

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: P642441

Luminaire Tested: GWS-SA6C-830-U-SLL-W-HSS

Issue Date: 1/10/2023

Test Information

Test Method: LM-79-2019
Report Number: P642441
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2209-782-40)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 1/10/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: McGRAW-EDISON
Catalog Number: GWS-SA6C-830-U-SLL-W-HSS
Description: GALLEON WALL SLIM LUMINAIRE. (6) LIGHTSQUARES WITH 16 LEDS EACH AND SPILL LIGHT ELIMINATOR LEFT OPTICS WITH HOUSE SIDE SHIELD
Light Source: (96) 3000K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 13657.2 lumens
Efficiency: N/A
Efficacy: 72.2 lumens/watt
Luminous Opening: Rectangular (W 2' x L: 1' x H: 0')
IES Classification: Type III - Short
BUG Rating: B1 - U0 - G3

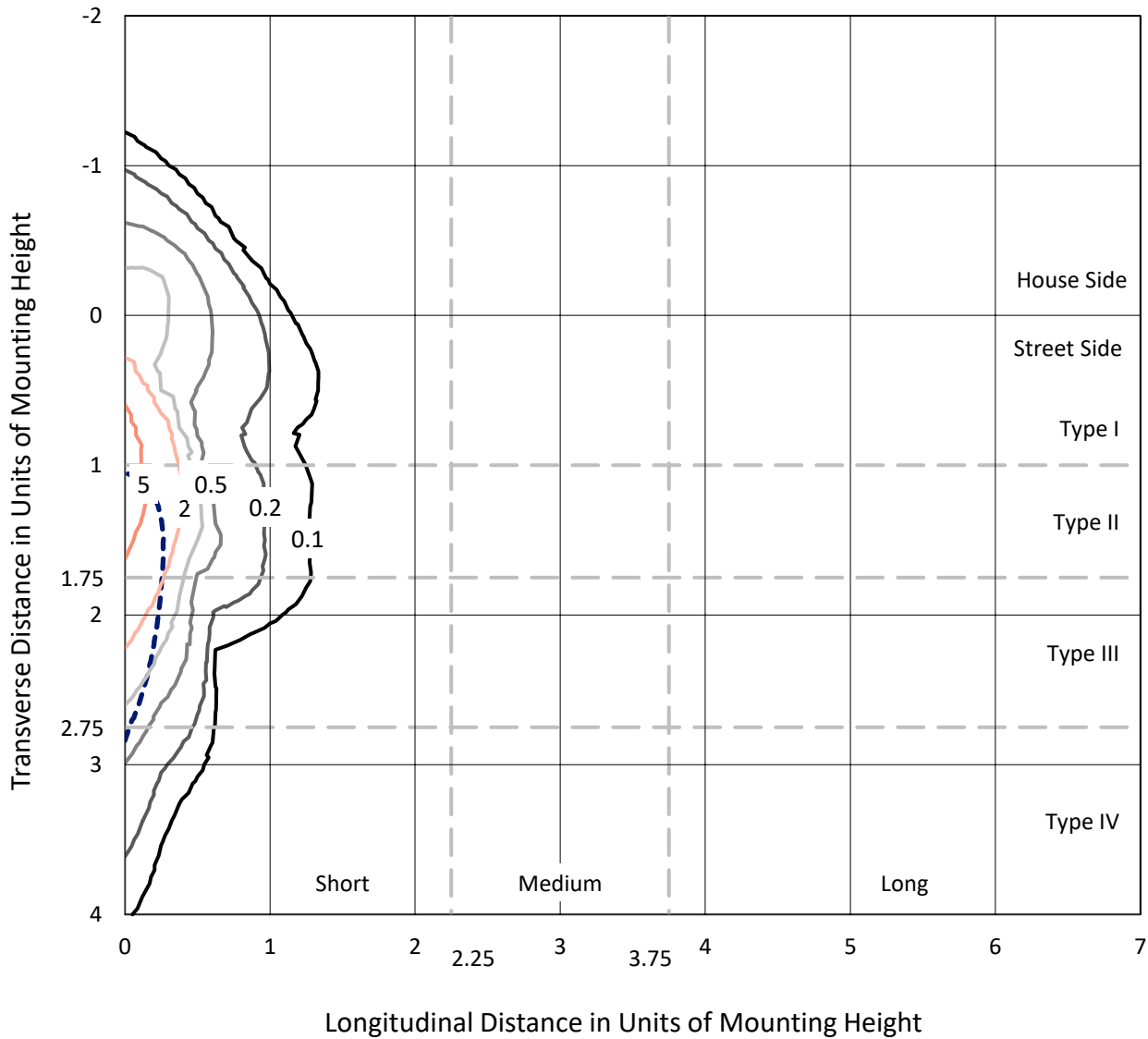
Input Watts (W): 189.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 0
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

