

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:

Luminaire Tested: SQ4-FB-0U-125D-940-1D-UNV-STD-W-6

Issue Date: 8/1/2024

Test Information

Test Method: LM-79-2019
Report Number:
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2301-892-3)
Test Lab: INNOVATION CENTER
Issue Date: 8/1/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: SQ4-FB-0U-125D-940-1D-UNV-STD-W-6
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE
DOWNLIGHT 1250 LUMENS PER FOOT
DIRECT ONLY
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

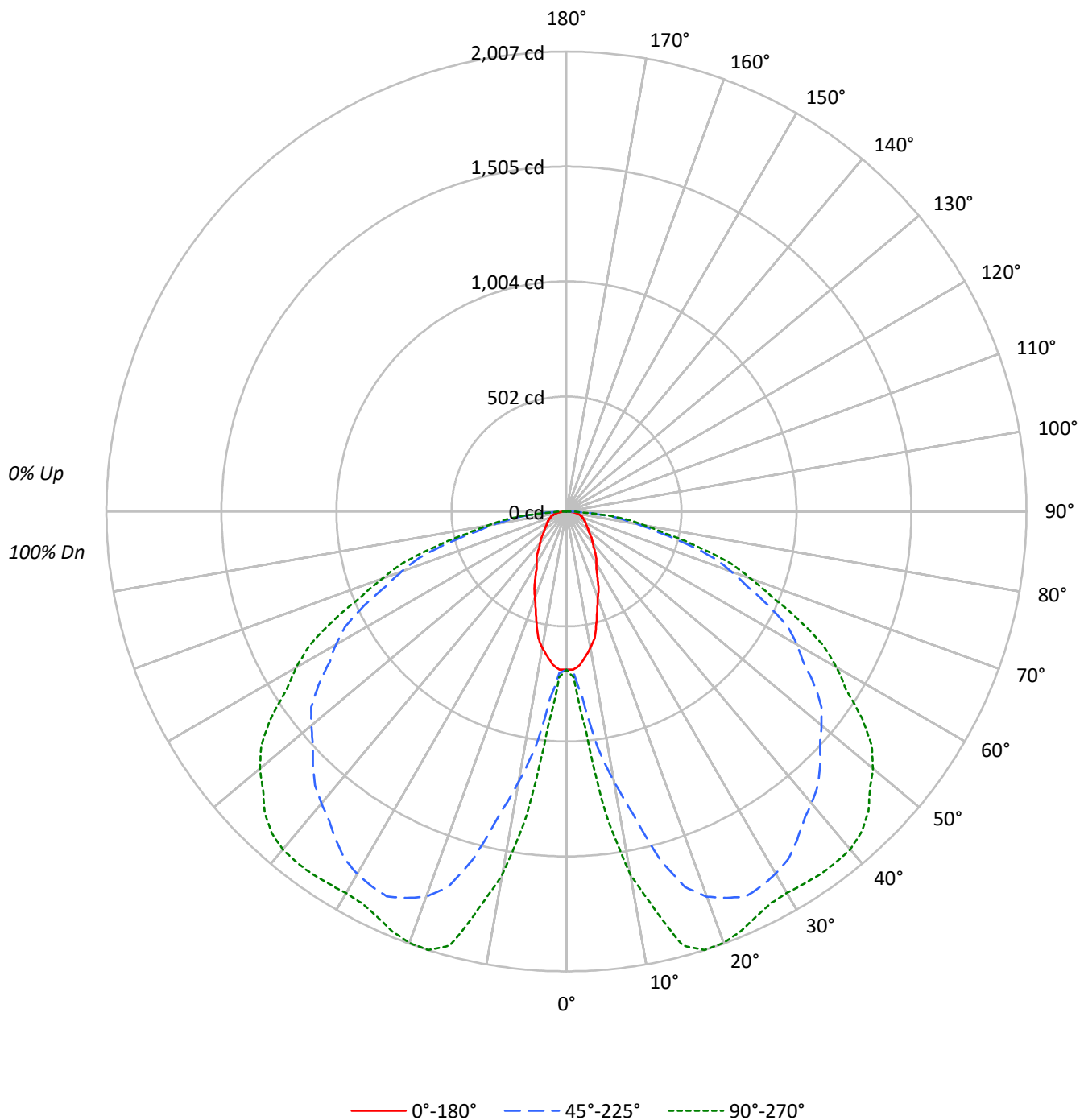
Lumens per Lamp: N/A
Luminaire Lumens: 5345.2 lumens
Efficiency: N/A
Efficacy: 76.7 lumens/watt
Spacing Criteria (0/90/45): 0.7 / 2.7 / 2.32
Luminous Opening: Rectangular (W 0.29' x L: 6' x H: 0')
CIE Type: Direct

