

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: CORELITE

Report Number: P521763

Luminaire Tested: SQ4-WB-050U-050D-92765-1D-UNV-STD-W-4_6500K

Issue Date: 5-5-2021

Test Information

Test Method: LM-79-2019
Report Number: P521763
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-51, G2-2009-966-13)
Test Lab: INNOVATION CENTER
Issue Date: 5-5-2021
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-WB-050U-050D-92765-1D-UNV-STD-W-4_6500K
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH WHITE BAFFLE
DOWNLIGHT 500 LUMENS PER FOOT
UPLIGHT 500 LUMENS PER FOOT
Light Source: 2700K-6500K CCT, 90 CRI LEDS, TUNED TO 6500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4205.1 lumens
Efficiency: N/A
Efficacy: 116.2 lumens/watt
Spacing Criteria (0/90/45): 0.89 / 1 / 1.02
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: General Diffuse

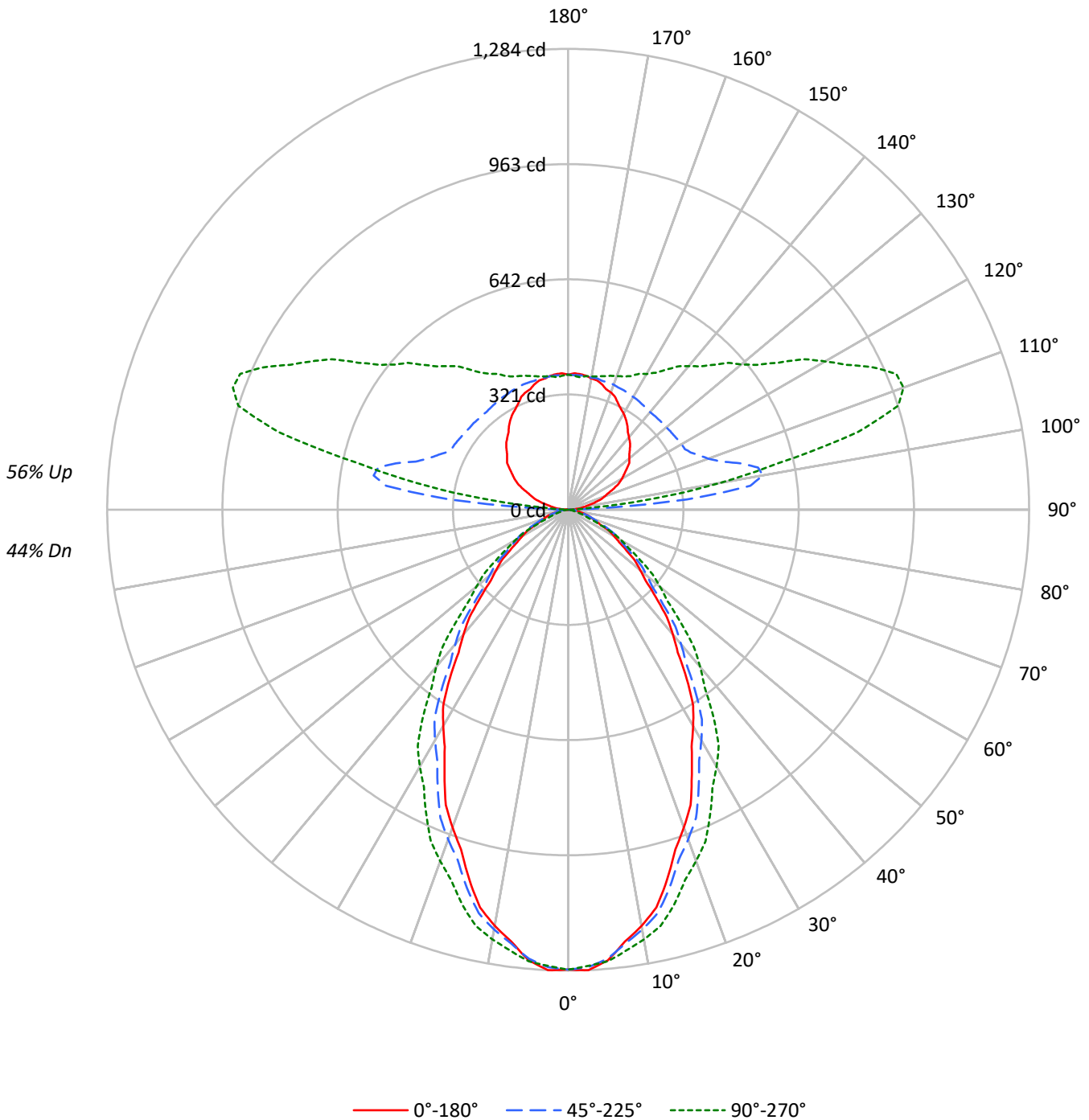
Input Watts (W): 36.2
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Luminous Intensity Polar Plot



