

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: P936503

Luminaire Tested: SQ4-FB-025U-100D-B40-1D-UNV-W2A-W-6

Issue Date: 12/17/2024

Test Information

Test Method: LM-79-2019
Report Number: P936503
REPORT IS A COMBINATION OF REPORTS P933447 AND P933786
Test Lab: INNOVATION CENTER
Issue Date: 12/17/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FB-025U-100D-B40-1D-UNV-W2A-W-6
Description: CORELITE SQ4 SUSPENDED INDIRECT LED LUMINAIRE WITH Batwing Frosted Continuous Roll L
Light Source: -
Ballast/Driver: -

Summary

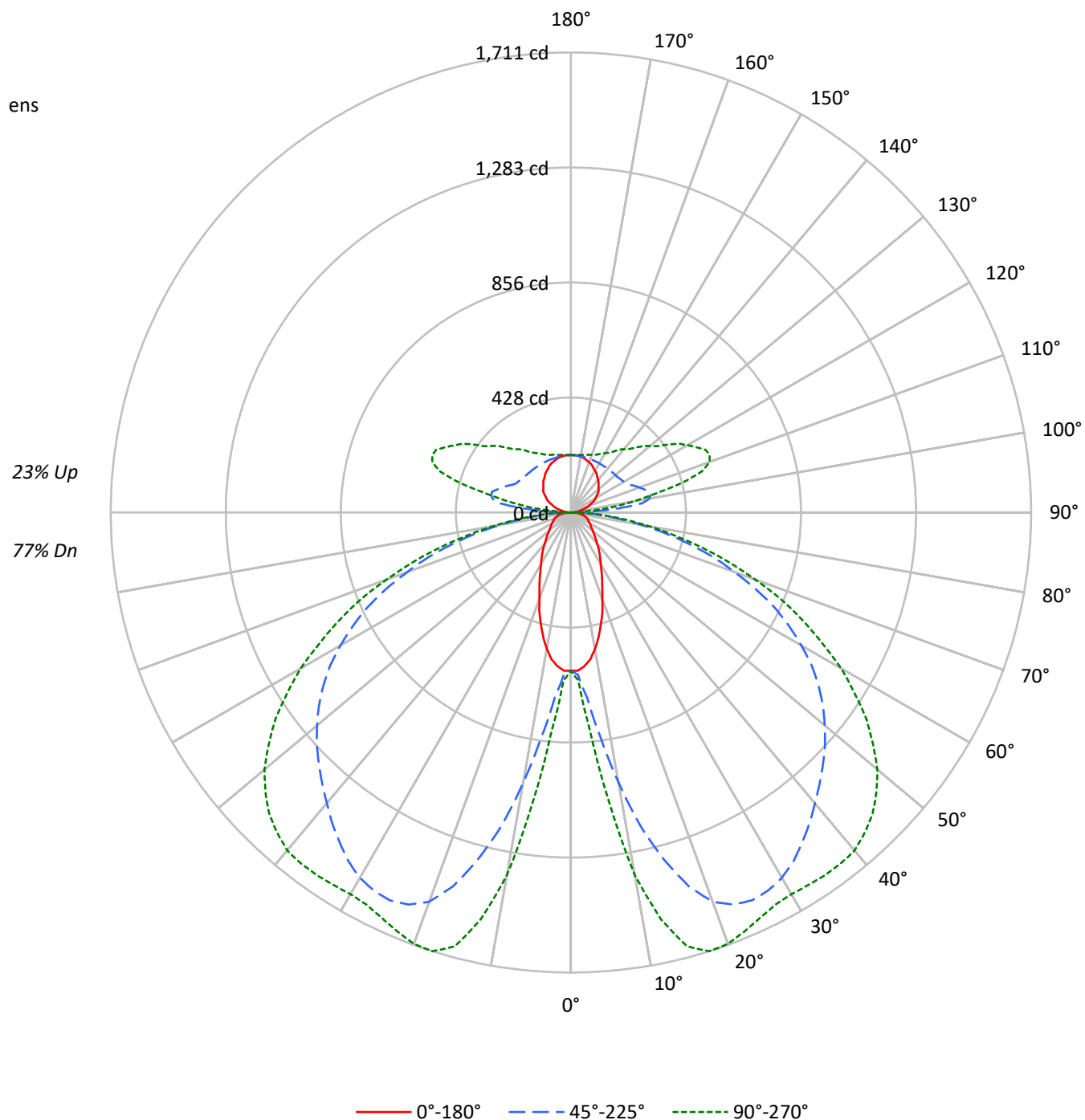
Lumens per Lamp: N/A
Luminaire Lumens: 5940.1 lumens
Efficiency: N/A
Efficacy: 102.1 lumens/watt
Spacing Criteria (0/90/45): 0.71 / 2.69 / 2.33
Luminous Opening: Rectangular w/ Sides (W: 0.29' x L: 6' x H: 0.1')
CIE Type: Semi-Direct

