

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: METALUX

Report Number: P296042

Luminaire Tested: **24RLN-LD5-50-UNV-L92765-W2A1-U-4000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P296042  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1901-085-1)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24RLN-LD5-50-UNV-L92765-W2A1-U-4000K  
Description: RLN LED 2x4 TUNABLE WHITE TROFFER  
WITH STANDARD LENS  
Light Source: (504) 90 CRI LEDS TUNED TO 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4408.0 lumens  
Efficiency: N/A  
Efficacy: 124.7 lumens/watt  
Spacing Criteria (0/90/45): 1.2 / 1.19 / 1.29  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

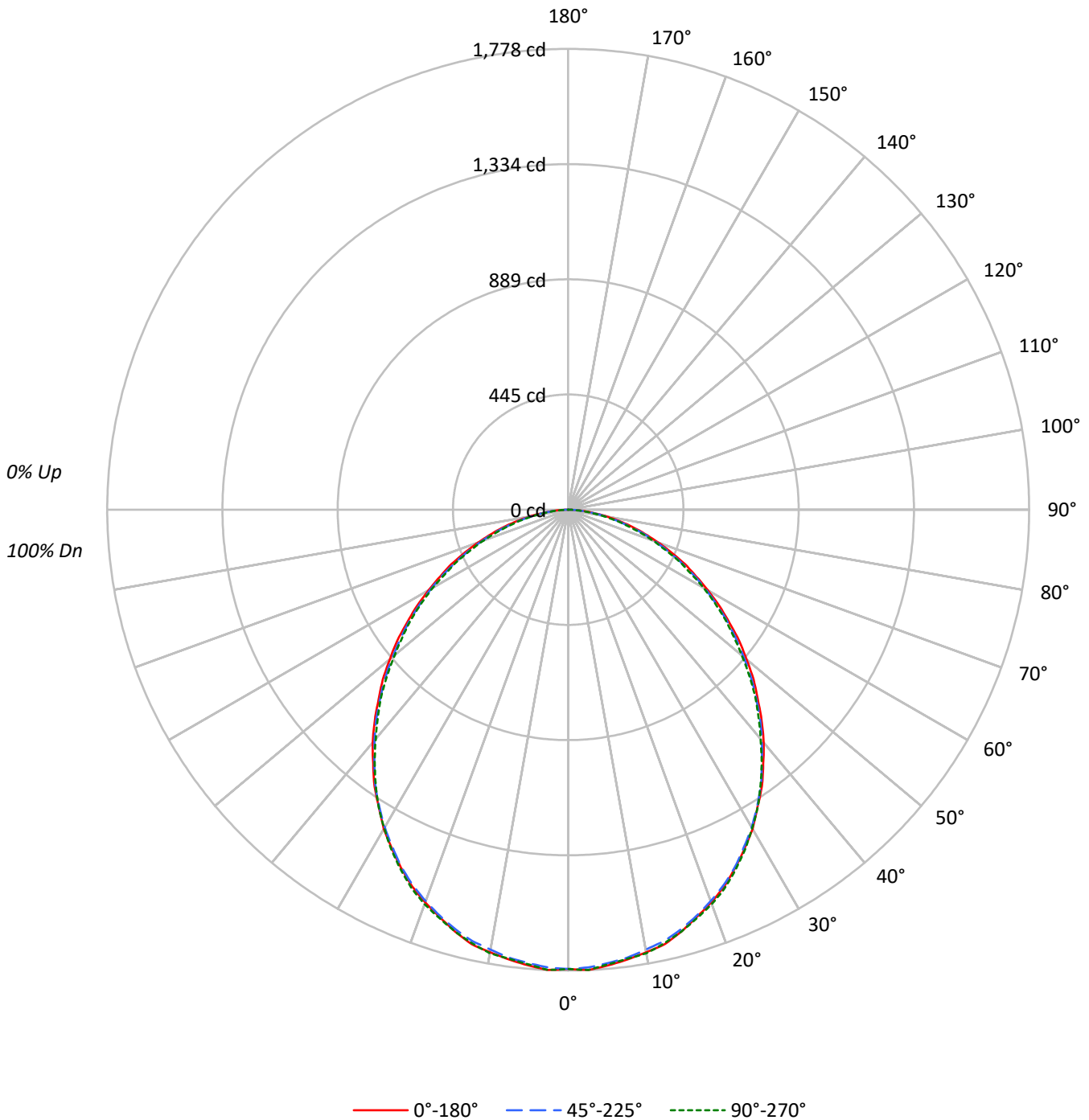
Input Watts (W): 35.34  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	105	101	97	107	102	99	95	98	95	92	94	92	90	91	89	87	85
2	100	92	85	80	97	90	84	79	86	81	77	83	79	75	80	77	74	72
3	91	81	73	67	89	80	72	66	77	70	65	74	69	64	71	67	63	61
4	84	72	64	57	82	71	63	57	68	62	56	66	60	55	64	59	55	52
5	77	65	56	50	75	64	55	49	62	54	49	60	53	48	58	52	48	46
6	72	59	50	44	70	58	49	43	56	48	43	54	48	43	53	47	42	40
7	66	53	45	39	65	52	44	39	51	44	38	49	43	38	48	42	38	36
8	62	49	40	35	60	48	40	35	47	39	34	45	39	34	44	38	34	32
9	58	45	37	31	57	44	36	31	43	36	31	42	36	31	41	35	31	29
10	54	41	34	28	53	41	33	28	40	33	28	39	33	28	38	32	28	26

