

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: P259084

Luminaire Tested: **14CZ-LD5-29-SQP-UNV-L93050-W2A1-U-5000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P259084
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35908)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 14CZ-LD5-29-SQP-UNV-L93050-W2A1-U-5000K
Description: CRUZE 1x4 TUNABLE WHITE LED TROFFER WITH SQP LENS
Light Source: (168) 90 CRI LEDS TUNED AT 5000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1771.0 lumens
Efficiency: N/A
Efficacy: 76.8 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.28 / 1.4
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

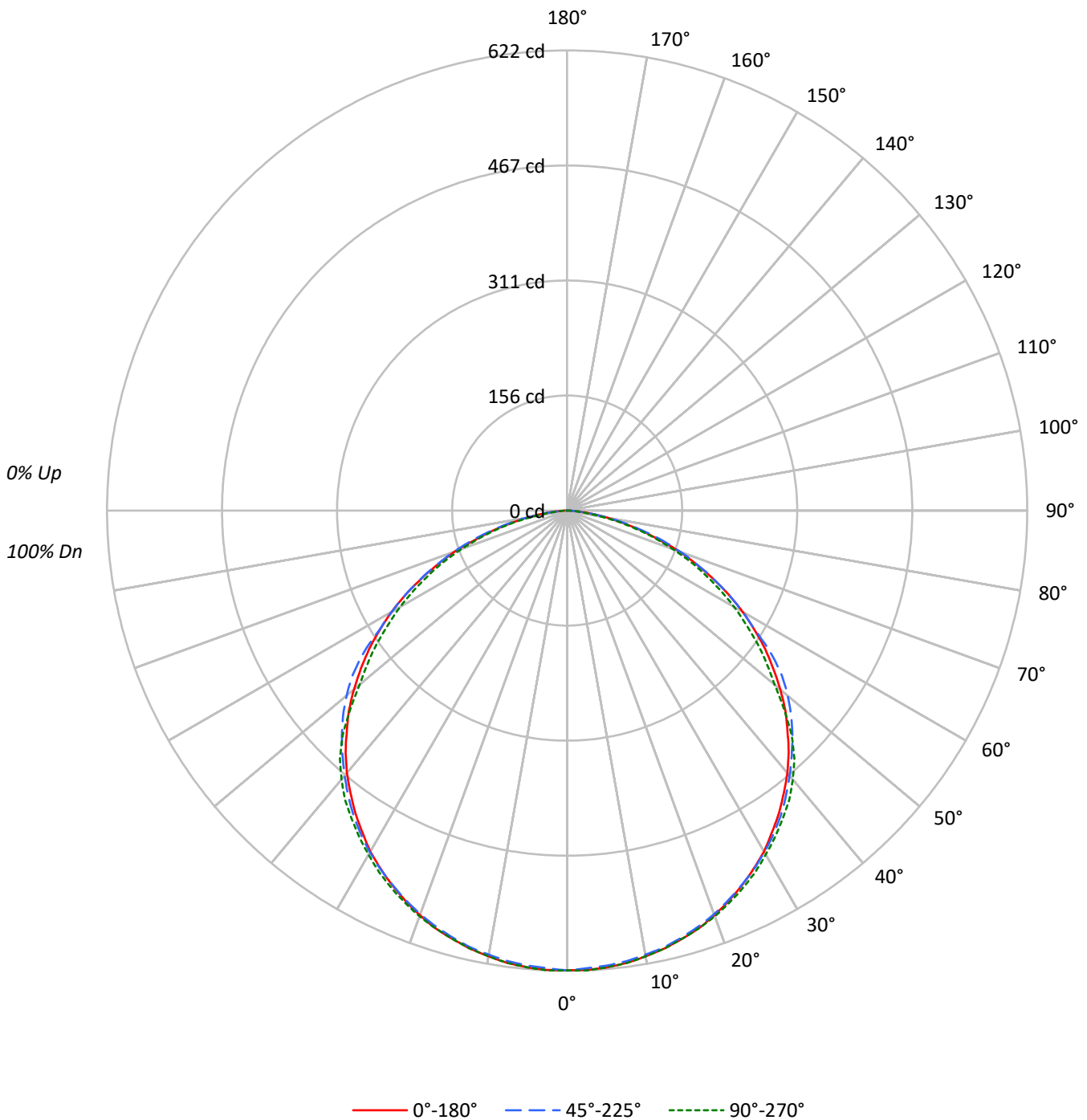
Input Watts (W): 23.064
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	73	70
3	90	80	72	65	88	78	71	65	75	69	64	73	67	63	70	65	62	59
4	83	71	62	55	81	70	61	55	67	60	54	65	59	54	63	57	53	51
5	76	63	54	48	74	62	54	47	60	53	47	58	52	46	56	50	46	44
6	70	57	48	42	68	56	48	41	54	47	41	52	46	41	51	45	40	38
7	65	52	43	37	63	51	42	37	49	42	36	48	41	36	46	40	36	34
8	61	47	39	33	59	46	38	33	45	38	32	44	37	32	43	37	32	30
9	57	43	35	29	55	43	35	29	41	34	29	40	34	29	39	33	29	27
10	53	40	32	27	52	39	32	27	38	31	26	37	31	26	36	30	26	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1672	1672	1672
5°	1674	1667	1674
10°	1672	1665	1672
15°	1670	1665	1670
20°	1666	1663	1672
25°	1660	1658	1671
30°	1653	1657	1668
35°	1640	1653	1669
40°	1627	1644	1667
45°	1603	1639	1632
50°	1575	1630	1532
55°	1534	1579	1475
60°	1475	1472	1404
65°	1383	1391	1314
70°	1270	1284	1190
75°	1067	1117	1017
80°	846	865	716
85°	556	482	408



