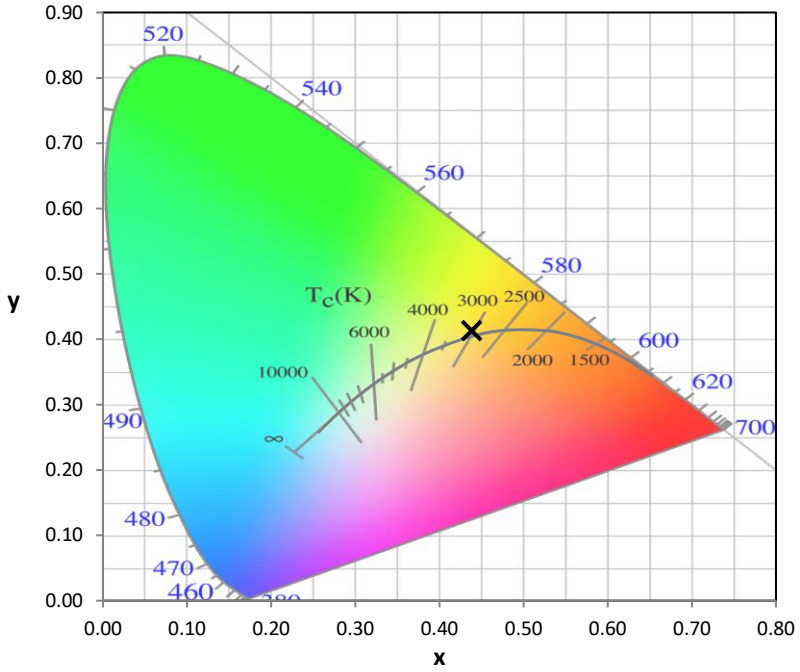
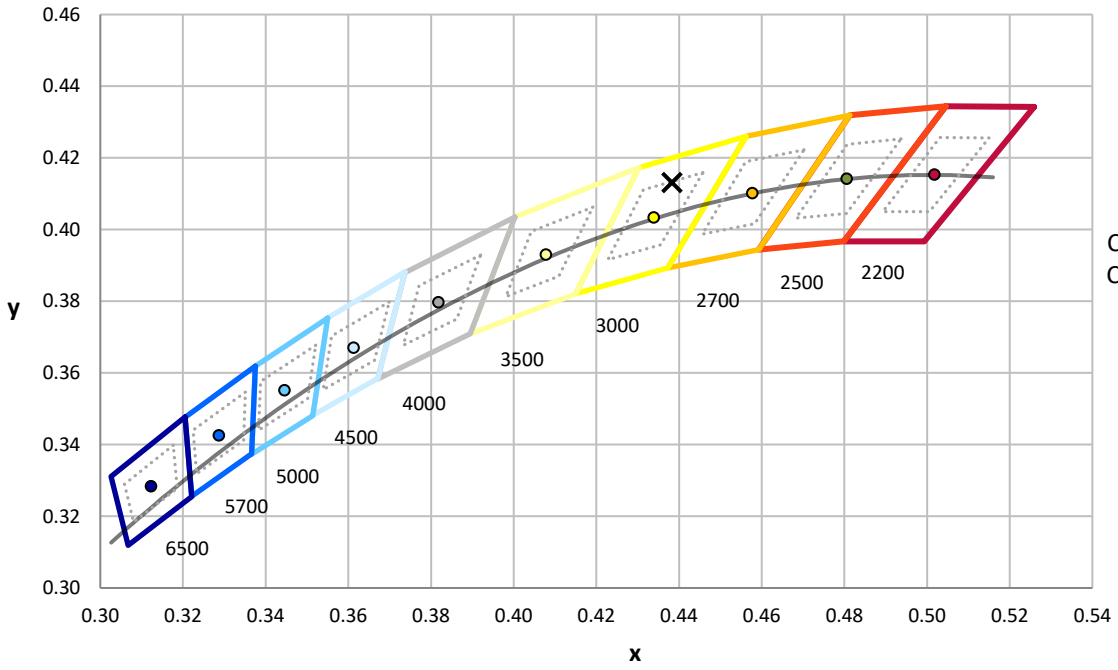
CIE 1931 Chromaticity Diagram



