

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: P275598

Luminaire Tested: **14CZ2-29-S-UNV-L93050-W2A1-U-4000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P275598  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-40)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14CZ2-29-S-UNV-L93050-W2A1-U-4000K  
Description: CRUZE 2.0 1x4 TUNABLE WHITE LED TROFFER  
WITH SMOOTH LENS  
Light Source: (168) 90 CRI LEDS TUNED TO 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2689.0 lumens  
Efficiency: N/A  
Efficacy: 118.5 lumens/watt  
Spacing Criteria (0/90/45): 1.19 / 1.26 / 1.36  
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')  
CIE Type: Direct

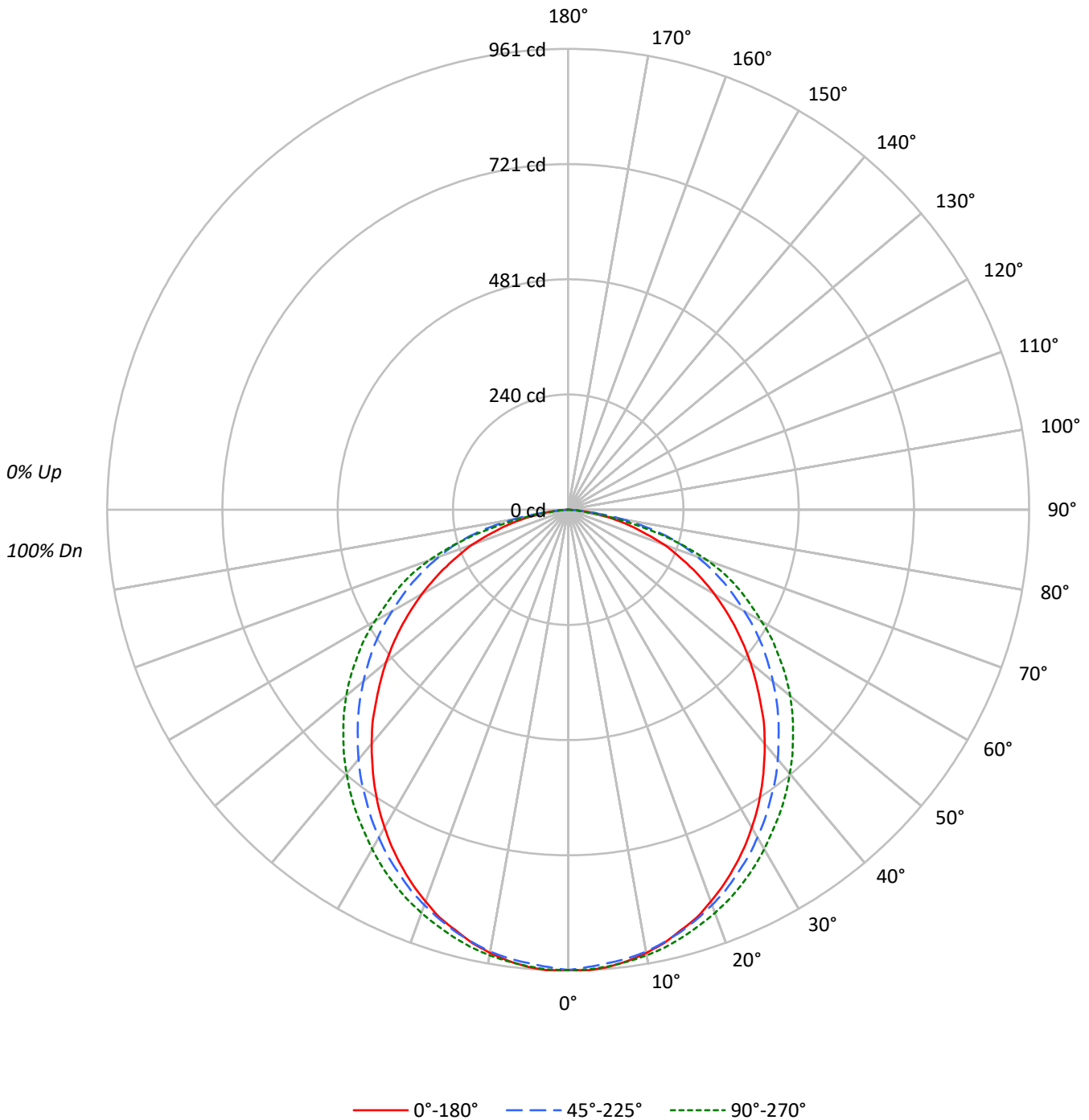
Input Watts (W): 22.692  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	94	97	94	91	94	91	89	90	88	86	84
2	99	90	84	78	96	89	82	77	85	80	75	82	77	73	79	75	72	70
3	90	79	71	65	87	78	70	64	75	68	63	72	66	62	69	65	61	58
4	82	70	61	55	80	69	61	54	66	59	53	64	58	53	62	56	52	50
5	76	63	54	47	74	62	53	47	59	52	46	57	51	46	56	50	45	43
6	70	56	47	41	68	55	47	41	54	46	40	52	45	40	50	44	40	38
7	65	51	42	36	63	50	42	36	49	41	36	47	41	35	46	40	35	33
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	30
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	28	27
10	53	40	32	26	52	39	31	26	38	31	26	37	31	26	36	30	26	24

