

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: P263119

Luminaire Tested: **24CZ-LD5-75-SQP-UNV-L83050-W2A1-U-4000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P263119  
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-LD5-75-SQP-UNV-L83050-W2A1-U-4000K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER WITH SQP LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5240.0 lumens  
Efficiency: N/A  
Efficacy: 87.7 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

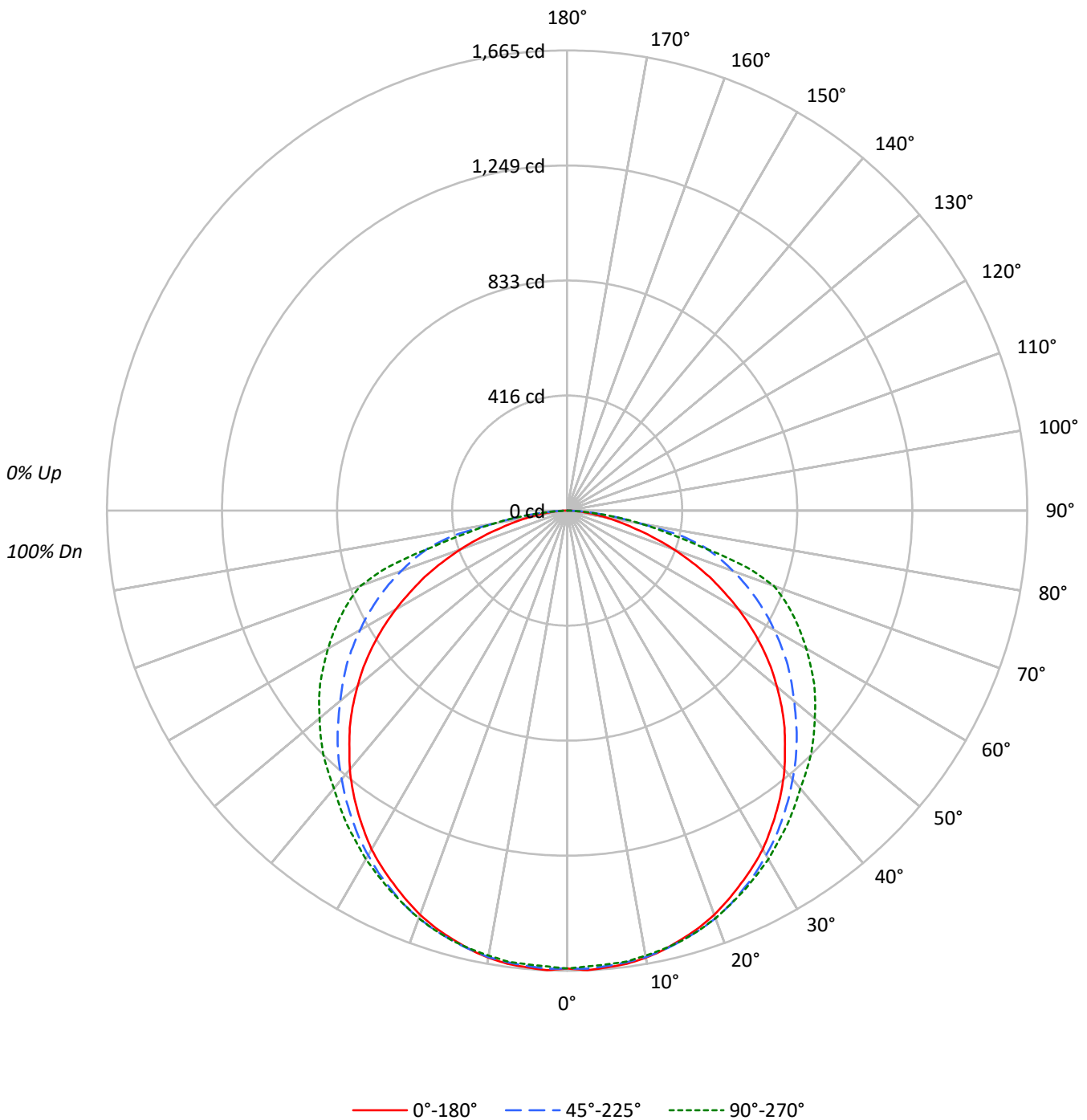
Input Watts (W): 59.747292  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	98	94	105	101	97	93	96	93	90	92	90	87	89	87	84	82					82			
2	98	89	82	76	95	87	80	75	83	78	73	80	75	71	77	73	70	67					67			
3	89	78	69	62	86	76	68	62	73	66	60	70	64	59	67	63	58	56					56			
4	81	68	59	52	79	67	58	52	64	57	51	62	56	50	60	54	50	47					47			
5	74	61	51	45	72	60	51	44	57	50	44	55	49	43	54	48	43	41					41			
6	68	55	45	39	66	54	45	38	52	44	38	50	43	38	48	42	37	35					35			
7	63	49	40	34	62	49	40	34	47	39	34	45	39	33	44	38	33	31					31			
8	59	45	36	30	57	44	36	30	43	35	30	42	35	30	40	34	29	28					28			
9	55	41	33	27	54	41	33	27	39	32	27	38	32	27	37	31	27	25					25			
10	51	38	30	24	50	37	30	24	36	29	24	35	29	24	35	28	24	22					22			

