

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



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

Brand: McGRAW-EDISON

Report Number: P639983

Luminaire Tested: GWS-SA5C-830-U-T3-W-HSS

Issue Date: 1/10/2023

Test Information

Test Method: LM-79-2019
Report Number: P639983
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2209-782-26)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 1/10/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: McGRAW-EDISON
Catalog Number: GWS-SA5C-830-U-T3-W-HSS
Description: GALLEON WALL SLIM LUMINAIRE. (5) LIGHTSQUARES WITH 16 LEDS EACH AND TYPE III OPTICS WITH HOUSE SIDE SHIELD
Light Source: (80) 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 13887.4 lumens
Efficiency: N/A
Efficacy: 88.2 lumens/watt
Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')
IES Classification: Type III - Short
BUG Rating: B1 - U0 - G2

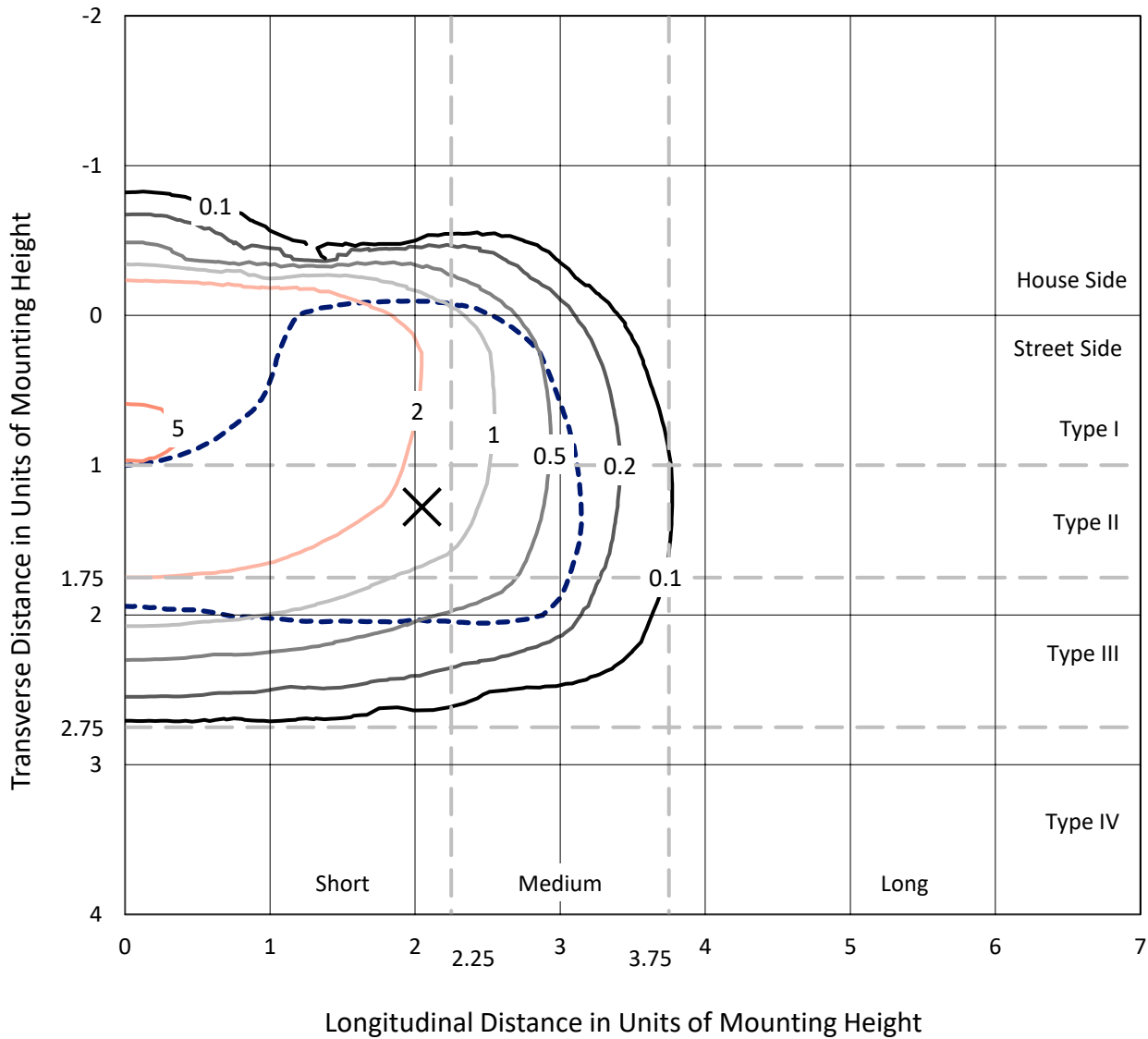
Input Watts (W): 157.5
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 0
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



