

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



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: P571975

Luminaire Tested: 22ID-50-L830-DBR

Issue Date: 10/5/2021

Test Information

Test Method: LM-79-2019
Report Number: P571975
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2109-397-3)
Test Lab: INNOVATION CENTER
Issue Date: 10/5/2021
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 22ID-50-L830-DBR
Description: 5000 LUMEN, 2X2 INDEPTH TROFFER WITH 2IN REGRESSED DOUBLE BARRELL LENS AND 3000K, 80 CRI LEDS
Light Source: -
Ballast/Driver: -

Summary

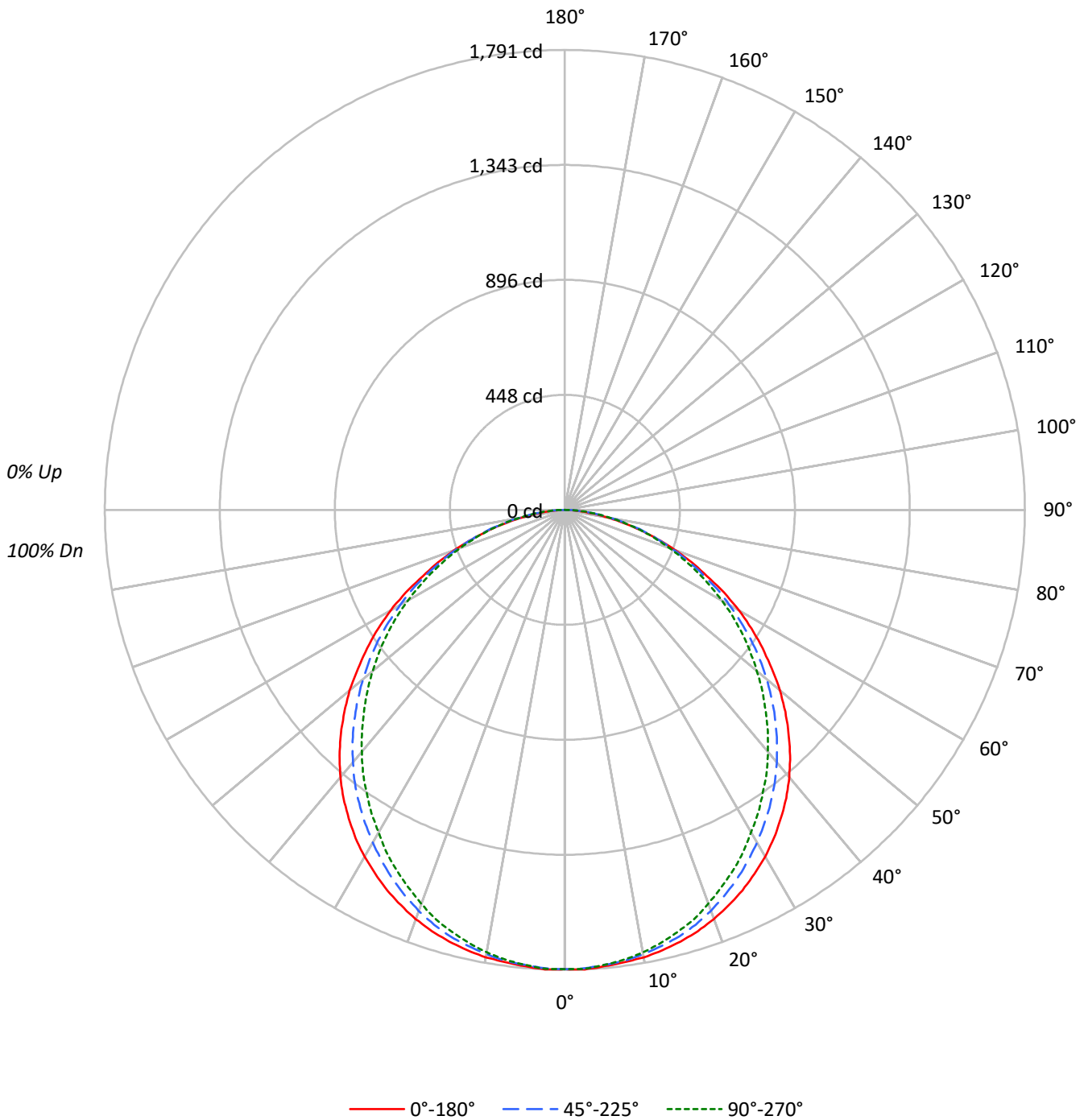
Lumens per Lamp: N/A
Luminaire Lumens: 4950.0 lumens
Efficiency: N/A
Efficacy: 120.4 lumens/watt
Spacing Criteria (0/90/45): 1.29 / 1.21 / 1.35
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

