

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: P296017

Luminaire Tested: **24RLN-LD5-36-UNV-L92765-W2A1-U-5000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P296017  
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-LD5-36-UNV-L92765-W2A1-U-5000K  
Description: RLN LED 2x4 TUNABLE WHITE TROFFER WITH STANDARD LENS  
Light Source: (504) 90 CRI LEDS TUNED TO 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3395.0 lumens  
Efficiency: N/A  
Efficacy: 131.8 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

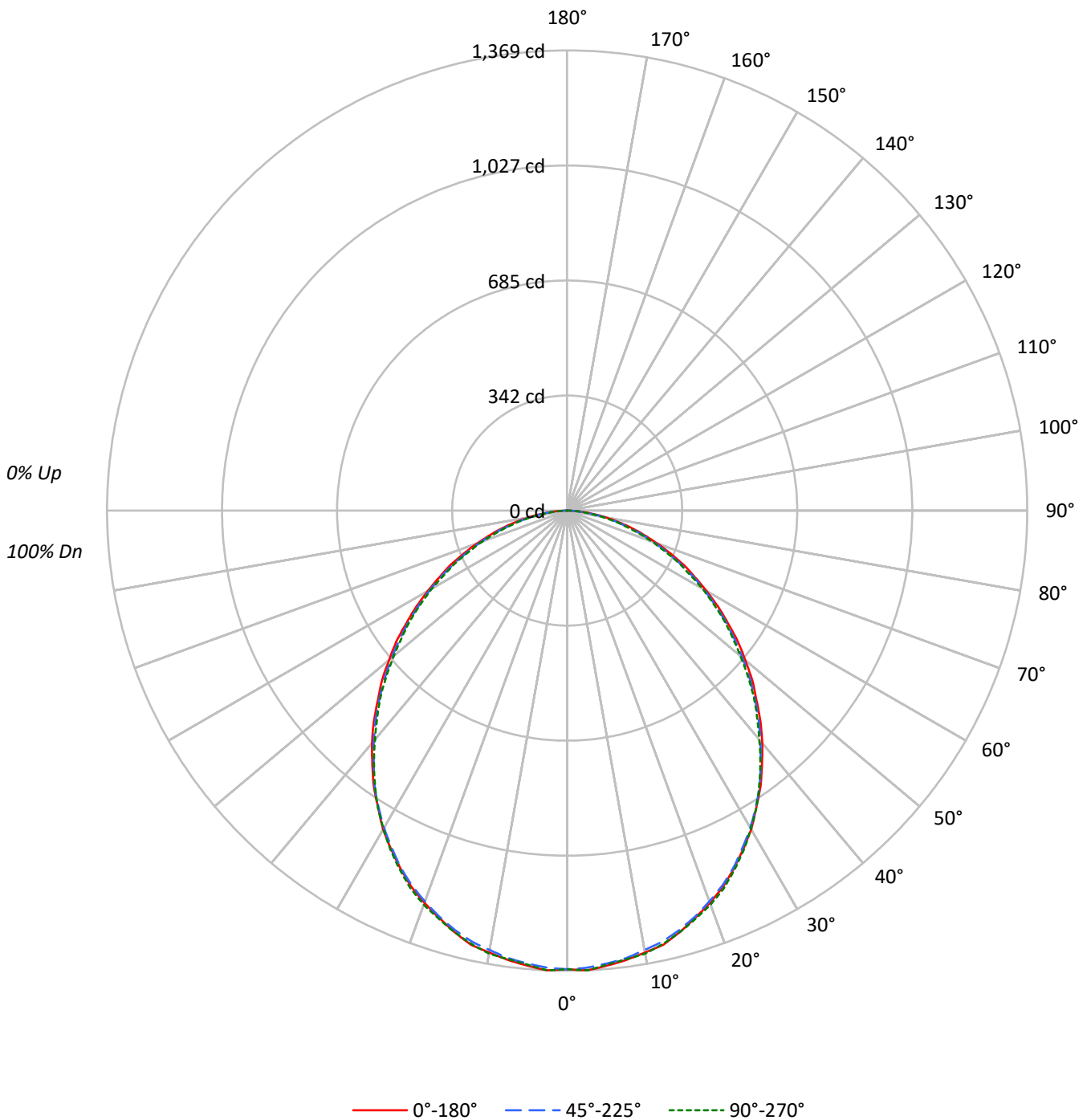
Input Watts (W): 25.761  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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