REPORT NUMBER: P639983
 CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

Iso-Footcandle Lines of Horizontal Illumination

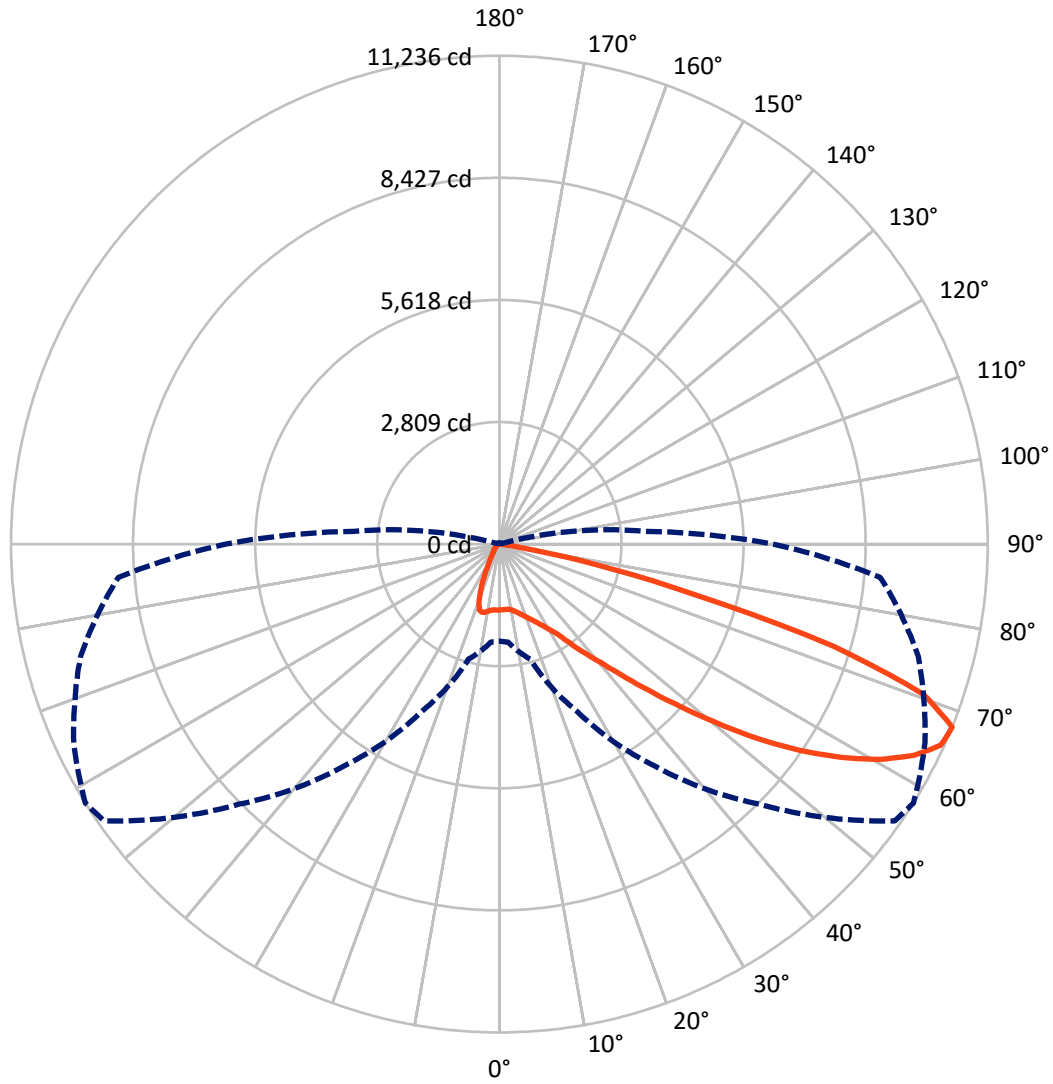
✕ Max cd
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 5.3 fc
 Type III - Short - N/A