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

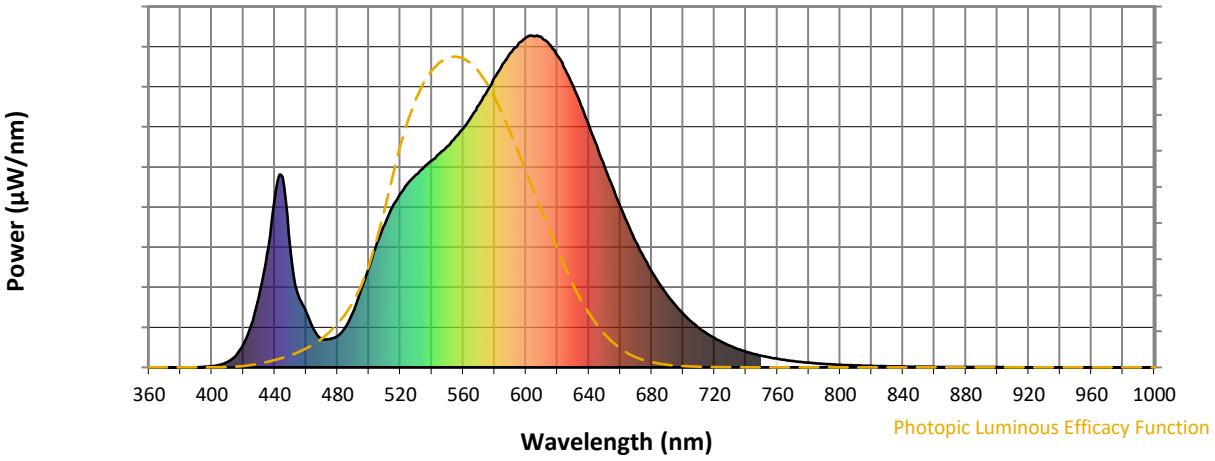


CCT = 3050K
CIE x = 0.4383
CIE y = 0.4131
Duv = 0.0034

Point lies inside the ANSI 3000K 4-step quadrangle

REPORT NUMBER: SP1-2408-195-9

Photopic Flux vs. Wavelength

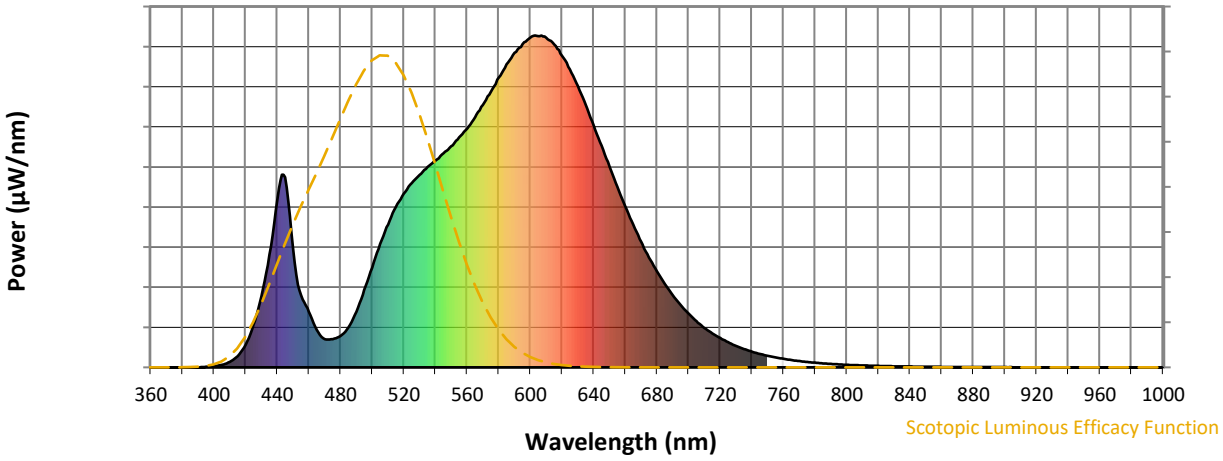


Photopic Lumens: NR

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	168	NR	620	940	NR	750	35	NR	880	1	NR
365	0	NR	495	233	NR	625	897	NR	755	30	NR	885	1	NR
370	0	NR	500	300	NR	630	847	NR	760	26	NR	890	1	NR
375	0	NR	505	372	NR	635	790	NR	765	22	NR	895	1	NR
380	0	NR	510	430	NR	640	730	NR	770	19	NR	900	1	NR
385	0	NR	515	483	NR	645	668	NR	775	16	NR	905	1	NR
390	0	NR	520	524	NR	650	605	NR	780	14	NR	910	0	NR
395	2	NR	525	555	NR	655	545	NR	785	12	NR	915	0	NR
400	4	NR	530	581	NR	660	485	NR	790	10	NR	920	0	NR
405	7	NR	535	604	NR	665	430	NR	795	9	NR	925	0	NR
410	17	NR	540	623	NR	670	378	NR	800	8	NR	930	0	NR
415	34	NR	545	645	NR	675	331	NR	805	7	NR	935	0	NR
420	68	NR	550	667	NR	680	290	NR	810	6	NR	940	0	NR
425	128	NR	555	693	NR	685	251	NR	815	5	NR	945	0	NR
430	214	NR	560	719	NR	690	218	NR	820	4	NR	950	0	NR
435	339	NR	565	754	NR	695	188	NR	825	4	NR	955	0	NR
440	507	NR	570	791	NR	700	162	NR	830	3	NR	960	0	NR
445	573	NR	575	830	NR	705	139	NR	835	3	NR	965	0	NR
450	356	NR	580	873	NR	710	119	NR	840	3	NR	970	0	NR
455	217	NR	585	913	NR	715	102	NR	845	2	NR	975	0	NR
460	168	NR	590	948	NR	720	88	NR	850	2	NR	980	0	NR
465	113	NR	595	974	NR	725	76	NR	855	2	NR	985	0	NR
470	85	NR	600	994	NR	730	65	NR	860	1	NR	990	0	NR
475	85	NR	605	998	NR	735	55	NR	865	1	NR	995	0	NR
480	94	NR	610	994	NR	740	47	NR	870	1	NR	1000	0	NR
485	120	NR	615	973	NR	745	41	NR	875	1	NR			

