

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: P263095

Luminaire Tested: **24CZ-LD5-50-SQP-UNV-L83050-W2A1-U-4500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P263095  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25695)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ-LD5-50-SQP-UNV-L83050-W2A1-U-4500K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER WITH SQP LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 4500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3527.0 lumens  
Efficiency: N/A  
Efficacy: 94.1 lumens/watt  
Spacing Criteria (0/90/45): 1.27 / 1.31 / 1.42  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

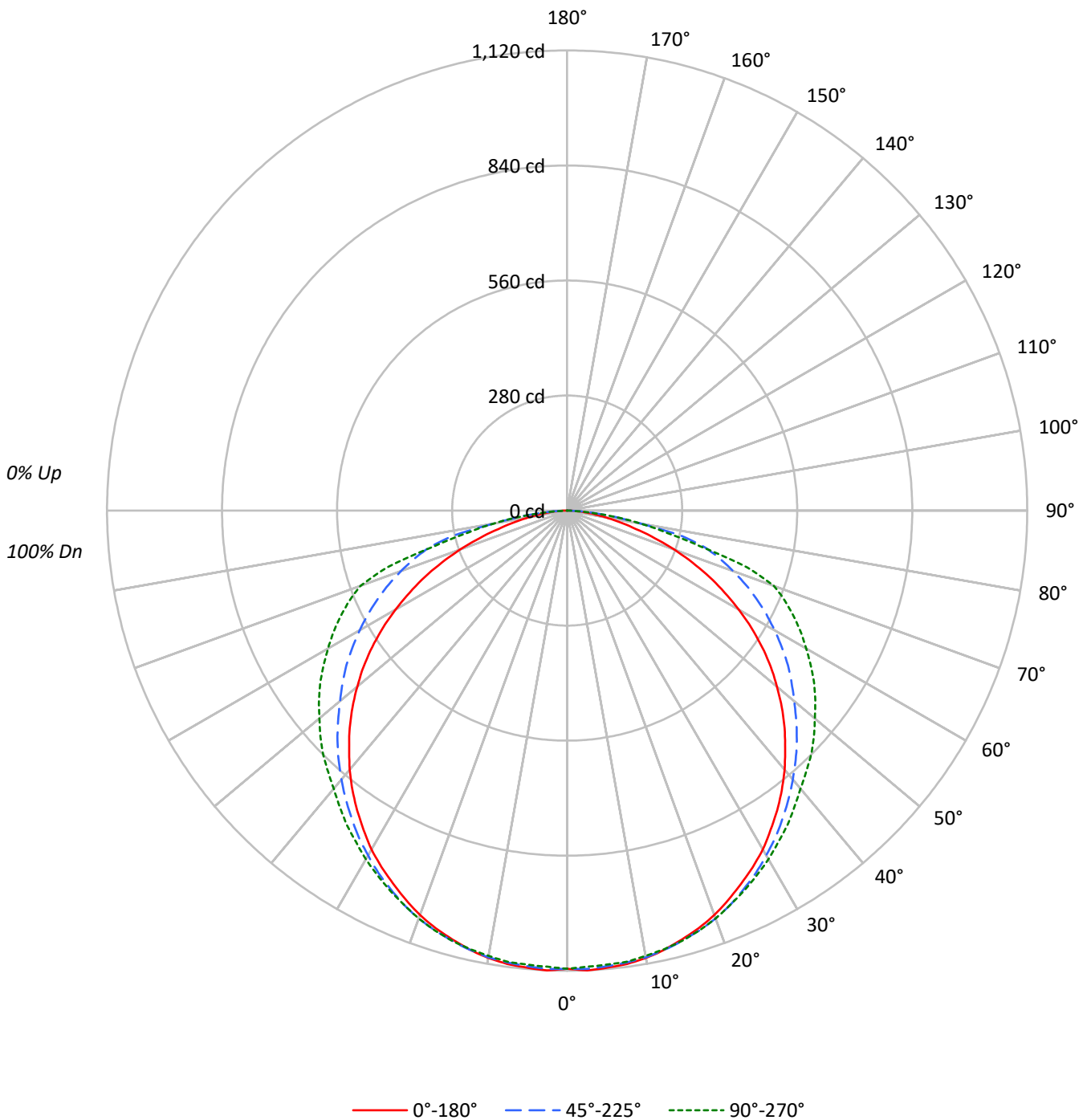
Input Watts (W): 37.461888  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	101	97	93	96	93	90	92	90	87	89	87	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	60	70	64	59	67	63	58	56
4	81	68	59	52	79	67	58	52	64	57	51	62	56	50	60	54	50	47
5	74	61	51	45	72	60	51	44	57	50	44	55	49	43	54	48	43	41
6	68	55	45	39	66	54	45	38	52	44	38	50	43	38	48	42	37	35
7	63	49	40	34	62	49	40	34	47	39	34	45	39	33	44	38	33	31
8	59	45	36	30	57	44	36	30	43	35	30	42	35	30	40	34	29	28
9	55	41	33	27	54	41	33	27	39	32	27	38	32	27	37	31	27	25
10	51	38	30	24	50	37	30	24	36	29	24	35	29	24	35	28	24	22

