

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: P388327

Luminaire Tested: **22CZ2-44VHE-UNV-L950-CD1-SWPD1-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: P388327
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: 22CZ2-44VHE-UNV-L950-CD1-SWPD1-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: 4137.0 lumens
Efficiency: N/A
Efficacy: 126.9 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

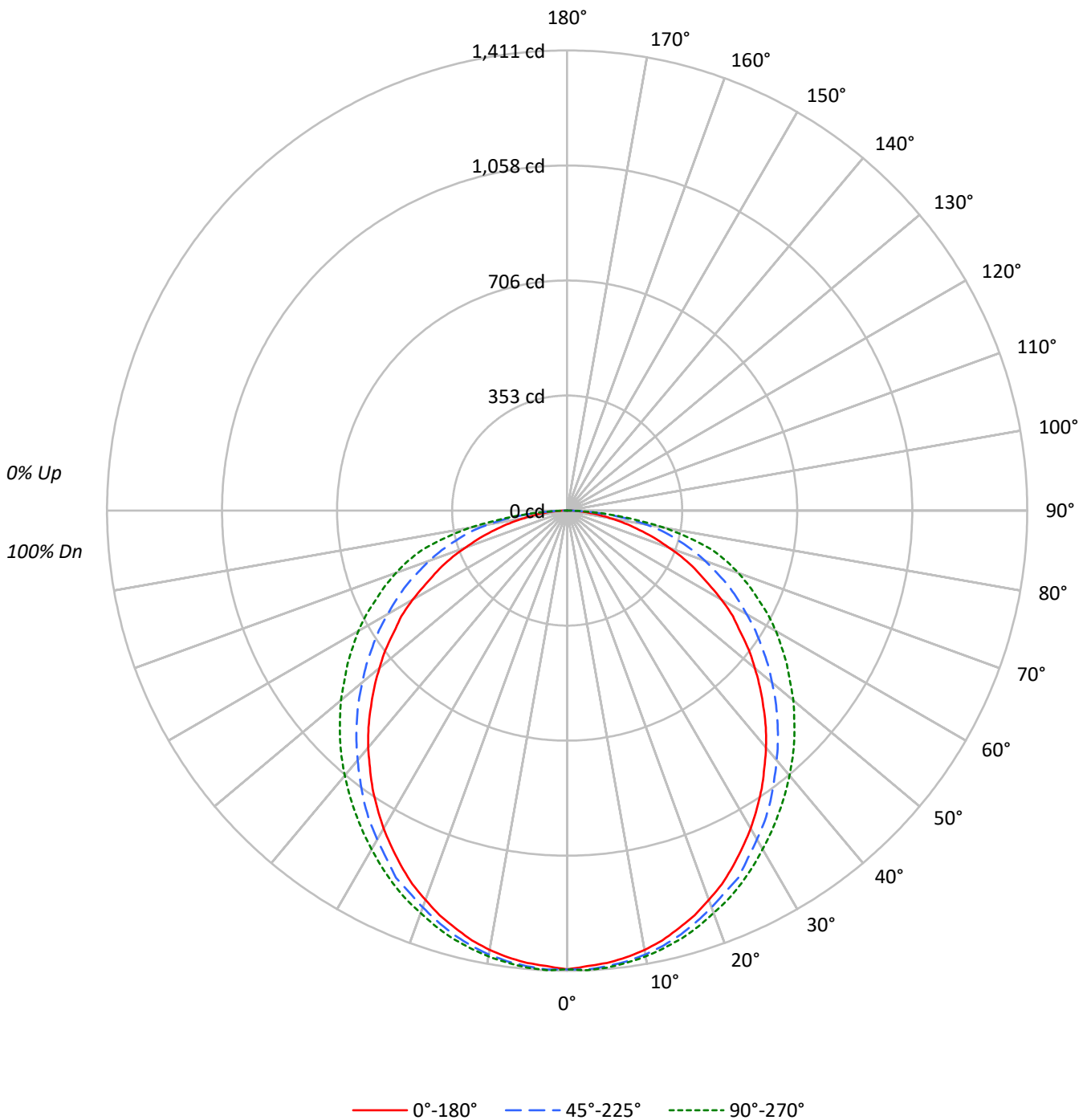
Input Watts (W): 32.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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°	3785	3785	3785
5°	3761	3789	3800
10°	3738	3777	3794
15°	3692	3749	3783
20°	3638	3708	3760
25°	3572	3687	3747
30°	3498	3618	3726
35°	3417	3571	3718
40°	3332	3511	3726
45°	3238	3471	3750
50°	3145	3435	3792
55°	3037	3419	3858
60°	2947	3418	3977
65°	2800	3474	4122
70°	2611	3540	4389
75°	2391	3662	4741
80°	2083	3817	4669
85°	1822	3393	3708