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

	0°	45°	90°
0°	1836	1836	1836
5°	1836	1827	1831
10°	1824	1814	1829
15°	1808	1799	1808
20°	1778	1772	1786
25°	1743	1740	1750
30°	1702	1693	1698
35°	1648	1641	1637
40°	1587	1572	1562
45°	1515	1501	1494
50°	1447	1424	1408
55°	1369	1349	1336
60°	1288	1264	1250
65°	1217	1172	1161
70°	1116	1073	1051
75°	1025	962	922
80°	900	840	790
85°	727	676	574



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	128.8	3.8
10°-20°	365.0	10.8
20°-30°	540.0	15.9
30°-40°	623.2	18.4
40°-50°	608.6	17.9
50°-60°	514.0	15.1
60°-70°	366.1	10.8
70°-80°	198.2	5.8
80°-90°	51.1	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°	1033.8	30.4
0°-40°	1656.9	48.8
0°-60°	2779.6	81.9
0°-90°	3395.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3395.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1365	1365	1365	1365	1365	
5°	1359	1359	1353	1356	1356	129
15°	1298	1292	1291	1297	1298	366
25°	1174	1168	1172	1176	1178	541
35°	1003	996	999	996	997	626
45°	796	790	789	785	785	616
55°	584	576	575	570	570	523
65°	382	375	368	364	365	377
75°	197	191	185	181	177	209
85°	47	46	44	38	37	55
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1364.7	1364.7	1364.7	1364.7	1364.7
2.5°	1369.1	1363.6	1361.4	1362.5	1369.1
5°	1359.2	1359.2	1352.6	1355.9	1355.9
7.5°	1348.3	1349.4	1342.8	1348.3	1346.1
10°	1335.1	1331.8	1327.5	1336.2	1338.4
12.5°	1323.1	1315.4	1313.2	1318.7	1319.8
15°	1297.9	1292.4	1291.3	1296.8	1297.9
17.5°	1269.4	1270.5	1266.1	1273.8	1272.7
20°	1242.0	1239.8	1237.6	1246.4	1247.5
22.5°	1211.4	1204.8	1207.0	1214.6	1216.8
25°	1174.1	1167.5	1171.9	1176.3	1178.5
27.5°	1134.7	1131.4	1130.3	1135.8	1138.0
30°	1095.3	1089.8	1089.8	1096.4	1093.1
32.5°	1047.1	1042.7	1044.9	1047.1	1048.2
35°	1003.3	995.6	998.9	995.6	996.7
37.5°	951.8	946.3	945.2	944.1	944.1
40°	903.6	899.2	894.8	894.8	889.4
42.5°	851.0	845.5	843.3	840.1	836.8
45°	796.3	789.7	788.6	785.3	785.3
47.5°	747.0	737.1	736.0	729.4	729.4
50°	691.1	684.5	680.2	675.8	672.5
52.5°	640.7	634.2	627.6	623.2	619.9
55°	583.8	576.1	575.0	569.5	569.5
57.5°	532.3	525.7	521.3	514.8	515.9
60°	478.6	472.1	469.9	464.4	464.4
62.5°	428.2	422.8	419.5	414.0	409.6
65°	382.2	374.6	368.0	363.6	364.7
67.5°	331.9	323.1	319.8	315.4	312.1
70°	283.7	278.2	272.7	267.2	267.2
72.5°	238.8	233.3	230.0	223.4	221.2
75°	197.1	190.6	185.1	180.7	177.4
77.5°	155.5	149.0	145.7	140.2	140.2
80°	116.1	111.7	108.4	106.2	101.9
82.5°	80.0	77.8	74.5	71.2	67.9
85°	47.1	46.0	43.8	38.3	37.2
87.5°	18.6	18.6	16.4	15.3	14.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)