

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: P276589

Luminaire Tested: **24CZ2-50-S-UNV-L82765-W2A1-U-3000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P276589
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-3000K
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER
WITH SMOOTH LENS
Light Source: (168) 80 CRI LEDS TUNED TO 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4693.6 lumens
Efficiency: N/A
Efficacy: 119.0 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

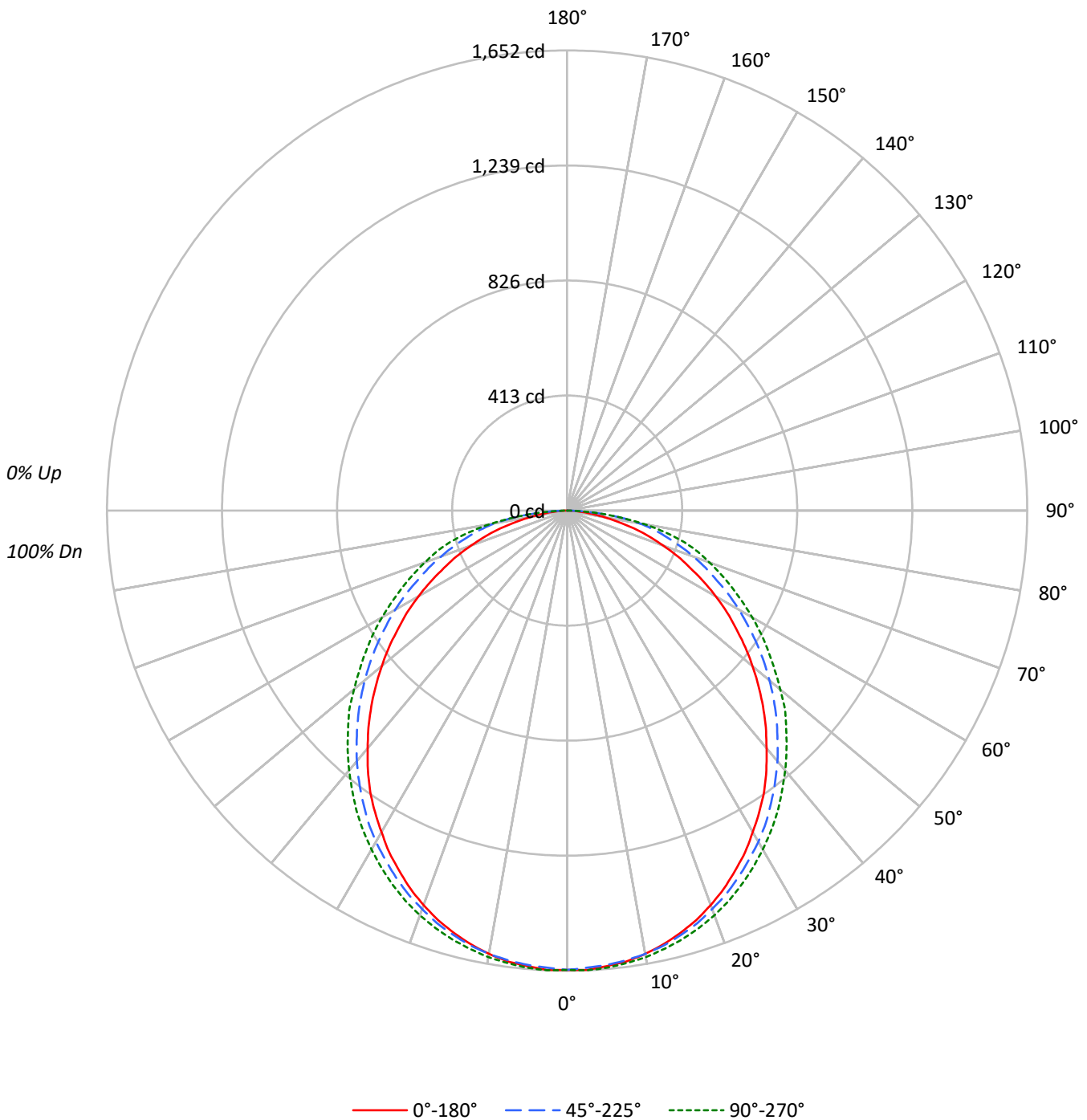
Input Watts (W): 39.432
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	99	95	106	101	97	93	97	93	90	93	90	88	89	87	85	83
2	98	90	83	77	96	88	81	76	84	79	74	81	76	72	78	74	71	69
3	89	79	70	64	87	77	69	63	74	67	62	71	66	61	69	64	60	58
4	82	70	61	54	80	68	60	54	66	59	53	63	57	52	61	56	51	49
5	75	62	53	46	73	61	53	46	59	51	46	57	50	45	55	49	45	42
6	70	56	47	40	68	55	47	40	53	46	40	52	45	40	50	44	39	37
7	64	51	42	36	63	50	42	36	48	41	35	47	40	35	46	39	35	33
8	60	46	38	32	58	46	37	32	44	37	32	43	36	31	42	36	31	29
9	56	43	34	29	55	42	34	29	41	34	28	40	33	28	39	33	28	26
10	53	39	31	26	51	39	31	26	38	31	26	37	30	26	36	30	26	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2219	2219	2219
5°	2217	2211	2225
10°	2208	2208	2224
15°	2187	2197	2220
20°	2158	2180	2214
25°	2118	2158	2200
30°	2071	2133	2182
35°	2025	2099	2165
40°	1956	2063	2139
45°	1892	2023	2116
50°	1819	1985	2091
55°	1738	1948	2070
60°	1657	1918	2066
65°	1552	1884	2079
70°	1437	1895	2135
75°	1287	1930	2255
80°	1040	2045	2207
85°	783	1795	1749