REPORT NUMBER: SP1-2408-195-9

Scotopic Flux vs. Wavelength

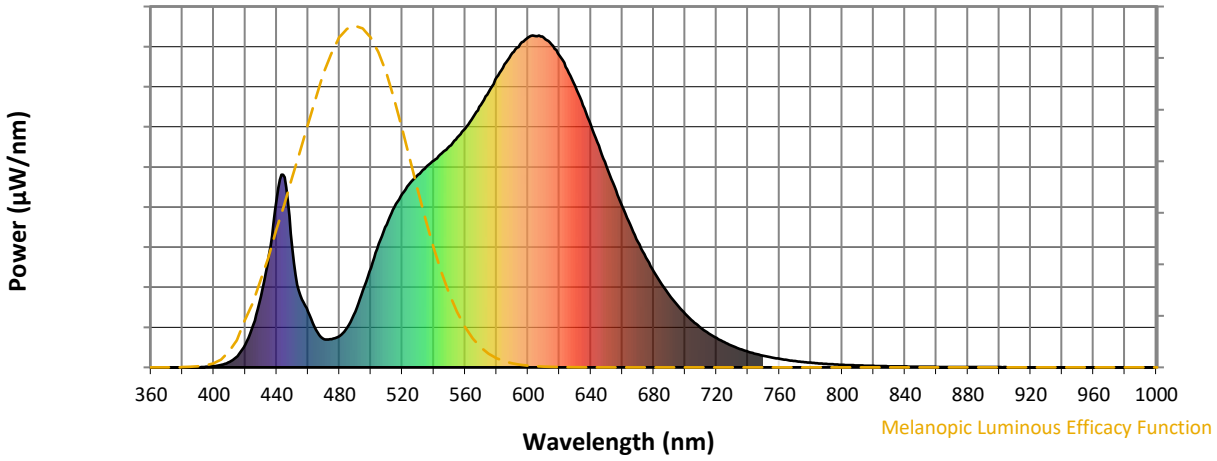


Scotopic Lumens: NR **S/P: 1.27**

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	168	NR	620	940	NR	750	35	NR	880	1	NR
365	0	NR	495	233	NR	625	897	NR	755	30	NR	885	1	NR
370	0	NR	500	300	NR	630	847	NR	760	26	NR	890	1	NR
375	0	NR	505	372	NR	635	790	NR	765	22	NR	895	1	NR
380	0	NR	510	430	NR	640	730	NR	770	19	NR	900	1	NR
385	0	NR	515	483	NR	645	668	NR	775	16	NR	905	1	NR
390	0	NR	520	524	NR	650	605	NR	780	14	NR	910	0	NR
395	2	NR	525	555	NR	655	545	NR	785	12	NR	915	0	NR
400	4	NR	530	581	NR	660	485	NR	790	10	NR	920	0	NR
405	7	NR	535	604	NR	665	430	NR	795	9	NR	925	0	NR
410	17	NR	540	623	NR	670	378	NR	800	8	NR	930	0	NR
415	34	NR	545	645	NR	675	331	NR	805	7	NR	935	0	NR
420	68	NR	550	667	NR	680	290	NR	810	6	NR	940	0	NR
425	128	NR	555	693	NR	685	251	NR	815	5	NR	945	0	NR
430	214	NR	560	719	NR	690	218	NR	820	4	NR	950	0	NR
435	339	NR	565	754	NR	695	188	NR	825	4	NR	955	0	NR
440	507	NR	570	791	NR	700	162	NR	830	3	NR	960	0	NR
445	573	NR	575	830	NR	705	139	NR	835	3	NR	965	0	NR
450	356	NR	580	873	NR	710	119	NR	840	3	NR	970	0	NR
455	217	NR	585	913	NR	715	102	NR	845	2	NR	975	0	NR
460	168	NR	590	948	NR	720	88	NR	850	2	NR	980	0	NR
465	113	NR	595	974	NR	725	76	NR	855	2	NR	985	0	NR
470	85	NR	600	994	NR	730	65	NR	860	1	NR	990	0	NR
475	85	NR	605	998	NR	735	55	NR	865	1	NR	995	0	NR
480	94	NR	610	994	NR	740	47	NR	870	1	NR	1000	0	NR
485	120	NR	615	973	NR	745	41	NR	875	1	NR			