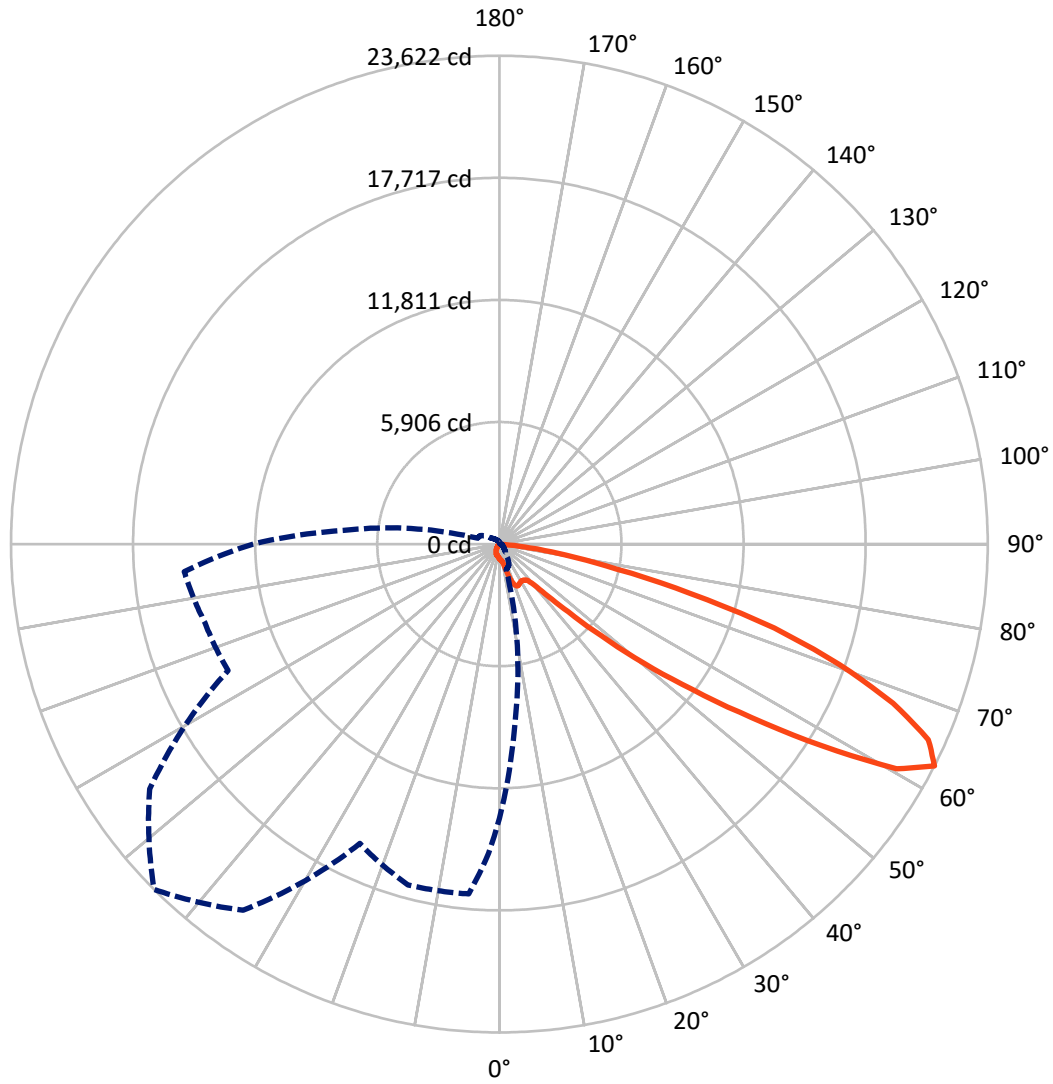
× Max cd
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 6.1 fc
 Type III - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 315-Deg Lateral - - - Horizontal Cone Through 62.5-Deg Vertical