REPORT NUMBER: P639983
CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

Luminous Intensity Polar Plot



— Vertical Plane Through 58-Deg Lateral - - - Horizontal Cone Through 67.5-Deg Vertical

REPORT NUMBER: P639983

CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

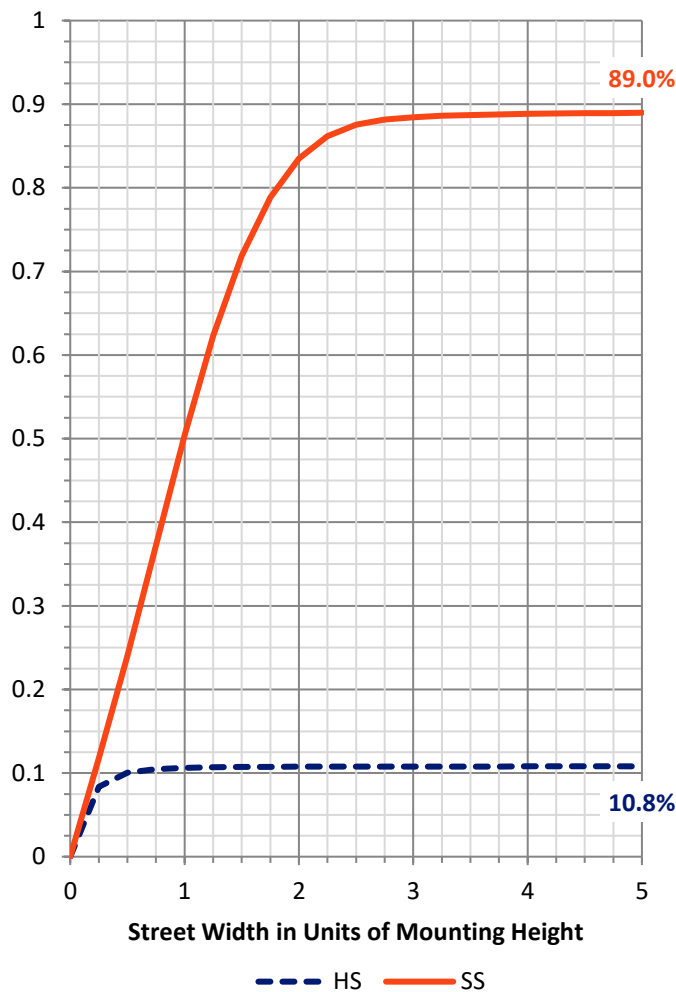
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1515.1	0.0	1515.1
	% Fixture	10.9	0.0	10.9
Street Side	Lumens	12372.3	0.0	12372.3
	% Fixture	89.1	0.0	89.1
Total	Lumens	13887.4	0.0	13887.4
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	142.2	1.0
10°-20°	399.1	2.9
20°-30°	696.7	5.0
30°-40°	1244.2	9.0
40°-50°	2274.2	16.4
50°-60°	3782.3	27.2
60°-70°	4108.2	29.6
70°-80°	1206.2	8.7
80°-90°	34.4	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°	13887.4	100.0
0°-180°	13887.4	100.0

