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: P638464

Luminaire Tested: GWS-SA4E-830-U-AFL-W-HSS

Issue Date: 1/10/2023

Report Generated By 670246102 / DESKTOP-G35701P

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

Scaled Data Report

Test Information

Test Method:	LM-79-2019
Report Number:	P638464
	TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2209-782-48)
Test Lab:	COOPER LIGHTING SOLUTIONS
Issue Date:	1/10/2023
Manufacturer:	COOPER LIGHTING SOLUTIONS
Product Line:	McGRAW-EDISON
Catalog Number:	GWS-SA4E-830-U-AFL-W-HSS
Description:	GALLEON WALL SLIM LUMINAIRE. (4) LIGHTSQUARES WITH 16 LEDS EACH AND AUTOMOTIVE FRONTLINE OPTICS WITH HOUSE SIDE SHIELD
Light Source:	(64) 3000K CCT, 80 CRI LEDS
Ballast/Driver:	-

Summary

Lumens per Lamp:	N/A
Luminaire Lumens:	20386.6 lumens
Efficiency:	N/A
Efficacy:	100.6 lumens/watt
Luminous Opening:	Rectangular (W 1' x L: 1' x H: 0')
IES Classification:	Type II - Short
BUG Rating:	B2 - U0 - G2

Input Watts (W):	202.6
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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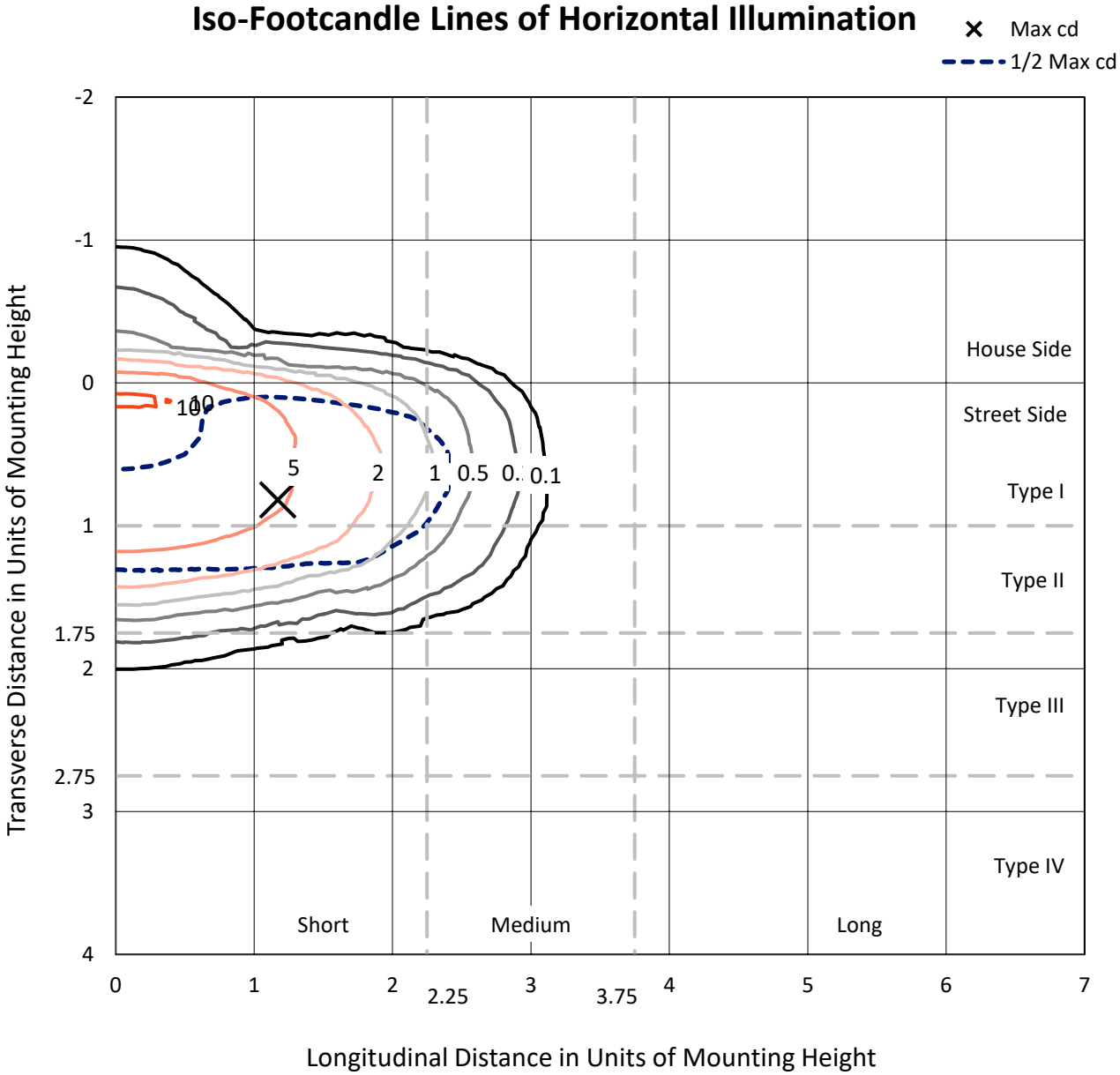
Scaled Data Report

REPORT NUMBER: P638464
CATALOG NUMBER: GWS-SA4E-830-U-AFL-W-HSS

Iso-Footcandle Lines of Horizontal Illumination



Based on 25 foot mounting height. Maximum calculated value = 11 fc
Type II - Short - N/A