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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1586.8	0.0	1586.8
	% Fixture	11.6	0.0	11.6
Street Side	Lumens	12070.4	0.0	12070.4
	% Fixture	88.4	0.0	88.4
Total	Lumens	13657.2	0.0	13657.2
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	61.2	0.4
10°-20°	209.6	1.5
20°-30°	473.6	3.5
30°-40°	815.9	6.0
40°-50°	1539.1	11.3
50°-60°	3436.3	25.2
60°-70°	4596.0	33.7
70°-80°	2304.7	16.9
80°-90°	220.9	1.6
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°	13657.2	100.0
0°-180°	13657.2	100.0

Coefficient of Utilization



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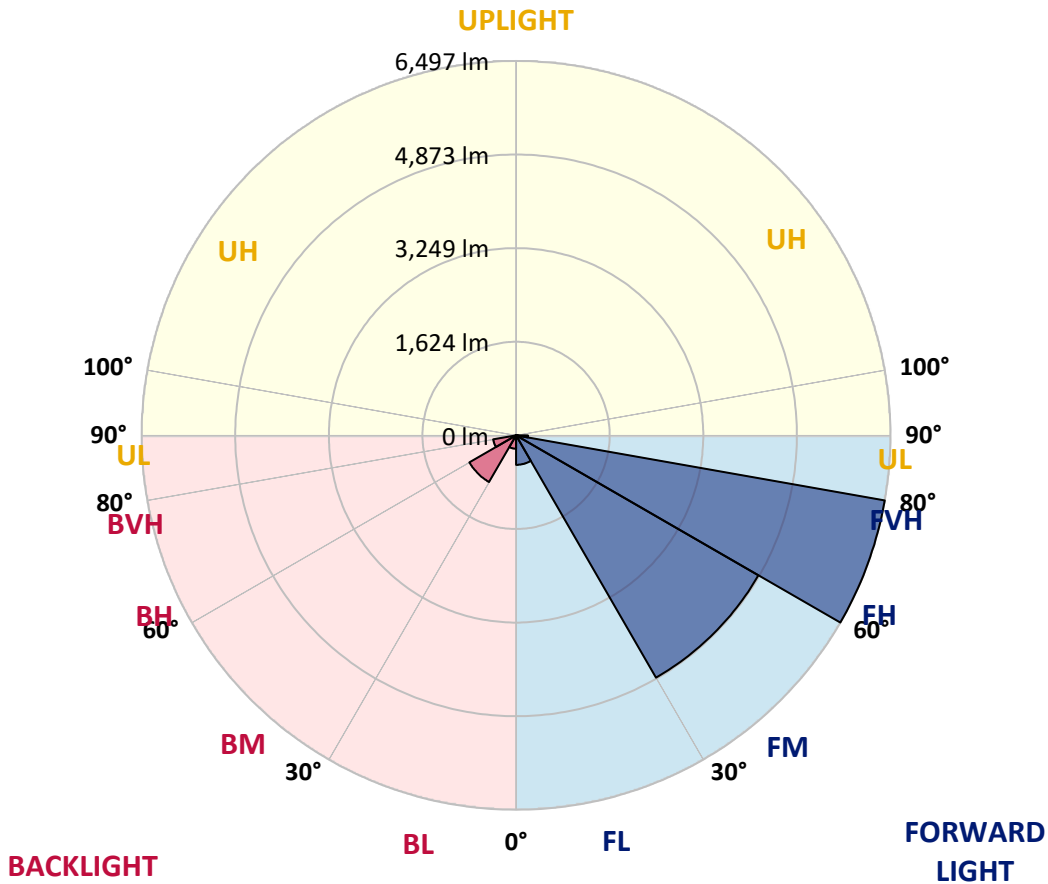
CATALOG NUMBER: GWS-SA6C-830-U-SLL-W-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	511.5	3.7			
FM (30°-60°)	4855.5	35.6			
FH (60°-80°)	6497.2	47.6			G3/7500
FVH (80°-90°)	206.2	1.5			G2/225
BL (0°-30°)	232.9	1.7	B1/500		
BM (30°-60°)	935.7	6.9	B1/1000		
BH (60°-80°)	403.5	3.0	B1/500		G1/500
BVH (80°-90°)	14.7	0.1			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G3