Input Watts (W): 58.2
Input Voltage (V): NR
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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	113	113	113	113	108	108	108	108	98	98	98	89	89	89	81	81	81
1	103	98	94	90	98	94	90	86	85	82	79	77	75	73	70	68	66
2	93	85	78	72	88	81	75	69	73	68	64	67	63	59	61	57	55
3	84	74	65	59	80	70	63	57	64	58	53	58	53	49	53	49	45
4	77	65	56	49	73	62	54	47	56	50	44	51	46	41	47	42	38
5	70	57	48	42	66	55	46	40	50	43	38	46	40	35	41	37	33
6	64	51	42	36	61	49	41	35	45	38	32	41	35	30	37	32	28
7	59	46	37	31	56	44	36	30	40	33	28	37	31	27	34	29	25
8	55	42	33	27	52	40	32	26	37	30	25	34	28	23	31	26	22
9	51	38	30	24	49	36	29	23	33	27	22	31	25	21	28	23	19
10	48	35	27	21	45	33	26	21	31	24	20	28	23	19	26	21	17

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3641	3641	3641
5°	3556	4207	4894
10°	3224	6131	8114
15°	2740	8009	9798
20°	2229	9279	9986
25°	1859	9707	9782
30°	1567	9766	9764
35°	1385	9602	10016
40°	1206	9388	10277
45°	1091	9231	10317
50°	1000	9089	10147
55°	957	8882	9697
60°	979	8489	8986
65°	1016	7892	8010
70°	1081	6878	6768
75°	1193	5602	5281
80°	1292	3880	3559
85°	1127	2054	1821

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 10317 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	76.1	1.3
10°-20°	337.5	5.7
20°-30°	590.2	9.9
30°-40°	759.8	12.8
40°-50°	848.7	14.3
50°-60°	812.9	13.7
60°-70°	644.2	10.8
70°-80°	378.8	6.4
80°-90°	106.0	1.8
90°-100°	104.2	1.8
100°-110°	274.0	4.6
110°-120°	284.1	4.8
120°-130°	227.9	3.8
130°-140°	178.8	3.0
140°-150°	137.2	2.3
150°-160°	98.8	1.7
160°-170°	60.5	1.0
170°-180°	20.4	0.3
0°-30°	1003.8	16.9
0°-40°	1763.7	29.7
0°-60°	3425.2	57.7
0°-90°	4554.3	76.7
90°-120°	662.2	11.1
90°-150°	1206.1	20.3
90°-180°	1386.0	23.3
0°-180°	5940.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	589	589	589	589	589	
5°	574	615	693	784	812	53
15°	430	793	1336	1620	1671	120
25°	274	899	1592	1662	1664	126
35°	186	859	1499	1584	1647	116
45°	127	685	1325	1518	1586	98
55°	91	435	1124	1306	1342	83
65°	72	231	835	939	952	71
75°	53	142	458	504	505	55
85°	19	44	114	125	127	20
90°	1	4	11	5	5	2
95°	14	54	179	92	63	15
105°	49	75	303	460	429	52
115°	88	106	243	484	552	87
125°	122	137	221	373	440	108
135°	145	160	214	301	341	112
145°	169	179	211	257	277	106
155°	190	196	211	232	238	88
165°	206	208	211	219	222	58
175°	214	214	212	215	215	20
180°	214	214	214	214	214	