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

	0°	45°	90°
0°	1500	1500	1500
5°	1508	1503	1499
10°	1511	1508	1503
15°	1505	1510	1510
20°	1500	1513	1513
25°	1488	1509	1515
30°	1480	1506	1523
35°	1463	1502	1535
40°	1446	1501	1552
45°	1425	1505	1598
50°	1396	1510	1647
55°	1359	1539	1722
60°	1299	1569	1809
65°	1218	1618	1937
70°	1089	1691	2107
75°	900	1809	1743
80°	734	1398	1412
85°	591	928	872



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	105.9	3.0
10°-20°	305.6	8.7
20°-30°	467.0	13.2
30°-40°	571.2	16.2
40°-50°	611.1	17.3
50°-60°	585.2	16.6
60°-70°	495.0	14.0
70°-80°	313.8	8.9
80°-90°	72.2	2.0
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°	878.4	24.9
0°-40°	1449.6	41.1
0°-60°	2646.0	75.0
0°-90°	3527.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3527.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1115	1115	1115	1115	1115	
5°	1117	1111	1113	1111	1110	106
15°	1080	1078	1084	1084	1084	305
25°	1002	1002	1017	1020	1020	462
35°	891	896	915	927	935	557
45°	749	762	791	824	840	577
55°	579	598	656	710	734	517
65°	383	419	508	578	608	377
75°	173	244	348	346	335	188
85°	38	58	60	55	56	46
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1115.0	1115.0	1115.0	1115.0	1115.0
2.5°	1120.4	1115.0	1116.8	1115.0	1111.3
5°	1116.8	1111.3	1113.1	1111.3	1109.5
7.5°	1113.1	1107.7	1109.5	1107.7	1107.7
10°	1105.8	1100.4	1104.0	1102.2	1100.4
12.5°	1094.9	1091.3	1094.9	1093.1	1093.1
15°	1080.3	1078.5	1084.0	1084.0	1084.0
17.5°	1065.8	1063.9	1071.2	1071.2	1071.2
20°	1047.5	1045.7	1056.7	1056.7	1056.7
22.5°	1025.7	1023.9	1038.4	1038.4	1038.4
25°	1002.0	1002.0	1016.6	1020.2	1020.2
27.5°	978.3	978.3	994.7	1000.2	1000.2
30°	952.8	952.8	969.2	976.5	980.1
32.5°	921.8	925.5	943.7	952.8	956.5
35°	890.9	896.3	914.6	927.3	934.6
37.5°	858.1	863.5	885.4	900.0	909.1
40°	823.5	830.7	854.4	872.6	883.6
42.5°	785.2	796.1	823.5	847.1	861.7
45°	748.8	761.5	790.7	823.5	839.9
47.5°	708.7	723.3	756.1	798.0	814.4
50°	666.8	681.4	721.4	768.8	787.0
52.5°	624.9	641.3	688.6	739.7	761.5
55°	579.3	597.6	655.9	710.5	734.2
57.5°	532.0	553.8	619.4	677.7	703.2
60°	482.8	510.1	583.0	644.9	672.2
62.5°	431.8	464.6	546.5	612.1	641.3
65°	382.6	419.0	508.3	577.5	608.5
67.5°	329.7	375.3	470.0	544.7	573.9
70°	276.9	329.7	429.9	506.5	535.6
72.5°	224.1	287.8	389.9	459.1	459.1
75°	173.1	244.1	348.0	346.1	335.2
77.5°	131.2	204.0	286.0	244.1	245.9
80°	94.7	164.0	180.4	180.4	182.2
82.5°	63.8	125.7	116.6	114.8	118.4
85°	38.3	58.3	60.1	54.7	56.5
87.5°	18.2	20.0	16.4	10.9	10.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)