Type III Short





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CANDELA DISTRIBUTION (FULL):

	0°	2°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3
2.5°	700.2	698.6	695.3	685.6	677.6	672.7	663.0	663.0	661.4	658.2	651.7
5°	677.6	671.1	664.6	646.8	627.4	616.1	603.2	601.6	601.6	598.3	596.7
7.5°	642.0	635.5	627.4	598.3	580.5	569.2	557.9	556.3	551.4	551.4	551.4
10°	622.6	612.9	599.9	567.6	549.8	540.1	532.0	527.2	523.9	519.1	517.5
12.5°	664.6	646.8	619.3	561.1	536.9	523.9	514.2	511.0	501.3	494.8	490.0
15°	795.6	751.9	697.0	575.7	532.0	512.6	499.7	493.2	485.1	473.8	465.7
17.5°	1010.7	947.6	855.4	622.6	527.2	502.9	486.7	475.4	464.1	451.2	441.5
20°	1308.2	1214.4	1104.5	708.3	527.2	491.6	472.2	457.6	441.5	426.9	415.6
22.5°	1686.6	1592.8	1405.2	853.8	533.6	477.0	454.4	435.0	415.6	402.7	389.7
25°	2110.3	1977.7	1803.0	1030.1	551.4	457.6	433.4	414.0	396.2	380.0	365.5
27.5°	2582.5	2438.6	2205.7	1280.7	590.2	438.2	410.7	393.0	376.8	360.6	341.2
30°	3017.5	2931.8	2694.1	1581.5	653.3	425.3	393.0	376.8	360.6	339.6	321.8
32.5°	3539.8	3387.8	3192.1	1924.3	737.4	412.4	378.4	355.8	342.8	323.4	304.0
35°	4065.3	3936.0	3678.9	2346.4	831.2	399.4	360.6	339.6	328.3	305.6	284.6
37.5°	4607.1	4578.0	4324.1	2813.7	923.4	384.9	339.6	326.7	315.3	289.5	265.2
40°	5140.7	5087.3	4852.9	3347.4	980.0	368.7	321.8	313.7	300.8	271.7	244.2
42.5°	5651.7	5611.3	5383.3	3858.4	971.9	354.1	304.0	294.3	284.6	255.5	221.5
45°	6279.1	6212.8	5925.0	4236.8	889.4	370.3	286.2	270.1	268.4	240.9	198.9
47.5°	7453.1	7234.8	6746.5	4527.8	806.9	412.4	266.8	247.4	258.7	226.4	176.3
50°	9097.7	8840.6	8133.9	4754.2	805.3	467.3	263.6	226.4	250.6	215.1	156.9
52.5°	10750.4	10297.6	9438.9	4875.5	865.1	507.8	292.7	205.4	240.9	203.8	142.3
55°	12333.5	11394.0	9985.5	4474.5	912.0	551.4	346.1	194.0	223.2	190.8	134.2
57.5°	13842.2	12275.3	10223.2	3539.8	1068.9	569.2	378.4	198.9	197.3	174.6	127.7
60°	14049.2	12233.2	9742.9	2058.5	1178.9	538.5	365.5	221.5	173.0	155.2	116.4
62.5°	13266.5	11419.8	8648.2	1284.0	1094.8	527.2	325.0	252.3	156.9	137.5	101.9
65°	12078.0	10144.0	7210.6	827.9	829.6	585.4	284.6	247.4	147.2	121.3	87.3
67.5°	10220.0	8489.7	5680.8	554.7	469.0	499.7	249.0	169.8	143.9	103.5	67.9
70°	7459.6	6043.0	3698.3	370.3	279.8	399.4	208.6	121.3	135.8	85.7	48.5
72.5°	5452.8	4060.5	2065.0	242.6	158.5	232.9	153.6	87.3	105.1	63.1	34.0
75°	3924.7	2794.3	1178.9	155.2	105.1	127.7	100.3	59.8	67.9	50.1	30.7
77.5°	1888.8	1361.6	535.3	85.7	71.2	64.7	53.4	37.2	42.0	45.3	27.5
80°	71.2	53.4	40.4	42.0	45.3	29.1	24.3	19.4	24.3	30.7	14.6
82.5°	0.0	0.0	0.0	4.9	6.5	8.1	9.7	8.1	9.7	11.3	1.6
