

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: P685556

Luminaire Tested: **8CZL-18-UNV-FL-L840-CD-U**

Issue Date: 05/10/2023



Test Information

Test Method: LM-79-08
Report Number: P685556
Test Lab: INNOVATION CENTER(G3)
Issue Date: 05/10/2023
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 8CZL-18-UNV-FL-L840-CD-U
Description: METALUX CRUZE LINEAR 8FT FROSTED LENS MODEL @80 CRI and 4000K
Light Source: (1176) 4000K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

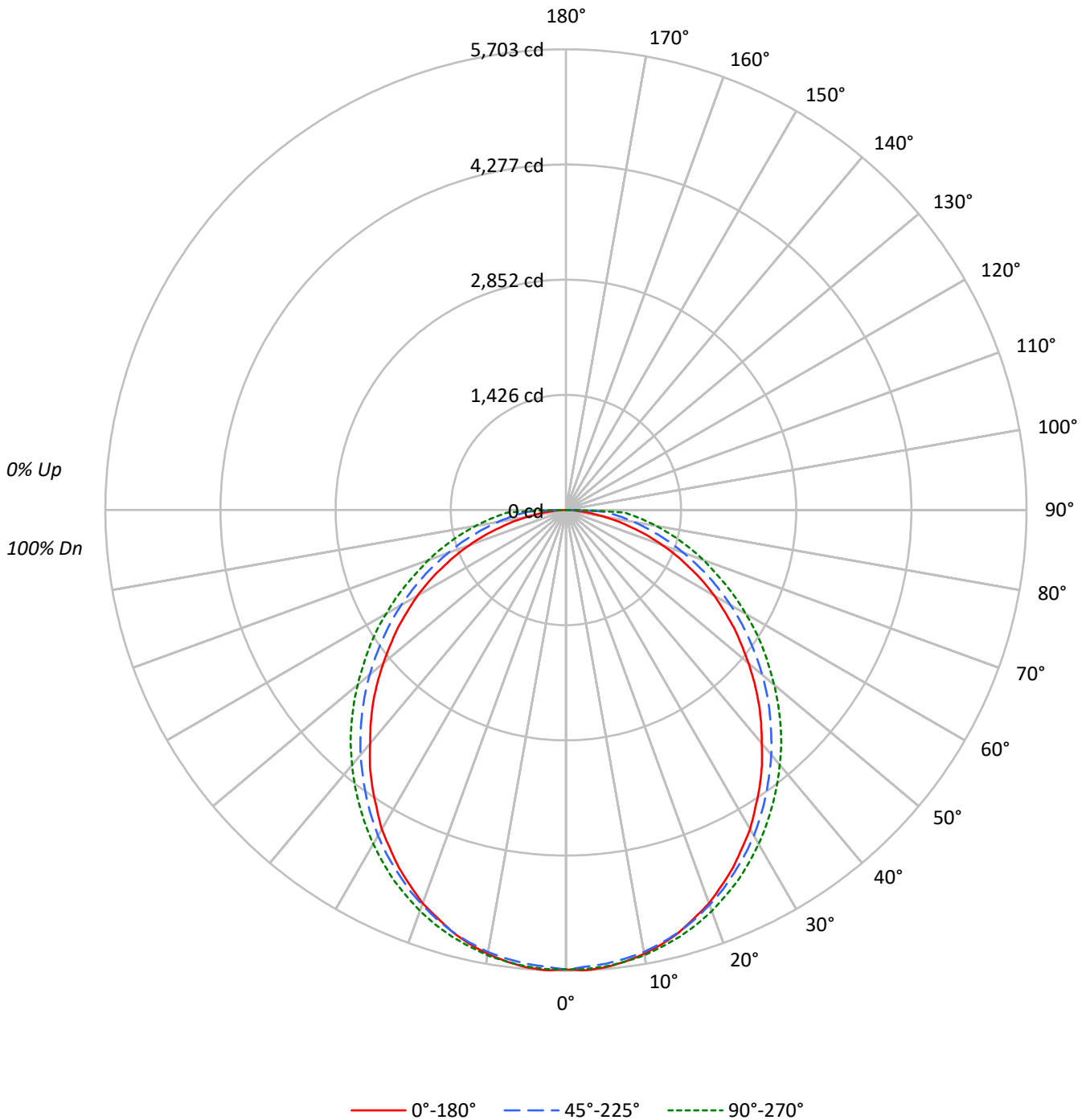
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 16017.9 lumens
Efficiency: N/A
Efficacy: 147.0 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.25 / 1.34
Luminous Opening: Rectangular w/ Sides (W: 0.83' x L: 8' x H: 0.08')
CIE Type: Direct