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	156.1	3.3
10°-20°	446.0	9.5
20°-30°	670.5	14.3
30°-40°	798.7	17.0
40°-50°	817.4	17.4
50°-60°	735.9	15.7
60°-70°	577.9	12.3
70°-80°	375.1	8.0
80°-90°	116.0	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°	1272.6	27.1
0°-40°	2071.3	44.1
0°-60°	3624.6	77.2
0°-90°	4693.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4693.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1649	1649	1649	1649	1649	
5°	1642	1644	1637	1646	1647	156
15°	1570	1574	1577	1591	1594	443
25°	1427	1439	1454	1478	1482	657
35°	1233	1248	1278	1309	1318	769
45°	994	1018	1063	1103	1112	767
55°	741	774	830	874	883	664
65°	488	525	592	641	653	485
75°	248	295	371	422	434	262
85°	51	94	116	113	113	61
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1648.9	1648.9	1648.9	1648.9	1648.9
2.5°	1650.4	1650.4	1642.9	1650.4	1651.9
5°	1641.5	1644.4	1637.0	1645.9	1647.4
7.5°	1632.5	1632.5	1628.0	1637.0	1638.5
10°	1616.1	1617.6	1616.1	1626.5	1628.0
12.5°	1595.2	1598.2	1599.7	1610.1	1611.6
15°	1569.9	1574.4	1577.3	1590.8	1593.7
17.5°	1541.6	1546.0	1553.5	1568.4	1571.4
20°	1507.3	1513.2	1522.2	1541.6	1546.0
22.5°	1470.0	1476.0	1490.9	1508.8	1516.2
25°	1426.8	1438.7	1453.6	1477.5	1481.9
27.5°	1383.5	1394.0	1413.3	1438.7	1444.7
30°	1332.8	1349.2	1373.1	1398.4	1404.4
32.5°	1283.6	1300.0	1328.4	1355.2	1362.7
35°	1233.0	1247.9	1277.7	1309.0	1317.9
37.5°	1174.8	1194.2	1227.0	1258.3	1267.2
40°	1113.7	1137.5	1174.8	1207.6	1218.0
42.5°	1055.5	1080.9	1118.2	1153.9	1165.9
45°	994.4	1018.3	1063.0	1103.2	1112.2
47.5°	931.8	958.6	1006.3	1046.6	1061.5
50°	869.2	897.5	948.2	989.9	998.9
52.5°	806.6	836.4	890.1	934.8	939.3
55°	741.0	773.8	830.4	873.7	882.6
57.5°	681.3	709.7	770.8	815.5	825.9
60°	615.7	647.0	712.6	754.4	767.8
62.5°	553.1	585.9	654.5	696.2	708.2
65°	487.5	524.8	591.9	641.1	653.0
67.5°	430.9	466.6	538.2	585.9	597.8
70°	365.3	405.5	481.6	530.8	542.7
72.5°	308.6	350.4	426.4	474.1	492.0
75°	247.5	295.2	371.2	421.9	433.8
77.5°	187.9	243.0	320.5	359.3	359.3
80°	134.2	192.3	263.9	281.8	284.8
82.5°	88.0	144.6	195.3	193.8	193.8
85°	50.7	93.9	116.3	113.3	113.3
87.5°	19.4	38.8	41.7	41.7	40.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)