

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: P230818

Luminaire Tested: **22CZ-LD5-44-SQP-UNV-L940-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P230818
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25713)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ-LD5-44-SQP-UNV-L940-CD1-U
Description: CRUZE 2x2 LED TROFFER
WITH SQP LENS
Light Source: (84) 4000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2702.0 lumens
Efficiency: N/A
Efficacy: 64.6 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.31 / 1.41
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

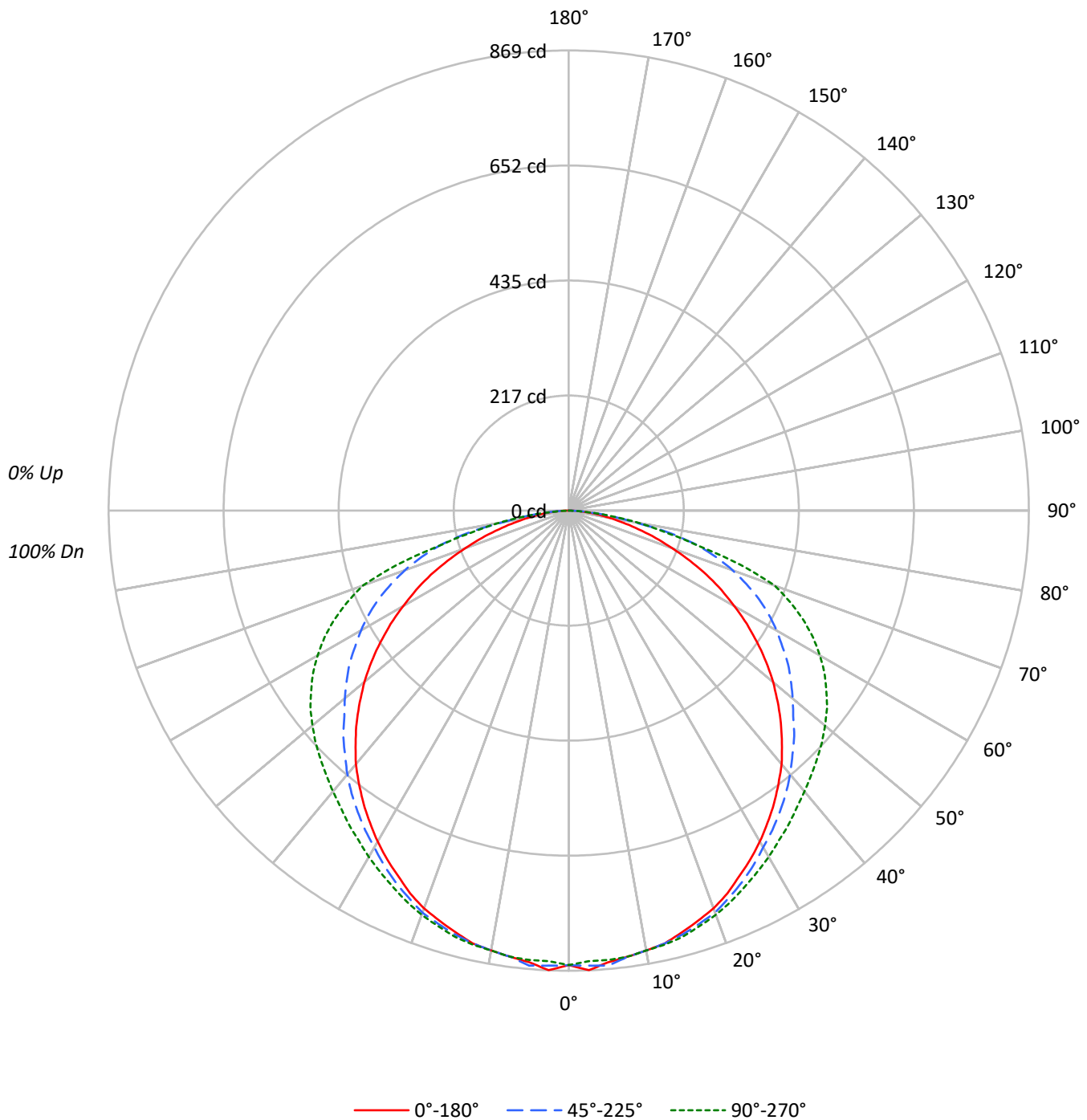
Input Watts (W): 41.8
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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
RW	70	50	30	10	70	50	30	10		50	30	10		50	30	10		50	30	10
RCR																				
0	119	119	119	119	116	116	116	116		111	111	111		106	106	106		102	102	102
1	108	103	99	95	105	101	97	93		97	93	90		93	90	87		89	87	85
2	98	89	82	76	95	87	81	75		84	78	73		80	76	71		77	73	70
3	89	78	69	62	86	76	68	62		73	66	61		70	64	59		68	63	58
4	81	68	59	52	79	67	58	52		64	57	51		62	56	50		60	54	50
5	74	61	52	45	72	60	51	44		58	50	44		56	49	43		54	48	43
6	68	55	45	39	66	54	45	39		52	44	38		50	43	38		48	42	37
7	63	49	40	34	62	49	40	34		47	39	34		45	39	33		44	38	33
8	59	45	36	30	57	44	36	30		43	35	30		42	35	30		40	34	29
9	55	41	33	27	54	41	33	27		39	32	27		38	32	27		37	31	27
10	51	38	30	24	50	37	30	24		36	29	24		35	29	24		35	28	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2309	2309	2309
5°	2313	2330	2301
10°	2305	2305	2305
15°	2298	2309	2321
20°	2290	2314	2326
25°	2262	2299	2330
30°	2243	2282	2347
35°	2220	2282	2378
40°	2197	2285	2433
45°	2156	2292	2524
50°	2108	2310	2644
55°	2038	2373	2786
60°	1942	2439	2948
65°	1831	2525	3113
70°	1634	2592	3253
75°	1418	2596	2574
80°	1203	1918	2081
85°	1037	1297	1167