REPORT NUMBER: SP1-2408-195-9

Melanopic Flux vs. Wavelength



Melanopic Lumens: NR **M/P: 2.32**

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	168	NR	620	940	NR	750	35	NR	880	1	NR
365	0	NR	495	233	NR	625	897	NR	755	30	NR	885	1	NR
370	0	NR	500	300	NR	630	847	NR	760	26	NR	890	1	NR
375	0	NR	505	372	NR	635	790	NR	765	22	NR	895	1	NR
380	0	NR	510	430	NR	640	730	NR	770	19	NR	900	1	NR
385	0	NR	515	483	NR	645	668	NR	775	16	NR	905	1	NR
390	0	NR	520	524	NR	650	605	NR	780	14	NR	910	0	NR
395	2	NR	525	555	NR	655	545	NR	785	12	NR	915	0	NR
400	4	NR	530	581	NR	660	485	NR	790	10	NR	920	0	NR
405	7	NR	535	604	NR	665	430	NR	795	9	NR	925	0	NR
410	17	NR	540	623	NR	670	378	NR	800	8	NR	930	0	NR
415	34	NR	545	645	NR	675	331	NR	805	7	NR	935	0	NR
420	68	NR	550	667	NR	680	290	NR	810	6	NR	940	0	NR
425	128	NR	555	693	NR	685	251	NR	815	5	NR	945	0	NR
430	214	NR	560	719	NR	690	218	NR	820	4	NR	950	0	NR
435	339	NR	565	754	NR	695	188	NR	825	4	NR	955	0	NR
440	507	NR	570	791	NR	700	162	NR	830	3	NR	960	0	NR
445	573	NR	575	830	NR	705	139	NR	835	3	NR	965	0	NR
450	356	NR	580	873	NR	710	119	NR	840	3	NR	970	0	NR
455	217	NR	585	913	NR	715	102	NR	845	2	NR	975	0	NR
460	168	NR	590	948	NR	720	88	NR	850	2	NR	980	0	NR
465	113	NR	595	974	NR	725	76	NR	855	2	NR	985	0	NR
470	85	NR	600	994	NR	730	65	NR	860	1	NR	990	0	NR
475	85	NR	605	998	NR	735	55	NR	865	1	NR	995	0	NR
480	94	NR	610	994	NR	740	47	NR	870	1	NR	1000	0	NR
485	120	NR	615	973	NR	745	41	NR	875	1	NR			

