

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

(formerly Eaton)

Brand: CORELITE

Report Number: P564266

Luminaire Tested: **SQ4-PR1-100U-075D-840-1D-UNV-STD-W-4**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P564266
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-23, G2-2106-289-4)
Test Lab: INNOVATION CENTER
Issue Date: 7/30/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-PR1-100U-075D-840-1D-UNV-STD-W-4
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.
DOWNLIGHT 750 LUMENS PER FOOT
UPLIGHT 1000 LUMENS PER FOOT
Light Source: 4000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

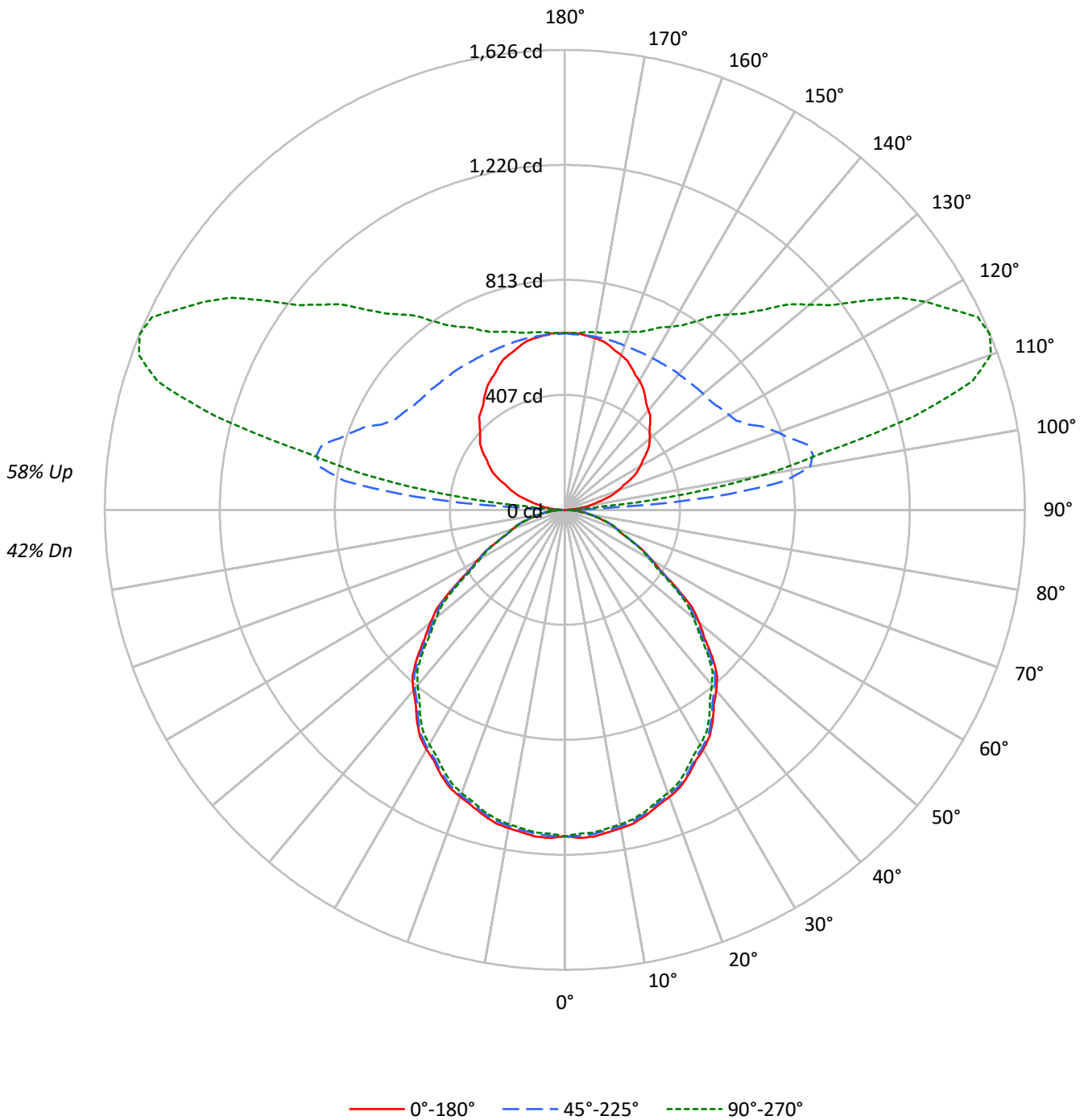
Lumens per Lamp: N/A
Luminaire Lumens: 6942.9 lumens
Efficiency: N/A
Efficacy: 141.4 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 49.1
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	105	105	105	105	96	96	96	96	79	79	79	63	63	63	48	48	48	42
1	96	92	88	85	88	84	81	78	69	67	65	56	54	53	43	42	41	35
2	88	81	75	70	80	74	69	64	61	57	54	49	47	44	38	37	35	30
3	80	71	64	58	73	65	59	54	54	49	46	44	40	38	34	32	30	26
4	73	63	55	49	67	58	51	46	48	43	39	39	35	33	31	28	26	22
5	67	56	48	42	61	52	45	39	43	38	34	35	31	28	28	25	23	19
6	62	50	42	37	56	46	39	34	39	33	29	32	28	25	25	22	20	17
7	57	45	38	32	52	42	35	30	35	30	26	29	25	22	23	20	18	15
8	53	41	34	28	48	38	31	27	32	27	23	26	22	20	21	18	16	14
9	49	38	30	25	45	35	28	24	29	24	21	24	20	18	19	17	15	12
10	46	34	27	23	42	32	25	21	27	22	19	22	19	16	18	15	13	11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10647	10647	10647
5°	10743	10660	10604
10°	10709	10634	10578
15°	10662	10596	10538
20°	10608	10540	10461
25°	10533	10463	10341
30°	10420	10346	10198
35°	10266	10176	10031
40°	10031	9924	9745
45°	9623	9454	9260
50°	8902	8688	8517
55°	7771	7594	7435
60°	6547	6493	6364
65°	5663	5685	5641
70°	5201	5228	5228
75°	4994	4994	5030
80°	4702	4755	4702
85°	3790	4213	4213



