

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: P276499

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

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P276499
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: 24CZ2-50HE-S-UNV-L82765-W2A1-U-3000K
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER WITH SMOOTH LENS
Light Source: (336) 80 CRI LEDS TUNED TO 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4716.5 lumens
Efficiency: N/A
Efficacy: 133.1 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

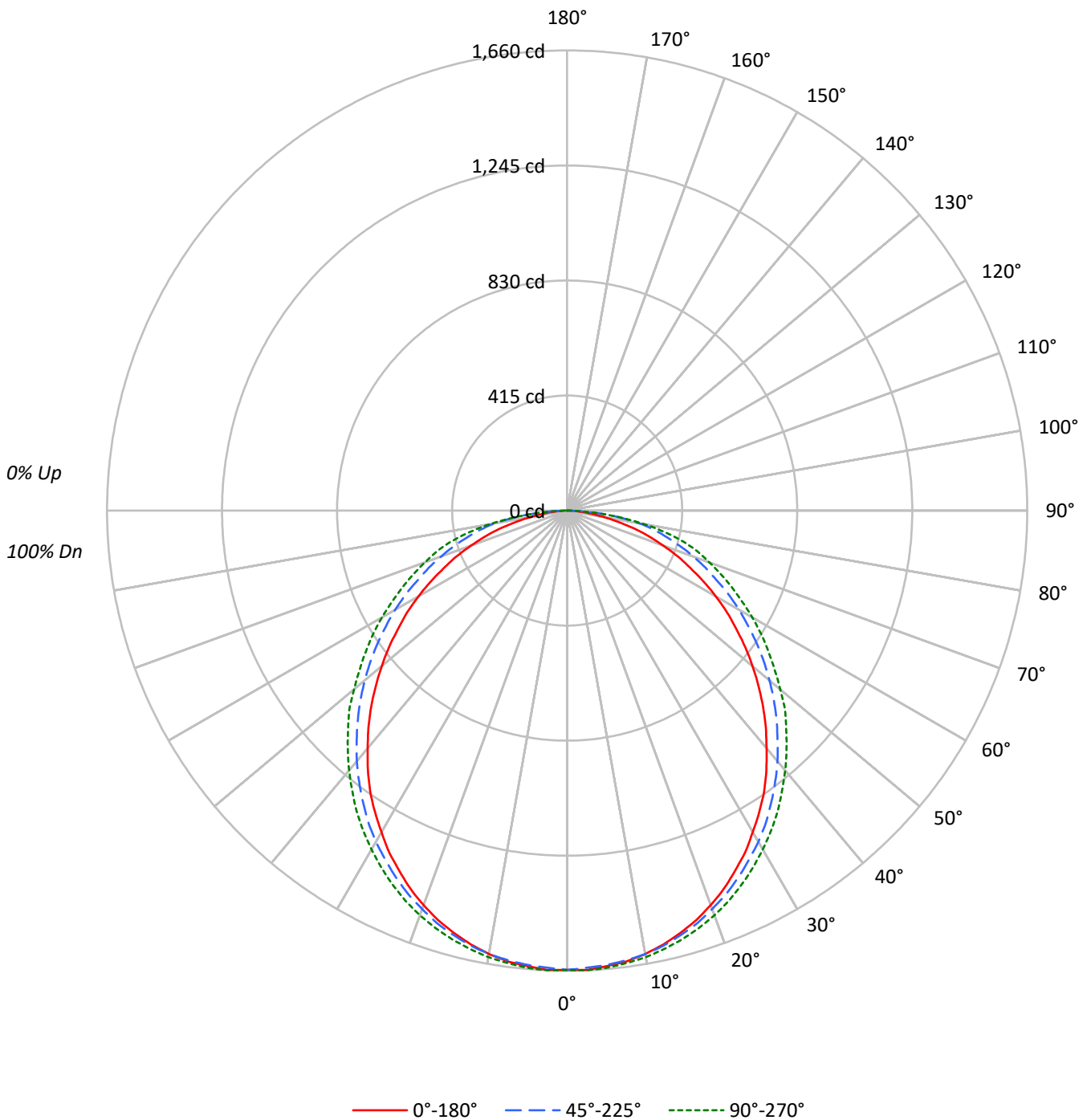
Input Watts (W): 35.433
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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°	2229	2229	2229
5°	2228	2222	2236
10°	2219	2219	2235
15°	2197	2208	2231
20°	2169	2190	2225
25°	2128	2169	2211
30°	2081	2144	2192
35°	2035	2109	2175
40°	1966	2073	2150
45°	1901	2033	2127
50°	1828	1994	2101
55°	1747	1958	2080
60°	1665	1927	2076
65°	1560	1894	2089
70°	1444	1904	2145
75°	1293	1939	2267
80°	1044	2055	2217
85°	786	1805	1758