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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
0°	588.6	588.6	588.6	588.6	588.6	588.6	588.6	588.6	588.6	588.6	588.6
2.5°	588.6	588.6	592.4	594.3	598.0	599.9	603.8	607.6	618.8	620.8	624.6
5°	573.5	581.0	605.7	615.1	641.6	677.6	692.7	717.3	768.4	783.6	793.0
7.5°	550.7	567.7	628.4	643.5	709.8	804.4	844.1	897.1	978.5	1018.2	1050.4
10°	514.7	550.7	658.7	694.6	802.5	946.3	1020.1	1094.0	1217.0	1271.9	1292.7
12.5°	475.0	533.7	690.8	740.0	895.2	1105.3	1194.2	1275.6	1415.7	1489.5	1500.9
15°	429.7	509.1	721.1	793.0	993.6	1237.8	1336.2	1436.5	1567.1	1620.1	1633.3
17.5°	389.9	490.2	749.5	825.2	1069.3	1357.1	1457.3	1540.6	1646.6	1682.5	1692.0
20°	340.6	459.9	768.4	866.9	1148.9	1444.1	1540.6	1605.0	1676.9	1699.6	1703.3
22.5°	304.7	427.7	779.8	881.9	1201.8	1497.1	1578.4	1629.5	1678.8	1686.3	1688.2
25°	274.5	391.7	777.8	899.0	1247.2	1529.2	1591.7	1629.5	1658.0	1661.7	1661.7
27.5°	246.0	352.0	770.3	902.8	1281.3	1536.8	1586.0	1612.5	1625.8	1633.3	1633.3
30°	221.5	314.2	751.4	895.2	1296.4	1529.2	1569.0	1582.2	1595.5	1606.8	1612.5
32.5°	202.6	278.2	722.9	880.0	1298.3	1510.3	1538.7	1546.2	1565.1	1591.7	1601.2
35°	185.5	242.3	690.8	859.2	1287.0	1480.1	1499.0	1506.5	1544.3	1584.2	1597.3
37.5°	168.5	215.7	649.2	823.3	1270.0	1444.1	1457.3	1470.6	1529.2	1576.5	1591.7
40°	151.4	193.0	599.9	783.6	1243.4	1400.5	1411.9	1432.7	1510.3	1565.1	1580.3
42.5°	138.2	174.1	546.9	741.9	1209.4	1351.3	1368.3	1398.6	1487.6	1546.2	1563.3
45°	126.8	155.2	490.2	685.1	1165.9	1300.2	1324.9	1366.5	1461.1	1517.9	1533.1
47.5°	115.5	141.9	431.6	626.5	1118.5	1249.1	1281.3	1328.6	1425.1	1480.1	1493.2
50°	106.0	128.7	372.8	564.0	1067.4	1194.2	1232.1	1281.3	1379.7	1430.8	1447.9
52.5°	98.5	117.4	317.9	501.6	1008.8	1137.5	1181.0	1232.1	1324.9	1374.1	1385.4
55°	90.8	107.9	270.6	435.3	948.2	1076.9	1124.2	1173.4	1264.2	1305.9	1313.5
57.5°	87.1	100.3	230.9	372.8	883.9	1008.8	1061.8	1107.2	1192.3	1224.5	1232.1
60°	81.4	94.6	200.6	319.8	813.9	944.4	989.9	1035.2	1107.2	1133.7	1139.3
62.5°	75.7	90.8	177.9	268.7	741.9	868.7	914.1	955.8	1016.3	1035.2	1042.9
65°	71.9	87.1	160.9	230.9	668.1	789.2	834.7	870.6	919.9	938.8	942.5
67.5°	68.1	83.3	147.6	198.7	594.3	709.8	743.8	777.8	815.8	834.7	836.6
70°	62.5	79.5	136.3	176.0	518.6	618.8	647.3	683.2	713.5	722.9	728.7
72.5°	58.6	73.8	128.7	159.0	441.0	531.8	558.3	579.1	605.7	615.1	615.1
75°	53.0	66.3	121.1	141.9	361.5	435.3	458.0	478.8	499.7	503.5	497.7
77.5°	47.3	58.6	104.1	119.3	282.0	344.5	363.4	374.7	391.7	395.6	397.5
80°	39.7	51.1	81.4	92.7	204.4	253.6	266.8	276.3	291.5	291.5	295.3
82.5°	30.3	39.7	58.6	66.3	138.2	174.1	185.5	191.2	200.6	200.6	200.6
85°	18.9	24.6	37.8	43.5	83.3	106.0	113.5	115.5	123.0	124.9	124.9
87.5°	9.5	13.3	24.6	26.5	43.5	54.9	54.9	58.6	58.6	56.8	54.9
90°	1.4	2.6	3.7	4.0	6.3	9.4	10.9	9.6	7.3	5.4	5.4
92.5°	5.7	15.5	25.2	27.7	39.0	54.0	61.4	53.8	38.6	27.2	26.2
95°	13.8	31.6	49.5	54.0	95.8	151.6	179.4	160.2	121.5	92.5	89.3
97.5°	23.8	39.5	55.3	59.2	129.0	222.0	268.5	256.3	232.0	213.6	207.4
100°	31.6	45.8	60.2	63.7	141.1	244.4	296.0	296.8	298.6	300.0	292.5
102.5°	38.2	51.6	64.8	68.2	146.7	251.4	303.7	319.3	350.4	373.8	367.4
105°	49.4	60.6	71.9	74.8	150.8	252.1	302.8	337.7	407.5	459.8	456.4
107.5°	60.8	71.3	81.8	84.5	151.6	240.9	285.6	334.3	431.7	504.6	505.5
110°	68.6	78.1	87.6	90.0	150.4	231.0	271.3	325.8	434.5	516.1	519.6