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REPORT NUMBER: P638464
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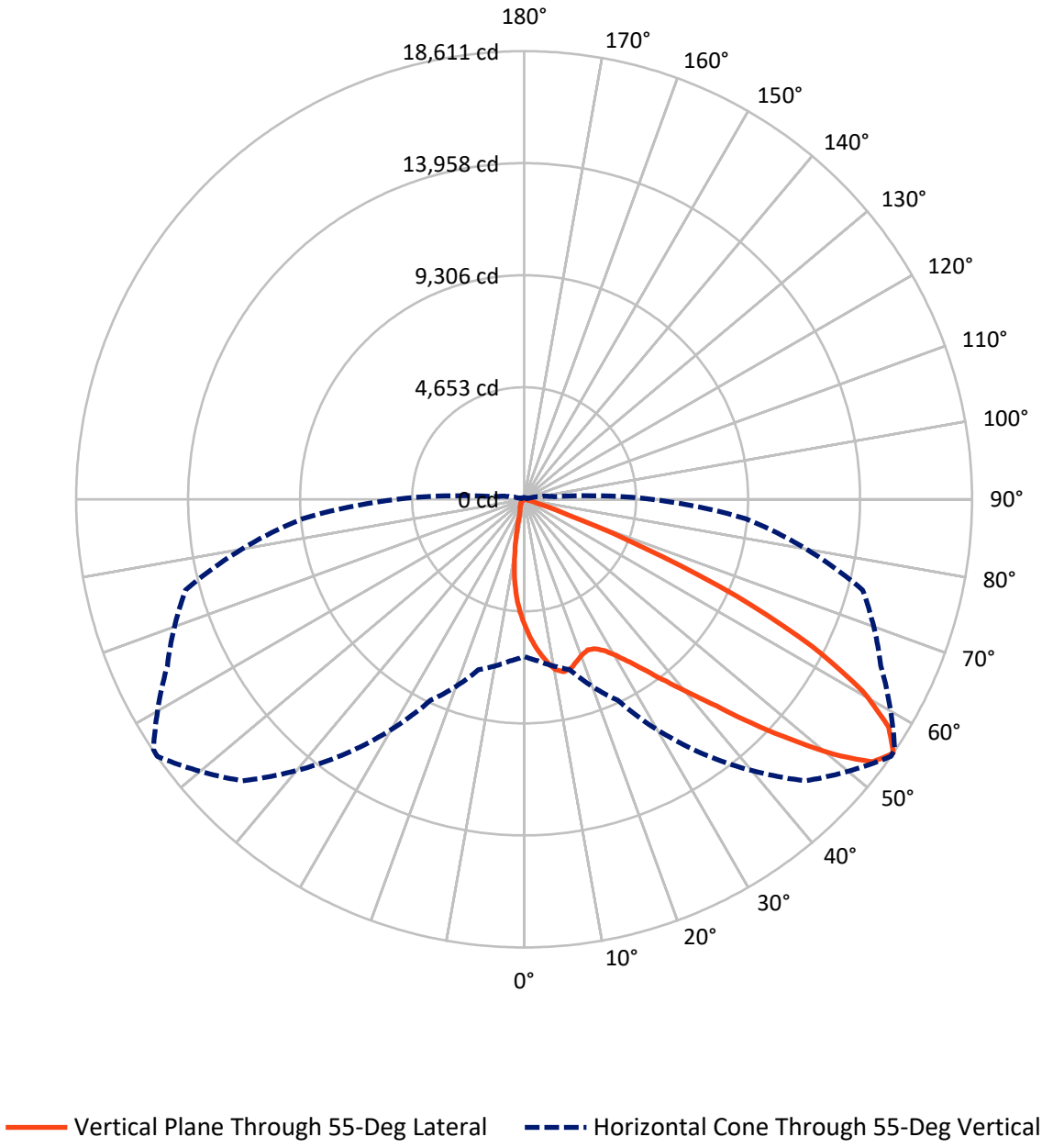
Luminous Intensity Polar Plot



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REPORT NUMBER: P638464
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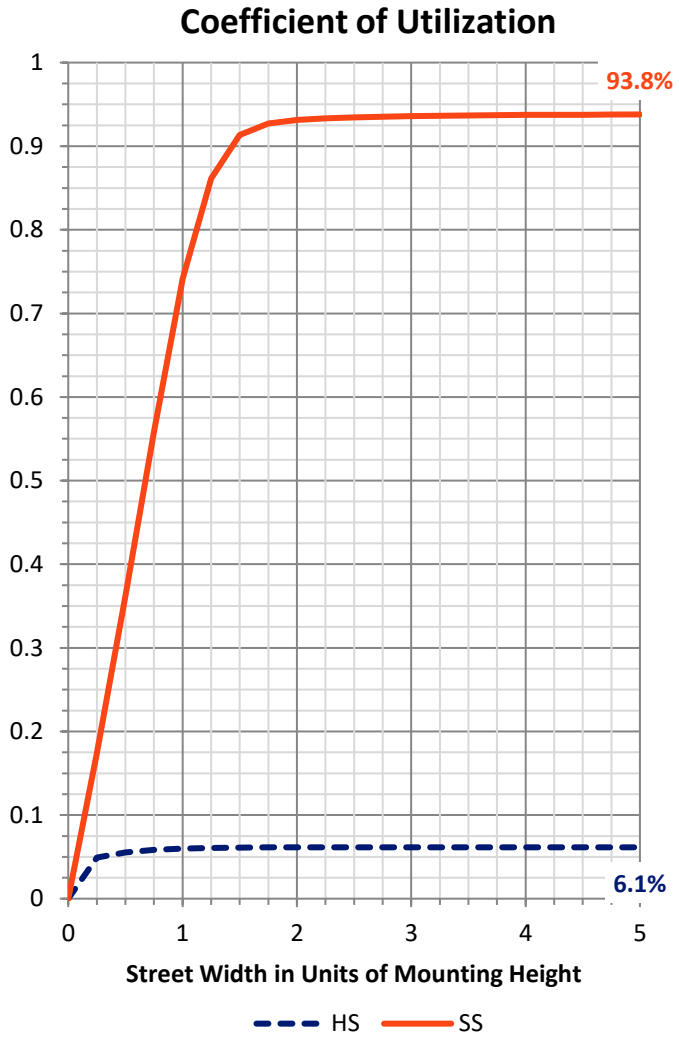
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1257.9	0.0	1257.9
	% Fixture	6.2	0.0	6.2
Street Side	Lumens	19128.7	0.0	19128.7
	% Fixture	93.8	0.0	93.8
Total	Lumens	20386.6	0.0	20386.6
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	465.4	2.3
10°-20°	1122.2	5.5
20°-30°	1868.8	9.2
30°-40°	3184.6	15.6
40°-50°	5198.3	25.5
50°-60°	5442.4	26.7
60°-70°	2745.0	13.5
70°-80°	346.7	1.7
80°-90°	13.2	0.1
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°	20386.6	100.0
0°-180°	20386.6	100.0



