

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: P276592

Luminaire Tested: **24CZ2-50-S-UNV-L82765-W2A1-U-4500K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P276592
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-1)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ2-50-S-UNV-L82765-W2A1-U-4500K
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER
WITH SMOOTH LENS
Light Source: (168) 80 CRI LEDS TUNED TO 4500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5050.5 lumens
Efficiency: N/A
Efficacy: 124.8 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.26 / 1.35
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

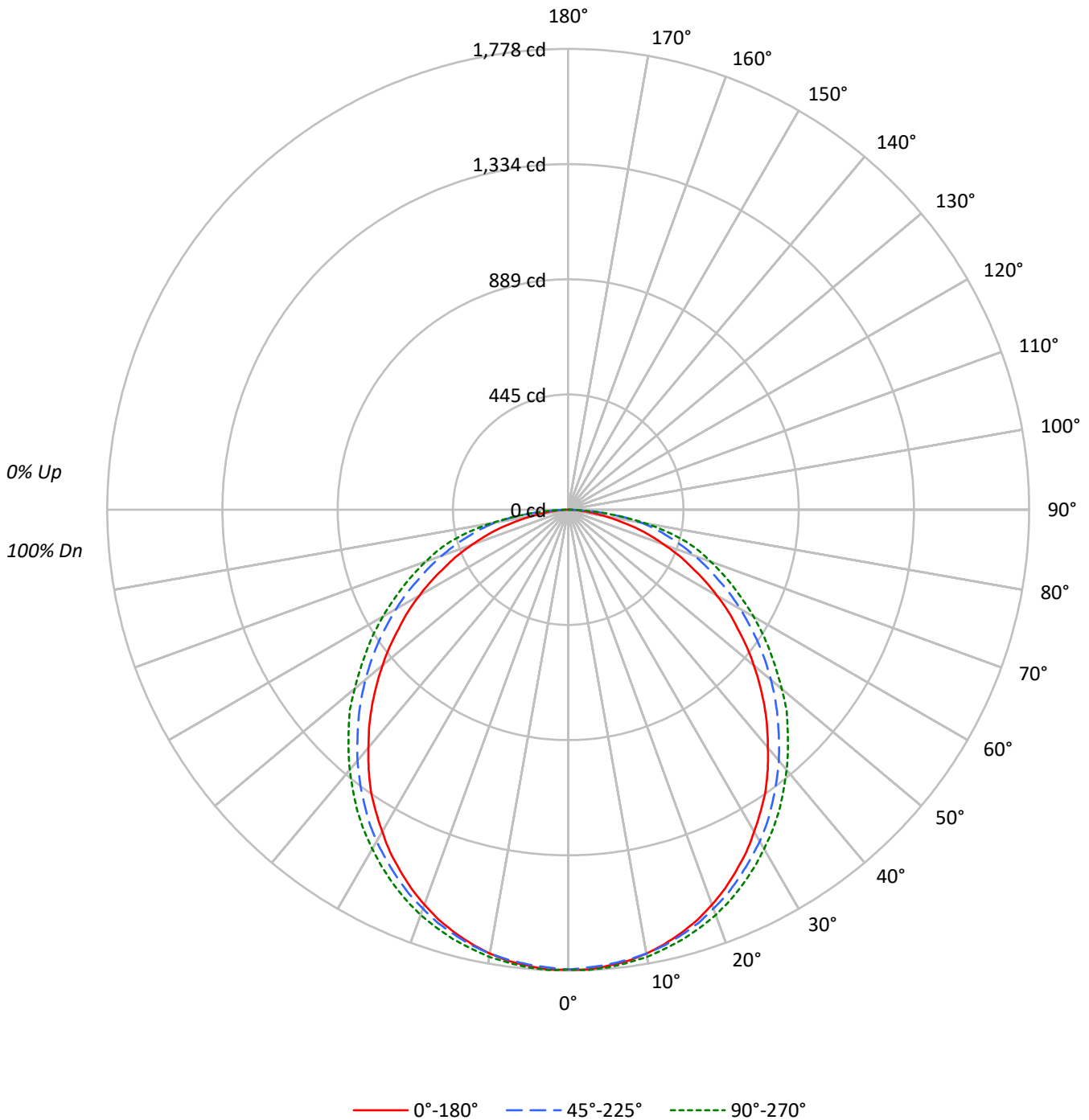
Input Watts (W): 40.455
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	96	88	81	76	84	79	74	81	76	72	78	74	71	69					69			
3	89	79	70	64	87	77	69	63	74	67	62	71	66	61	69	64	60	58					58			
4	82	70	61	54	80	68	60	54	66	59	53	63	57	52	61	56	51	49					49			
5	75	62	53	46	73	61	53	46	59	51	46	57	50	45	55	49	45	42					42			
6	70	56	47	40	68	55	47	40	53	46	40	52	45	40	50	44	39	37					37			
7	64	51	42	36	63	50	42	36	48	41	35	47	40	35	46	39	35	33					33			
8	60	46	38	32	58	46	37	32	44	37	32	43	36	31	42	36	31	29					29			
9	56	43	34	29	55	42	34	29	41	34	28	40	33	28	39	33	28	26					26			
10	53	39	31	26	51	39	31	26	38	31	26	37	30	26	36	30	26	24					24			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2387	2387	2387
5°	2385	2379	2394
10°	2376	2376	2393
15°	2353	2364	2389
20°	2322	2345	2382
25°	2279	2322	2367
30°	2228	2295	2348
35°	2179	2258	2329
40°	2105	2220	2302
45°	2036	2176	2277
50°	1958	2136	2250
55°	1870	2096	2228
60°	1783	2063	2223
65°	1670	2028	2237
70°	1546	2039	2297
75°	1384	2077	2427
80°	1119	2200	2374
85°	841	1931	1882



