

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: P572147

Luminaire Tested: 24ID-35-L850-DBD

Issue Date: 10/5/2021

Test Information

Test Method: LM-79-2019
Report Number: P572147
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2109-397-8)
Test Lab: INNOVATION CENTER
Issue Date: 10/5/2021
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 24ID-35-L850-DBD
Description: 3500 LUMEN, 2X4 INDEPTH TROFFER WITH 2IN DROPPED DOUBLE BARRELL LENS AND 5000K, 80 CRI LEDS
Light Source: -
Ballast/Driver: -

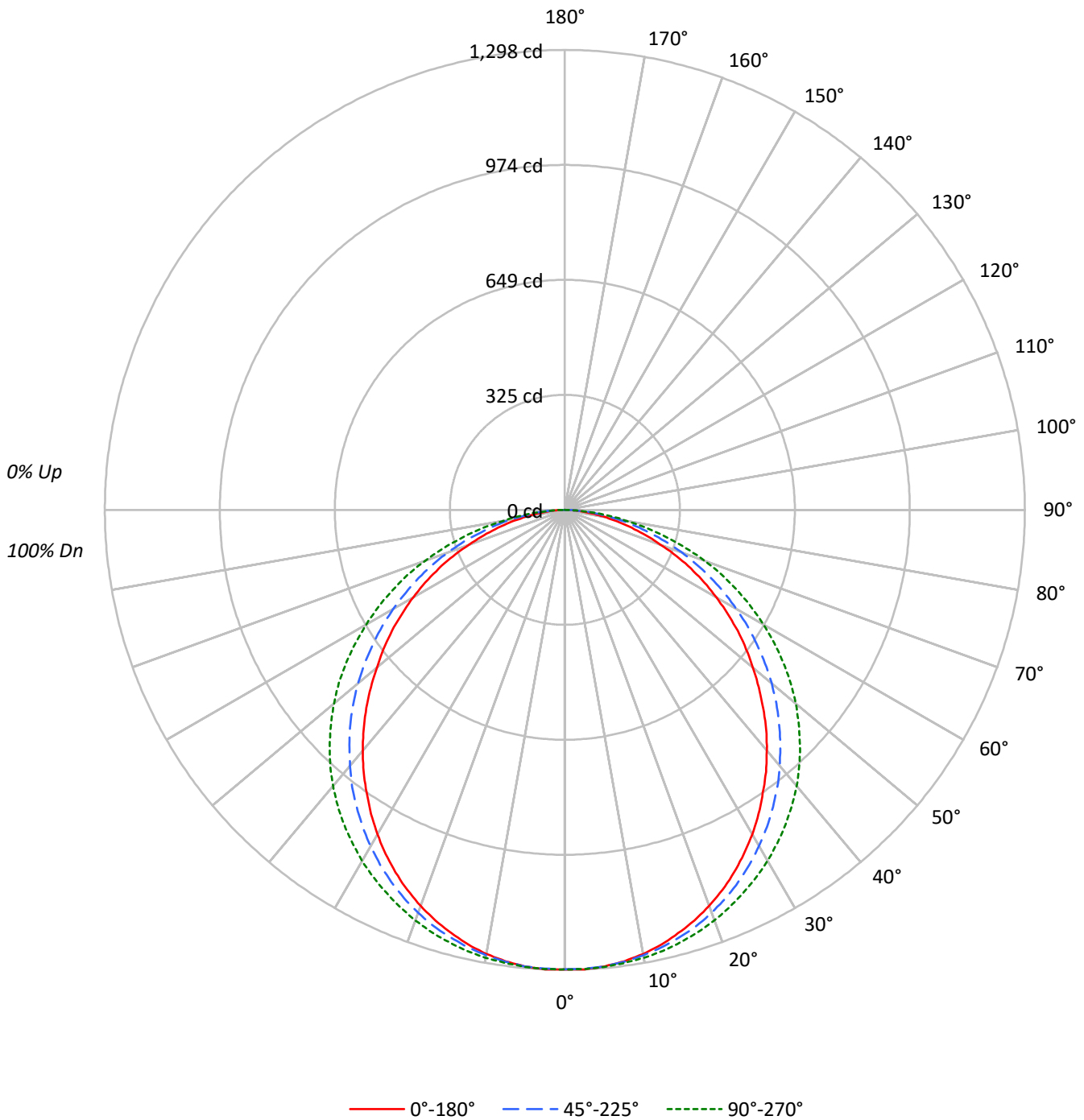
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3700.0 lumens
Efficiency: N/A
Efficacy: 121.7 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.31 / 1.37
Luminous Opening: Rectangular w/ Sides (W: 2' x L: 4' x H: 0.17')
CIE Type: Direct

Input Watts (W): 30.4
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				
1	109	104	100	96	106	102	98	94	97	94	91	93	91	88	90	88	86	84				
2	99	90	84	78	96	89	82	77	85	80	75	82	77	73	79	75	72	70				
3	90	79	71	65	87	78	70	64	75	68	63	72	66	62	69	65	61	58				
4	82	70	61	55	80	69	61	54	66	59	54	64	58	53	62	57	52	50				
5	76	63	54	47	74	62	53	47	59	52	46	58	51	46	56	50	45	43				
6	70	56	47	41	68	56	47	41	54	46	40	52	45	40	50	44	40	38				
7	65	51	42	36	63	50	42	36	49	41	36	47	41	36	46	40	35	33				
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	30				
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	28	27				
10	53	40	32	26	52	39	31	26	38	31	26	37	31	26	36	30	26	24				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1745	1745	1745
5°	1740	1733	1736
10°	1726	1717	1728
15°	1704	1699	1721
20°	1678	1679	1714
25°	1645	1652	1704
30°	1604	1620	1696
35°	1555	1584	1684
40°	1505	1542	1671
45°	1446	1495	1648
50°	1380	1442	1620
55°	1318	1376	1579
60°	1238	1303	1522
65°	1146	1217	1446
70°	1015	1108	1336
75°	877	955	1174
80°	694	776	918
85°	478	481	552