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	156.9	3.3
10°-20°	448.2	9.5
20°-30°	673.8	14.3
30°-40°	802.6	17.0
40°-50°	821.4	17.4
50°-60°	739.5	15.7
60°-70°	580.7	12.3
70°-80°	376.9	8.0
80°-90°	116.6	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°	1278.8	27.1
0°-40°	2081.4	44.1
0°-60°	3642.3	77.2
0°-90°	4716.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4716.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1657	1657	1657	1657	1657	
5°	1649	1652	1645	1654	1655	157
15°	1578	1582	1585	1598	1602	445
25°	1434	1446	1461	1485	1489	660
35°	1239	1254	1284	1315	1324	773
45°	999	1023	1068	1109	1118	770
55°	745	778	834	878	887	668
65°	490	527	595	644	656	488
75°	249	297	373	424	436	263
85°	51	94	117	114	114	62
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1656.9	1656.9	1656.9	1656.9	1656.9
2.5°	1658.4	1658.4	1650.9	1658.4	1659.9
5°	1649.4	1652.4	1645.0	1653.9	1655.4
7.5°	1640.5	1640.5	1636.0	1645.0	1646.5
10°	1624.0	1625.5	1624.0	1634.5	1636.0
12.5°	1603.0	1606.0	1607.5	1618.0	1619.5
15°	1577.5	1582.0	1585.0	1598.5	1601.5
17.5°	1549.1	1553.6	1561.1	1576.0	1579.0
20°	1514.6	1520.6	1529.6	1549.1	1553.6
22.5°	1477.2	1483.2	1498.1	1516.1	1523.6
25°	1433.7	1445.7	1460.7	1484.7	1489.1
27.5°	1390.3	1400.8	1420.2	1445.7	1451.7
30°	1339.3	1355.8	1379.8	1405.3	1411.2
32.5°	1289.9	1306.4	1334.8	1361.8	1369.3
35°	1239.0	1253.9	1283.9	1315.4	1324.4
37.5°	1180.5	1200.0	1233.0	1264.4	1273.4
40°	1119.1	1143.1	1180.5	1213.5	1224.0
42.5°	1060.7	1086.1	1123.6	1159.6	1171.5
45°	999.3	1023.2	1068.2	1108.6	1117.6
47.5°	936.3	963.3	1011.2	1051.7	1066.7
50°	873.4	901.9	952.8	994.8	1003.8
52.5°	810.5	840.5	894.4	939.3	943.8
55°	744.6	777.5	834.5	877.9	886.9
57.5°	684.6	713.1	774.5	819.5	830.0
60°	618.7	650.2	716.1	758.1	771.5
62.5°	555.8	588.8	657.7	699.6	711.6
65°	489.9	527.3	594.8	644.2	656.2
67.5°	433.0	468.9	540.8	588.8	600.8
70°	367.0	407.5	483.9	533.3	545.3
72.5°	310.1	352.1	428.5	476.4	494.4
75°	248.7	296.6	373.0	424.0	436.0
77.5°	188.8	244.2	322.1	361.1	361.1
80°	134.8	193.3	265.2	283.1	286.1
82.5°	88.4	145.3	196.3	194.8	194.8
85°	50.9	94.4	116.9	113.9	113.9
87.5°	19.5	39.0	41.9	41.9	40.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)