

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: P388520

Luminaire Tested: **22CZ2-85VHE-UNV-L950-CD1-U**

Issue Date: 2/28/2020

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.

Test Information

Test Method: LM-79-08
Report Number: P388520
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-27)
Test Lab: INNOVATIONS CENTER(G3)
Issue Date: 2/28/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ2-85VHE-UNV-L950-CD1-U
Description: 2x2 CRUZE LED TROFFER WITH 5000K, 90 LEDS, AND RIBBED LENS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

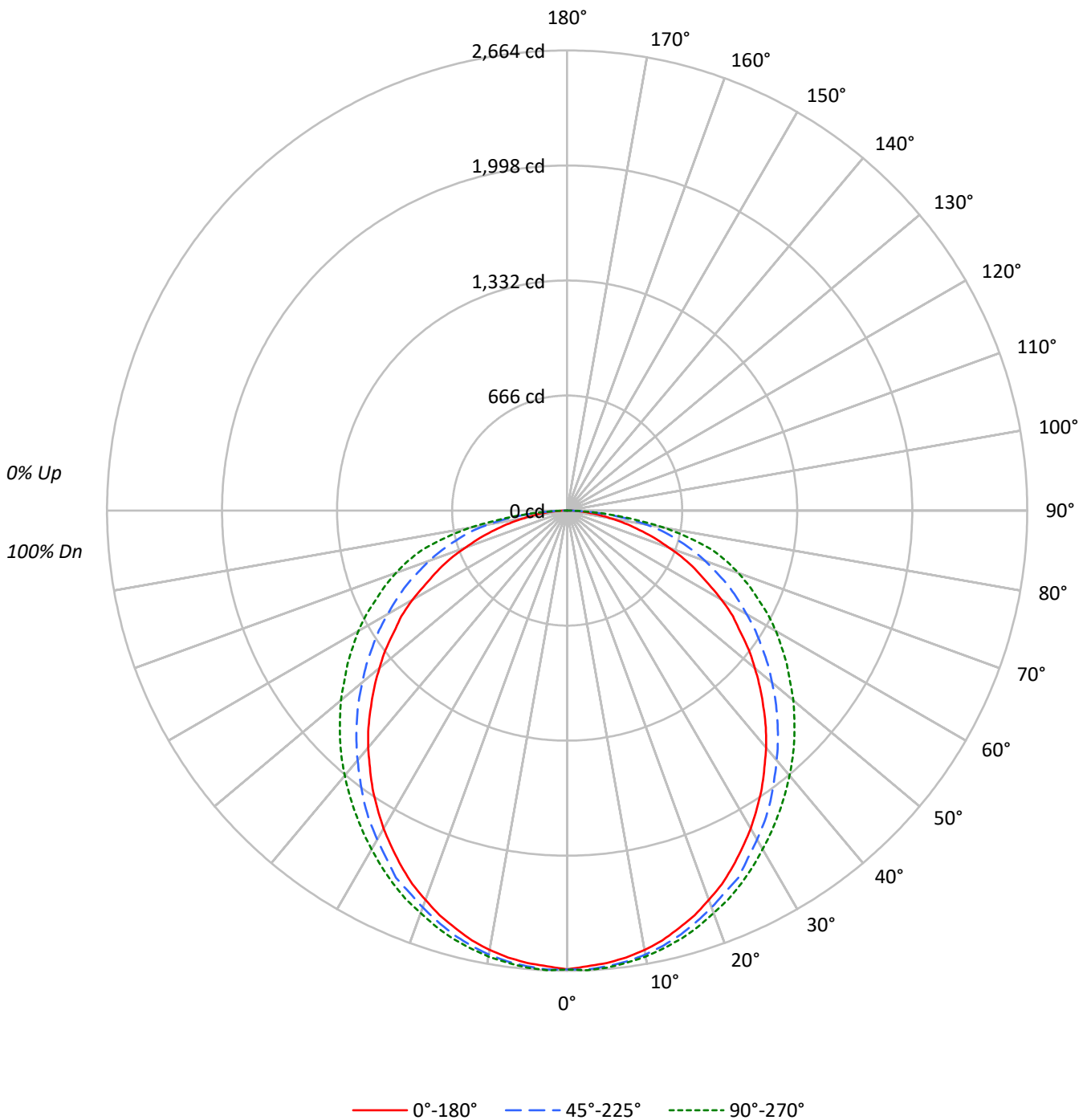
Lumens per Lamp: N/A
Luminaire Lumens: 7811.3 lumens
Efficiency: N/A
Efficacy: 122.8 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.27 / 1.36
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

