

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: P260743

Luminaire Tested: **24CZ-LD5-50-UNV-L82765-W2A1-U-5000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P260743  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25697)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ-LD5-50-UNV-L82765-W2A1-U-5000K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER  
WITH RIBBED LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5175.0 lumens  
Efficiency: N/A  
Efficacy: 141.6 lumens/watt  
Spacing Criteria (0/90/45): 1.19 / 1.25 / 1.35  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

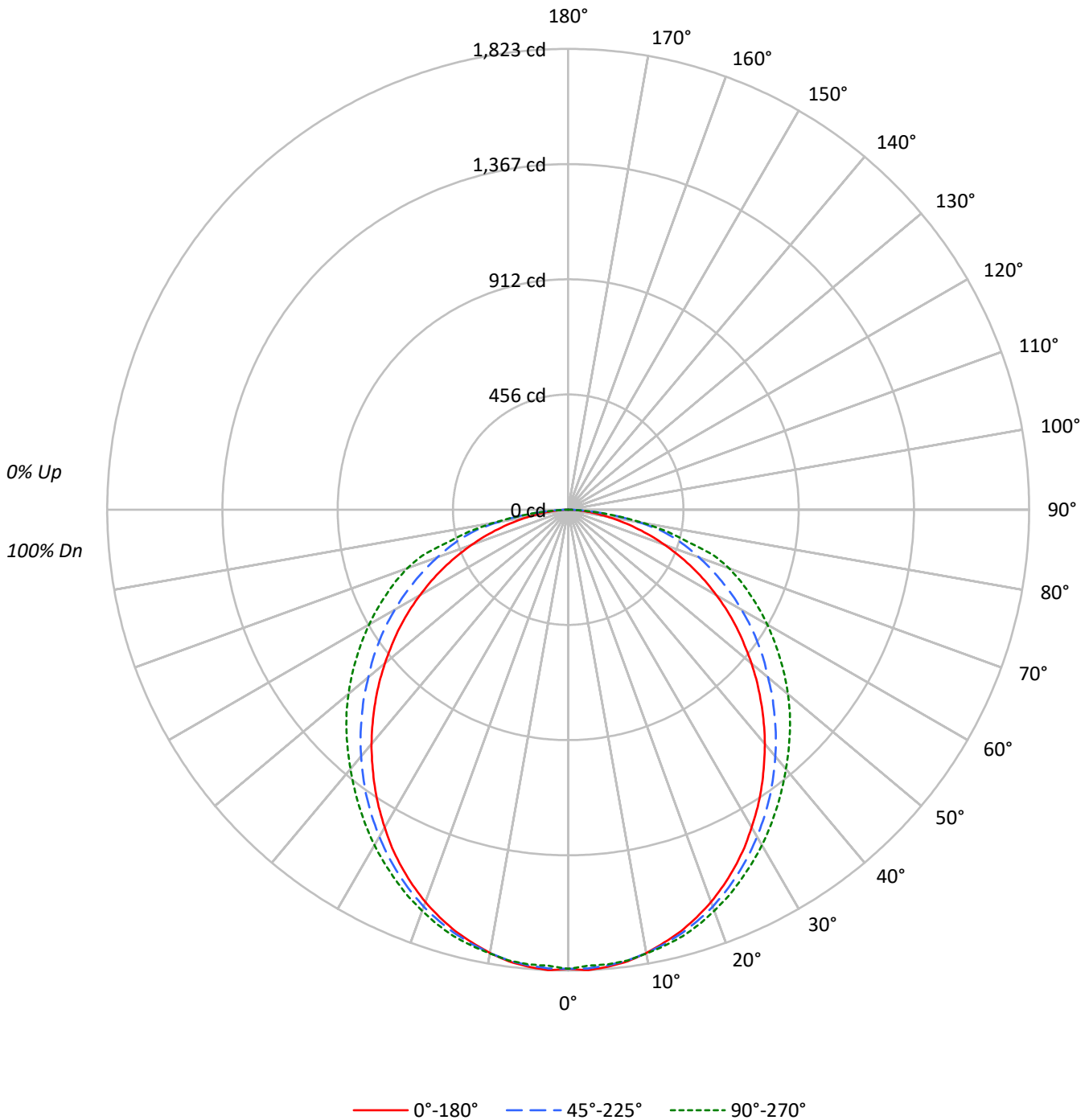
Input Watts (W): 36.549  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	108	103	99	95	106	101	97	93	97	93	90	93	90	88	89	87	85	83					83			
2	98	90	83	77	95	88	81	76	84	79	74	81	76	72	78	74	71	68					68			
3	89	78	70	63	87	77	69	63	74	67	62	71	65	61	68	64	60	57					57			
4	82	69	60	54	79	68	60	53	66	58	52	63	57	52	61	56	51	49					49			
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42					42			
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37					37			
7	64	51	42	35	63	50	41	35	48	41	35	47	40	35	45	39	35	32					32			
8	60	46	38	32	58	45	37	32	44	37	31	43	36	31	42	36	31	29					29			
9	56	42	34	28	54	42	34	28	41	33	28	40	33	28	38	32	28	26					26			
10	52	39	31	26	51	39	31	26	38	31	26	37	30	25	36	30	25	24					24			