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	109.1	1.6
10°-20°	312.2	4.5
20°-30°	470.9	6.8
30°-40°	561.1	8.1
40°-50°	553.2	8.0
50°-60°	422.8	6.1
60°-70°	261.6	3.8
70°-80°	148.6	2.1
80°-90°	46.5	0.7
90°-100°	292.4	4.2
100°-110°	807.2	11.6
110°-120°	832.5	12.0
120°-130°	669.0	9.6
130°-140°	525.7	7.6
140°-150°	403.2	5.8
150°-160°	289.8	4.2
160°-170°	177.2	2.6
170°-180°	59.8	0.9
0°-30°	892.3	12.9
0°-40°	1453.4	20.9
0°-60°	2429.4	35.0
0°-90°	2886.1	41.6
90°-120°	1932.1	27.8
90°-150°	3530.0	50.8
90°-180°	4057.0	58.4
0°-180°	6942.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1154	1154	1154	1154	1154	
5°	1160	1147	1151	1147	1145	110
15°	1116	1105	1109	1105	1103	315
25°	1035	1022	1028	1017	1016	476
35°	912	901	904	892	891	569
45°	738	728	725	712	710	565
55°	483	475	472	464	462	433
65°	259	258	260	258	258	263
75°	140	140	140	141	141	148
85°	36	38	40	40	40	42
90°	2	4	8	9	10	4
95°	43	158	530	218	142	46
105°	144	222	888	1356	1277	153
115°	258	312	715	1416	1610	253
125°	354	402	648	1097	1288	315
135°	426	472	630	889	1002	329
145°	494	528	622	756	814	309
155°	556	575	617	679	700	256
165°	602	610	620	644	649	170
175°	624	625	621	630	628	59
180°	624	624	624	624	624	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1154.0	1154.0	1154.0	1154.0	1154.0
2.5°	1161.1	1151.0	1154.0	1151.5	1146.0
5°	1160.0	1147.3	1151.0	1147.0	1145.0
7.5°	1151.0	1138.6	1142.3	1138.3	1137.1
10°	1143.1	1131.4	1135.1	1131.1	1129.1
12.5°	1134.3	1121.9	1126.4	1121.5	1119.6
15°	1116.2	1104.6	1109.3	1105.2	1103.3
17.5°	1096.3	1083.9	1088.6	1084.0	1081.4
20°	1080.4	1068.8	1073.5	1066.5	1065.5
22.5°	1062.9	1051.3	1056.0	1046.6	1046.4
25°	1034.7	1022.1	1027.8	1016.8	1015.8
27.5°	1001.1	989.5	994.2	983.0	981.8
30°	978.1	966.4	971.1	959.1	957.2
32.5°	951.8	940.9	944.9	932.9	931.7
35°	911.5	900.8	903.5	891.6	890.6
37.5°	865.5	855.8	857.4	844.2	843.3
40°	832.9	823.2	824.0	810.1	809.1
42.5°	797.2	787.4	786.6	772.7	771.7
45°	737.5	727.8	724.6	711.6	709.7
47.5°	669.5	659.8	653.8	643.3	641.9
50°	620.2	610.5	605.3	596.3	593.4
52.5°	567.0	557.2	552.8	544.6	541.7
55°	483.1	475.3	472.1	464.1	462.2
57.5°	403.3	398.1	397.2	389.4	388.6
60°	354.8	351.9	351.9	344.9	344.9
62.5°	313.5	311.4	312.9	308.3	307.5
65°	259.4	257.5	260.4	258.4	258.4
67.5°	216.7	216.7	218.5	217.7	217.7
70°	192.8	192.8	193.8	193.8	193.8
72.5°	171.4	170.6	173.1	173.1	172.4
75°	140.1	140.1	140.1	141.1	141.1
77.5°	109.1	109.3	110.1	109.9	109.1
80°	88.5	89.4	89.5	88.5	88.5
82.5°	67.8	68.8	68.8	68.6	67.8
85°	35.8	37.7	39.8	39.8	39.8
87.5°	10.7	14.2	17.5	17.7	17.1
90°	2.0	4.0	8.0	9.0	10.0
92.5°	18.0	74.6	133.5	48.7	38.0
95°	43.0	158.2	530.5	218.0	141.9
97.5°	71.1	177.2	785.8	605.0	438.1
100°	91.9	188.6	880.1	886.3	720.3
102.5°	111.9	201.6	898.5	1095.1	937.6
105°	143.9	222.0	888.1	1355.8	1276.7
107.5°	177.8	247.4	838.5	1481.5	1510.4
110°	201.8	264.3	800.2	1508.6	1602.3



