

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P521637

Luminaire Tested: **SQ4-F-125U-100D-93050-1D-UNV-STD-W-4 (4500K)**

Issue Date: 5/5/2021

Test Information

Test Method: LM-79-08
Report Number: P521637
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-50,
Test Lab: INNOVATION CENTER
Issue Date: 5/5/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-F-125U-100D-93050-1D-UNV-STD-W-4 (4500K)
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 1250 LUMENS PER FOOT
Light Source: 3000K/5000K CCT, 90 CRI LEDS, TUNED TO 4500K CCT
Ballast/Driver: ELECTRONIC DRIVER

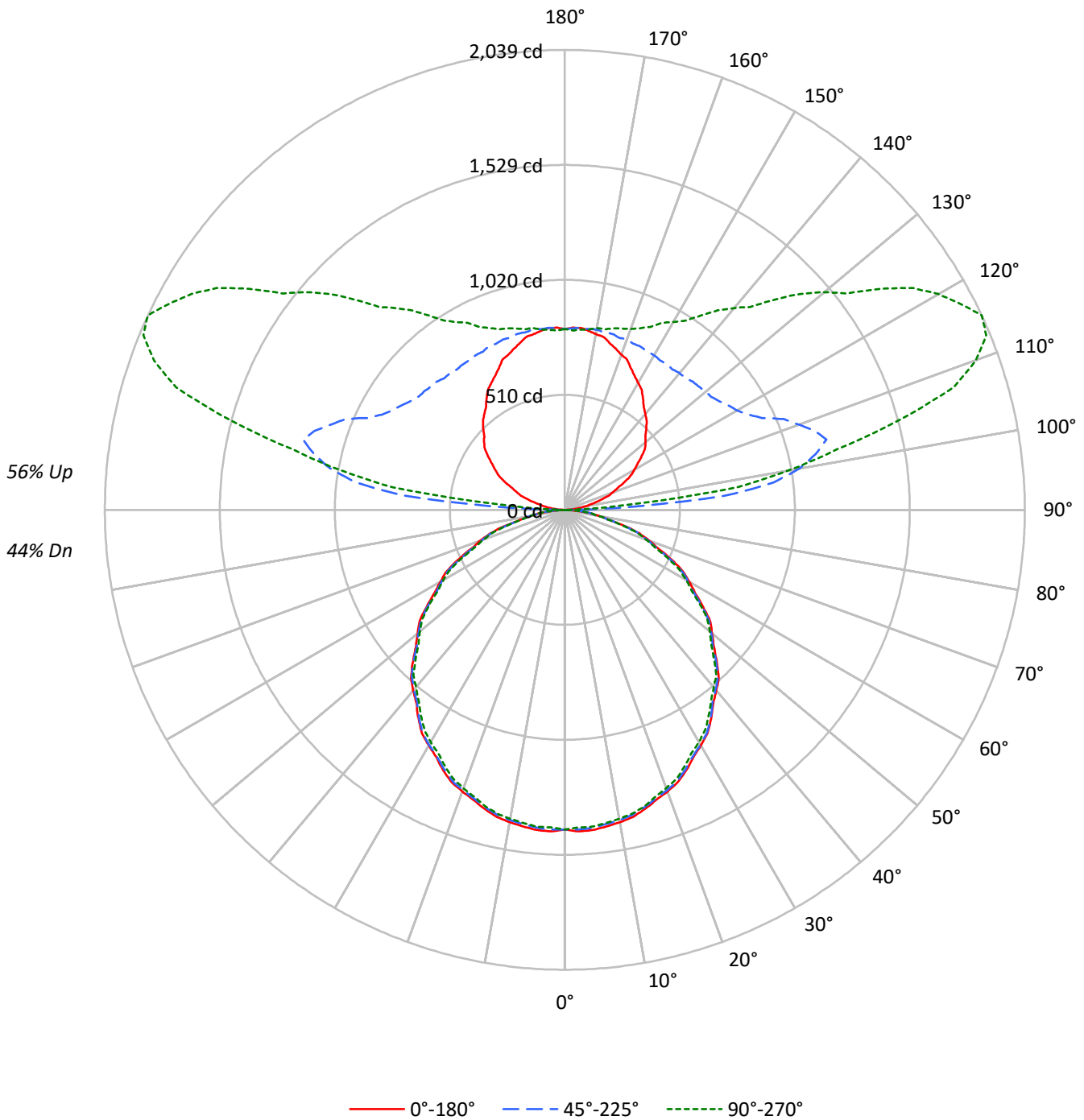
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9237.3 lumens
Efficiency: N/A
Efficacy: 110.5 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.25 / 1.38
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 83.6
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	50	50	50	44
1	96	92	88	85	88	84	81	78	70	67	65	57	55	53	44	43	42	37
2	88	80	74	69	80	73	68	64	61	57	54	49	47	44	39	37	35	30
3	80	70	63	57	73	64	58	53	54	49	45	44	40	37	34	32	30	26
4	73	62	54	48	66	57	50	45	48	42	38	39	35	32	31	28	26	22
5	67	55	47	41	61	51	44	38	42	37	33	35	31	27	27	25	22	19
6	61	49	41	35	56	45	38	33	38	33	28	31	27	24	25	22	19	16
7	57	44	36	31	52	41	34	29	34	29	25	28	24	21	23	20	17	15
8	53	40	33	27	48	37	30	25	31	26	22	26	22	19	21	18	15	13
9	49	37	29	24	45	34	27	23	29	23	20	24	20	17	19	16	14	12
10	46	34	26	22	42	31	25	20	26	21	18	22	18	15	18	15	13	11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	13081	13081	13081
5°	13197	13102	13055
10°	13178	13082	13025
15°	13114	13036	12998
20°	13051	12991	12890
25°	12972	12899	12785
30°	12849	12816	12665
35°	12736	12690	12529
40°	12590	12528	12356
45°	12429	12364	12191
50°	12228	12154	12038
55°	12017	11902	11771
60°	11738	11607	11437
65°	11354	11132	10931
70°	10707	10461	10270
75°	9760	9432	9250
80°	8002	8002	8002
85°	5706	6468	6786