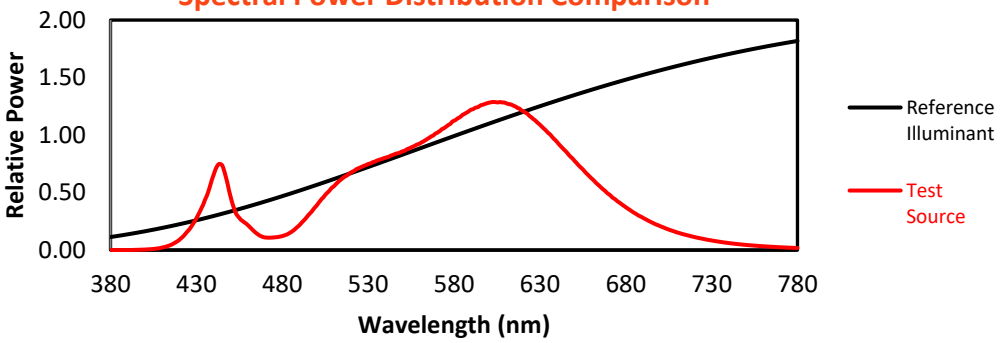
REPORT NUMBER: SP1-2408-195-9

TM-30-18

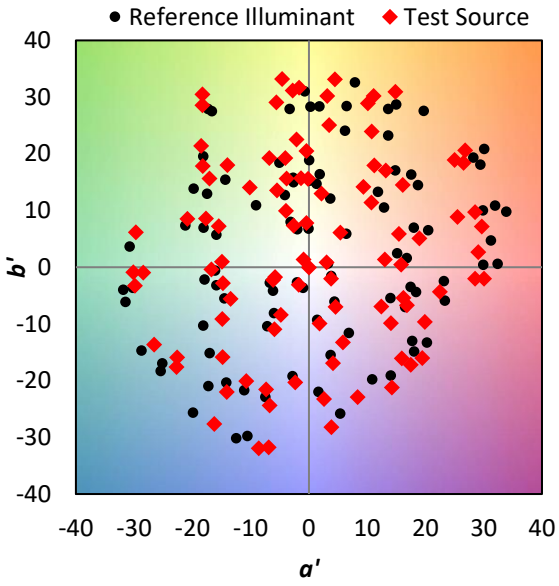
Summary

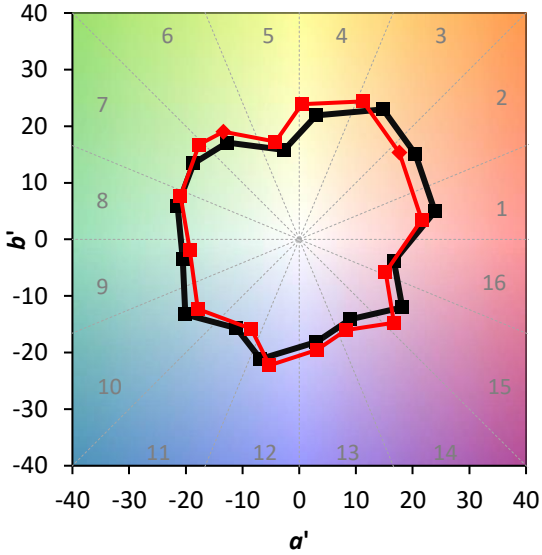
R_f = 81.5
R_g = 99.2
CIE R_a = 81.0
R_9 = 7.1