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	2583	2583	2583
5°	2586	2564	2582
10°	2565	2557	2579
15°	2529	2537	2570
20°	2489	2512	2562
25°	2439	2482	2553
30°	2378	2453	2540
35°	2312	2417	2531
40°	2239	2388	2524
45°	2156	2359	2522
50°	2076	2333	2529
55°	1989	2314	2521
60°	1894	2282	2504
65°	1783	2275	2504
70°	1678	2255	2434
75°	1456	2204	2079
80°	1178	1777	1384
85°	781	618	411



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	90.6	3.4
10°-20°	257.9	9.6
20°-30°	386.9	14.4
30°-40°	461.5	17.2
40°-50°	477.2	17.7
50°-60°	435.6	16.2
60°-70°	342.8	12.7
70°-80°	199.6	7.4
80°-90°	36.8	1.4
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°	735.5	27.4
0°-40°	1197.0	44.5
0°-60°	2109.8	78.5
0°-90°	2689.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2689.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	960	960	960	960	960	
5°	957	955	949	957	956	91
15°	908	909	911	923	923	256
25°	821	825	836	856	860	378
35°	704	713	736	764	771	440
45°	567	585	620	655	663	438
55°	424	447	493	529	537	379
65°	280	309	357	385	393	278
75°	140	173	212	208	200	149
85°	25	36	20	16	13	33
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	959.9	959.9	959.9	959.9	959.9
2.5°	961.3	958.6	954.6	961.3	959.9
5°	957.3	954.6	949.3	957.3	955.9
7.5°	949.3	946.6	943.9	951.9	950.6
10°	938.6	937.3	935.9	945.3	943.9
12.5°	925.3	925.3	923.9	934.6	934.6
15°	907.9	909.3	910.6	922.6	922.6
17.5°	891.9	890.6	894.6	907.9	909.3
20°	869.3	871.9	877.3	893.3	894.6
22.5°	846.6	849.3	858.6	874.6	878.6
25°	821.3	825.3	835.9	855.9	859.9
27.5°	794.6	799.9	814.6	835.9	839.9
30°	765.3	773.3	789.3	813.3	817.3
32.5°	735.9	743.9	763.9	787.9	793.3
35°	703.9	713.3	735.9	763.9	770.6
37.5°	670.6	682.6	709.3	737.3	745.3
40°	637.3	650.6	679.9	709.3	718.6
42.5°	604.0	617.3	649.3	682.6	691.9
45°	566.6	585.3	620.0	654.6	662.6
47.5°	530.6	550.6	589.3	624.0	634.6
50°	496.0	516.0	557.3	593.3	604.0
52.5°	460.0	481.3	525.3	562.6	572.0
55°	424.0	446.6	493.3	529.3	537.3
57.5°	388.0	412.0	460.0	494.6	504.0
60°	352.0	377.3	424.0	458.6	465.3
62.5°	316.0	342.6	390.6	421.3	428.0
65°	280.0	309.3	357.3	385.3	393.3
67.5°	245.3	274.6	321.3	348.0	354.6
70°	213.3	240.0	286.6	306.6	309.3
72.5°	173.3	206.7	252.0	262.6	256.0
75°	140.0	173.3	212.0	208.0	200.0
77.5°	106.7	140.0	165.3	152.0	141.3
80°	76.0	109.3	114.7	94.7	89.3
82.5°	49.3	76.0	64.0	49.3	40.0
85°	25.3	36.0	20.0	16.0	13.3
87.5°	8.0	5.3	2.7	2.7	1.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)