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	134.2	1.5
10°-20°	384.4	4.2
20°-30°	581.5	6.3
30°-40°	700.3	7.6
40°-50°	727.3	7.9
50°-60°	660.1	7.1
60°-70°	503.6	5.5
70°-80°	281.5	3.0
80°-90°	73.3	0.8
90°-100°	413.3	4.5
100°-110°	998.9	10.8
110°-120°	1065.4	11.5
120°-130°	862.9	9.3
130°-140°	668.1	7.2
140°-150°	509.6	5.5
150°-160°	368.9	4.0
160°-170°	227.2	2.5
170°-180°	76.9	0.8
0°-30°	1100.1	11.9
0°-40°	1800.4	19.5
0°-60°	3187.7	34.5
0°-90°	4046.1	43.8
90°-120°	2477.6	26.8
90°-150°	4518.2	48.9
90°-180°	5191.0	56.2
0°-180°	9237.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1418	1418	1418	1418	1418	
5°	1425	1410	1415	1412	1410	135
15°	1373	1359	1365	1361	1361	387
25°	1274	1261	1267	1256	1256	587
35°	1131	1121	1127	1112	1112	707
45°	953	946	948	934	934	735
55°	747	745	740	732	732	668
65°	520	516	510	503	501	513
75°	274	270	265	260	260	288
85°	54	59	61	62	64	67
90°	0	0	0	0	0	4
95°	41	207	708	460	323	46
105°	160	276	1201	1553	1533	169
115°	292	373	964	1829	2039	289
125°	416	479	837	1454	1708	371
135°	511	571	803	1147	1319	395
145°	604	649	788	975	1051	378
155°	693	723	798	863	895	320
165°	766	778	808	820	832	216
175°	810	807	810	803	802	77
180°	802	802	802	802	802	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1417.8	1417.8	1417.8	1417.8	1417.8
2.5°	1426.7	1414.8	1418.6	1416.8	1409.6
5°	1424.9	1410.0	1414.7	1411.6	1409.6
7.5°	1415.5	1400.6	1405.4	1401.3	1400.1
10°	1406.6	1391.6	1396.4	1392.3	1390.3
12.5°	1394.4	1380.2	1385.0	1380.1	1379.7
15°	1373.0	1359.1	1364.8	1360.8	1360.8
17.5°	1348.0	1335.0	1341.0	1335.1	1334.1
20°	1329.2	1316.3	1323.1	1313.9	1312.9
22.5°	1308.1	1295.9	1301.9	1291.2	1291.8
25°	1274.3	1261.3	1267.1	1255.9	1255.9
27.5°	1235.4	1222.6	1229.9	1216.4	1215.6
30°	1206.1	1194.1	1203.0	1188.8	1188.8
32.5°	1176.8	1166.4	1172.9	1159.4	1157.0
35°	1130.8	1120.8	1126.7	1112.4	1112.4
37.5°	1080.3	1072.1	1075.2	1062.0	1065.0
40°	1045.3	1036.3	1040.2	1026.9	1025.9
42.5°	1009.4	1001.3	1004.3	991.2	994.2
45°	952.6	945.7	947.6	934.3	934.3
47.5°	895.0	889.9	888.3	876.6	878.6
50°	851.9	849.9	846.8	836.7	838.7
52.5°	812.8	808.4	804.5	795.1	796.3
55°	747.1	745.1	739.9	731.8	731.8
57.5°	684.2	679.8	673.8	665.4	665.4
60°	636.1	634.1	629.0	619.8	619.8
62.5°	590.5	587.7	581.8	573.4	572.6
65°	520.1	516.1	509.9	502.7	500.7
67.5°	446.6	442.4	437.4	430.7	429.5
70°	396.9	392.0	387.8	382.6	380.7
72.5°	346.5	343.9	338.9	333.8	332.6
75°	273.8	269.8	264.6	260.5	259.5
77.5°	197.0	196.4	194.6	192.0	193.0
80°	150.6	151.6	150.6	149.6	150.6
82.5°	109.1	111.7	111.5	111.4	112.4
85°	53.9	58.9	61.1	62.1	64.1
87.5°	15.5	20.2	24.4	25.3	26.1
90°	0.0	0.0	0.0	0.0	0.0
92.5°	13.6	111.9	263.5	128.1	86.9
95°	40.8	206.8	708.1	460.5	322.6
97.5°	72.3	229.1	932.6	898.5	771.3
100°	96.8	242.9	1056.2	1115.0	1010.4
102.5°	119.9	255.4	1137.7	1295.3	1233.2
105°	159.6	275.8	1200.6	1553.3	1533.4
107.5°	198.7	300.0	1163.5	1760.3	1807.1
110°	225.8	320.5	1103.8	1849.6	1937.6