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

	0°	45°	90°
0°	2444	2444	2444
5°	2451	2443	2439
10°	2433	2433	2435
15°	2404	2416	2434
20°	2365	2392	2418
25°	2315	2360	2399
30°	2255	2321	2381
35°	2191	2282	2363
40°	2126	2238	2353
45°	2053	2195	2360
50°	1981	2159	2374
55°	1908	2145	2398
60°	1822	2131	2446
65°	1726	2132	2527
70°	1596	2168	2663
75°	1428	2266	2533
80°	1195	2170	2320
85°	903	1669	1587



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	171.6	3.3
10°-20°	488.5	9.4
20°-30°	730.2	14.1
30°-40°	866.3	16.7
40°-50°	891.6	17.2
50°-60°	817.9	15.8
60°-70°	661.3	12.8
70°-80°	429.2	8.3
80°-90°	118.4	2.3
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°	1390.3	26.9
0°-40°	2256.6	43.6
0°-60°	3966.1	76.6
0°-90°	5175.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5175.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1816	1816	1816	1816	1816	
5°	1814	1802	1809	1807	1806	172
15°	1726	1719	1735	1742	1747	486
25°	1559	1561	1589	1604	1616	718
35°	1334	1345	1389	1419	1439	834
45°	1079	1097	1154	1208	1240	833
55°	813	838	914	989	1022	727
65°	542	574	670	758	794	536
75°	275	326	436	487	487	292
85°	58	99	108	104	103	72
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1816.2	1816.2	1816.2	1816.2	1816.2
2.5°	1823.2	1809.1	1816.2	1814.4	1805.5
5°	1814.4	1802.0	1809.1	1807.3	1805.5
7.5°	1802.0	1789.6	1798.4	1796.7	1798.4
10°	1780.7	1770.1	1780.7	1782.5	1782.5
12.5°	1754.1	1745.3	1759.5	1763.0	1766.5
15°	1725.8	1718.7	1734.7	1741.7	1747.1
17.5°	1690.4	1685.0	1704.5	1713.4	1720.5
20°	1651.4	1649.6	1670.9	1679.7	1688.6
22.5°	1607.1	1607.1	1631.9	1642.5	1654.9
25°	1559.2	1561.0	1589.4	1603.5	1615.9
27.5°	1507.9	1509.6	1543.3	1561.0	1575.2
30°	1451.2	1458.2	1493.7	1516.7	1532.7
32.5°	1394.5	1403.3	1442.3	1468.9	1486.6
35°	1334.2	1344.8	1389.1	1419.3	1438.7
37.5°	1272.2	1284.6	1332.4	1366.1	1389.1
40°	1210.2	1224.4	1274.0	1312.9	1339.5
42.5°	1144.6	1160.6	1215.5	1261.6	1289.9
45°	1079.1	1096.8	1153.5	1208.4	1240.3
47.5°	1013.5	1034.8	1095.0	1155.3	1188.9
50°	946.2	967.4	1031.2	1100.3	1134.0
52.5°	878.8	903.6	974.5	1045.4	1079.1
55°	813.3	838.1	914.3	988.7	1022.4
57.5°	746.0	770.8	854.0	932.0	965.7
60°	676.9	705.2	792.0	871.8	909.0
62.5°	609.5	639.6	731.8	816.8	852.3
65°	542.2	574.1	669.8	758.4	793.8
67.5°	473.1	510.3	609.5	699.9	737.1
70°	405.8	446.5	551.0	641.4	676.9
72.5°	340.2	384.5	492.6	584.7	606.0
75°	274.6	326.0	435.9	487.3	487.3
77.5°	212.6	269.3	372.1	391.6	402.2
80°	154.2	216.2	280.0	303.0	299.4
82.5°	102.8	164.8	200.2	200.2	194.9
85°	58.5	99.2	108.1	104.5	102.8
87.5°	24.8	37.2	33.7	26.6	23.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)