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

	0°	45°	90°
0°	2384	2384	2384
5°	2384	2372	2378
10°	2368	2355	2374
15°	2347	2335	2347
20°	2309	2301	2319
25°	2263	2259	2272
30°	2209	2198	2205
35°	2140	2130	2126
40°	2061	2041	2028
45°	1967	1948	1940
50°	1878	1849	1828
55°	1778	1751	1735
60°	1672	1642	1623
65°	1580	1521	1507
70°	1449	1393	1365
75°	1331	1249	1198
80°	1168	1091	1025
85°	943	878	747



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	167.2	3.8
10°-20°	474.0	10.8
20°-30°	701.1	15.9
30°-40°	809.1	18.4
40°-50°	790.2	17.9
50°-60°	667.3	15.1
60°-70°	475.3	10.8
70°-80°	257.4	5.8
80°-90°	66.4	1.5
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°	1342.2	30.4
0°-40°	2151.3	48.8
0°-60°	3608.9	81.9
0°-90°	4408.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4408.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1772	1772	1772	1772	1772	
5°	1765	1765	1756	1760	1760	167
15°	1685	1678	1677	1684	1685	475
25°	1524	1516	1522	1527	1530	702
35°	1303	1293	1297	1293	1294	813
45°	1034	1025	1024	1020	1020	799
55°	758	748	747	740	740	680
65°	496	486	478	472	474	489
75°	256	247	240	235	230	271
85°	61	60	57	50	48	72
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1771.9	1771.9	1771.9	1771.9	1771.9
2.5°	1777.6	1770.5	1767.6	1769.0	1777.6
5°	1764.8	1764.8	1756.2	1760.5	1760.5
7.5°	1750.6	1752.0	1743.4	1750.6	1747.7
10°	1733.5	1729.2	1723.5	1734.9	1737.8
12.5°	1717.9	1707.9	1705.1	1712.2	1713.6
15°	1685.1	1678.0	1676.6	1683.7	1685.1
17.5°	1648.2	1649.6	1643.9	1653.9	1652.4
20°	1612.6	1609.8	1606.9	1618.3	1619.7
22.5°	1572.8	1564.3	1567.1	1577.1	1579.9
25°	1524.5	1515.9	1521.6	1527.3	1530.1
27.5°	1473.3	1469.0	1467.6	1474.7	1477.5
30°	1422.1	1415.0	1415.0	1423.5	1419.2
32.5°	1359.5	1353.8	1356.6	1359.5	1360.9
35°	1302.6	1292.7	1296.9	1292.7	1294.1
37.5°	1235.8	1228.7	1227.2	1225.8	1225.8
40°	1173.2	1167.5	1161.8	1161.8	1154.7
42.5°	1104.9	1097.8	1095.0	1090.7	1086.5
45°	1033.8	1025.3	1023.9	1019.6	1019.6
47.5°	969.8	957.0	955.6	947.1	947.1
50°	897.3	888.8	883.1	877.4	873.1
52.5°	831.9	823.4	814.8	809.2	804.9
55°	758.0	748.0	746.6	739.5	739.5
57.5°	691.1	682.6	676.9	668.4	669.8
60°	621.4	612.9	610.1	603.0	603.0
62.5°	556.0	548.9	544.7	537.5	531.9
65°	496.3	486.3	477.8	472.1	473.5
67.5°	430.9	419.5	415.2	409.6	405.3
70°	368.3	361.2	354.1	347.0	347.0
72.5°	310.0	302.9	298.6	290.1	287.3
75°	256.0	247.4	240.3	234.6	230.4
77.5°	201.9	193.4	189.1	182.0	182.0
80°	150.7	145.1	140.8	137.9	132.3
82.5°	103.8	101.0	96.7	92.4	88.2
85°	61.1	59.7	56.9	49.8	48.4
87.5°	24.2	24.2	21.3	19.9	18.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)