Input Watts (W): 41.1
Input Voltage (V):
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	50	30	10	0	
RCR																						
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100				100
1	109	104	100	96	106	102	98	95	98	94	92	94	91	89	90	88	86	84				84
2	99	91	84	78	96	89	83	78	85	80	76	82	78	74	79	76	72	70				70
3	90	80	72	65	88	78	71	65	75	69	64	73	67	62	70	65	61	59				59
4	83	71	62	55	80	69	61	55	67	60	54	65	58	53	62	57	53	51				51
5	76	63	54	48	74	62	54	47	60	53	47	58	52	46	56	51	46	44				44
6	70	57	48	42	68	56	48	42	54	47	41	53	46	41	51	45	40	38				38
7	65	52	43	37	63	51	43	37	49	42	36	48	41	36	47	41	36	34				34
8	61	47	39	33	59	47	38	33	45	38	33	44	37	32	43	37	32	30				30
9	57	43	35	30	55	43	35	30	42	34	29	41	34	29	39	33	29	27				27
10	53	40	32	27	52	39	32	27	38	31	27	38	31	27	37	31	26	25				25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4814	4814	4814
5°	4819	4806	4806
10°	4835	4802	4782
15°	4848	4793	4739
20°	4857	4759	4676
25°	4855	4710	4601
30°	4846	4648	4505
35°	4819	4586	4417
40°	4775	4509	4321
45°	4690	4411	4207
50°	4577	4291	4087
55°	4408	4156	3962
60°	4216	3980	3796
65°	3885	3761	3590
70°	3571	3514	3399
75°	3146	3248	3146
80°	2572	2836	2836
85°	1584	2260	2260