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CANDELA DISTRIBUTION (continued):

	0°	10°	20°	22.5°	30°	40°	45°	50°	60°	67.5°	70°
112.5°	76.2	85.3	94.3	96.6	150.4	222.3	258.2	313.9	425.3	508.7	514.2
115°	87.7	96.1	104.4	106.5	151.8	212.3	242.6	296.2	403.5	483.9	491.5
117.5°	99.0	106.6	114.1	116.0	154.6	206.1	231.9	280.3	377.0	449.6	458.0
120°	105.6	112.8	119.9	121.7	157.0	204.1	227.6	271.8	360.2	426.6	434.8
122.5°	112.0	119.3	126.4	128.3	160.2	202.9	224.2	264.1	343.7	403.5	411.6
125°	122.0	128.5	135.1	136.8	164.7	202.1	220.7	254.5	322.2	372.9	380.4
127.5°	130.0	136.6	143.2	144.9	169.1	201.5	217.6	246.7	304.8	348.4	354.7
130°	134.3	141.4	148.5	150.3	172.4	201.8	216.5	242.4	294.0	332.8	338.6
132.5°	138.8	145.9	153.0	154.8	175.1	202.1	215.5	238.7	285.0	319.6	324.8
135°	145.4	151.8	158.3	160.0	177.9	201.9	213.8	233.2	272.0	301.0	305.5
137.5°	152.1	158.5	164.9	166.6	182.2	203.1	213.5	230.0	262.7	287.3	290.9
140°	157.7	163.6	169.5	171.0	184.9	203.3	212.5	226.6	255.0	276.2	279.6
142.5°	162.0	167.4	173.0	174.3	187.0	204.0	212.5	224.9	249.8	268.5	271.4
145°	168.6	173.3	178.1	179.3	189.9	204.0	211.1	221.2	241.5	256.8	259.0
147.5°	175.1	179.8	184.5	185.7	194.2	205.4	211.1	219.1	235.0	247.1	248.9
150°	179.4	183.6	187.9	189.0	196.3	206.2	211.1	217.8	231.3	241.4	243.0
152.5°	183.9	187.1	190.3	191.1	197.8	206.7	211.1	216.8	228.3	237.0	238.2
155°	190.5	192.9	195.3	195.9	200.9	207.7	211.1	215.6	224.8	231.7	232.4
157.5°	195.4	197.7	200.0	200.5	204.1	208.8	211.1	214.6	221.8	227.1	227.7
160°	198.7	200.5	202.3	202.7	205.5	209.2	211.1	214.1	220.2	224.8	225.1
162.5°	202.0	203.3	204.7	205.0	207.0	209.7	211.1	213.6	218.8	222.7	223.0
165°	205.6	206.8	208.0	208.3	209.2	210.5	211.1	212.9	216.6	219.4	219.6
167.5°	208.9	209.4	210.0	210.2	211.0	212.0	212.5	213.7	216.1	217.9	218.0
170°	211.1	211.6	212.2	212.3	212.4	212.5	212.5	213.7	216.1	217.9	217.9
172.5°	212.2	212.3	212.5	212.5	212.5	212.5	212.5	213.4	215.4	216.8	216.7
175°	213.8	213.8	213.8	213.8	213.3	212.8	212.5	213.1	214.3	215.3	215.3
177.5°	213.8	213.8	213.8	213.8	213.4	213.0	212.8	213.3	214.2	215.0	214.9
180°	213.8	213.8	213.8	213.8	213.8	213.8	213.8	213.8	213.8	213.8	213.8