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	58.9	3.3
10°-20°	169.2	9.6
20°-30°	258.3	14.6
30°-40°	315.1	17.8
40°-50°	329.5	18.6
50°-60°	291.7	16.5
60°-70°	214.9	12.1
70°-80°	111.3	6.3
80°-90°	22.2	1.3
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°	486.3	27.5
0°-40°	801.5	45.3
0°-60°	1422.7	80.3
0°-90°	1771.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1771.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	622	622	622	622	622	
5°	620	620	617	620	620	59
15°	599	599	598	600	599	169
25°	559	559	558	562	563	258
35°	499	500	503	508	508	312
45°	421	425	431	434	429	325
55°	327	334	336	319	314	292
65°	217	230	218	210	206	215
75°	103	110	107	101	98	110
85°	18	19	16	14	13	23
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	621.5	621.5	621.5	621.5	621.5
2.5°	621.5	621.5	619.1	621.5	622.1
5°	619.7	619.7	617.3	619.7	619.7
7.5°	616.7	616.1	614.3	616.7	616.7
10°	611.9	611.9	609.5	612.5	611.9
12.5°	606.5	605.9	604.7	607.1	606.5
15°	599.3	599.3	597.5	599.9	599.3
17.5°	592.1	591.5	589.7	592.1	592.1
20°	581.9	581.3	580.7	583.1	583.7
22.5°	571.1	570.5	569.9	573.5	573.5
25°	559.1	559.1	558.5	562.1	562.7
27.5°	545.9	545.9	546.5	551.3	550.7
30°	532.1	532.1	533.3	536.9	536.9
32.5°	515.3	516.5	518.9	523.1	523.1
35°	499.1	500.3	503.3	508.1	508.1
37.5°	481.1	482.9	485.9	491.9	493.1
40°	463.1	464.3	467.9	474.5	474.5
42.5°	443.3	444.5	449.3	455.9	454.7
45°	421.1	424.7	430.7	434.3	428.9
47.5°	400.1	402.5	410.9	406.7	397.7
50°	376.1	380.9	389.3	374.3	365.9
52.5°	351.5	356.9	365.9	344.9	340.1
55°	326.9	333.5	336.5	319.1	314.3
57.5°	300.5	307.7	301.7	291.5	286.7
60°	274.1	282.5	273.5	263.9	260.9
62.5°	246.6	256.1	246.0	237.6	233.4
65°	217.2	230.4	218.4	210.0	206.4
67.5°	188.4	202.2	189.6	182.4	180.0
70°	161.4	169.2	163.2	156.0	151.2
72.5°	129.0	136.8	135.6	127.8	124.8
75°	102.6	109.8	107.4	100.8	97.8
77.5°	76.2	84.0	81.6	73.8	72.6
80°	54.6	60.0	55.8	48.6	46.2
82.5°	34.2	38.4	33.0	27.6	26.4
85°	18.0	19.2	15.6	13.8	13.2
87.5°	6.0	6.6	6.6	6.0	6.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)