Input Watts (W): 63.6
Input Voltage (V): NR
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	98	94	105	101	96	93	96	93	90	92	90	87	89	86	84	82
2	98	89	82	76	95	87	81	75	84	78	73	80	76	71	77	73	70	68
3	89	78	69	63	86	76	68	62	73	66	61	70	65	60	68	63	59	56
4	81	69	60	53	79	67	59	52	65	57	52	63	56	51	60	55	50	48
5	75	61	52	45	72	60	52	45	58	50	44	56	49	44	54	48	44	41
6	69	55	46	39	67	54	46	39	52	45	39	51	44	39	49	43	38	36
7	64	50	41	35	62	49	41	35	48	40	34	46	39	34	45	39	34	32
8	59	46	37	31	58	45	37	31	44	36	31	42	35	30	41	35	30	28
9	56	42	34	28	54	41	33	28	40	33	28	39	32	27	38	32	27	25
10	52	39	31	25	51	38	30	25	37	30	25	36	30	25	35	29	25	23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7147	7147	7147
5°	7102	7154	7175
10°	7058	7132	7163
15°	6971	7078	7142
20°	6869	7001	7100
25°	6745	6962	7076
30°	6605	6832	7035
35°	6452	6743	7021
40°	6292	6629	7035
45°	6114	6553	7080
50°	5938	6485	7160
55°	5735	6456	7285
60°	5565	6454	7509
65°	5286	6559	7783
70°	4929	6684	8286
75°	4515	6914	8952
80°	3932	7208	8816
85°	3443	6410	7003



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	251.2	3.2
10°-20°	715.4	9.2
20°-30°	1074.0	13.7
30°-40°	1283.4	16.4
40°-50°	1334.5	17.1
50°-60°	1236.9	15.8
60°-70°	1014.5	13.0
70°-80°	685.8	8.8
80°-90°	215.5	2.8
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°	2040.7	26.1
0°-40°	3324.0	42.6
0°-60°	5895.4	75.5
0°-90°	7811.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7811.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2656	2656	2656	2656	2656	
5°	2629	2633	2648	2652	2656	250
15°	2502	2514	2541	2556	2564	706
25°	2272	2291	2345	2372	2383	1046
35°	1964	1991	2052	2114	2137	1228
45°	1607	1637	1722	1822	1860	1241
55°	1222	1261	1376	1499	1553	1099
65°	830	876	1030	1165	1222	821
75°	434	507	665	800	861	461
85°	112	154	208	231	227	127
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2656.0	2656.0	2656.0	2656.0	2656.0
2.5°	2640.6	2648.3	2659.8	2663.7	2663.7
5°	2629.1	2632.9	2648.3	2652.1	2656.0
7.5°	2609.9	2617.5	2632.9	2636.8	2640.6
10°	2583.0	2590.6	2609.9	2617.5	2621.4
12.5°	2548.4	2556.1	2579.1	2590.6	2594.5
15°	2502.2	2513.8	2540.7	2556.1	2563.7
17.5°	2456.1	2467.6	2494.6	2517.6	2525.3
20°	2398.5	2425.4	2444.6	2475.3	2479.2
22.5°	2340.8	2356.2	2390.8	2421.5	2436.9
25°	2271.6	2290.8	2344.6	2371.6	2383.1
27.5°	2198.6	2225.5	2267.8	2310.1	2325.4
30°	2125.6	2144.8	2198.6	2248.6	2263.9
32.5°	2044.8	2071.7	2129.4	2179.4	2202.4
35°	1964.1	1991.0	2052.5	2114.0	2137.1
37.5°	1875.7	1906.5	1968.0	2041.0	2071.7
40°	1791.2	1814.2	1887.2	1975.7	2002.6
42.5°	1702.8	1729.7	1806.5	1902.6	1933.4
45°	1606.7	1637.4	1722.0	1821.9	1860.3
47.5°	1514.4	1545.2	1637.4	1737.3	1783.5
50°	1418.3	1456.8	1549.0	1664.3	1710.4
52.5°	1326.1	1360.7	1464.4	1583.6	1625.9
55°	1222.3	1260.7	1376.0	1499.0	1552.8
57.5°	1137.7	1164.6	1291.5	1418.3	1472.1
60°	1034.0	1068.5	1199.2	1333.8	1395.3
62.5°	922.5	980.1	1114.7	1253.0	1314.5
65°	830.2	876.4	1030.1	1164.6	1222.3
67.5°	734.1	784.1	934.0	1076.2	1141.6
70°	626.5	691.9	849.5	991.7	1053.2
72.5°	530.4	599.6	761.0	899.4	964.8
75°	434.3	507.4	665.0	799.5	861.0
77.5°	342.1	422.8	576.6	680.3	718.8
80°	253.7	330.6	465.1	538.1	568.9
82.5°	176.8	242.2	342.1	380.5	388.2
85°	111.5	153.7	207.6	230.6	226.8
87.5°	50.0	61.5	76.9	84.6	80.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)