

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: P263101

Luminaire Tested: **24CZ-LD5-55-SQP-UNV-L83050-W2A1-U-5000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P263101  
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-LD5-55-SQP-UNV-L83050-W2A1-U-5000K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER WITH SQP LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3895.0 lumens  
Efficiency: N/A  
Efficacy: 92.6 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

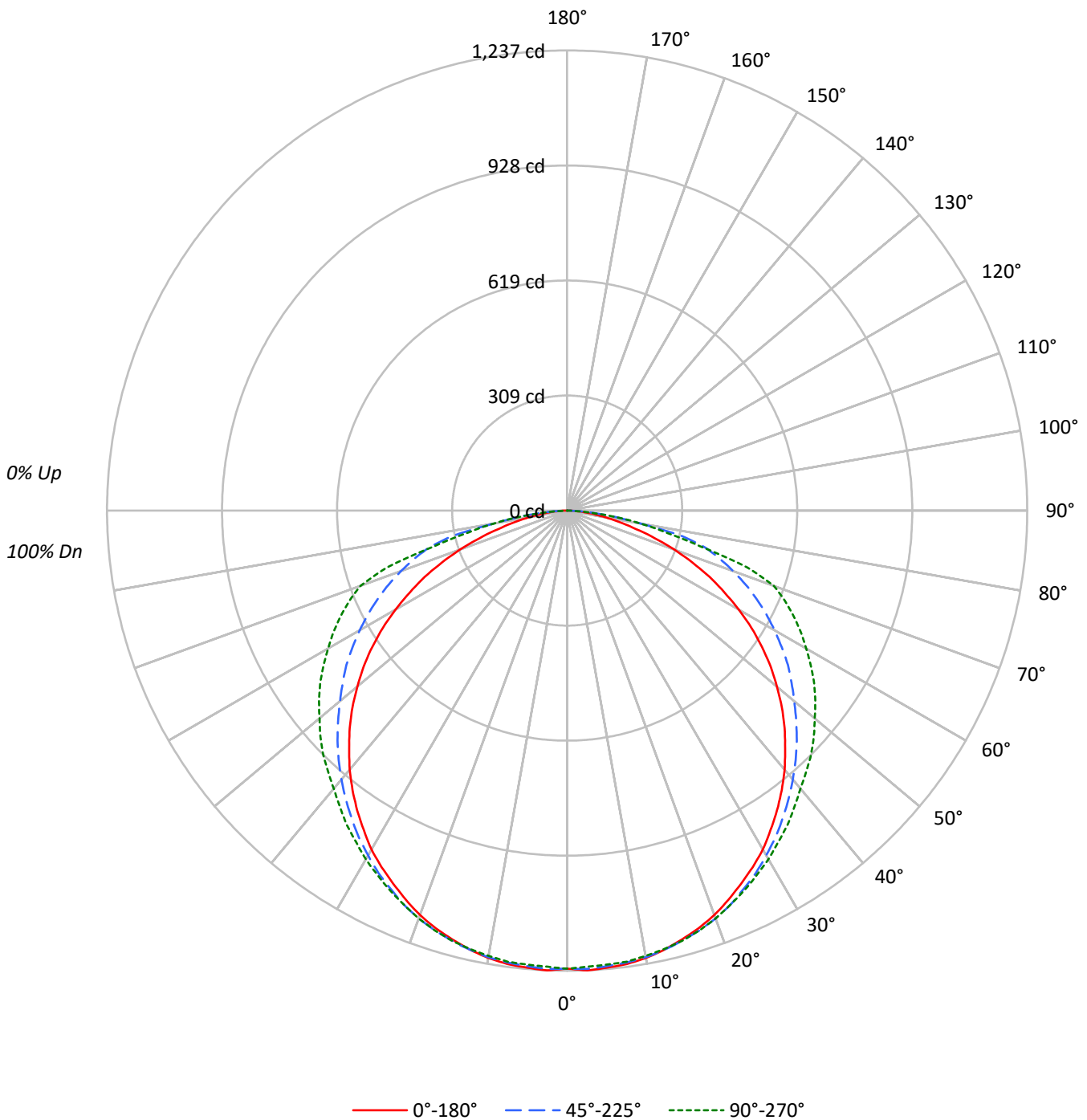
Input Watts (W): 42.047067  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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°	1657	1657	1657
5°	1666	1660	1655
10°	1668	1666	1660
15°	1662	1668	1668
20°	1656	1671	1671
25°	1643	1667	1673
30°	1635	1663	1682
35°	1616	1659	1695
40°	1597	1657	1714
45°	1573	1662	1765
50°	1541	1668	1819
55°	1501	1699	1902
60°	1435	1732	1998
65°	1345	1787	2139
70°	1203	1868	2327
75°	993	1998	1925
80°	810	1543	1559
85°	651	1025	963