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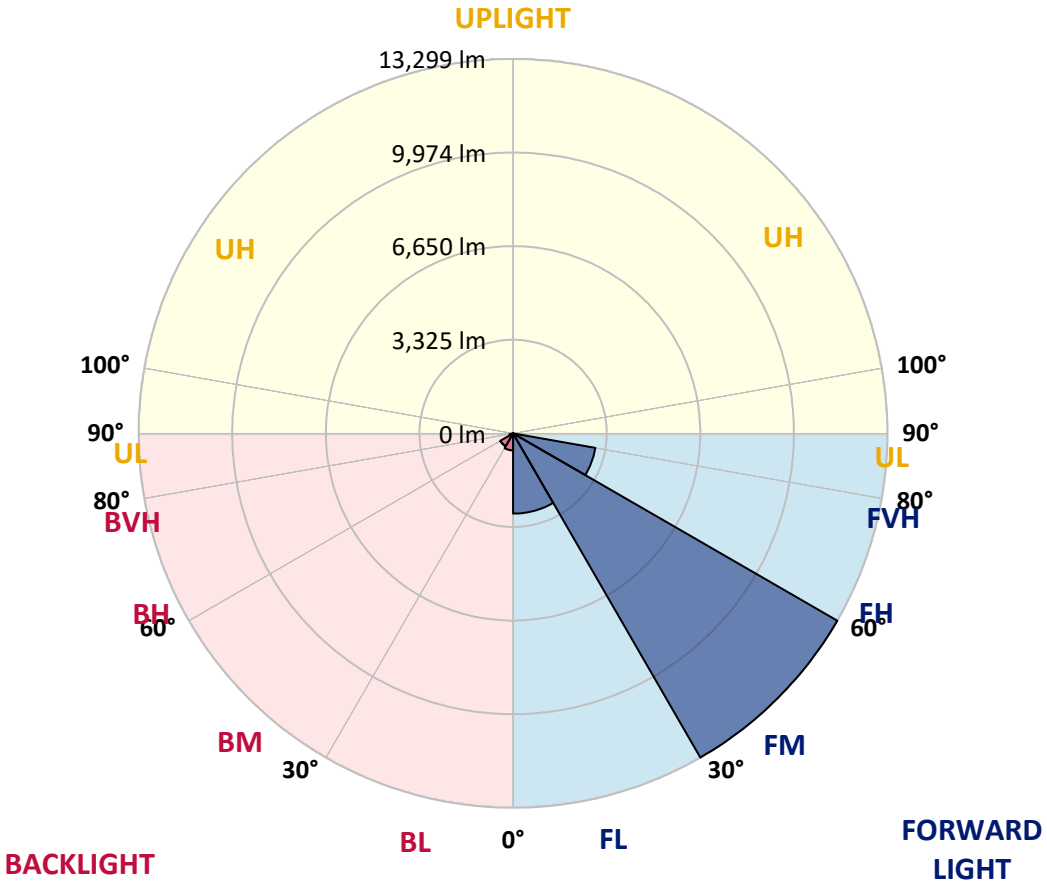
CATALOG NUMBER: GWS-SA4E-830-U-AFL-W-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit B	U	G
FL	(0°-30°)	2851.8	14.0			
FM	(30°-60°)	13299.3	65.2			
FH	(60°-80°)	2965.6	14.5			G2/5000
FVH	(80°-90°)	12.0	0.1			G1/100
BL	(0°-30°)	604.6	3.0	B2/1000		
BM	(30°-60°)	525.9	2.6	B1/1000		
BH	(60°-80°)	126.2	0.6	B1/500		G1/500
BVH	(80°-90°)	1.2	0.0			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B2-U0-G2
Type II Short



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Scaled Data Report

REPORT NUMBER: P638464
CATALOG NUMBER: GWS-SA4E-830-U-AFL-W-HSS

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	56°	65°	75°	85°
0°	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	*5266.7*	5266.7	5266.7	5266.7	5266.7
2.5°	6139.8	6110.2	6155.5	6103.2	6014.4	5939.4	*5841.8*	5807.0	5650.1	5502.0	5359.1
5°	6885.8	6894.5	6880.5	6807.3	6681.8	6542.4	*6345.5*	6301.9	6028.3	5746.0	5441.0
7.5°	7070.5	7065.3	7094.9	7122.8	7101.9	7032.1	*6817.8*	6774.2	6434.4	6010.9	5566.5
10°	6500.6	6504.1	6565.1	6753.3	6986.8	7229.1	*7196.0*	7171.6	6838.7	6310.6	5705.9
12.5°	5695.4	5726.8	5791.3	6059.7	6455.3	7006.0	*7347.6*	7372.0	7209.9	6640.0	5869.7
15°	5346.9	5353.8	5406.1	5568.2	5862.7	6542.4	*7283.1*	7351.1	7520.1	6971.1	6047.5
17.5°	5338.2	5346.9	5369.5	5441.0	5632.7	6178.2	*7075.7*	7194.2	7753.7	7326.7	6260.1
20°	5665.8	5660.6	5644.9	5606.5	5690.2	6057.9	*6884.0*	7014.7	7880.9	7673.5	6474.5
22.5°	6260.1	6253.1	6183.4	6024.8	5956.8	6167.7	*6789.9*	6908.4	7957.6	7982.0	6650.5
25°	6945.0	6993.8	6863.1	6622.6	6455.3	6448.3	*6873.6*	6957.2	8023.8	8255.6	6770.7
27.5°	7696.1	7711.8	7600.3	7330.2	7087.9	6898.0	*7115.8*	7178.5	8097.0	8499.6	6838.7
30°	8520.5	8515.3	8388.0	8074.3	7779.8	7506.2	*7523.6*	7548.0	8267.8	8778.4	6913.6
32.5°	9550.5	9573.1	9346.6	8919.6	8565.8	8187.6	*8056.9*	8060.4	8576.3	9137.4	7026.9
35°	10949.9	10894.2	10594.4	9986.2	9383.2	8975.4	*8752.3*	8733.1	9052.0	9620.2	7223.9
37.5°	12283.2	12288.4	11974.7	11305.5	10543.9	9900.8	*9585.3*	9533.0	9721.3	10289.4	7551.5
40°	13208.6	13226.0	13095.3	12745.0	11938.1	11028.4	*10564.8*	10510.8	10589.2	11136.4	7980.2
42.5°	13698.3	13747.1	13783.7	13865.6	13253.9	12436.5	*11723.7*	11718.5	11636.6	12101.9	8476.9
45°	13717.5	13790.7	14013.8	14573.2	14642.9	14043.4	*13267.8*	13151.1	12835.6	13135.4	8921.3
47.5°	12959.4	13128.4	13602.5	14710.9	15442.8	15641.5	*14872.9*	14801.5	13916.2	13952.8	9254.2
50°	11192.2	11368.2	12241.3	14005.0	15645.0	16910.3	*16634.9*	16486.8	14818.9	14493.0	9414.5
52.5°	9379.7	9540.0	10132.6	12325.0	14806.7	17309.4	*18119.8*	17943.7	15629.3	14681.2	9348.3
55°	*6526.7*	*6741.1*	*7319.7*	*9212.4*	*12875.7*	*16532.1*	*18611.2*	*18574.6*	*16352.6*	*14562.7*	*9245.5*
57.5°	3199.8	3412.4	3989.2	5679.7	9538.3	14433.8	*17860.1*	18053.5	16784.8	14435.5	9161.8
60°	1336.7	1423.9	1622.5	2492.2	5336.4	10908.1	*16164.4*	16432.7	16519.9	14263.0	9153.1
62.5°	775.5	789.5	810.4	1033.5	2075.7	6253.1	*13409.0*	13790.7	15127.4	14034.7	9015.4
65°	585.6	590.8	582.1	634.4	857.5	2371.9	*9688.2*	10207.5	12626.5	13142.4	8471.7
67.5°	481.0	481.0	458.4	468.8	538.5	888.8	*5348.6*	6073.6	9343.1	10801.8	6995.5
70°	383.4	392.1	381.7	367.7	385.2	491.5	*1903.1*	2359.7	5441.0	6378.6	4079.9
72.5°	291.0	291.0	308.5	298.0	285.8	308.5	*664.0*	745.9	2183.7	2659.5	1472.7
75°	224.8	231.8	244.0	233.5	216.1	183.0	*318.9*	338.1	658.8	618.7	329.4
77.5°	115.0	116.8	155.1	170.8	160.3	111.5	*139.4*	153.4	214.4	191.7	122.0
80°	69.7	73.2	87.1	134.2	106.3	59.3	*57.5*	61.0	101.1	87.1	50.5
82.5°	29.6	31.4	48.8	48.8	43.6	22.7	*22.7*	22.7	48.8	45.3	20.9
85°	0.0	0.0	8.7	7.0	7.0	8.7	*8.7*	8.7	12.2	17.4	10.5
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	*0.0*	0.0	1.7	5.2	5.2
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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REPORT NUMBER: P638464
CATALOG NUMBER: GWS-SA4E-830-U-AFL-W-HSS