Coefficient of Utilization



REPORT NUMBER: P639983

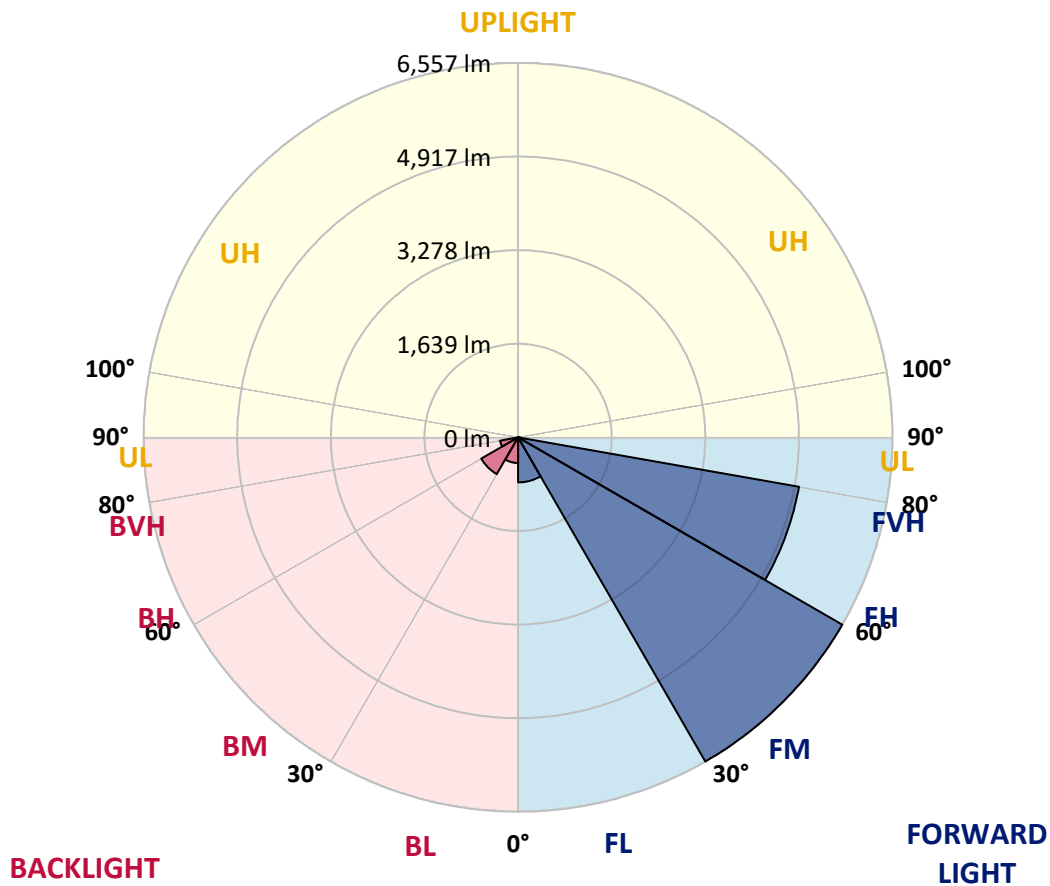
CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	788.6	5.7			
FM (30°-60°)	6556.5	47.2			
FH (60°-80°)	4994.5	36.0			G2/5000
FVH (80°-90°)	32.7	0.2			G1/100
BL (0°-30°)	449.4	3.2	B1/500		
BM (30°-60°)	744.2	5.4	B1/1000		
BH (60°-80°)	319.8	2.3	B1/500		G1/500
BVH (80°-90°)	1.7	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-G2