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	116.9	3.0
10°-20°	337.4	8.7
20°-30°	515.7	13.2
30°-40°	630.8	16.2
40°-50°	674.9	17.3
50°-60°	646.3	16.6
60°-70°	546.7	14.0
70°-80°	346.6	8.9
80°-90°	79.7	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°	970.1	24.9
0°-40°	1600.9	41.1
0°-60°	2922.0	75.0
0°-90°	3895.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3895.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1231	1231	1231	1231	1231	
5°	1233	1227	1229	1227	1225	117
15°	1193	1191	1197	1197	1197	337
25°	1106	1106	1123	1127	1127	511
35°	984	990	1010	1024	1032	615
45°	827	841	873	909	928	637
55°	640	660	724	785	811	571
65°	422	463	561	638	672	416
75°	191	270	384	382	370	208
85°	42	64	66	60	62	50
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1231.3	1231.3	1231.3	1231.3	1231.3
2.5°	1237.3	1231.3	1233.3	1231.3	1227.3
5°	1233.3	1227.3	1229.3	1227.3	1225.2
7.5°	1229.3	1223.2	1225.2	1223.2	1223.2
10°	1221.2	1215.2	1219.2	1217.2	1215.2
12.5°	1209.2	1205.1	1209.2	1207.1	1207.1
15°	1193.1	1191.0	1197.1	1197.1	1197.1
17.5°	1177.0	1174.9	1183.0	1183.0	1183.0
20°	1156.8	1154.8	1166.9	1166.9	1166.9
22.5°	1132.7	1130.7	1146.8	1146.8	1146.8
25°	1106.5	1106.5	1122.6	1126.7	1126.7
27.5°	1080.4	1080.4	1098.5	1104.5	1104.5
30°	1052.2	1052.2	1070.3	1078.4	1082.4
32.5°	1018.0	1022.0	1042.2	1052.2	1056.2
35°	983.8	989.9	1010.0	1024.1	1032.1
37.5°	947.6	953.6	977.8	993.9	1003.9
40°	909.4	917.4	943.6	963.7	975.8
42.5°	867.1	879.2	909.4	935.5	951.6
45°	826.9	841.0	873.2	909.4	927.5
47.5°	782.6	798.7	834.9	881.2	899.3
50°	736.4	752.5	796.7	849.0	869.1
52.5°	690.1	708.2	760.5	816.8	841.0
55°	639.8	659.9	724.3	784.6	810.8
57.5°	587.5	611.6	684.0	748.4	776.6
60°	533.2	563.3	643.8	712.2	742.4
62.5°	476.8	513.0	603.6	676.0	708.2
65°	422.5	462.7	561.3	637.8	672.0
67.5°	364.2	414.5	519.1	601.6	633.7
70°	305.8	364.2	474.8	559.3	591.5
72.5°	247.5	317.9	430.5	507.0	507.0
75°	191.1	269.6	384.3	382.3	370.2
77.5°	144.9	225.3	315.9	269.6	271.6
80°	104.6	181.1	199.2	199.2	201.2
82.5°	70.4	138.8	128.8	126.7	130.8
85°	42.2	64.4	66.4	60.4	62.4
87.5°	20.1	22.1	18.1	12.1	12.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)