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7	5266.7
2.5°	5266.7	5155.2	5005.3	4869.3	4686.4	4583.5	4440.6	4323.9	4224.5	4193.1	4179.2
5°	5268.4	5076.7	4756.1	4435.4	4041.5	3731.3	3412.4	3159.7	2952.3	2886.1	2868.6
7.5°	5303.3	5021.0	4501.6	3919.5	3260.8	2717.0	2230.8	1795.1	1592.9	1524.9	1511.0
10°	5350.4	4973.9	4207.1	3300.8	2354.5	1655.6	1172.9	894.0	761.6	688.4	698.9
12.5°	5411.4	4935.6	3881.2	2631.6	1558.1	909.7	644.8	540.3	512.4	498.4	491.5
15°	5493.3	4890.3	3476.9	1967.6	955.0	585.6	496.7	468.8	458.4	451.4	449.6
17.5°	5576.9	4838.0	3065.6	1383.8	634.4	486.2	446.2	432.2	425.2	420.0	418.3
20°	5665.8	4749.1	2582.8	953.3	500.2	437.4	411.3	395.6	386.9	378.2	376.4
22.5°	5704.1	4606.2	2121.0	667.5	444.4	402.6	369.5	350.3	339.8	332.9	332.9
25°	5667.5	4374.4	1643.4	507.2	404.3	364.2	331.1	310.2	301.5	294.5	294.5
27.5°	5569.9	4076.4	1199.0	420.0	360.8	324.2	292.8	273.6	266.6	263.2	263.2
30°	5461.9	3699.9	845.3	360.8	312.0	282.3	256.2	244.0	242.2	238.8	238.8
32.5°	5369.5	3347.9	582.1	317.2	275.4	245.7	228.3	223.1	224.8	221.3	223.1
35°	5319.0	3002.8	432.2	282.3	245.7	217.8	209.1	209.1	209.1	207.4	207.4
37.5°	5339.9	2663.0	352.0	257.9	219.6	198.7	190.0	193.4	196.9	196.9	196.9
40°	5444.5	2361.5	312.0	235.3	196.9	181.2	174.3	179.5	184.7	188.2	188.2
42.5°	5576.9	2117.5	282.3	216.1	181.2	163.8	160.3	165.6	170.8	174.3	174.3
45°	5660.6	1871.8	252.7	191.7	165.6	144.7	144.7	151.6	149.9	151.6	151.6
47.5°	5698.9	1676.6	223.1	165.6	141.2	125.5	127.2	130.7	127.2	130.7	130.7
50°	5604.8	1479.6	196.9	137.7	116.8	109.8	113.3	111.5	111.5	118.5	118.5
52.5°	5432.3	1333.2	174.3	116.8	99.3	97.6	101.1	94.1	95.9	95.9	94.1
55°	*5305.0*	*1249.6*	*155.1*	*101.1*	*85.4*	*87.1*	*85.4*	*73.2*	*66.2*	*59.3*	*57.5*
57.5°	5242.3	1216.5	141.2	90.6	76.7	76.7	69.7	50.5	38.3	29.6	26.1
60°	5228.4	1176.4	127.2	78.4	68.0	64.5	50.5	29.6	19.2	13.9	12.2
62.5°	5095.9	1078.8	115.0	62.7	59.3	52.3	31.4	17.4	10.5	7.0	5.2
65°	4662.0	887.1	102.8	48.8	45.3	38.3	19.2	10.5	5.2	1.7	0.0
67.5°	3708.7	629.1	90.6	36.6	31.4	24.4	12.2	7.0	1.7	0.0	0.0
70°	2138.4	339.8	74.9	26.1	20.9	15.7	8.7	3.5	0.0	0.0	0.0
72.5°	714.5	158.6	57.5	17.4	15.7	12.2	5.2	1.7	0.0	0.0	0.0
75°	156.9	94.1	38.3	12.2	10.5	8.7	3.5	0.0	0.0	0.0	0.0
77.5°	59.3	66.2	19.2	8.7	7.0	5.2	1.7	0.0	0.0	0.0	0.0
80°	22.7	43.6	8.7	5.2	5.2	1.7	0.0	0.0	0.0	0.0	0.0
82.5°	12.2	17.4	5.2	3.5	3.5	0.0	0.0	0.0	0.0	0.0	0.0
85°	7.0	8.7	3.5	1.7	1.7	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	3.5	1.7	1.7	1.7	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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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