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CANDELA DISTRIBUTION (continued):

	80°	90°
0°	588.6	588.6
2.5°	628.4	624.6
5°	808.1	811.9
7.5°	1088.2	1086.4
10°	1353.2	1370.2
12.5°	1546.2	1550.1
15°	1663.6	1671.2
17.5°	1709.1	1710.9
20°	1710.9	1707.2
22.5°	1690.1	1686.3
25°	1665.5	1663.6
27.5°	1642.8	1644.7
30°	1633.3	1639.0
32.5°	1633.3	1642.8
35°	1637.2	1646.6
37.5°	1635.2	1646.6
40°	1627.6	1640.9
42.5°	1606.8	1616.3
45°	1574.7	1586.0
47.5°	1533.1	1540.6
50°	1480.1	1487.6
52.5°	1413.8	1415.7
55°	1334.3	1341.9
57.5°	1249.1	1251.0
60°	1154.5	1160.1
62.5°	1054.2	1054.2
65°	948.2	951.9
67.5°	838.4	847.8
70°	726.8	728.7
72.5°	617.0	617.0
75°	503.5	505.3
77.5°	395.6	395.6
80°	293.4	295.3
82.5°	202.6	206.3
85°	126.8	126.8
87.5°	58.6	53.0
90°	5.4	5.4
92.5°	21.8	17.5
95°	76.1	63.0
97.5°	182.4	157.4
100°	262.8	233.0
102.5°	341.9	316.4
105°	442.7	429.0
107.5°	508.7	512.1
110°	533.9	548.3

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CANDELA DISTRIBUTION (continued):

	80°	90°
112.5°	536.1	558.1
115°	521.9	552.4
117.5°	491.8	525.5
120°	467.6	500.3
122.5°	443.9	476.2
125°	410.1	439.9
127.5°	379.8	404.9
130°	361.8	385.1
132.5°	345.6	366.4
135°	323.4	341.3
137.5°	305.6	320.2
140°	293.3	307.0
142.5°	283.2	295.0
145°	268.0	277.0
147.5°	256.3	263.7
150°	249.0	255.0
152.5°	242.7	247.2
155°	235.4	238.5
157.5°	229.8	231.9
160°	226.3	227.6
162.5°	224.1	225.3
165°	220.9	222.1
167.5°	218.6	219.1
170°	217.9	217.9
172.5°	216.2	215.8
175°	215.3	215.3
177.5°	214.3	213.8
180°	213.8	213.8

(END OF REPORT)