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°	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3
2.5°	656.5	653.3	656.5	659.8	663.0	666.2	661.4	664.6	667.9	659.8	663.0
5°	604.8	603.2	612.9	617.7	624.2	627.4	624.2	624.2	622.6	612.9	612.9
7.5°	559.5	561.1	569.2	580.5	588.6	593.5	590.2	588.6	583.8	569.2	569.2
10°	525.6	525.6	538.5	548.2	559.5	564.4	561.1	556.3	551.4	536.9	535.3
12.5°	498.1	498.1	507.8	523.9	536.9	543.3	541.7	535.3	527.2	512.6	511.0
15°	472.2	470.6	485.1	499.7	517.5	525.6	522.3	517.5	502.9	490.0	486.7
17.5°	446.3	444.7	457.6	477.0	496.4	507.8	506.1	494.8	481.9	465.7	462.5
20°	420.4	417.2	433.4	452.8	472.2	483.5	480.3	470.6	454.4	438.2	435.0
22.5°	394.6	393.0	404.3	420.4	438.2	447.9	446.3	438.2	422.1	407.5	407.5
25°	365.5	365.5	373.5	384.9	397.8	402.7	404.3	401.0	391.3	383.2	383.2
27.5°	341.2	336.4	339.6	342.8	349.3	357.4	357.4	360.6	362.2	359.0	360.6
30°	321.8	313.7	308.9	302.4	299.2	302.4	305.6	316.9	328.3	334.7	338.0
32.5°	299.2	289.5	276.5	258.7	247.4	244.2	253.9	274.9	295.9	310.5	318.6
35°	276.5	263.6	239.3	213.5	198.9	194.0	205.4	229.6	260.4	286.2	297.5
37.5°	253.9	236.1	202.1	171.4	155.2	152.0	163.3	189.2	224.8	260.4	274.9
40°	228.0	207.0	166.6	134.2	121.3	118.0	127.7	153.6	190.8	231.2	253.9
42.5°	202.1	176.3	134.2	106.7	93.8	93.8	106.7	126.1	160.1	203.8	231.2
45°	176.3	148.8	110.0	85.7	77.6	79.2	87.3	106.7	134.2	179.5	205.4
47.5°	152.0	127.7	90.6	71.2	64.7	66.3	76.0	92.2	114.8	155.2	182.7
50°	131.0	108.3	79.2	59.8	55.0	58.2	67.9	82.5	101.9	137.5	160.1
52.5°	118.0	97.0	72.8	51.7	48.5	51.7	61.4	74.4	92.2	121.3	143.9
55°	111.6	95.4	72.8	46.9	42.0	45.3	55.0	67.9	82.5	110.0	129.4
57.5°	110.0	98.6	77.6	42.0	35.6	38.8	48.5	61.4	76.0	100.3	116.4
60°	103.5	93.8	76.0	34.0	27.5	32.3	40.4	53.4	69.5	93.8	108.3
62.5°	90.6	82.5	66.3	27.5	21.0	24.3	34.0	46.9	63.1	85.7	101.9
65°	74.4	66.3	51.7	17.8	12.9	16.2	25.9	40.4	55.0	77.6	92.2
67.5°	55.0	46.9	35.6	11.3	6.5	11.3	21.0	34.0	50.1	69.5	84.1
70°	34.0	27.5	19.4	6.5	4.9	9.7	19.4	32.3	45.3	64.7	79.2
72.5°	19.4	12.9	8.1	3.2	4.9	9.7	19.4	32.3	43.7	61.4	74.4
75°	14.6	8.1	3.2	1.6	3.2	8.1	17.8	29.1	42.0	58.2	71.2
77.5°	9.7	4.9	1.6	0.0	1.6	6.5	16.2	27.5	38.8	55.0	67.9
80°	1.6	0.0	0.0	0.0	0.0	4.9	14.6	24.3	35.6	48.5	59.8
82.5°	0.0	0.0	0.0	0.0	0.0	1.6	11.3	21.0	30.7	40.4	48.5
85°	0.0	0.0	0.0	0.0	0.0	0.0	6.5	16.2	24.3	30.7	34.0
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	8.1	16.2	19.4	22.6
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°	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3
2.5°	661.4	671.1	671.1	677.6	685.6	700.2	708.3	719.6	727.7	735.8	739.0
