

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: P384360

Luminaire Tested: **24ID-55-L840-CFD2**

Issue Date: 2/25/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P384360  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1911-572-68)  
Test Lab: INNOVATION CENTER(G2)  
Issue Date: 2/25/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: 24ID-55-L840-CFD2  
Description: 2X4 IN DEPTH TROFFER WITH 2INCH DROP CUBE LENS

Light Source: -  
Ballast/Driver: -

**Summary**

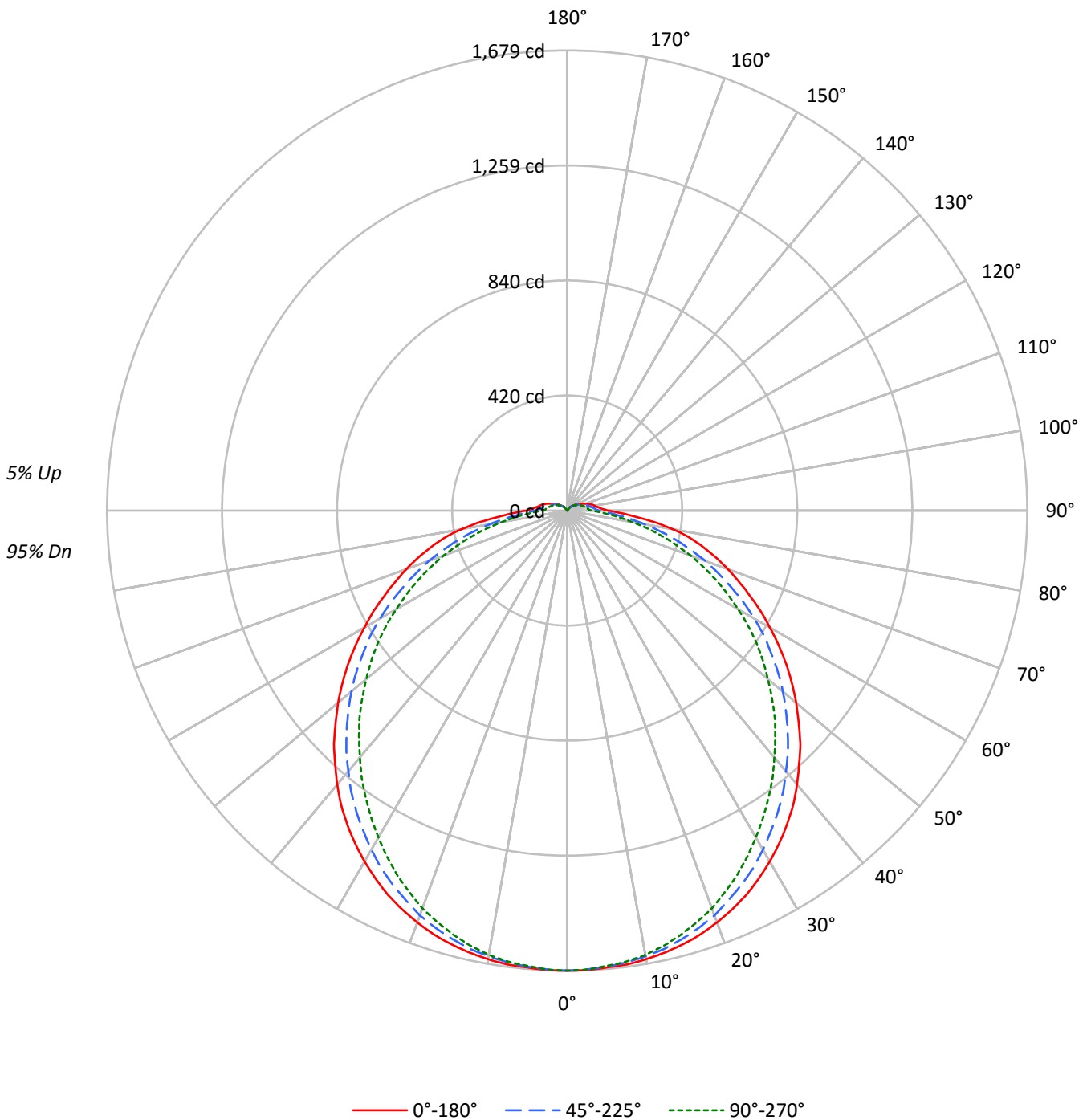
Lumens per Lamp: N/A  
Luminaire Lumens: 5445.4 lumens  
Efficiency: N/A  
Efficacy: 108.5 lumens/watt  
Spacing Criteria (0/90/45): 1.31 / 1.22 / 1.38  
Luminous Opening: Rectangular w/ Sides (W: 2' x L: 4' x H: 0.17')  
CIE Type: Direct