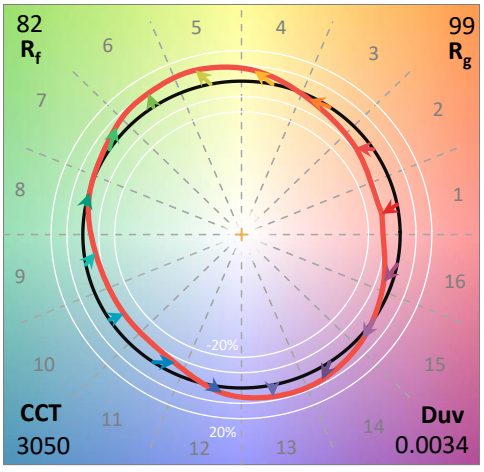
Test Information

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

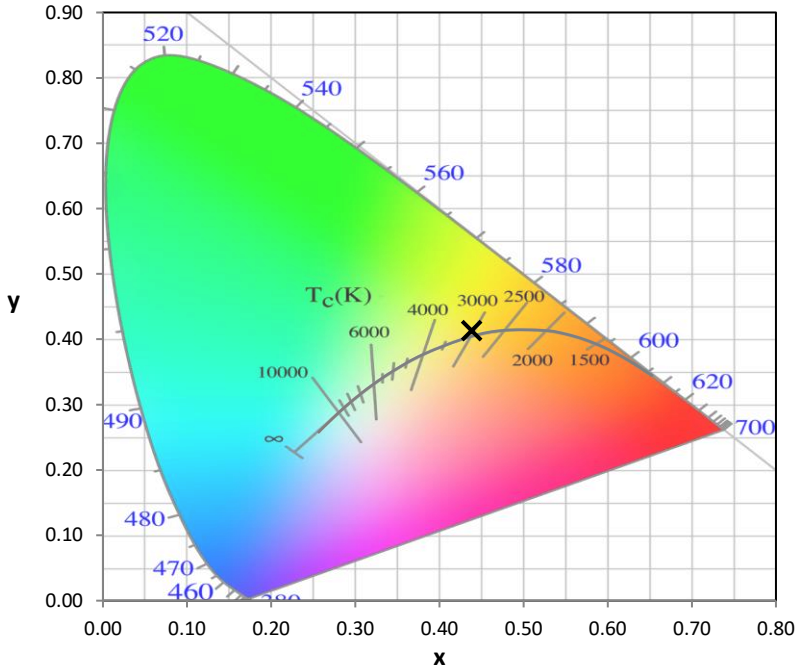
Stabilization Time:	20M
Operation Time:	1H 20M
Sphere Temperature (°C):	24.2

REPORT NUMBER: SP1-2408-195-9

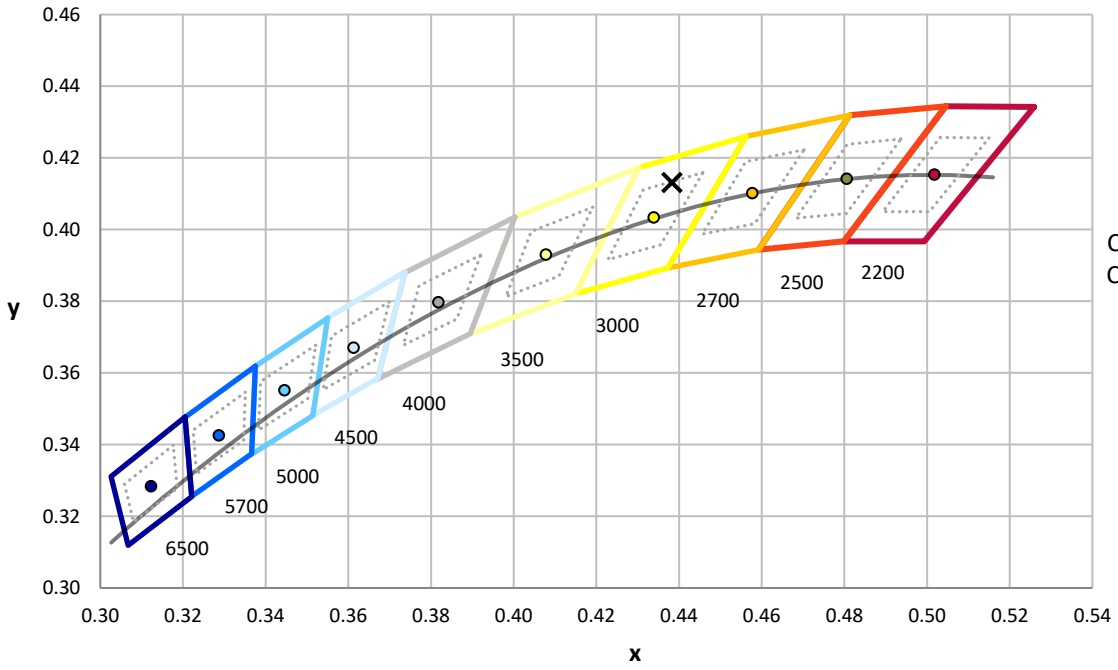
Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	IN0058	6/18/2024	12/18/2024
Power Meter	INXT2011004	2/8/2024	2/8/2025
AC Power Source	IN0063	10/24/2023	10/24/2024
DC Power Source	IN0208	10/24/2023	10/24/2024
Sphere Thermometer	IN0085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