Input Watts (W): 69.7
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
RW	70	50	30	10	70	50	30	10	50	30	10		50	30	10		50
RCR																	
0	119	119	119	119	116	116	116	116	111	111	111		106	106	106		102
1	108	103	98	94	105	100	96	92	96	93	89		92	89	87		89
2	97	88	81	75	95	87	80	74	83	77	72		80	75	71		77
3	88	77	68	61	86	75	67	61	72	65	59		69	63	58		67
4	80	67	58	51	78	66	57	51	63	56	50		61	54	49		59
5	73	60	50	43	71	58	50	43	56	48	42		54	47	42		52
6	67	53	44	37	65	52	43	37	50	42	36		49	42	36		47
7	62	48	39	32	60	47	38	32	45	38	32		44	37	32		43
8	58	43	34	28	56	43	34	28	41	34	28		40	33	28		39
9	54	40	31	25	52	39	31	25	38	30	25		37	30	25		36
10	50	36	28	23	49	36	28	22	35	27	22		34	27	22		33

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4248	4248	4248
5°	4155	5053	5883
10°	3773	7476	10042
15°	3210	9992	12487
20°	2617	11709	13112
25°	2185	12578	13249
30°	1845	12966	13660
35°	1634	13157	14508
40°	1427	13348	15460
45°	1294	13610	16189
50°	1190	13898	16704
55°	1143	14159	16885
60°	1175	14288	16747
65°	1228	14173	16258
70°	1318	13739	15376
75°	1478	12746	14093
80°	1651	11012	12273
85°	1567	9171	10501