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	223.4	283.5	764.2	1487.2	1625.5
115°	257.7	311.5	715.3	1416.0	1610.3
117.5°	287.7	341.2	683.1	1315.7	1536.8
120°	307.7	360.4	670.3	1247.8	1470.5
122.5°	326.9	377.3	659.9	1184.4	1395.4
125°	353.6	402.5	648.3	1097.2	1287.7
127.5°	376.4	425.2	641.5	1023.5	1187.8
130°	391.6	440.4	638.3	978.4	1127.8
132.5°	406.0	452.5	635.1	940.5	1075.9
135°	425.6	471.5	630.3	888.7	1002.0
137.5°	447.5	489.3	628.0	845.1	941.8
140°	459.5	500.5	626.4	816.1	901.1
142.5°	473.1	511.0	624.8	790.3	865.1
145°	493.5	527.7	622.4	756.5	814.2
147.5°	513.1	543.0	620.2	728.1	772.8
150°	527.5	551.9	619.4	711.1	747.2
152.5°	538.6	561.5	618.6	696.6	726.4
155°	556.4	575.0	617.4	678.8	700.3
157.5°	572.8	587.1	617.6	665.8	680.5
160°	582.4	595.1	618.4	658.6	669.3
162.5°	590.4	601.5	619.2	652.1	660.5
165°	602.4	610.2	620.4	644.4	649.3
167.5°	611.6	616.3	621.4	639.8	641.3
170°	616.4	620.3	621.4	637.3	637.3
172.5°	620.4	622.7	621.4	634.1	633.3
175°	624.4	625.3	621.4	630.3	628.4
177.5°	626.0	625.2	621.2	626.7	625.2
180°	624.4	624.4	624.4	624.4	624.4

(END OF REPORT)