Input Watts (W): 109
Input Voltage (V): 120
Input Current (A_{in}): 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				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	50	30	10	0
RCR																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	102	102	102	100
1	108	103	98	94	105	101	96	93	96	93	90	92	90	87	89	86	84	84	84	84	82
2	98	89	82	76	95	87	81	75	84	78	74	81	76	72	78	74	70	70	70	70	68
3	89	78	70	63	87	77	69	63	74	67	62	71	65	61	68	64	59	59	59	59	57
4	82	69	60	54	79	68	60	53	66	58	52	63	57	52	61	56	51	51	51	51	49
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	44	44	44	42
6	69	56	47	40	68	55	46	40	53	45	40	51	45	39	50	44	39	39	39	39	37
7	64	51	42	36	63	50	41	36	48	41	35	47	40	35	46	39	35	35	35	35	33
8	60	46	38	32	58	46	37	32	44	37	32	43	36	31	42	36	31	31	31	31	29
9	56	43	34	29	55	42	34	29	41	34	28	40	33	28	39	33	28	28	28	28	26
10	53	39	31	26	51	39	31	26	38	31	26	37	30	26	36	30	26	26	26	26	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	9182	9182	9182
5°	9199	9076	9111
10°	9131	8985	9019
15°	9021	8856	8897
20°	8870	8690	8757
25°	8668	8496	8599
30°	8451	8303	8413
35°	8183	8066	8213
40°	7882	7828	8010
45°	7628	7562	7799
50°	7321	7288	7552
55°	7039	6989	7330
60°	6730	6690	7075
65°	6317	6371	6852
70°	5839	6016	6717
75°	5128	5718	6639
80°	4213	5524	6728
85°	2827	5650	7288



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	537.9	3.4
10°-20°	1530.6	9.6
20°-30°	2286.0	14.3
30°-40°	2703.7	16.9
40°-50°	2754.9	17.2
50°-60°	2468.5	15.4
60°-70°	1922.7	12.0
70°-80°	1244.8	7.8
80°-90°	568.8	3.6
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°	4354.5	27.2
0°-40°	7058.2	44.1
0°-60°	12281.6	76.7
0°-90°	16017.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	16017.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	5687	5687	5687	5687	5687	
5°	5681	5672	5638	5672	5670	539
15°	5412	5412	5409	5460	5465	1524
25°	4889	4906	4943	5030	5052	2250
35°	4182	4222	4316	4433	4459	2613
45°	3376	3436	3570	3706	3757	2601
55°	2538	2609	2760	2918	2976	2266
65°	1690	1764	1947	2110	2178	1679
75°	854	963	1184	1380	1461	916
85°	171	330	577	786	843	219
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	5686.6	5686.6	5686.6	5686.6	5686.6
2.5°	5702.8	5693.1	5658.5	5688.8	5687.7
5°	5681.2	5671.5	5638.0	5671.5	5670.4
7.5°	5636.9	5633.6	5603.4	5640.1	5636.9
10°	5579.6	5575.3	5555.8	5592.6	5598.0
12.5°	5503.9	5501.8	5486.6	5529.9	5533.1
15°	5412.1	5412.1	5408.8	5459.6	5465.0
17.5°	5294.2	5309.4	5312.6	5367.7	5379.6
20°	5181.8	5186.1	5201.3	5268.3	5282.3
22.5°	5033.7	5052.1	5082.4	5155.9	5167.8
25°	4888.9	4906.2	4942.9	5030.5	5052.1
27.5°	4720.3	4753.8	4804.6	4892.1	4913.8
30°	4560.3	4588.4	4654.3	4751.6	4773.2
32.5°	4364.7	4412.2	4487.9	4590.6	4619.8
35°	4182.0	4222.0	4316.0	4432.8	4458.7
37.5°	3986.3	4033.9	4133.3	4257.7	4293.3
40°	3772.3	3841.5	3957.2	4081.5	4119.3
42.5°	3576.7	3640.5	3762.6	3903.1	3946.4
45°	3375.6	3436.2	3570.2	3706.4	3757.2
47.5°	3165.9	3228.6	3374.6	3519.4	3564.8
50°	2950.8	3025.4	3171.4	3323.8	3364.8
52.5°	2736.8	2811.4	2966.0	3118.4	3164.9
55°	2537.9	2609.3	2759.5	2918.4	2975.7
57.5°	2321.8	2397.4	2562.8	2716.3	2777.9
60°	2121.8	2176.9	2352.0	2510.9	2570.4
62.5°	1915.3	1974.8	2145.6	2308.8	2379.1
65°	1690.5	1764.0	1946.7	2109.9	2178.0
67.5°	1485.2	1555.4	1743.5	1927.2	1982.4
70°	1272.2	1353.3	1547.8	1735.9	1813.7
72.5°	1069.0	1153.3	1367.3	1554.3	1633.2
75°	853.9	963.1	1183.6	1380.3	1461.4
77.5°	676.6	784.7	1010.6	1216.0	1293.8
80°	479.9	612.9	857.2	1064.7	1133.9
82.5°	319.9	455.1	711.2	913.4	987.9
85°	170.8	329.7	577.2	785.8	843.1
87.5°	74.6	230.2	468.0	653.9	722.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)