

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: P276192

Luminaire Tested: **24CZ2-35HE-UNV-L92765-W2A1-U-5500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P276192  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-5)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ2-35HE-UNV-L92765-W2A1-U-5500K  
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER  
WITH RIBBED LENS  
Light Source: (336) 90 CRI LEDS TUNED TO 5500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3124.6 lumens  
Efficiency: N/A  
Efficacy: 125.8 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.27 / 1.37  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

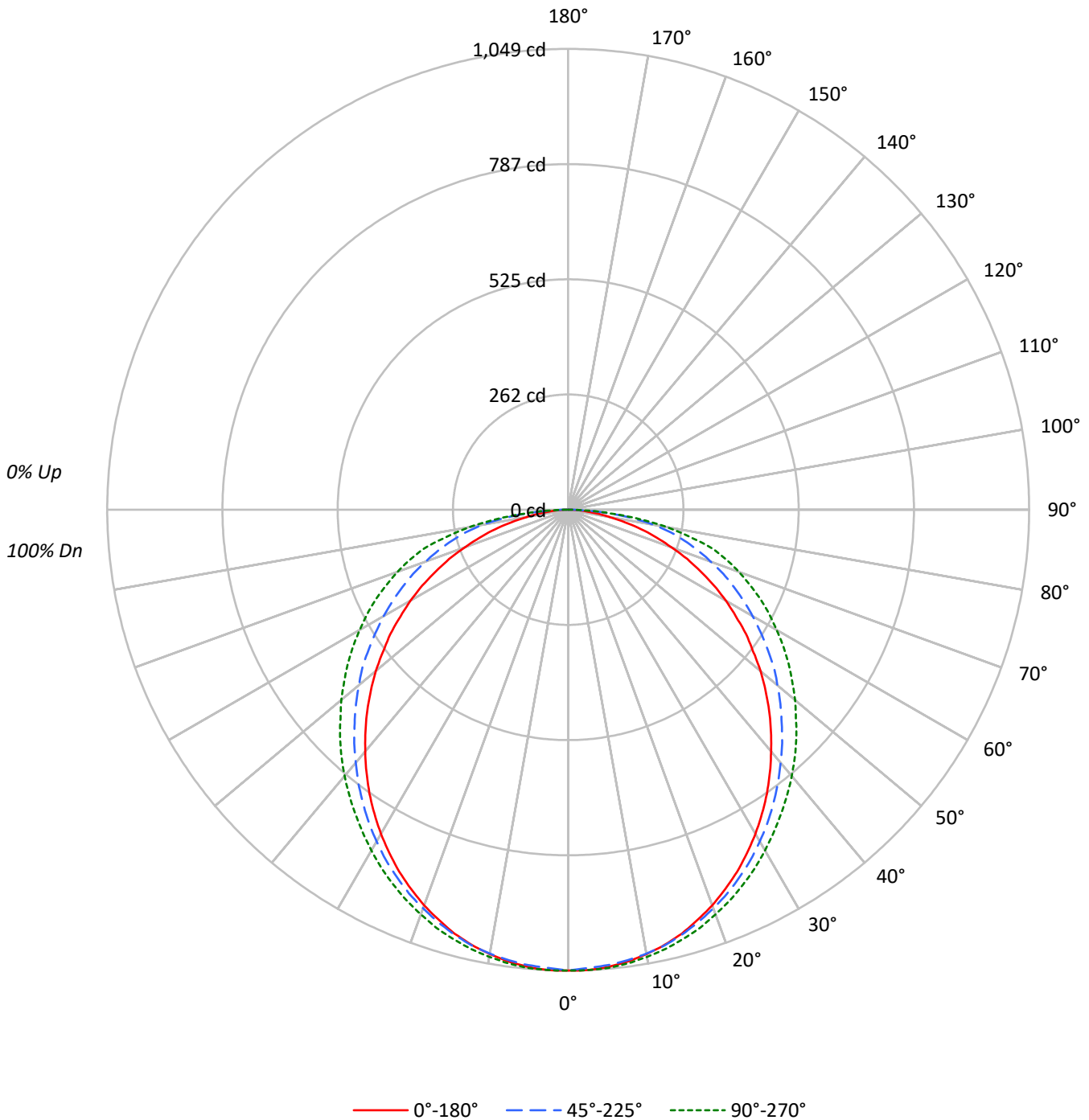
Input Watts (W): 24.831  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	108	103	98	94	105	100	96	92	96	93	89	92	89	87	89	86	84	82
2	98	89	82	76	95	87	80	75	83	78	73	80	75	71	77	73	70	67
3	89	78	69	62	86	76	68	62	73	66	61	70	64	60	68	63	58	56
4	81	69	59	52	79	67	59	52	65	57	51	62	56	51	60	55	50	48
5	74	61	52	45	72	60	51	45	58	50	44	56	49	44	54	48	43	41
6	69	55	46	39	67	54	45	39	52	44	39	50	44	38	49	43	38	36
7	64	50	41	35	62	49	40	34	47	40	34	46	39	34	45	38	34	32
8	59	45	37	31	58	45	36	31	43	36	30	42	35	30	41	35	30	28
9	55	42	33	28	54	41	33	28	40	33	27	39	32	27	38	32	27	25
10	52	38	30	25	51	38	30	25	37	30	25	36	29	25	35	29	25	23