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	253.0	341.0	1050.8	1871.3	2021.8
115°	292.1	373.4	964.5	1828.6	2039.4
117.5°	330.8	407.5	913.9	1730.2	1977.3
120°	356.6	428.0	881.3	1653.1	1912.1
122.5°	383.8	449.9	860.9	1574.2	1829.2
125°	416.0	479.1	837.2	1454.3	1708.3
127.5°	448.0	507.4	820.5	1352.7	1575.9
130°	467.0	525.1	815.1	1282.0	1501.1
132.5°	484.6	545.4	806.9	1230.9	1416.9
135°	511.1	570.9	803.2	1146.8	1319.4
137.5°	536.3	596.4	791.3	1089.8	1219.9
140°	555.3	610.1	791.3	1048.8	1168.3
142.5°	574.3	629.1	784.5	1013.0	1114.0
145°	604.5	649.4	787.9	974.8	1051.1
147.5°	632.7	676.2	785.9	930.6	993.7
150°	650.4	688.6	791.3	911.3	961.1
152.5°	669.4	706.3	790.0	890.8	935.3
155°	692.8	722.7	798.1	863.4	894.9
157.5°	721.0	746.6	796.4	852.9	871.5
160°	731.9	753.5	803.2	839.2	852.5
162.5°	749.5	768.5	800.5	835.0	842.9
165°	765.9	777.5	808.3	820.5	832.1
167.5°	785.9	793.5	806.3	819.5	819.9
170°	791.3	796.3	811.7	810.2	818.5
172.5°	800.8	804.5	807.6	811.2	806.3
175°	810.0	806.7	810.0	803.2	801.5
177.5°	808.3	808.3	805.6	802.7	796.1
180°	801.5	801.5	801.5	801.5	801.5

(END OF REPORT)