Input Watts (W): 50.2  
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: 25 FT



TEST NUMBER: P384360  
CATALOG NUMBER: 24ID-55-L840-CFD2

### Luminous Intensity Polar Plot





TEST NUMBER: P384360

CATALOG NUMBER: 24ID-55-L840-CFD2

**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	118	118	118	118	114	114	114	114	108	108	108	102	102	102	97	97	97	95
1	106	101	96	92	103	98	94	90	93	90	86	88	85	83	84	81	79	77
2	96	87	80	74	93	85	78	73	81	75	70	77	72	68	73	69	66	63
3	87	76	68	61	84	74	67	60	71	64	58	67	62	57	64	59	55	53
4	80	68	58	51	77	66	57	51	63	55	50	60	53	48	57	51	47	45
5	73	60	51	44	71	59	50	44	56	48	43	53	47	42	51	45	41	38
6	68	54	45	38	65	53	44	38	50	43	37	48	42	36	46	40	36	33
7	63	49	40	34	61	48	39	33	46	38	33	44	37	32	42	36	32	30
8	58	45	36	30	56	44	35	30	42	35	29	40	34	29	39	33	28	26
9	54	41	33	27	53	40	32	27	39	31	26	37	31	26	36	30	25	24
10	51	38	30	24	50	37	29	24	36	29	24	34	28	23	33	27	23	21

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	2259	2259	2259
5°	2252	2239	2236
10°	2255	2222	2216
15°	2256	2202	2183
20°	2256	2180	2146
25°	2253	2147	2097
30°	2243	2112	2041
35°	2232	2074	1987
40°	2215	2031	1931
45°	2198	1989	1882
50°	2175	1946	1821
55°	2160	1894	1768
60°	2145	1840	1693
65°	2152	1765	1618
70°	2202	1696	1530
75°	2312	1600	1416
80°	2462	1475	1272
85°	2586	1393	1173



TEST NUMBER: P384360

CATALOG NUMBER: 24ID-55-L840-CFD2

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	158.9	2.9
10°-20°	456.9	8.4
20°-30°	694.0	12.7
30°-40°	838.3	15.4
40°-50°	877.4	16.1
50°-60°	814.1	15.0
60°-70°	659.4	12.1
70°-80°	445.0	8.2
80°-90°	215.0	3.9
90°-100°	108.1	2.0
100°-110°	78.6	1.4
110°-120°	52.6	1.0
120°-130°	30.5	0.6
130°-140°	15.3	0.3
140°-150°	1.2	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	1309.8	24.1
0°-40°	2148.1	39.4
0°-60°	3839.6	70.5
0°-90°	5159.1	94.7
90°-120°	239.3	4.4
90°-150°	286.3	5.3
90°-180°	286.0	5.3
0°-180°	5445.4	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1679	1679	1679	1679	1679	
5°	1673	1671	1671	1668	1668	159
15°	1638	1630	1618	1608	1602	463
25°	1547	1533	1506	1478	1467	713
35°	1399	1379	1341	1300	1280	875
45°	1204	1182	1138	1091	1072	927
55°	976	954	910	866	844	872
65°	736	709	660	624	599	731
75°	514	462	409	379	357	541
85°	247	214	181	165	148	234
90°	148	135	115	104	88	85
95°	118	110	99	88	77	93
105°	88	82	74	66	60	94
115°	60	55	55	47	47	60
125°	38	33	36	30	33	34
135°	22	19	19	19	22	17
145°	0	0	0	0	0	1
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P384360