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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20			
RC	80				70				50				30				10	0		
RW	70	50	30	10	70	50	30	10	50	30	10		50	30	10		50	30	10	0
RCR																				
0	106	106	106	106	97	97	97	97	80	80	80		65	65	65		51	51	51	44
1	98	94	90	87	89	86	83	80	72	70	68		59	57	56		47	46	45	39
2	90	83	77	73	82	76	72	68	64	61	58		53	50	48		42	41	40	35
3	82	74	67	62	76	68	62	58	58	53	50		48	45	42		38	37	35	31
4	76	66	59	53	70	61	55	50	52	47	44		43	40	37		35	33	31	27
5	70	59	52	46	64	55	49	44	47	42	38		39	36	33		32	30	28	25
6	65	54	46	41	60	50	43	39	43	38	34		36	32	29		30	27	25	22
7	60	49	42	36	55	46	39	34	39	34	30		33	29	27		27	25	23	20
8	56	45	37	32	52	42	35	31	36	31	27		31	27	24		25	23	21	18
9	53	41	34	29	48	38	32	28	33	28	25		28	25	22		24	21	19	17
10	49	38	31	27	45	35	29	25	31	26	23		26	23	20		22	19	18	16

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11822	11822	11822
5°	11674	11632	11700
10°	11030	11130	11387
15°	10182	10418	10885
20°	9246	9593	10229
25°	8293	8746	9529
30°	7415	7901	8804
35°	6484	6953	7947
40°	5457	5891	6880
45°	4504	4893	5744
50°	3761	4099	4785
55°	3193	3518	3952
60°	2729	3050	3154
65°	2172	2565	2037
70°	1926	2002	1244
75°	1782	1622	763
80°	1642	1493	659
85°	1493	1366	540