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	133.0	3.2
10°-20°	378.9	9.2
20°-30°	568.8	13.7
30°-40°	679.7	16.4
40°-50°	706.8	17.1
50°-60°	655.1	15.8
60°-70°	537.3	13.0
70°-80°	363.2	8.8
80°-90°	114.1	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°	1080.8	26.1
0°-40°	1760.5	42.6
0°-60°	3122.3	75.5
0°-90°	4137.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4137.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1407	1407	1407	1407	1407	
5°	1392	1394	1403	1405	1407	132
15°	1325	1331	1346	1354	1358	374
25°	1203	1213	1242	1256	1262	554
35°	1040	1054	1087	1120	1132	650
45°	851	867	912	965	985	657
55°	647	668	729	794	822	582
65°	440	464	546	617	647	435
75°	230	269	352	423	456	244
85°	59	81	110	122	120	67
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1406.7	1406.7	1406.7	1406.7	1406.7
2.5°	1398.5	1402.6	1408.7	1410.7	1410.7
5°	1392.4	1394.4	1402.6	1404.6	1406.7
7.5°	1382.2	1386.3	1394.4	1396.5	1398.5
10°	1368.0	1372.0	1382.2	1386.3	1388.3
12.5°	1349.7	1353.7	1365.9	1372.0	1374.1
15°	1325.2	1331.3	1345.6	1353.7	1357.8
17.5°	1300.8	1306.9	1321.2	1333.4	1337.4
20°	1270.3	1284.5	1294.7	1311.0	1313.0
22.5°	1239.7	1247.9	1266.2	1282.5	1290.6
25°	1203.1	1213.3	1241.8	1256.0	1262.1
27.5°	1164.4	1178.7	1201.1	1223.4	1231.6
30°	1125.7	1135.9	1164.4	1190.9	1199.0
32.5°	1083.0	1097.2	1127.8	1154.2	1166.4
35°	1040.2	1054.5	1087.1	1119.6	1131.8
37.5°	993.4	1009.7	1042.3	1080.9	1097.2
40°	948.6	960.8	999.5	1046.3	1060.6
42.5°	901.8	916.1	956.8	1007.7	1023.9
45°	850.9	867.2	912.0	964.9	985.3
47.5°	802.1	818.3	867.2	920.1	944.6
50°	751.2	771.5	820.4	881.5	905.9
52.5°	702.3	720.6	775.6	838.7	861.1
55°	647.3	667.7	728.8	793.9	822.4
57.5°	602.6	616.8	684.0	751.2	779.7
60°	547.6	565.9	635.1	706.4	739.0
62.5°	488.6	519.1	590.3	663.6	696.2
65°	439.7	464.1	545.6	616.8	647.3
67.5°	388.8	415.3	494.7	570.0	604.6
70°	331.8	366.4	449.9	525.2	557.8
72.5°	280.9	317.6	403.1	476.3	511.0
75°	230.0	268.7	352.2	423.4	456.0
77.5°	181.2	223.9	305.4	360.3	380.7
80°	134.4	175.1	246.3	285.0	301.3
82.5°	93.6	128.2	181.2	201.5	205.6
85°	59.0	81.4	109.9	122.1	120.1
87.5°	26.5	32.6	40.7	44.8	42.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)