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 4690 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	169.2	3.4
10°-20°	485.2	9.8
20°-30°	732.2	14.8
30°-40°	876.1	17.7
40°-50°	897.1	18.1
50°-60°	793.2	16.0
60°-70°	585.9	11.8
70°-80°	327.4	6.6
80°-90°	83.7	1.7
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°	1386.6	28.0
0°-40°	2262.7	45.7
0°-60°	3953.0	79.9
0°-90°	4950.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4950.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1789	1789	1789	1789	1789	
5°	1784	1782	1779	1777	1779	170
15°	1740	1733	1721	1706	1701	492
25°	1635	1620	1586	1560	1550	754
35°	1467	1445	1396	1357	1345	917
45°	1232	1208	1159	1118	1106	950
55°	940	922	886	854	844	840
65°	610	610	591	571	564	609
75°	303	315	312	308	303	322
85°	51	66	73	76	73	70
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1788.9	1788.9	1788.9	1788.9	1788.9
2.5°	1791.3	1786.5	1786.5	1786.5	1788.9
5°	1784.0	1781.6	1779.1	1776.7	1779.1
7.5°	1776.7	1774.3	1771.8	1764.5	1766.9
10°	1769.4	1764.5	1757.2	1749.9	1749.9
12.5°	1757.2	1749.9	1740.1	1730.3	1727.9
15°	1740.1	1732.8	1720.6	1705.9	1701.0
17.5°	1720.6	1710.8	1693.7	1676.6	1671.8
20°	1696.2	1686.4	1662.0	1640.0	1632.7
22.5°	1666.9	1654.7	1625.4	1601.0	1591.2
25°	1635.2	1620.5	1586.3	1559.5	1549.7
27.5°	1598.5	1581.5	1542.4	1513.1	1503.4
30°	1559.5	1540.0	1496.0	1464.3	1449.7
32.5°	1515.6	1493.6	1447.2	1410.6	1400.9
35°	1466.8	1444.8	1396.0	1356.9	1344.7
37.5°	1415.5	1391.1	1342.3	1300.8	1291.0
40°	1359.4	1335.0	1283.7	1239.8	1230.0
42.5°	1298.4	1271.5	1222.7	1181.2	1169.0
45°	1232.5	1208.1	1159.2	1117.8	1105.6
47.5°	1164.1	1142.2	1093.4	1054.3	1042.1
50°	1093.4	1071.4	1025.0	986.0	976.2
52.5°	1015.3	998.2	956.7	917.6	910.3
55°	939.6	922.5	885.9	854.2	844.4
57.5°	861.5	844.4	812.7	781.0	776.1
60°	783.4	768.8	739.5	715.1	705.3
62.5°	698.0	693.1	668.7	641.9	634.5
65°	610.1	610.1	590.6	571.1	563.8
67.5°	534.5	532.0	517.4	505.2	497.9
70°	453.9	458.8	446.6	434.4	432.0
72.5°	378.3	383.2	378.3	371.0	366.1
75°	302.6	314.8	312.4	307.5	302.6
77.5°	231.8	246.5	246.5	244.1	241.6
80°	166.0	180.6	183.0	183.0	183.0
82.5°	104.9	119.6	126.9	126.9	126.9
85°	51.3	65.9	73.2	75.7	73.2
87.5°	17.1	24.4	26.8	29.3	29.3
90°	0.0	0.0	0.0	0.0	0.0



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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	17.33	18.95	17.69	19.27	19.58	16.75	18.38	17.12	18.69	19.01
	3H	19.00	20.47	19.37	20.80	21.16	18.50	19.97	18.87	20.29	20.65
	4H	19.59	20.97	19.98	21.32	21.69	19.15	20.54	19.55	20.88	21.26
	6H	19.97	21.26	20.38	21.62	22.01	19.64	20.92	20.05	21.28	21.67
	8H	20.07	21.30	20.49	21.68	22.08	19.79	21.01	20.21	21.40	21.80
	12H	20.11	21.29	20.54	21.67	22.10	19.88	21.06	20.31	21.44	21.87
4H	2H	17.88	19.26	18.27	19.61	19.98	17.42	18.81	17.82	19.15	19.53
	3H	19.78	20.94	20.19	21.34	21.74	19.38	20.54	19.78	20.93	21.33
	4H	20.50	21.55	20.93	21.97	22.40	20.16	21.21	20.59	21.62	22.06
	6H	21.02	21.93	21.47	22.37	22.83	20.77	21.68	21.22	22.12	22.58
	8H	21.16	22.01	21.62	22.45	22.92	20.96	21.82	21.42	22.26	22.73
	12H	21.23	22.00	21.71	22.47	22.94	21.10	21.87	21.58	22.34	22.81
8H	4H	20.78	21.64	21.24	22.08	22.55	20.48	21.34	20.94	21.78	22.24
	6H	21.41	22.13	21.91	22.61	23.09	21.20	21.91	21.70	22.40	22.88
	8H	21.61	22.25	22.12	22.76	23.24	21.47	22.11	21.98	22.61	23.10
	12H	21.74	22.31	22.25	22.80	23.36	21.67	22.24	22.18	22.73	23.29
12H	4H	20.81	21.58	21.29	22.06	22.53	20.51	21.28	20.99	21.76	22.22
	6H	21.46	22.10	21.97	22.61	23.09	21.25	21.89	21.76	22.40	22.89
	8H	21.71	22.28	22.22	22.77	23.33	21.58	22.14	22.08	22.63	23.19