5°	611.3	612.9	614.5	617.7	627.4	643.6	658.2	675.9	697.0	713.1	722.8
7.5°	569.2	569.2	569.2	574.1	583.8	595.1	609.6	633.9	658.2	677.6	693.7
10°	533.6	538.5	540.1	548.2	559.5	574.1	590.2	611.3	638.7	664.6	693.7
12.5°	511.0	515.8	523.9	532.0	543.3	559.5	577.3	604.8	661.4	714.8	776.2
15°	490.0	496.4	506.1	517.5	530.4	548.2	567.6	624.2	756.8	857.1	954.1
17.5°	467.3	477.0	490.0	501.3	517.5	536.9	561.1	671.1	931.4	1098.0	1262.9
20°	438.2	451.2	465.7	483.5	502.9	525.6	561.1	768.1	1183.7	1423.0	1641.3
22.5°	410.7	423.7	441.5	464.1	486.7	509.4	569.2	915.3	1508.7	1811.1	2087.7
25°	388.1	404.3	422.1	441.5	467.3	493.2	588.6	1122.3	1900.1	2289.8	2485.5
27.5°	367.1	386.5	404.3	420.4	443.1	472.2	632.3	1398.8	2362.6	2758.7	2912.4
30°	346.1	368.7	386.5	402.7	425.3	456.0	698.6	1751.3	2876.8	3261.7	3277.8
32.5°	328.3	349.3	370.3	386.5	407.5	443.1	790.8	2163.7	3404.0	3775.9	3623.9
35°	308.9	333.1	352.5	370.3	393.0	431.8	897.5	2608.4	3936.0	4248.1	3968.3
37.5°	289.5	316.9	341.2	354.1	376.8	420.4	975.1	3072.5	4479.3	4708.9	4270.7
40°	271.7	302.4	329.9	342.8	354.1	405.9	986.4	3547.9	5030.7	5163.3	4555.3
42.5°	252.3	286.2	310.5	328.3	338.0	396.2	918.5	3948.9	5493.2	5616.1	4927.2
45°	231.2	271.7	291.1	304.0	323.4	402.7	831.2	4259.4	6022.0	6233.9	5540.1
47.5°	210.2	255.5	271.7	281.4	307.2	441.5	798.8	4466.4	6893.6	7333.5	6573.4
50°	190.8	240.9	258.7	257.1	304.0	491.6	834.4	4623.2	8203.5	8720.9	7990.0
52.5°	169.8	224.8	245.8	239.3	328.3	530.4	905.6	4747.8	9210.9	10347.7	9893.3
55°	152.0	207.0	226.4	224.8	373.5	559.5	960.5	4091.2	9628.1	11859.7	12037.6
57.5°	139.1	187.6	203.8	231.2	402.7	559.5	1110.9	2904.3	9636.2	12972.2	14883.6
60°	127.7	169.8	181.1	253.9	391.3	530.4	1099.6	1778.8	8881.0	12896.2	16397.2
62.5°	118.0	153.6	168.2	260.4	346.1	525.6	992.9	1102.9	7574.4	11914.7	15299.2
65°	110.0	140.7	161.7	239.3	313.7	562.7	669.5	792.4	6143.3	10795.6	14039.5
67.5°	101.9	129.4	171.4	195.7	284.6	502.9	483.5	562.7	4822.1	9568.3	12883.3
70°	95.4	122.9	181.1	160.1	249.0	393.0	342.8	426.9	3691.8	7983.5	11254.9
72.5°	90.6	114.8	152.0	126.1	202.1	304.0	239.3	310.5	2412.7	6232.2	9175.3
75°	85.7	105.1	111.6	101.9	150.4	198.9	181.1	208.6	1437.6	4555.3	6961.5
77.5°	84.1	98.6	90.6	82.5	101.9	118.0	137.5	140.7	701.8	2278.5	3648.1
80°	74.4	88.9	77.6	67.9	69.5	77.6	101.9	93.8	160.1	578.9	973.5
82.5°	58.2	69.5	64.7	56.6	56.6	56.6	67.9	63.1	51.7	260.4	439.8
85°	40.4	48.5	48.5	45.3	43.7	43.7	42.0	40.4	14.6	16.2	24.3
87.5°	27.5	34.0	35.6	34.0	29.1	25.9	22.6	19.4	6.5	0.0	3.2
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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CANDELA DISTRIBUTION (continued):