Type III Short





REPORT NUMBER: P639983

CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	58°	65°	75°	85°
0°	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3
2.5°	1484.8	1482.1	1482.1	1493.0	1494.3	1499.8	1512.0	1513.3	1520.1	1517.4	1507.9
5°	1407.5	1408.9	1417.0	1436.0	1452.3	1472.6	1502.5	1509.2	1524.2	1532.3	1526.9
7.5°	1335.7	1337.0	1349.2	1379.1	1410.3	1450.9	1499.8	1513.3	1543.1	1564.8	1566.2
10°	1308.6	1307.2	1319.4	1353.3	1394.0	1450.9	1521.4	1539.1	1583.8	1621.8	1628.6
12.5°	1316.7	1315.3	1327.5	1358.7	1403.5	1475.3	1559.4	1583.8	1640.8	1699.1	1711.3
15°	1349.2	1347.9	1356.0	1381.8	1430.6	1505.2	1608.2	1644.8	1716.7	1787.2	1806.2
17.5°	1446.9	1440.1	1432.0	1434.7	1463.1	1540.4	1670.6	1715.4	1804.9	1888.9	1905.2
20°	1620.4	1602.8	1581.1	1552.6	1539.1	1592.0	1742.5	1794.0	1902.5	1998.8	2001.5
22.5°	1882.1	1875.4	1825.2	1742.5	1684.2	1685.5	1826.6	1886.2	2019.1	2124.9	2110.0
25°	2246.9	2242.8	2165.6	2030.0	1878.1	1826.6	1933.7	1994.7	2157.4	2270.0	2222.5
27.5°	2699.8	2671.3	2580.5	2397.4	2171.0	2009.6	2069.3	2123.5	2303.9	2409.6	2320.1
30°	3094.4	3095.8	3010.4	2819.2	2564.2	2284.9	2234.7	2282.2	2438.1	2549.3	2440.8
32.5°	3474.1	3486.3	3392.7	3220.5	2941.2	2644.2	2472.0	2480.1	2610.3	2731.0	2599.5
35°	3826.7	3836.2	3771.1	3624.6	3364.3	3019.8	2802.9	2798.8	2869.3	2992.7	2820.5
37.5°	4221.3	4230.8	4167.0	4035.5	3791.4	3449.7	3178.5	3173.1	3201.5	3301.9	3105.3
40°	4641.6	4659.3	4588.8	4477.6	4244.3	3955.5	3615.1	3566.3	3537.8	3655.8	3474.1
42.5°	5067.4	5094.5	5070.1	4958.9	4759.6	4521.0	4181.9	4106.0	4045.0	4192.8	4000.2
45°	5596.3	5628.8	5618.0	5532.5	5378.0	5184.0	4864.0	4775.9	4747.4	4884.4	4655.2
47.5°	6104.8	6140.0	6179.4	6160.4	6050.5	5961.0	5605.8	5555.6	5547.5	5693.9	5338.6
50°	6483.1	6515.6	6666.2	6774.6	6849.2	6830.2	6522.4	6447.8	6435.6	6529.2	6060.0
52.5°	6754.3	6785.5	6993.0	7332.0	7605.9	7755.0	7444.5	7428.2	7361.8	7329.3	6735.3
55°	6964.5	7007.9	7226.2	7738.8	8290.7	8621.5	8427.6	8369.3	8198.5	8011.3	7361.8
57.5°	7006.5	7024.2	7332.0	8023.5	8822.2	9357.9	9357.9	9256.2	8926.6	8667.6	8085.9
60°	6629.6	6683.8	7100.1	8000.5	9050.0	9839.2	10129.4	10058.9	9614.1	9295.5	8782.9
62.5°	5792.9	5853.9	6361.1	7448.6	8822.2	9938.2	10713.9	10703.0	10201.3	9814.8	9360.6
65°	4442.3	4487.1	4929.1	6230.9	7859.5	9557.2	11131.5	11161.4	10665.1	10157.9	9559.9
67.5°	2232.0	2263.2	2740.5	4256.5	6229.5	8460.2	11103.0	11235.9	10806.1	9976.2	8799.2
70°	779.7	810.9	1036.0	1826.6	3791.4	6460.1	10143.0	10359.9	9977.6	8515.8	6491.2
72.5°	267.1	282.1	429.9	678.0	1475.3	3829.4	7713.0	8039.8	7355.0	5717.0	3730.4
75°	151.9	161.4	230.5	367.5	618.3	1259.7	4375.9	4576.5	4287.7	3116.1	1535.0
77.5°	103.1	111.2	143.7	208.8	341.7	405.4	1784.5	2246.9	1959.4	1017.0	391.9
80°	61.0	66.4	88.1	123.4	174.9	157.3	382.4	508.5	655.0	303.7	118.0
82.5°	28.5	32.5	57.0	81.4	88.1	66.4	112.5	137.0	184.4	149.2	48.8
85°	0.0	0.0	19.0	33.9	32.5	19.0	31.2	33.9	50.2	74.6	19.0
87.5°	0.0	0.0	0.0	0.0	0.0	1.4	2.7	4.1	8.1	14.9	8.1
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: P639983