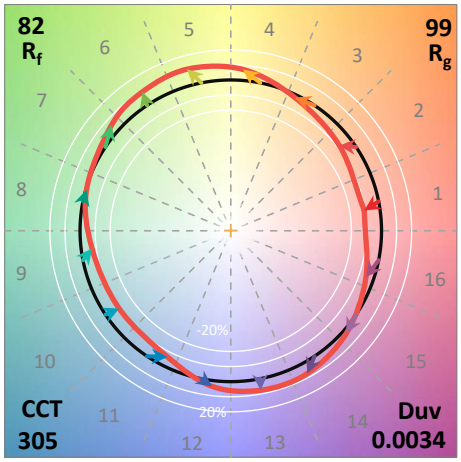
Spectral Power Distribution Comparison

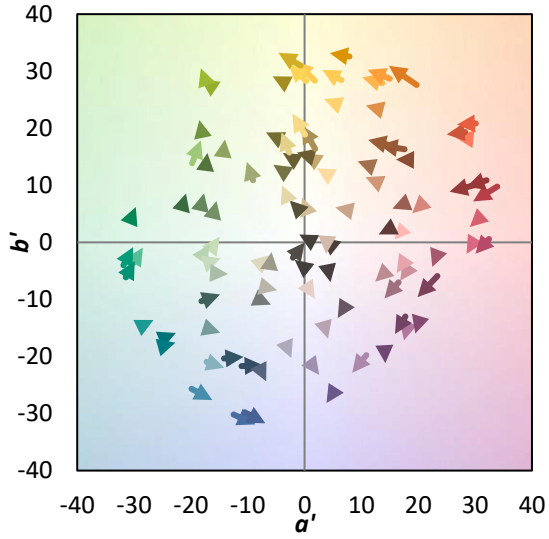


Color Vector Graphics









REPORT NUMBER: SP1-2408-195-9

TM-30-18

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

CES01 = 86	CES26 = 74	CES51 = 89	CES76 = 70
CES02 = 63	CES27 = 88	CES52 = 92	CES77 = 86
CES03 = 31	CES28 = 89	CES53 = 81	CES78 = 72
CES04 = 70	CES29 = 67	CES54 = 87	CES79 = 90
CES05 = 50	CES30 = 68	CES55 = 85	CES80 = 88
CES06 = 51	CES31 = 71	CES56 = 78	CES81 = 78
CES07 = 42	CES32 = 70	CES57 = 76	CES82 = 95
CES08 = 41	CES33 = 71	CES58 = 78	CES83 = 90
CES09 = 29	CES34 = 82	CES59 = 92	CES84 = 94
CES10 = 76	CES35 = 90	CES60 = 95	CES85 = 86
CES11 = 59	CES36 = 93	CES61 = 93	CES86 = 72
CES12 = 65	CES37 = 87	CES62 = 83	CES87 = 85
CES13 = 43	CES38 = 75	CES63 = 77	CES88 = 83
CES14 = 74	CES39 = 94	CES64 = 83	CES89 = 75
CES15 = 71	CES40 = 89	CES65 = 77	CES90 = 81
CES16 = 47	CES41 = 85	CES66 = 80	CES91 = 96
CES17 = 50	CES42 = 86	CES67 = 79	CES92 = 73
CES18 = 56	CES43 = 81	CES68 = 84	CES93 = 84
CES19 = 72	CES44 = 99	CES69 = 91	CES94 = 64
CES20 = 66	CES45 = 87	CES70 = 78	CES95 = 80
CES21 = 87	CES46 = 82	CES71 = 76	CES96 = 84
CES22 = 79	CES47 = 77	CES72 = 92	CES97 = 87
CES23 = 92	CES48 = 71	CES73 = 71	CES98 = 81
CES24 = 91	CES49 = 81	CES74 = 93	CES99 = 74
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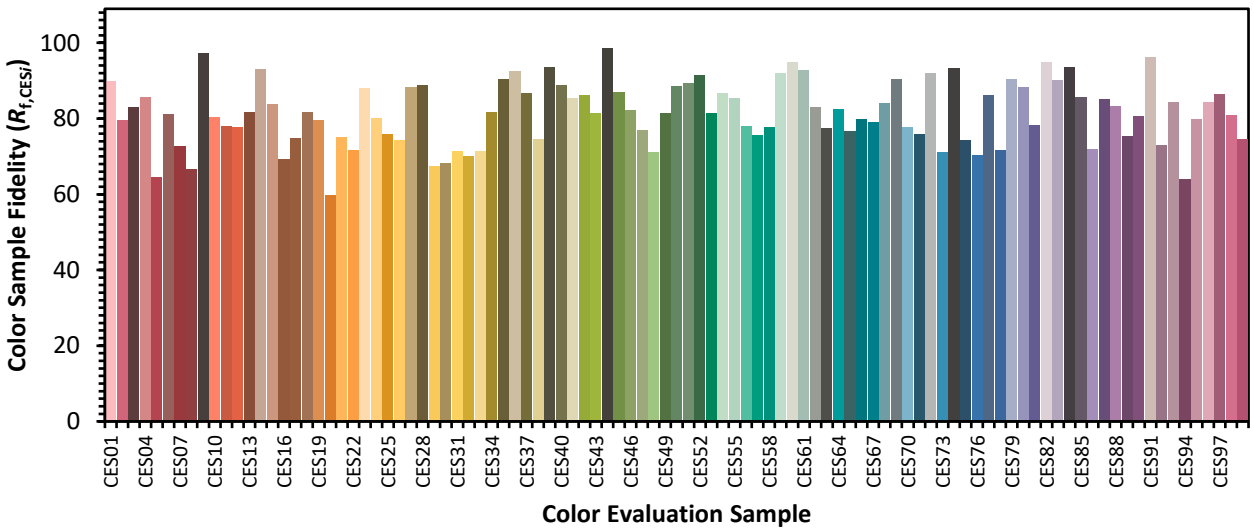