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 52.5°

Luminance: 16955 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	90.6	1.7
10°-20°	394.6	7.4
20°-30°	691.5	12.9
30°-40°	890.4	16.7
40°-50°	994.1	18.6
50°-60°	953.3	17.8
60°-70°	758.6	14.2
70°-80°	446.9	8.4
80°-90°	125.3	2.3
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°-30°	1176.7	22.0
0°-40°	2067.0	38.7
0°-60°	4014.4	75.1
0°-90°	5345.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5345.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	691	691	691	691	691	
5°	673	721	818	923	953	62
15°	504	926	1569	1897	1961	140
25°	322	1050	1853	1949	1952	148
35°	218	986	1752	1859	1932	136
45°	149	773	1565	1778	1861	115
55°	107	516	1320	1527	1575	97
65°	84	338	974	1099	1117	84
75°	62	213	536	585	593	65
85°	22	58	130	146	149	25
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	10°	20°	30°	40°	50°	60°	70°	80°	90°
0°	690.7	690.7	690.7	690.7	690.7	690.7	690.7	690.7	690.7	690.7
2.5°	690.7	690.7	694.2	699.6	701.4	708.5	719.1	724.5	728.0	724.5
5°	672.9	681.8	710.7	752.9	795.1	841.7	901.7	930.6	948.3	952.8
7.5°	637.8	662.3	744.4	854.6	977.2	1098.9	1204.2	1289.4	1339.2	1341.4
10°	604.1	646.3	772.9	941.7	1110.4	1283.7	1428.0	1516.9	1587.9	1607.9
12.5°	566.8	630.3	803.1	1028.7	1259.7	1454.2	1614.6	1712.3	1769.2	1776.7
15°	504.1	597.4	846.2	1166.0	1452.5	1685.7	1838.9	1916.6	1952.2	1961.0
17.5°	446.0	568.1	883.9	1273.5	1612.8	1822.9	1939.3	1988.1	2005.9	2006.8
20°	399.8	539.7	901.7	1348.1	1694.5	1883.3	1967.7	1998.8	2007.7	2003.2
22.5°	366.0	509.5	912.3	1397.8	1744.3	1906.4	1969.5	1984.6	1988.1	1983.7
25°	322.0	459.7	912.8	1463.6	1794.5	1912.2	1945.5	1949.9	1954.4	1952.2
27.5°	282.9	404.2	899.5	1507.1	1801.6	1885.1	1900.6	1911.7	1925.5	1928.6
30°	259.8	368.7	881.7	1521.3	1794.5	1856.7	1872.2	1892.2	1916.6	1923.3
32.5°	242.1	334.9	855.0	1523.1	1776.7	1822.9	1843.8	1881.5	1916.6	1926.8
35°	217.6	284.3	810.6	1510.2	1736.7	1767.8	1812.2	1874.4	1921.1	1932.2
37.5°	193.7	247.9	750.2	1484.0	1684.3	1716.7	1790.0	1865.1	1917.1	1930.8
40°	177.7	226.5	704.0	1459.1	1643.5	1681.2	1772.3	1854.4	1910.0	1925.5
42.5°	165.2	208.8	654.3	1427.1	1597.3	1649.2	1750.9	1838.5	1890.4	1902.4
45°	148.8	182.1	575.2	1368.1	1525.7	1603.5	1714.5	1798.9	1847.8	1861.1
47.5°	133.3	163.5	492.6	1300.6	1452.9	1548.0	1661.7	1741.6	1786.5	1795.4
50°	124.4	151.0	437.5	1252.6	1401.4	1503.5	1619.0	1699.0	1736.7	1745.6
52.5°	117.3	140.4	386.0	1197.5	1348.1	1457.3	1567.5	1640.3	1674.5	1678.1
55°	106.6	126.6	317.6	1112.7	1263.7	1377.0	1483.6	1541.3	1565.7	1574.6
57.5°	100.8	116.4	263.8	1020.7	1168.6	1282.3	1379.2	1424.0	1443.6	1446.7
60°	95.5	111.0	235.4	955.0	1108.2	1214.8	1299.2	1337.0	1354.7	1361.4
62.5°	90.2	107.5	214.1	887.5	1037.2	1140.2	1213.9	1246.4	1260.6	1261.9
65°	84.4	102.2	188.8	784.0	926.1	1021.6	1079.4	1106.0	1112.7	1117.1
67.5°	78.6	96.8	170.6	679.6	811.5	890.6	933.2	956.3	957.6	967.0
70°	73.3	93.3	159.9	608.5	726.2	801.7	837.3	855.0	852.8	855.0
72.5°	69.7	87.9	152.8	535.7	644.5	704.0	736.0	748.4	749.8	750.2
75°	62.2	77.7	142.1	424.2	510.8	561.9	586.3	584.1	590.8	593.0
77.5°	53.7	67.1	116.8	312.7	382.9	416.6	436.2	442.4	440.2	440.6
80°	46.6	60.0	95.5	239.9	297.6	324.2	342.0	346.5	344.2	346.5
82.5°	37.8	49.3	74.2	177.7	223.0	244.3	256.7	257.6	259.0	263.0
85°	22.2	28.9	44.4	97.7	124.4	135.5	144.4	146.6	148.8	148.8
87.5°	8.9	12.4	23.1	40.9	51.5	55.1	55.1	51.5	55.1	49.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)