CATALOG NUMBER: 24ID-55-L840-CFD2

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1678.9	1678.9	1678.9	1678.9	1678.9
2.5°	1678.9	1676.2	1676.2	1676.2	1676.2
5°	1673.4	1670.7	1670.7	1667.9	1667.9
7.5°	1670.7	1665.2	1662.4	1659.7	1659.7
10°	1662.4	1656.9	1651.4	1645.9	1645.9
12.5°	1651.4	1645.9	1637.7	1626.7	1626.7
15°	1637.7	1629.5	1618.5	1607.5	1602.0
17.5°	1621.2	1613.0	1596.5	1580.0	1574.5
20°	1599.2	1588.2	1571.8	1549.8	1544.3
22.5°	1574.5	1563.5	1538.8	1516.8	1505.8
25°	1547.0	1533.3	1505.8	1478.3	1467.3
27.5°	1514.0	1500.3	1470.1	1437.1	1423.4
30°	1478.3	1461.8	1428.9	1393.1	1376.7
32.5°	1439.9	1420.6	1384.9	1346.4	1329.9
35°	1398.6	1379.4	1340.9	1299.7	1280.5
37.5°	1354.7	1335.4	1294.2	1250.3	1231.0
40°	1305.2	1286.0	1242.0	1198.1	1176.1
42.5°	1253.0	1236.5	1192.6	1145.8	1123.9
45°	1203.5	1181.6	1137.6	1090.9	1071.7
47.5°	1145.8	1129.4	1082.6	1035.9	1013.9
50°	1090.9	1071.7	1027.7	981.0	956.2
52.5°	1033.2	1016.7	970.0	923.3	901.3
55°	975.5	953.5	909.5	865.6	843.6
57.5°	915.0	895.8	851.8	810.6	783.1
60°	854.6	835.3	788.6	750.2	719.9
62.5°	796.9	774.9	725.4	684.2	659.5
65°	736.4	708.9	659.5	623.8	599.0
67.5°	678.7	645.7	596.3	563.3	538.6
70°	623.8	585.3	535.8	502.9	478.1
72.5°	568.8	522.1	469.9	439.7	417.7
75°	513.8	461.6	409.4	379.2	357.2
77.5°	458.9	398.4	346.2	321.5	299.5
80°	392.9	335.2	285.8	263.8	241.8
82.5°	318.7	272.0	230.8	208.8	192.3
85°	247.3	214.3	181.4	164.9	148.4
87.5°	192.3	167.6	142.9	129.1	115.4
90°	148.4	134.6	115.4	104.4	87.9
92.5°	129.1	118.2	104.4	93.4	79.7
95°	118.2	109.9	98.9	87.9	76.9
97.5°	107.2	101.7	90.7	82.4	71.4
100°	101.7	93.4	85.2	76.9	68.7
102.5°	96.2	87.9	79.7	71.4	65.9
105°	87.9	82.4	74.2	65.9	60.5
107.5°	82.4	74.2	68.7	60.5	57.7
110°	74.2	68.7	63.2	57.7	55.0



TEST NUMBER: P384360

CATALOG NUMBER: 24ID-55-L840-CFD2

**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	65.9	63.2	57.7	52.2	49.5
115°	60.5	55.0	55.0	46.7	46.7
117.5°	55.0	49.5	49.5	44.0	44.0
120°	46.7	44.0	44.0	38.5	38.5
122.5°	41.2	38.5	38.5	35.7	35.7
125°	38.5	33.0	35.7	30.2	33.0
127.5°	33.0	30.2	30.2	27.5	30.2
130°	27.5	24.7	24.7	24.7	27.5
132.5°	24.7	22.0	22.0	22.0	24.7
135°	22.0	19.2	19.2	19.2	22.0
137.5°	19.2	16.5	13.7	16.5	19.2
140°	16.5	13.7	11.0	13.7	16.5
142.5°	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)