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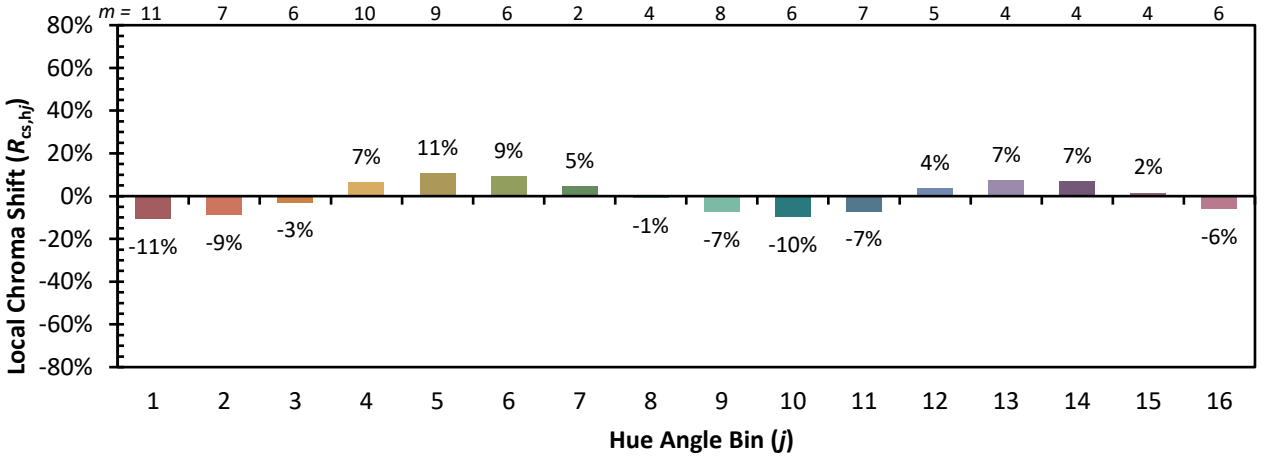
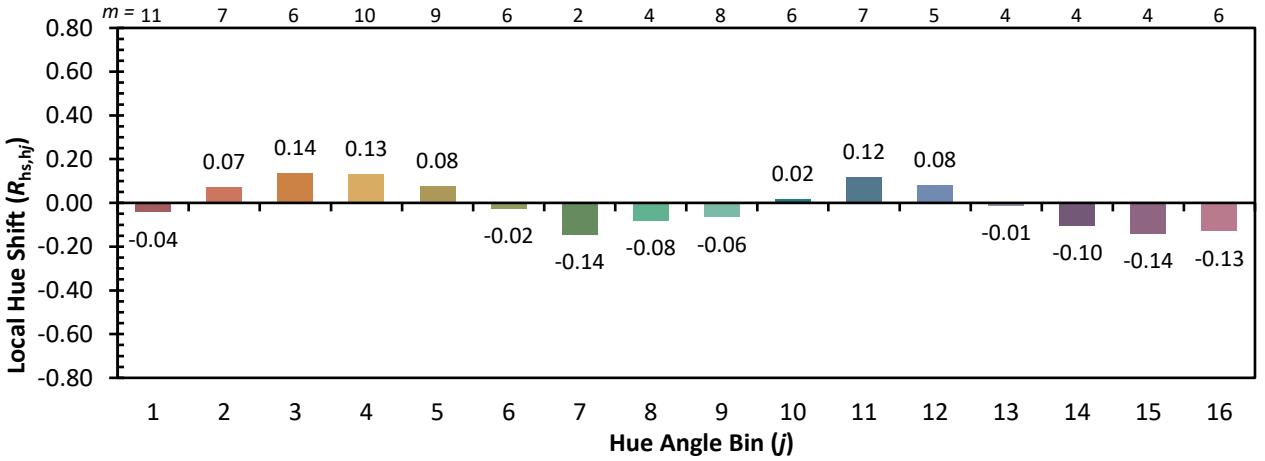
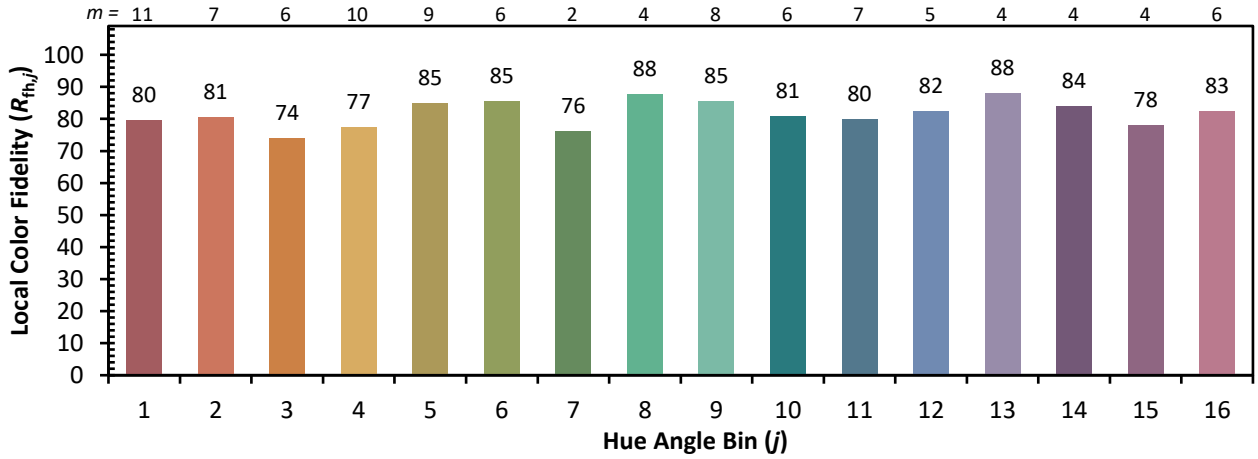
Color Rendition by Hue-Angle Bin