REPORT NUMBER: SP1-2408-195-9

CIE 1931 Chromaticity Diagram



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

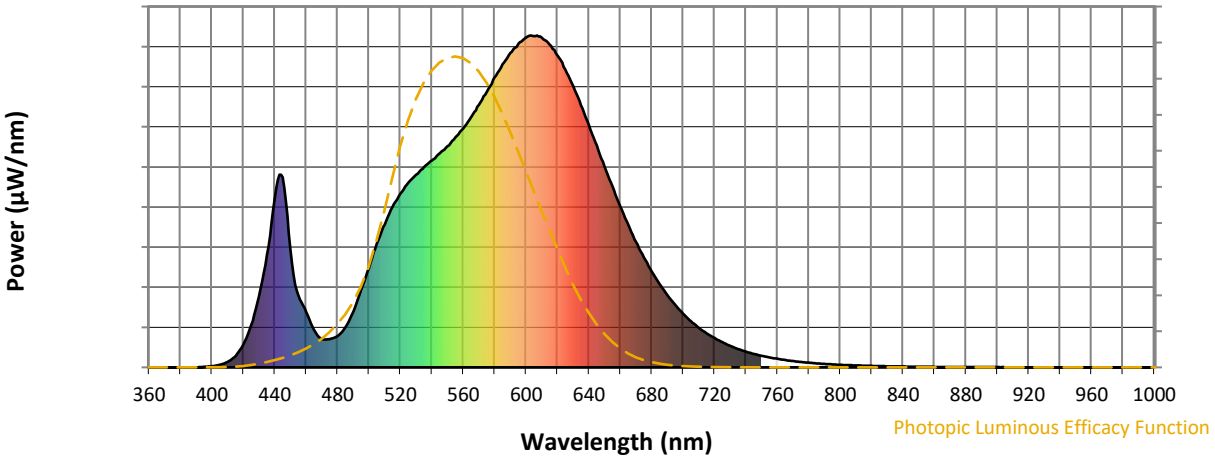


CCT = 3050K
CIE x = 0.4383
CIE y = 0.4131
Duv = 0.0034

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			

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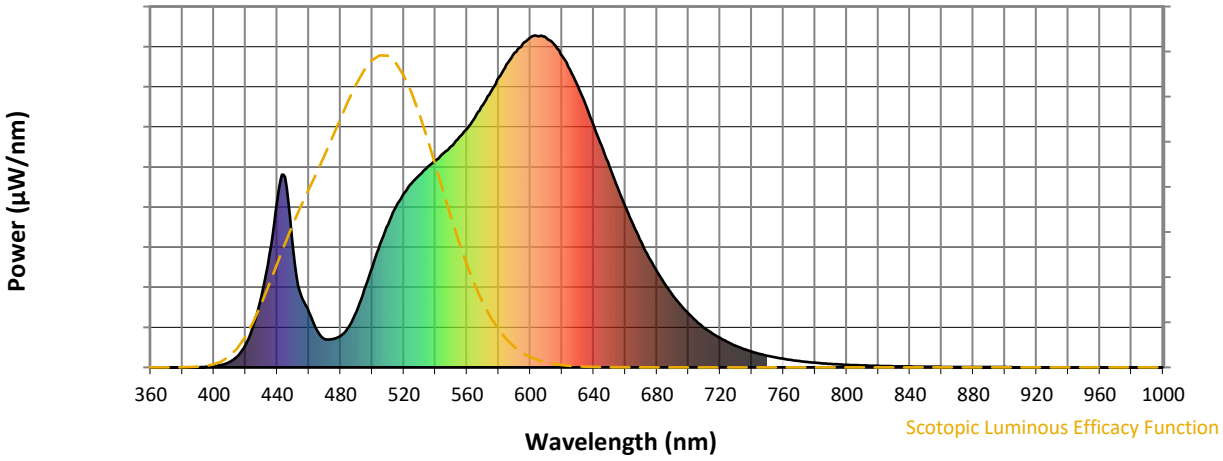
Scotopic Flux vs. Wavelength



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			

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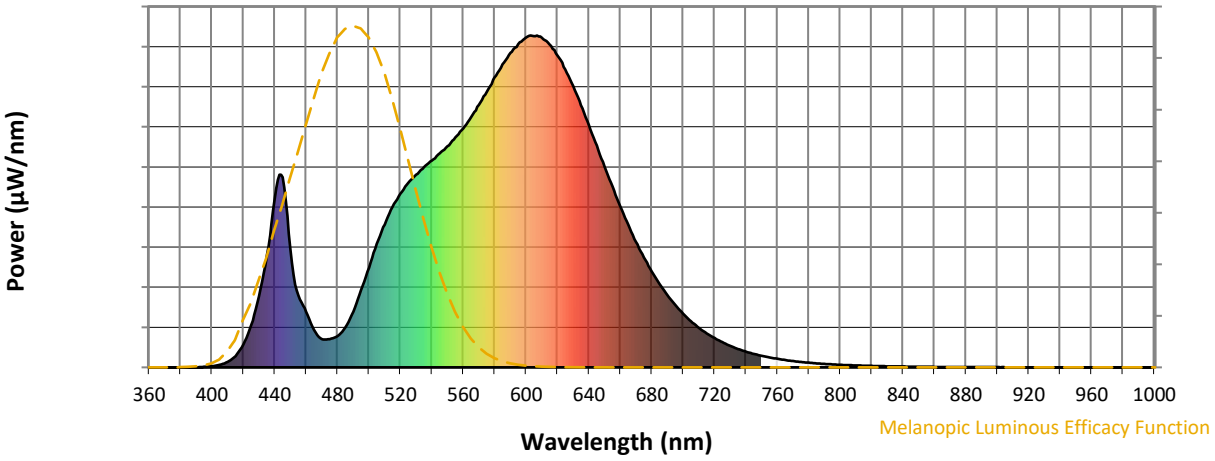
Melanopic Flux vs. Wavelength



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			

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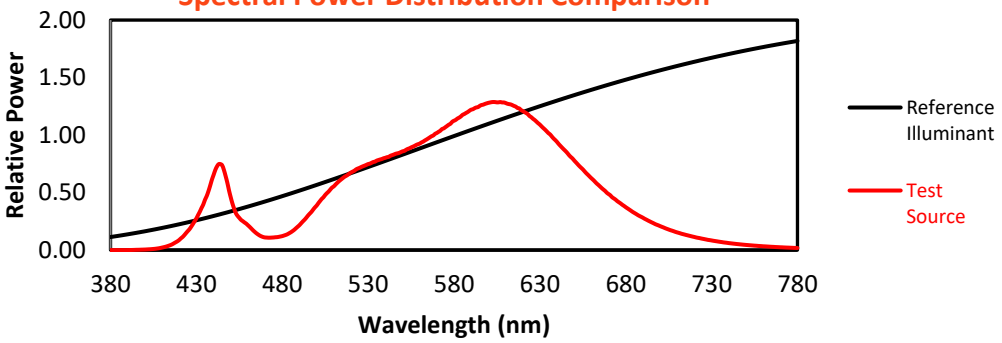
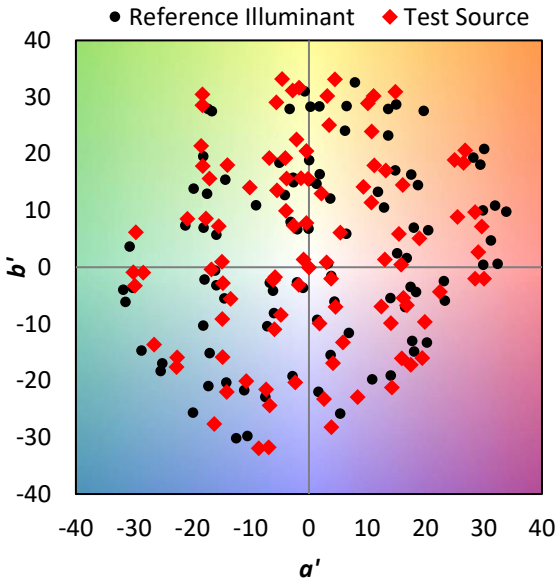
Summary

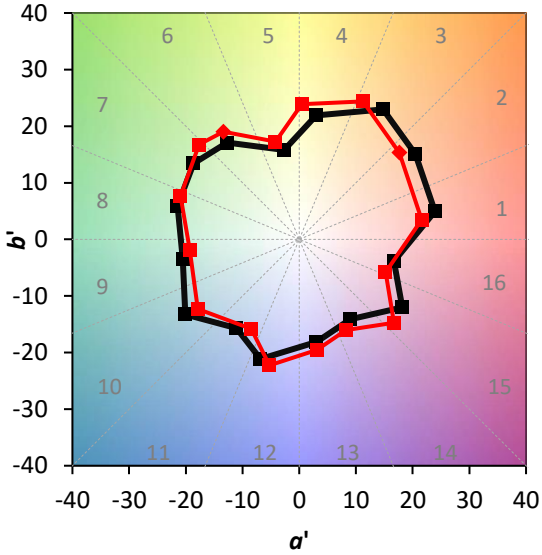
R_f = 81.5
R_g = 99.2
CIE R_a = 81.0
R_9 = 7.1