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

	0°	45°	90°
0°	1412	1412	1412
5°	1411	1406	1414
10°	1403	1402	1412
15°	1392	1394	1409
20°	1372	1383	1404
25°	1350	1370	1398
30°	1324	1354	1392
35°	1295	1338	1387
40°	1262	1321	1390
45°	1230	1308	1397
50°	1196	1301	1410
55°	1160	1299	1436
60°	1114	1305	1473
65°	1056	1325	1537
70°	980	1358	1625
75°	895	1426	1762
80°	735	1535	1761
85°	563	1417	1513



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	99.2	3.2
10°-20°	283.3	9.1
20°-30°	426.3	13.6
30°-40°	510.8	16.3
40°-50°	532.3	17.0
50°-60°	495.3	15.9
60°-70°	407.9	13.1
70°-80°	277.8	8.9
80°-90°	91.7	2.9
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°	808.7	25.9
0°-40°	1319.6	42.2
0°-60°	2347.2	75.1
0°-90°	3124.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3124.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1049	1049	1049	1049	1049	
5°	1045	1045	1041	1046	1047	99
15°	999	1000	1001	1010	1012	281
25°	909	914	923	938	942	419
35°	788	798	814	836	845	493
45°	647	660	687	722	734	499
55°	494	511	554	598	612	441
65°	332	360	416	465	483	329
75°	172	211	274	323	339	181
85°	36	71	92	98	98	45
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1049.1	1049.1	1049.1	1049.1	1049.1
2.5°	1049.1	1049.1	1043.9	1049.1	1049.1
5°	1044.9	1044.9	1040.7	1046.0	1047.0
7.5°	1037.6	1038.7	1034.5	1040.7	1041.8
10°	1027.2	1028.2	1026.1	1032.4	1033.4
12.5°	1014.7	1015.7	1015.7	1023.0	1024.1
15°	999.0	1000.1	1001.1	1010.5	1011.5
17.5°	979.2	982.3	984.4	995.9	998.0
20°	958.4	961.5	965.7	978.2	980.3
22.5°	934.4	938.5	945.8	959.4	962.5
25°	909.3	913.5	922.9	938.5	941.7
27.5°	881.2	887.4	898.9	915.6	919.8
30°	852.0	858.2	871.8	889.5	895.8
32.5°	820.7	829.0	844.7	864.5	870.8
35°	788.4	797.8	814.4	836.3	844.7
37.5°	754.0	764.4	784.2	808.2	818.6
40°	718.5	731.0	751.9	780.0	791.5
42.5°	683.1	694.5	720.6	750.8	763.4
45°	646.6	660.1	687.2	721.6	734.2
47.5°	609.0	622.6	654.9	691.4	702.9
50°	571.5	585.0	621.5	660.1	673.7
52.5°	530.8	548.5	590.2	628.8	642.4
55°	494.3	511.0	553.7	597.5	612.1
57.5°	452.6	472.4	519.3	565.2	580.9
60°	414.0	434.9	484.9	531.8	547.5
62.5°	374.4	397.3	450.5	498.5	516.2
65°	331.6	359.8	416.1	465.1	482.8
67.5°	293.0	322.2	381.7	431.7	447.4
70°	249.2	284.7	345.2	395.2	413.0
72.5°	211.7	247.2	310.8	359.8	377.5
75°	172.1	210.7	274.3	323.3	338.9
77.5°	132.4	175.2	238.8	276.3	281.6
80°	94.9	139.7	198.1	220.0	227.3
82.5°	66.7	107.4	146.0	160.6	164.8
85°	36.5	70.9	91.8	98.0	98.0
87.5°	15.6	30.2	36.5	37.5	38.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)