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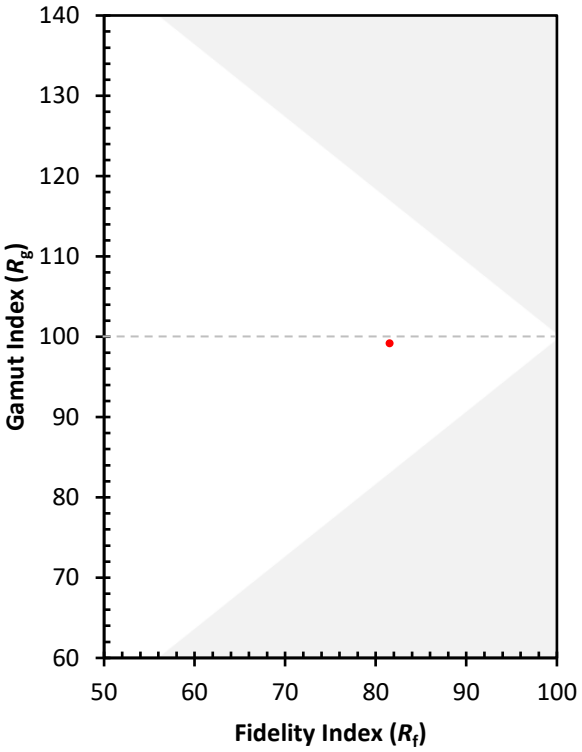
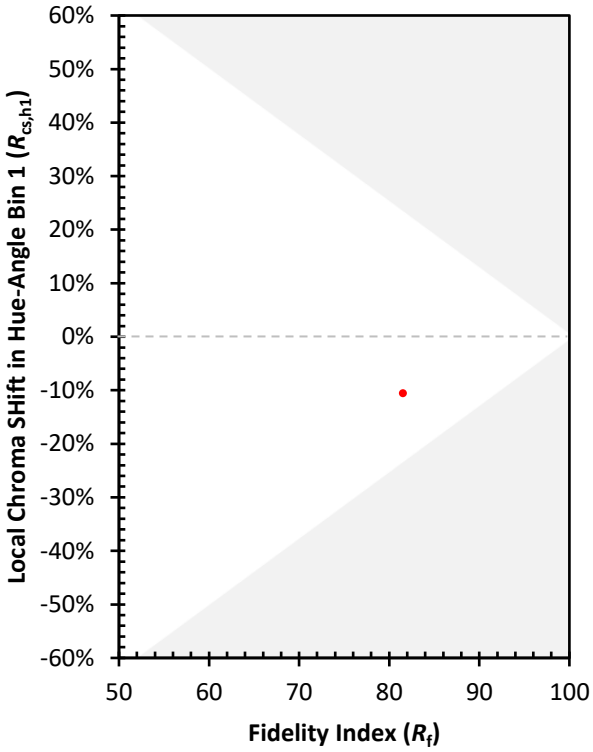
Measure Comparisons





(END OF REPORT)