	285°	295°	305°	315°	325°	335°	345°	355°	358°	360°
0°	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3	708.3
2.5°	750.3	755.2	755.2	748.7	743.9	730.9	718.0	705.0	701.8	700.2
5°	750.3	769.7	779.4	777.8	766.5	745.5	718.0	688.9	680.8	677.6
7.5°	739.0	776.2	805.3	810.2	789.1	751.9	701.8	658.2	646.8	642.0
10°	764.9	837.6	895.9	903.9	879.7	806.9	726.1	651.7	633.9	622.6
12.5°	903.9	1023.6	1094.8	1128.7	1081.8	989.7	855.4	722.8	682.4	664.6
15°	1185.3	1355.1	1490.9	1490.9	1447.3	1284.0	1114.2	899.1	844.1	795.6
17.5°	1545.9	1759.4	1879.0	1866.1	1799.8	1685.0	1481.2	1172.4	1060.8	1010.7
20°	1956.7	2084.4	2111.9	2103.8	2074.7	2008.4	1867.7	1536.2	1385.8	1308.2
22.5°	2312.4	2278.5	2238.0	2205.7	2197.6	2217.0	2197.6	1942.1	1824.1	1686.6
25°	2553.4	2360.9	2239.7	2181.4	2208.9	2320.5	2441.8	2346.4	2252.6	2110.3
27.5°	2684.4	2351.2	2176.6	2116.8	2163.7	2322.1	2585.7	2747.4	2650.4	2582.5
30°	2755.5	2343.2	2136.2	2078.0	2149.1	2348.0	2686.0	3122.6	3125.8	3017.5
32.5°	2857.4	2394.9	2144.3	2090.9	2186.3	2425.6	2812.1	3504.2	3598.0	3539.8
35°	2972.2	2474.1	2181.4	2132.9	2251.0	2529.1	2952.8	3889.1	4084.7	4065.3
37.5°	3080.5	2563.1	2268.8	2221.9	2349.6	2618.1	3088.6	4267.5	4539.1	4607.1
40°	3193.7	2687.6	2537.2	2582.5	2653.6	2758.7	3209.9	4595.7	5038.8	5140.7
42.5°	3460.6	3119.4	3349.0	3434.7	3444.4	3227.7	3475.1	5016.2	5530.4	5651.7
45°	4055.6	3887.5	4545.6	4666.9	4603.8	3947.3	4113.9	5622.6	6217.7	6279.1
47.5°	4807.6	4885.2	6183.7	6602.5	6224.1	4796.3	4888.4	6898.5	7475.8	7453.1
50°	5684.0	6051.1	8043.4	9031.4	8125.8	5899.1	5781.1	8467.0	9167.2	9097.7
52.5°	6720.6	7406.2	10278.2	11681.8	10824.7	7139.4	7090.9	10545.0	10971.9	10750.4
55°	8025.6	8714.5	12849.3	14810.9	13591.6	8653.0	8819.6	12954.4	13036.9	12333.5
57.5°	9972.5	10420.5	15879.7	18399.2	16479.7	10709.9	11917.9	16161.1	15174.7	13842.2
60°	13507.5	12614.9	18808.3	22069.9	19552.1	13602.9	16004.3	18061.2	15886.2	14049.2
62.5°	14738.1	14477.7	20642.1	23622.3	21618.8	15978.4	17066.7	16984.2	14964.5	13266.5
65°	12873.6	14013.6	20313.8	22802.5	21353.6	15587.1	15315.4	15795.7	13926.3	12078.0
67.5°	11892.0	12923.7	19070.3	20540.2	19883.6	14259.4	13651.4	13520.4	11691.5	10220.0
70°	10902.4	11924.4	17267.2	17449.9	17144.3	12095.8	11296.9	10418.9	8738.7	7459.6
72.5°	9712.2	10274.9	14765.6	13898.8	13552.8	9500.4	9332.2	7846.1	6550.8	5452.8
75°	8470.3	8307.0	11512.0	9539.2	9797.9	7391.7	7881.7	5761.7	4799.5	3924.7
77.5°	6161.1	6039.8	7710.2	5794.0	6416.6	4841.5	4350.0	2299.5	2189.5	1888.8
80°	3437.9	4144.6	4164.0	3247.1	4050.8	3156.5	1088.3	76.0	48.5	71.2
82.5°	1597.7	1782.0	2257.4	1505.5	2310.8	1563.7	224.8	0.0	0.0	0.0
85°	517.5	756.8	633.9	221.5	559.5	528.8	37.2	0.0	0.0	0.0
87.5°	30.7	63.1	16.2	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.

