

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: P259417

Luminaire Tested: **22CZ-LD5-29-S-UNV-L93050-W2A1-U-3500K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P259417
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25712)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ-LD5-29-S-UNV-L93050-W2A1-U-3500K
Description: CRUZE 2x2 TUNABLE WHITE LED TROFFER
WITH SMOOTH LENS
Light Source: (168) 90 CRI LEDS TUNED AT 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2471.0 lumens
Efficiency: N/A
Efficacy: 116.4 lumens/watt
Spacing Criteria (0/90/45): 1.18 / 1.24 / 1.33
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

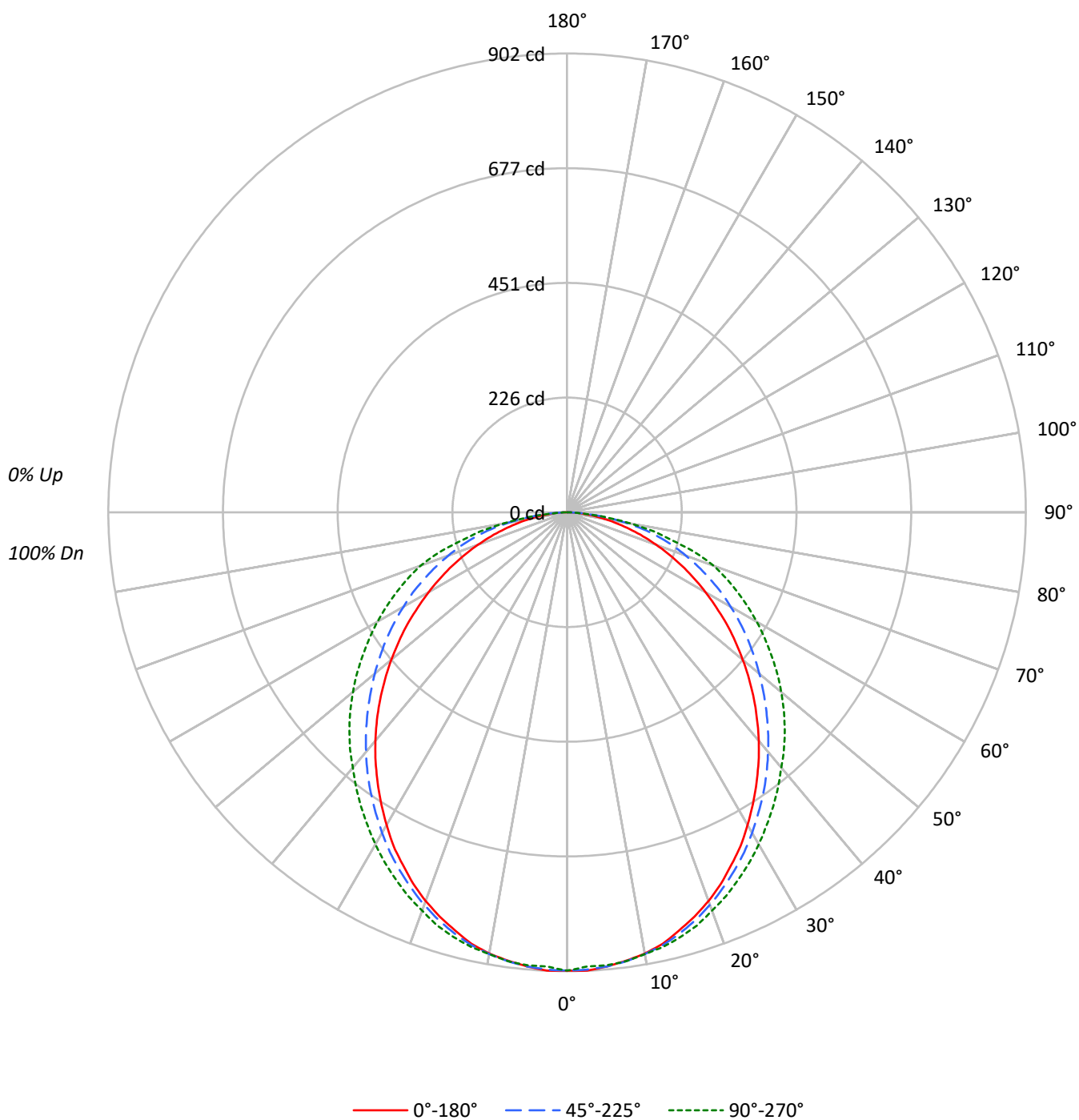
Input Watts (W): 21.227808
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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					0
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	109	104	99	95	106	101	97	94		97	94	91		93	91	88		90	87	85
2	99	90	83	77	96	88	82	77		85	79	75		81	77	73		78	75	71
3	90	79	71	64	87	78	70	64		75	68	63		72	66	62		69	64	60
4	82	70	61	54	80	69	61	54		66	59	53		64	58	53		62	56	52
5	76	63	54	47	74	62	53	47		59	52	46		57	51	46		56	50	45
6	70	56	47	41	68	56	47	41		54	46	40		52	45	40		50	44	40
7	65	51	42	36	63	50	42	36		49	41	36		47	41	36		46	40	35
8	60	47	38	32	59	46	38	32		45	37	32		43	37	32		42	36	32
9	56	43	35	29	55	42	34	29		41	34	29		40	34	29		39	33	29
10	53	40	32	26	52	39	32	26		38	31	26		37	31	26		36	30	26