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

	0°	45°	90°
0°	2229	2229	2229
5°	2241	2234	2226
10°	2245	2241	2234
15°	2236	2243	2243
20°	2228	2248	2248
25°	2210	2242	2250
30°	2199	2237	2262
35°	2174	2232	2281
40°	2149	2230	2306
45°	2117	2235	2374
50°	2074	2244	2448
55°	2019	2286	2559
60°	1930	2331	2687
65°	1810	2404	2878
70°	1618	2513	3131
75°	1337	2688	2589
80°	1090	2077	2097
85°	877	1379	1295



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	157.3	3.0
10°-20°	454.0	8.7
20°-30°	693.8	13.2
30°-40°	848.6	16.2
40°-50°	908.0	17.3
50°-60°	869.4	16.6
60°-70°	735.5	14.0
70°-80°	466.2	8.9
80°-90°	107.3	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°	1305.1	24.9
0°-40°	2153.7	41.1
0°-60°	3931.1	75.0
0°-90°	5240.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5240.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1656	1656	1656	1656	1656	
5°	1659	1651	1654	1651	1648	158
15°	1605	1602	1610	1610	1610	453
25°	1489	1489	1510	1516	1516	687
35°	1324	1332	1359	1378	1388	828
45°	1112	1131	1175	1223	1248	857
55°	861	888	974	1056	1091	768
65°	568	622	755	858	904	560
75°	257	363	517	514	498	280
85°	57	87	89	81	84	68
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1656.5	1656.5	1656.5	1656.5	1656.5
2.5°	1664.6	1656.5	1659.2	1656.5	1651.0
5°	1659.2	1651.0	1653.8	1651.0	1648.3
7.5°	1653.8	1645.6	1648.3	1645.6	1645.6
10°	1642.9	1634.8	1640.2	1637.5	1634.8
12.5°	1626.7	1621.3	1626.7	1624.0	1624.0
15°	1605.0	1602.3	1610.4	1610.4	1610.4
17.5°	1583.4	1580.7	1591.5	1591.5	1591.5
20°	1556.3	1553.6	1569.8	1569.8	1569.8
22.5°	1523.8	1521.1	1542.8	1542.8	1542.8
25°	1488.7	1488.7	1510.3	1515.7	1515.7
27.5°	1453.5	1453.5	1477.8	1485.9	1485.9
30°	1415.6	1415.6	1439.9	1450.8	1456.2
32.5°	1369.6	1375.0	1402.0	1415.6	1421.0
35°	1323.5	1331.7	1358.7	1377.7	1388.5
37.5°	1274.8	1282.9	1315.4	1337.1	1350.6
40°	1223.4	1234.2	1269.4	1296.5	1312.7
42.5°	1166.6	1182.8	1223.4	1258.6	1280.2
45°	1112.4	1131.4	1174.7	1223.4	1247.8
47.5°	1052.9	1074.5	1123.3	1185.5	1209.9
50°	990.6	1012.3	1071.8	1142.2	1169.3
52.5°	928.4	952.7	1023.1	1098.9	1131.4
55°	860.7	887.8	974.4	1055.6	1090.8
57.5°	790.3	822.8	920.3	1006.9	1044.8
60°	717.3	757.9	866.1	958.1	998.7
62.5°	641.5	690.2	812.0	909.4	952.7
65°	568.4	622.5	755.2	858.0	904.0
67.5°	489.9	557.6	698.3	809.3	852.6
70°	411.4	489.9	638.8	752.4	795.8
72.5°	332.9	427.6	579.2	682.1	682.1
75°	257.1	362.7	517.0	614.3	498.0
77.5°	194.9	303.1	424.9	362.7	365.4
80°	140.7	243.6	268.0	268.0	270.7
82.5°	94.7	186.8	173.2	170.5	175.9
85°	56.8	86.6	89.3	81.2	83.9
87.5°	27.1	29.8	24.4	16.2	16.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)