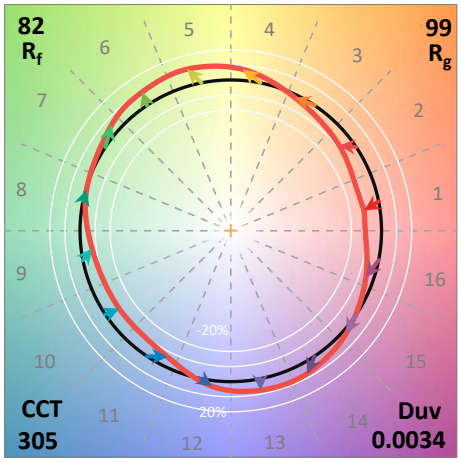
Spectral Power Distribution Comparison

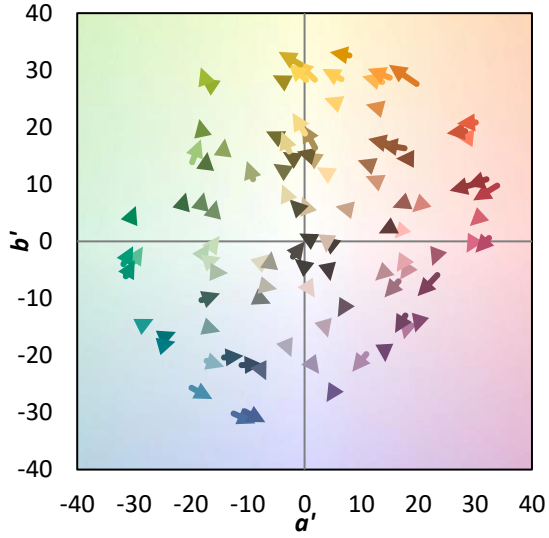


Color Vector Graphics









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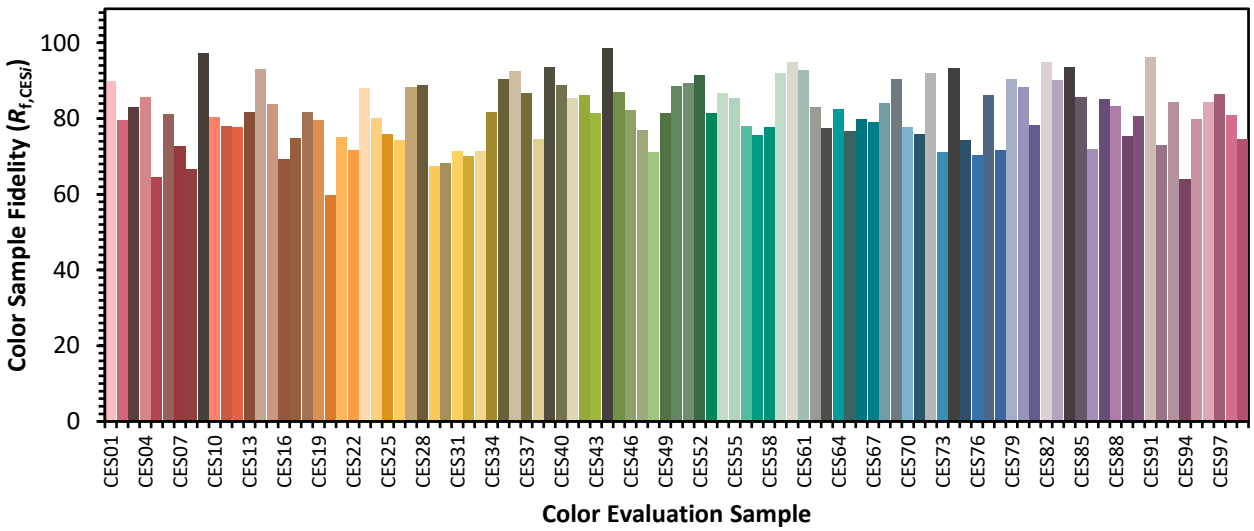
Individual Sample Fidelity Index ($R_{f,i}$)

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
CES25 = 72	CES50 = 89	CES75 = 74	