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2424	2424	2424
5°	2421	2421	2414
10°	2406	2410	2410
15°	2371	2387	2407
20°	2328	2352	2386
25°	2269	2308	2365
30°	2205	2261	2342
35°	2133	2211	2320
40°	2060	2160	2301
45°	1978	2109	2304
50°	1888	2067	2300
55°	1799	2032	2300
60°	1693	1999	2319
65°	1587	1973	2350
70°	1466	1952	2409
75°	1320	1937	2233
80°	1159	1802	1949
85°	954	1355	1210



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	85.1	3.4
10°-20°	241.7	9.8
20°-30°	358.9	14.5
30°-40°	422.5	17.1
40°-50°	430.7	17.4
50°-60°	388.5	15.7
60°-70°	306.0	12.4
70°-80°	188.7	7.6
80°-90°	49.0	2.0
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°	685.6	27.7
0°-40°	1108.1	44.8
0°-60°	1927.3	78.0
0°-90°	2471.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2471.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	901	901	901	901	901	
5°	896	897	896	895	894	85
15°	851	854	857	862	864	240
25°	764	769	777	790	796	352
35°	649	656	673	694	706	406
45°	520	528	554	588	605	401
55°	383	396	433	472	490	342
65°	249	267	310	349	369	247
75°	127	148	186	208	215	135
85°	31	39	44	42	39	36
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	900.8	900.8	900.8	900.8	900.8
2.5°	902.0	902.0	899.6	897.3	893.7
5°	896.1	897.3	896.1	894.9	893.7
7.5°	889.0	890.1	890.1	890.1	890.1
10°	880.6	881.8	881.8	881.8	881.8
12.5°	868.8	870.0	871.2	872.3	874.7
15°	851.0	854.5	856.9	861.7	864.0
17.5°	833.2	836.7	840.3	846.2	851.0
20°	813.0	815.4	821.3	828.4	833.2
22.5°	790.4	794.0	799.9	809.4	816.6
25°	764.3	769.1	777.4	790.4	796.4
27.5°	739.4	743.0	753.7	767.9	776.2
30°	709.7	714.5	727.5	745.3	753.7
32.5°	680.1	686.0	700.2	720.4	729.9
35°	649.2	656.3	672.9	694.3	706.2
37.5°	618.4	625.5	644.5	668.2	681.3
40°	586.3	593.4	614.8	640.9	655.1
42.5°	553.1	561.4	585.1	614.8	631.4
45°	519.8	528.2	554.3	587.5	605.3
47.5°	485.4	494.9	523.4	560.2	578.0
50°	451.0	461.7	493.7	531.7	549.5
52.5°	416.6	428.5	462.9	502.0	521.0
55°	383.4	396.4	433.2	472.4	490.2
57.5°	347.7	363.2	402.3	440.3	460.5
60°	314.5	331.1	371.5	409.5	430.8
62.5°	281.3	299.1	341.8	379.8	400.0
65°	249.2	267.0	309.8	348.9	369.1
67.5°	217.2	237.4	278.9	318.1	338.3
70°	186.3	207.7	248.1	286.0	306.2
72.5°	156.7	178.0	218.4	254.0	265.9
75°	127.0	148.4	186.3	207.7	214.8
77.5°	99.7	119.9	153.1	166.2	175.7
80°	74.8	92.6	116.3	124.6	125.8
82.5°	51.0	66.5	80.7	81.9	80.7
85°	30.9	39.2	43.9	41.5	39.2
87.5°	14.2	15.4	14.2	9.5	5.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)