CATALOG NUMBER: GWS-SA5C-830-U-T3-W-HSS

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3	1513.3
2.5°	1518.7	1509.2	1520.1	1514.7	1520.1	1518.7	1507.9	1501.1	1501.1	1488.9	1484.8
5°	1537.7	1528.2	1530.9	1518.7	1516.0	1509.2	1495.7	1490.3	1490.3	1478.1	1474.0
7.5°	1579.8	1564.8	1562.1	1537.7	1526.9	1507.9	1483.5	1474.0	1472.6	1460.4	1456.4
10°	1646.2	1628.6	1616.4	1585.2	1554.0	1516.0	1464.5	1421.1	1396.7	1364.2	1361.4
12.5°	1727.6	1705.9	1686.9	1639.4	1587.9	1502.5	1350.6	1191.9	1094.3	1017.0	1022.4
15°	1818.4	1798.1	1768.2	1696.4	1590.6	1368.2	1050.9	806.8	687.5	623.8	621.1
17.5°	1917.4	1887.6	1838.8	1741.1	1505.2	1045.5	683.4	482.7	420.4	398.7	393.2
20°	2009.6	1973.0	1912.0	1750.6	1258.4	707.8	427.1	374.3	363.4	356.6	356.6
22.5°	2107.2	2061.1	1970.3	1677.4	935.6	452.9	363.4	351.2	343.1	333.6	332.2
25°	2206.2	2146.6	2023.2	1486.2	612.9	356.6	340.4	326.8	311.9	297.0	292.9
27.5°	2290.3	2213.0	2063.9	1201.4	393.2	321.4	310.5	287.5	267.1	250.9	248.2
30°	2390.7	2291.7	2081.5	878.7	309.2	283.4	267.1	242.7	218.3	202.0	196.6
32.5°	2524.9	2416.4	2054.4	572.2	273.9	249.5	223.7	195.3	170.9	153.2	150.5
35°	2733.7	2604.9	1929.6	364.8	248.2	215.6	184.4	154.6	134.2	120.7	118.0
37.5°	2988.7	2869.3	1724.8	273.9	222.4	187.1	150.5	122.0	107.1	97.6	94.9
40°	3367.0	3200.2	1471.3	240.0	196.6	158.7	123.4	100.3	89.5	81.4	78.6
42.5°	3857.9	3590.7	1179.7	218.3	172.2	132.9	100.3	82.7	73.2	67.8	66.4
45°	4431.5	3971.8	871.9	196.6	149.2	109.8	82.7	67.8	61.0	57.0	55.6
47.5°	5018.6	4305.3	602.1	173.6	127.5	90.9	69.2	58.3	52.9	47.5	46.1
50°	5645.1	4587.4	410.9	150.5	108.5	74.6	59.7	52.9	46.1	42.0	40.7
52.5°	6104.8	4691.8	286.1	130.2	92.2	63.7	52.9	47.5	42.0	36.6	35.3
55°	6529.2	4689.1	217.0	109.8	78.6	55.6	47.5	42.0	36.6	32.5	31.2
57.5°	6952.3	4652.5	170.9	93.6	67.8	50.2	42.0	36.6	33.9	28.5	27.1
60°	7226.2	4514.2	132.9	78.6	58.3	43.4	36.6	32.5	28.5	24.4	23.1
62.5°	7371.3	4321.6	101.7	62.4	47.5	38.0	32.5	28.5	24.4	20.3	19.0
65°	7174.7	3979.9	80.0	48.8	36.6	32.5	27.1	23.1	19.0	14.9	13.6
67.5°	6302.8	3356.1	62.4	39.3	28.5	24.4	23.1	19.0	13.6	10.8	9.5
70°	4454.5	2298.4	48.8	29.8	21.7	19.0	17.6	14.9	10.8	8.1	6.8
72.5°	2444.9	1159.4	35.3	21.7	16.3	14.9	13.6	12.2	9.5	6.8	6.8
75°	941.1	318.7	25.8	14.9	10.8	10.8	9.5	9.5	8.1	5.4	5.4
77.5°	245.4	94.9	16.3	9.5	6.8	6.8	6.8	5.4	5.4	4.1	4.1
80°	78.6	31.2	9.5	6.8	5.4	4.1	4.1	2.7	4.1	2.7	2.7
82.5°	25.8	10.8	5.4	5.4	4.1	2.7	2.7	1.4	1.4	0.0	0.0
85°	9.5	5.4	4.1	2.7	2.7	2.7	1.4	0.0	0.0	0.0	0.0
87.5°	5.4	2.7	2.7	2.7	2.7	1.4	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



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.

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
 CIE u': 0.2476
 CIE v': 0.5251
 Duv: 0.0034
 CIE x: 0.4383
 CIE y: 0.4131
 CIE z: 0.1487
 Peak Wavelength (nm): 603
 Dominant Wavelength (nm): 581
 Purity: 55.55201
 Rf: 81.5
 Rg: 99.2

CRI (Ra):	81.0		
R1:	79.6	R9:	7.1
R2:	85.6	R10:	67.0
R3:	92.0	R11:	82.7
R4:	82.6	R12:	63.2
R5:	78.9	R13:	80.3
R6:	81.7	R14:	95.0
R7:	85.2	R15:	71.7
R8:	62.0		



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



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			

Summary

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



Color Vector Graphics



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	



Color Rendition by Hue-Angle Bin



Measure Comparisons



(END OF REPORT)