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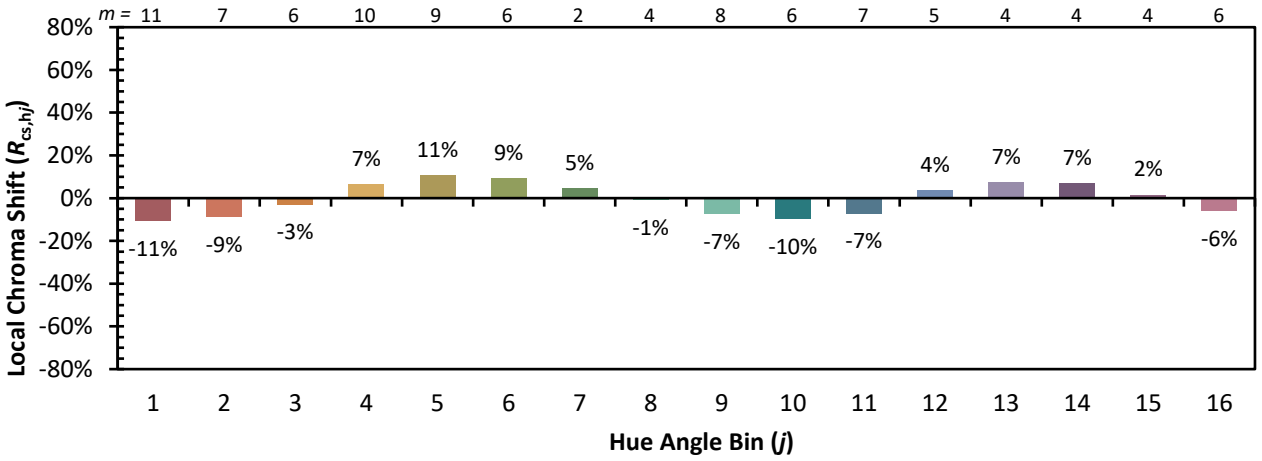
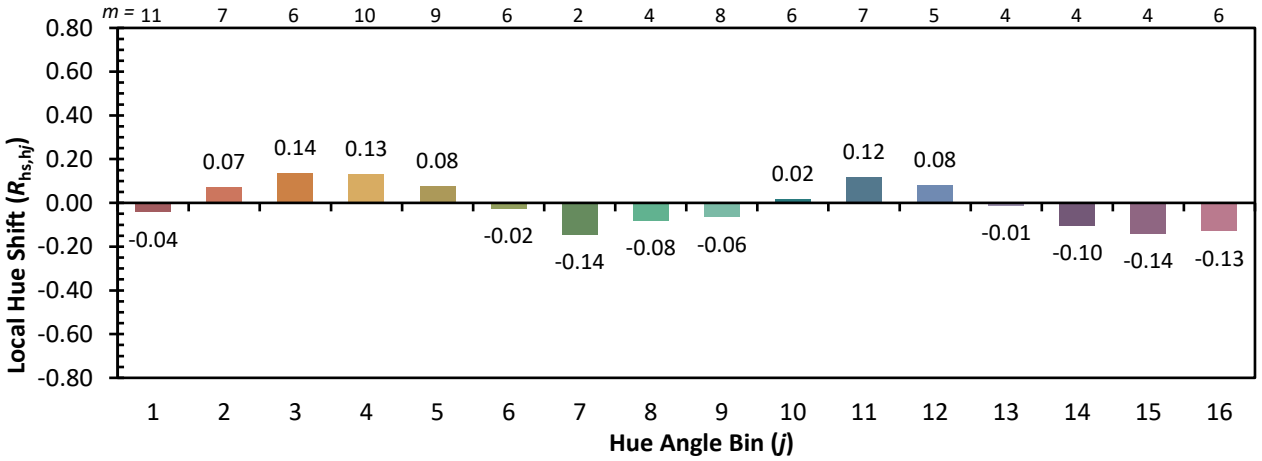
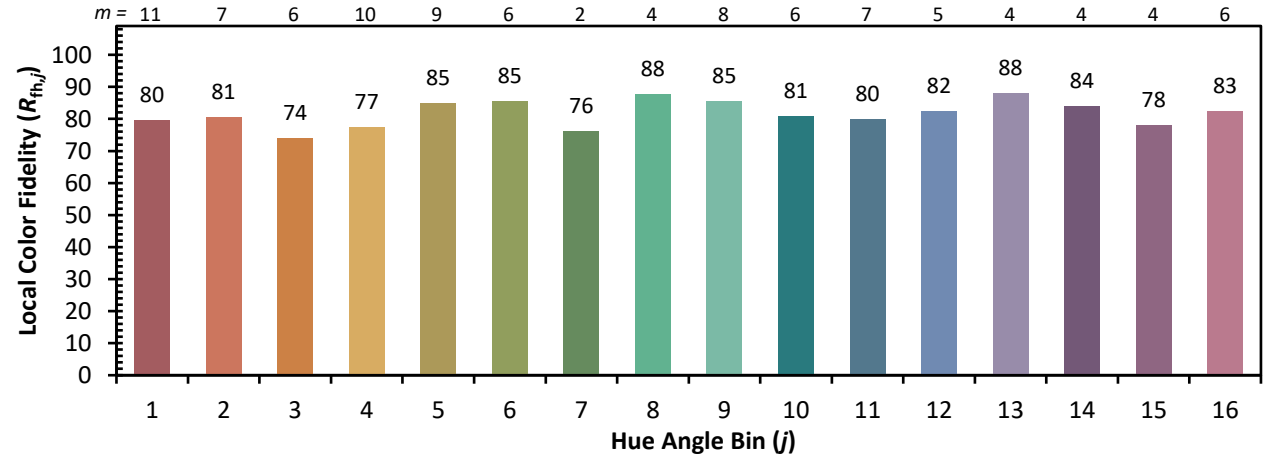
Color Rendition by Hue-Angle Bin







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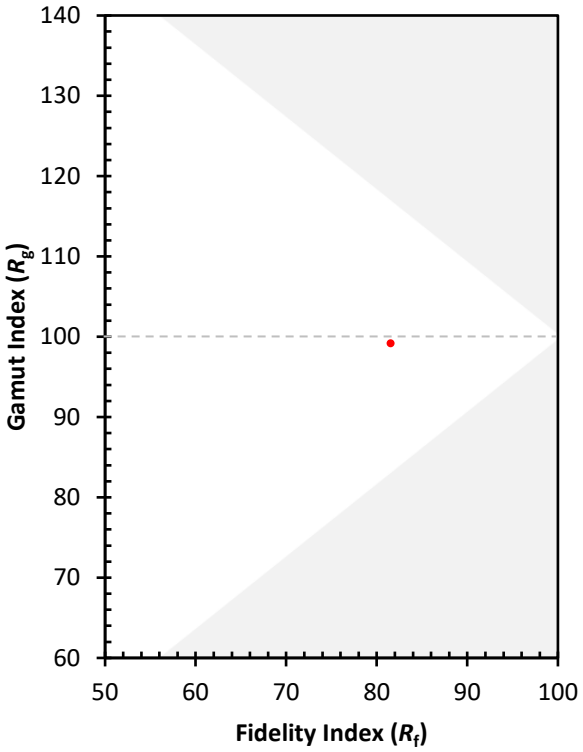
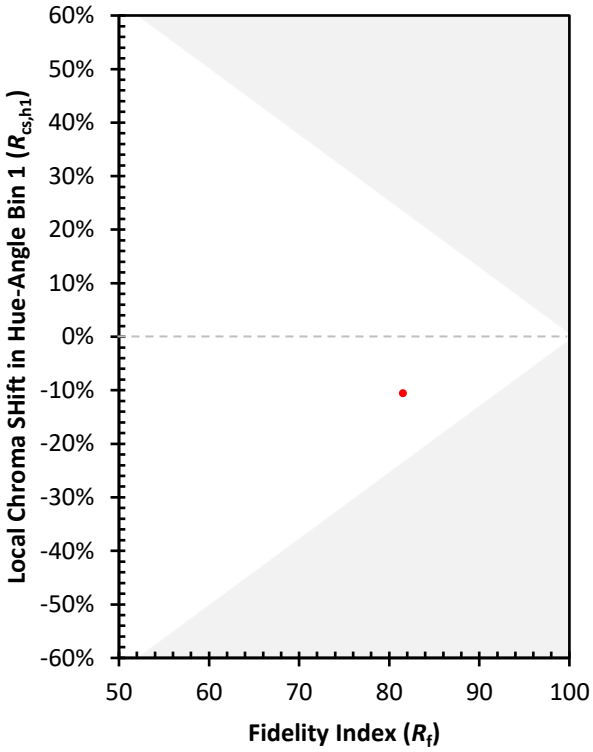
Measure Comparisons





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