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

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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 3000K 4-step quadrangle

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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

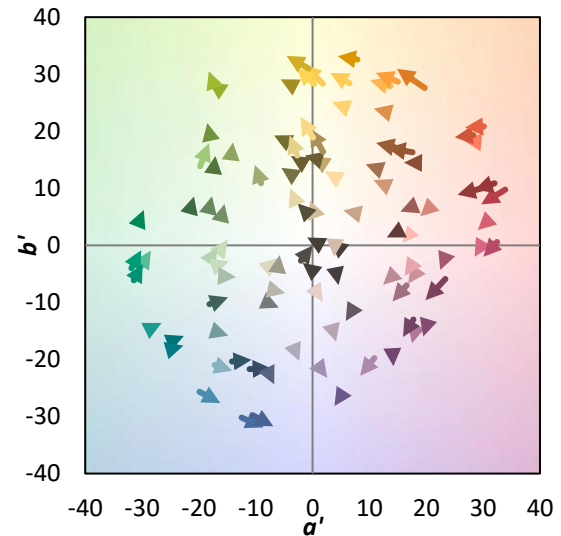
λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)	λ (nm)	Power W [^] /nm	Lumens (φ/nm)
360	0	NR	490	168	NR	620	940	NR	750	35	NR	880	1	NR
365	0	NR	495	233	NR	625	897	NR	755	30	NR	885	1	NR
370	0	NR	500	300	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			

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)