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	81.5	3.0
10°-20°	234.0	8.7
20°-30°	356.6	13.2
30°-40°	436.3	16.1
40°-50°	469.5	17.4
50°-60°	454.8	16.8
60°-70°	385.2	14.3
70°-80°	232.9	8.6
80°-90°	51.2	1.9
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°	672.1	24.9
0°-40°	1108.5	41.0
0°-60°	2032.7	75.2
0°-90°	2702.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2702.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	858	858	858	858	858	
5°	856	856	862	858	852	81
15°	825	827	829	831	833	233
25°	762	766	774	781	785	352
35°	676	680	695	713	724	423
45°	567	577	602	640	663	437
55°	434	453	506	564	594	388
65°	288	319	397	460	489	283
75°	136	185	250	254	248	147
85°	34	40	42	40	38	38
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	858.2	858.2	858.2	858.2	858.2
2.5°	868.7	866.6	860.3	856.1	851.9
5°	856.1	856.1	862.4	858.2	851.9
7.5°	849.8	849.8	849.8	860.3	849.8
10°	843.5	845.6	843.5	851.9	843.5
12.5°	837.2	837.2	837.2	839.3	839.3
15°	824.7	826.8	828.9	830.9	833.0
17.5°	812.1	814.2	818.4	820.5	822.6
20°	799.5	801.6	807.9	807.9	812.1
22.5°	782.7	782.7	791.1	793.2	799.5
25°	761.7	765.9	774.3	780.6	784.8
27.5°	742.8	747.0	755.4	763.8	770.1
30°	721.8	726.0	734.4	747.0	755.4
32.5°	698.8	702.9	715.5	730.2	738.6
35°	675.7	679.9	694.6	713.4	723.9
37.5°	650.5	656.8	673.6	694.6	707.1
40°	625.3	631.6	650.5	673.6	692.5
42.5°	595.9	604.3	625.3	656.8	677.8
45°	566.6	577.0	602.2	640.0	663.1
47.5°	535.1	545.6	574.9	623.2	648.4
50°	503.6	516.2	551.9	604.3	631.6
52.5°	470.0	482.6	528.8	585.4	614.8
55°	434.4	453.2	505.7	564.5	593.8
57.5°	398.7	419.7	478.4	541.4	572.9
60°	360.9	386.1	453.2	516.2	547.7
62.5°	325.2	352.5	426.0	488.9	520.4
65°	287.5	319.0	396.6	459.5	488.9
67.5°	247.6	287.5	363.0	423.9	453.2
70°	207.7	253.9	329.4	386.1	413.4
72.5°	172.1	220.3	291.7	339.9	339.9
75°	136.4	184.7	249.7	253.9	247.6
77.5°	104.9	151.1	195.1	178.4	182.6
80°	77.6	115.4	123.8	130.1	134.3
82.5°	52.5	77.6	79.7	83.9	83.9
85°	33.6	39.9	42.0	39.9	37.8
87.5°	14.7	16.8	12.6	8.4	6.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)