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	168.0	3.3
10°-20°	480.0	9.5
20°-30°	721.5	14.3
30°-40°	859.4	17.0
40°-50°	879.6	17.4
50°-60°	791.9	15.7
60°-70°	621.9	12.3
70°-80°	403.6	8.0
80°-90°	124.8	2.5
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°	1369.4	27.1
0°-40°	2228.8	44.1
0°-60°	3900.2	77.2
0°-90°	5050.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5050.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1774	1774	1774	1774	1774	
5°	1766	1770	1761	1771	1773	168
15°	1689	1694	1697	1712	1715	476
25°	1535	1548	1564	1590	1595	707
35°	1327	1343	1375	1408	1418	828
45°	1070	1096	1144	1187	1197	825
55°	797	833	894	940	950	715
65°	525	565	637	690	703	522
75°	266	318	400	454	467	282
85°	54	101	125	122	122	66
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1774.3	1774.3	1774.3	1774.3	1774.3
2.5°	1775.9	1775.9	1767.9	1775.9	1777.5
5°	1766.2	1769.5	1761.4	1771.1	1772.7
7.5°	1756.6	1756.6	1751.8	1761.4	1763.0
10°	1739.0	1740.6	1739.0	1750.2	1751.8
12.5°	1716.5	1719.7	1721.3	1732.6	1734.2
15°	1689.2	1694.1	1697.3	1711.7	1714.9
17.5°	1658.8	1663.6	1671.6	1687.6	1690.8
20°	1621.9	1628.3	1637.9	1658.8	1663.6
22.5°	1581.8	1588.2	1604.2	1623.5	1631.5
25°	1535.2	1548.1	1564.1	1589.8	1594.6
27.5°	1488.7	1499.9	1520.8	1548.1	1554.5
30°	1434.2	1451.8	1477.5	1504.8	1511.2
32.5°	1381.2	1398.9	1429.4	1458.2	1466.3
35°	1326.7	1342.7	1374.8	1408.5	1418.1
37.5°	1264.1	1285.0	1320.3	1354.0	1363.6
40°	1198.4	1224.0	1264.1	1299.4	1310.6
42.5°	1135.8	1163.1	1203.2	1241.7	1254.5
45°	1070.0	1095.7	1143.8	1187.1	1196.7
47.5°	1002.6	1031.5	1082.8	1126.2	1142.2
50°	935.3	965.7	1020.3	1065.2	1074.8
52.5°	867.9	900.0	957.7	1005.8	1010.7
55°	797.3	832.6	893.6	940.1	949.7
57.5°	733.1	763.6	829.4	877.5	888.7
60°	662.5	696.2	766.8	811.7	826.2
62.5°	595.2	630.5	704.3	749.2	762.0
65°	524.6	564.7	636.9	689.8	702.6
67.5°	463.6	502.1	579.1	630.5	643.3
70°	393.0	436.3	518.2	571.1	583.9
72.5°	332.1	377.0	458.8	510.1	529.4
75°	266.3	317.6	399.5	454.0	466.8
77.5°	202.1	261.5	344.9	386.6	386.6
80°	144.4	206.9	283.9	303.2	306.4
82.5°	94.6	155.6	210.2	208.5	208.5
85°	54.5	101.1	125.1	121.9	121.9
87.5°	20.9	41.7	44.9	44.9	43.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)