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 1648 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	122.9	3.3
10°-20°	352.8	9.5
20°-30°	534.7	14.5
30°-40°	643.2	17.4
40°-50°	664.1	17.9
50°-60°	596.7	16.1
60°-70°	454.3	12.3
70°-80°	260.9	7.1
80°-90°	70.4	1.9
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°	1010.5	27.3
0°-40°	1653.7	44.7
0°-60°	2914.4	78.8
0°-90°	3700.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3700.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1297	1297	1297	1297	1297	
5°	1293	1294	1293	1292	1294	123
15°	1237	1243	1249	1257	1263	349
25°	1130	1140	1159	1183	1192	520
35°	974	991	1024	1068	1085	610
45°	792	810	855	914	938	611
55°	596	611	660	724	753	531
65°	392	410	455	508	535	388
75°	195	213	244	279	296	207
85°	46	53	63	66	70	53
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1296.9	1296.9	1296.9	1296.9	1296.9
2.5°	1298.1	1298.1	1295.7	1294.5	1296.9
5°	1293.3	1294.5	1293.3	1292.1	1294.5
7.5°	1284.9	1286.1	1286.1	1287.3	1289.7
10°	1272.8	1275.3	1276.5	1280.1	1283.7
12.5°	1257.2	1259.6	1264.4	1270.4	1275.3
15°	1236.8	1242.8	1248.8	1257.2	1263.2
17.5°	1215.1	1222.3	1231.9	1242.8	1250.0
20°	1189.8	1198.3	1210.3	1224.7	1233.1
22.5°	1161.0	1171.8	1186.2	1204.3	1213.9
25°	1129.7	1140.5	1158.6	1182.6	1192.2
27.5°	1094.8	1106.8	1128.5	1156.1	1169.4
30°	1057.5	1070.7	1096.0	1129.7	1144.1
32.5°	1017.8	1032.2	1061.1	1099.6	1115.2
35°	974.5	991.3	1023.8	1068.3	1085.2
37.5°	932.4	949.2	985.3	1033.4	1052.7
40°	886.7	904.7	943.2	996.1	1017.8
42.5°	840.9	856.6	899.9	956.4	979.3
45°	791.6	809.7	855.4	914.3	938.4
47.5°	742.3	761.5	809.7	869.8	895.1
50°	691.8	712.2	761.5	822.9	850.6
52.5°	644.8	661.7	712.2	774.8	803.6
55°	595.5	611.2	660.5	724.2	753.1
57.5°	543.8	561.8	611.2	671.3	700.2
60°	493.3	511.3	558.2	618.4	647.2
62.5°	443.9	460.8	506.5	564.2	593.1
65°	392.2	410.2	454.8	507.7	535.4
67.5°	341.7	360.9	403.0	451.1	480.0
70°	287.5	309.2	350.1	394.6	417.5
72.5°	239.4	259.9	297.2	336.9	358.5
75°	194.9	212.9	244.2	279.1	296.0
77.5°	150.4	169.6	197.3	223.8	237.0
80°	110.7	128.7	150.4	168.4	174.4
82.5°	75.8	89.0	104.7	114.3	122.7
85°	45.7	52.9	62.6	66.2	69.8
87.5°	19.2	21.7	25.3	24.1	25.3
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	12.54	14.18	12.90	14.50	14.81	14.01	15.65	14.37	15.96	16.28
	3H	14.11	15.59	14.48	15.92	16.28	15.91	17.39	16.28	17.72	18.08
	4H	14.62	16.03	15.02	16.37	16.75	16.61	18.01	17.01	18.36	18.73
	6H	14.95	16.25	15.36	16.62	17.01	17.10	18.40	17.51	18.77	19.16
	8H	15.04	16.28	15.46	16.67	17.06	17.25	18.49	17.67	18.87	19.27
	12H	15.08	16.27	15.51	16.65	17.08	17.32	18.51	17.75	18.89	19.32
4H	2H	13.29	14.69	13.69	15.04	15.42	14.46	15.86	14.86	16.21	16.59
	3H	15.06	16.24	15.47	16.63	17.03	16.58	17.75	16.99	18.15	18.55
	4H	15.68	16.75	16.11	17.16	17.60	17.41	18.47	17.84	18.89	19.32
	6H	16.12	17.05	16.57	17.49	17.94	18.03	18.96	18.49	19.41	19.86
	8H	16.23	17.10	16.69	17.54	18.01	18.22	19.09	18.68	19.53	20.00
	12H	16.30	17.08	16.78	17.56	18.03	18.34	19.12	18.82	19.60	20.07
8H	4H	16.07	16.94	16.53	17.38	17.84	17.61	18.48	18.06	18.92	19.38
	6H	16.60	17.33	17.10	17.82	18.29	18.33	19.05	18.82	19.54	20.02
	8H	16.77	17.42	17.28	17.93	18.41	18.58	19.23	19.08	19.73	20.22
	12H	16.88	17.46	17.39	17.95	18.51	18.75	19.32	19.25	19.81	20.37
12H	4H	16.12	16.90	16.60	17.37	17.84	17.61	18.40	18.09	18.87	19.34
	6H	16.68	17.33	17.18	17.83	18.32	18.35	19.00	18.85	19.50	19.99
	8H	16.90	17.47	17.40	17.96	18.52	18.64	19.21	19.14	19.70	20.26