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 5744 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	117.5	2.8
10°-20°	305.7	7.3
20°-30°	395.9	9.4
30°-40°	387.7	9.2
40°-50°	296.8	7.1
50°-60°	197.8	4.7
60°-70°	107.9	2.6
70°-80°	45.0	1.1
80°-90°	12.7	0.3
90°-100°	171.5	4.1
100°-110°	488.0	11.6
110°-120°	467.6	11.1
120°-130°	370.1	8.8
130°-140°	297.0	7.1
140°-150°	232.5	5.5
150°-160°	170.1	4.0
160°-170°	105.4	2.5
170°-180°	35.8	0.9
0°-30°	819.2	19.5
0°-40°	1206.9	28.7
0°-60°	1701.4	40.5
0°-90°	1867.1	44.4
90°-120°	1127.1	26.8
90°-150°	2026.7	48.2
90°-180°	2338.0	55.6
0°-180°	4205.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1281	1281	1281	1281	1281	
5°	1260	1248	1256	1259	1263	117
15°	1066	1062	1091	1120	1140	298
25°	815	817	859	896	936	375
35°	576	578	617	659	706	358
45°	345	352	375	403	440	269
55°	198	207	219	227	246	180
65°	100	108	118	103	93	103
75°	50	50	46	31	21	53
85°	14	14	13	8	5	15
90°	0	0	0	0	0	1
95°	19	74	332	115	71	21
105°	76	115	497	878	835	80
115°	141	170	377	799	938	139
125°	199	221	360	597	714	178
135°	243	264	356	504	570	188
145°	287	302	358	437	476	179
155°	328	335	367	395	411	151
165°	362	364	371	379	385	102
175°	379	377	376	374	371	36
180°	376	376	376	376	376	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1281.3	1281.3	1281.3	1281.3	1281.3
2.5°	1284.4	1273.0	1275.9	1275.8	1272.3
5°	1260.5	1247.8	1256.0	1258.9	1263.3
7.5°	1213.7	1204.1	1219.0	1230.0	1238.9
10°	1177.3	1169.0	1188.0	1204.0	1215.5
12.5°	1135.0	1128.1	1151.5	1173.0	1188.1
15°	1066.0	1062.1	1090.7	1120.4	1139.6
17.5°	992.1	990.2	1023.0	1057.6	1082.3
20°	941.7	941.2	977.1	1013.2	1041.8
22.5°	890.9	892.1	929.9	967.4	999.9
25°	814.6	816.8	859.1	896.5	936.1
27.5°	744.1	745.1	788.8	828.3	870.5
30°	696.0	698.8	741.6	782.5	826.4
32.5°	647.9	651.1	693.0	735.3	780.1
35°	575.7	578.5	617.3	658.8	705.6
37.5°	501.3	505.0	539.5	578.8	624.7
40°	453.1	458.6	489.1	526.1	571.2
42.5°	406.8	413.6	441.9	477.0	517.7
45°	345.2	351.8	375.0	403.4	440.2
47.5°	292.1	299.7	317.5	342.0	373.4
50°	262.0	269.1	285.6	303.7	333.4
52.5°	235.5	242.6	257.3	271.2	296.5
55°	198.5	206.7	218.7	227.0	245.7
57.5°	168.1	176.0	185.5	189.3	200.6
60°	147.9	156.7	165.3	164.9	170.9
62.5°	129.4	136.9	145.5	139.5	139.9
65°	99.5	107.8	117.5	102.7	93.3
67.5°	80.4	82.2	92.2	71.6	60.5
70°	71.4	71.4	74.2	55.4	46.1
72.5°	62.9	62.9	60.3	45.1	35.3
75°	50.0	50.0	45.5	31.3	21.4
77.5°	38.6	38.1	34.9	23.3	15.5
80°	30.9	30.9	28.1	18.4	12.4
82.5°	24.2	24.2	21.8	14.4	9.2
85°	14.1	14.1	12.9	8.4	5.1
87.5°	4.9	4.9	4.5	2.7	2.2
90°	0.0	0.0	0.0	0.0	0.0
92.5°	5.7	30.4	70.4	20.5	15.5
95°	18.6	73.9	332.0	114.9	70.8
97.5°	34.2	86.5	511.3	365.9	250.7
100°	45.1	94.1	550.3	557.4	429.3
102.5°	57.1	102.2	541.7	713.5	601.6
105°	75.8	115.0	497.3	878.4	835.1
107.5°	94.9	130.0	445.5	925.0	963.6
110°	108.1	140.9	415.7	907.2	993.9

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	120.6	151.8	395.7	865.1	988.8
115°	141.0	170.4	377.1	798.9	938.1
117.5°	158.9	186.4	366.1	726.5	874.0
120°	173.2	196.3	364.9	685.1	826.5
122.5°	184.6	207.7	362.1	648.9	780.1
125°	198.9	220.6	359.9	597.3	714.1
127.5°	214.5	234.8	358.8	566.5	662.8
130°	222.5	242.8	357.1	545.0	629.0
132.5°	231.1	250.9	357.1	528.3	605.5
135°	243.3	263.6	355.6	504.5	570.3
137.5°	254.7	274.5	355.5	484.4	541.3
140°	263.3	283.6	354.9	467.8	522.4
142.5°	273.1	290.0	356.6	454.5	503.5
145°	286.9	301.6	358.5	436.7	475.8
147.5°	298.8	313.1	361.6	418.7	452.5
150°	309.1	318.9	362.8	412.7	436.5
152.5°	317.1	327.5	363.9	404.7	426.8
155°	327.7	335.4	367.1	394.6	410.7
157.5°	340.9	345.5	367.8	390.1	401.6
160°	347.8	351.3	370.7	386.6	396.4
162.5°	351.8	355.8	371.2	383.7	391.3
165°	362.1	363.5	371.4	379.4	385.0
167.5°	369.1	367.8	374.7	378.3	380.5
170°	371.4	370.7	373.5	374.3	377.1
172.5°	376.5	374.2	375.2	373.1	375.4
175°	379.2	377.1	375.7	373.5	370.7
177.5°	380.4	377.0	375.2	373.0	373.5
180°	376.4	376.4	376.4	376.4	376.4

(END OF REPORT)