

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: P271940

Luminaire Tested: **14CZ2-29-S-UNV-L950-CD1-U**

Issue Date: 3/3/2020

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.

Test Information

Test Method: LM-79-08
Report Number: P271940
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-L950-CD1-U
Description: 1'X4' TROFFER LED MODULE,SMOOTH LENS, 90CRI
Light Source: (84) 5000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER
Luminaire Equipment: Sample No. Condition Description

Summary

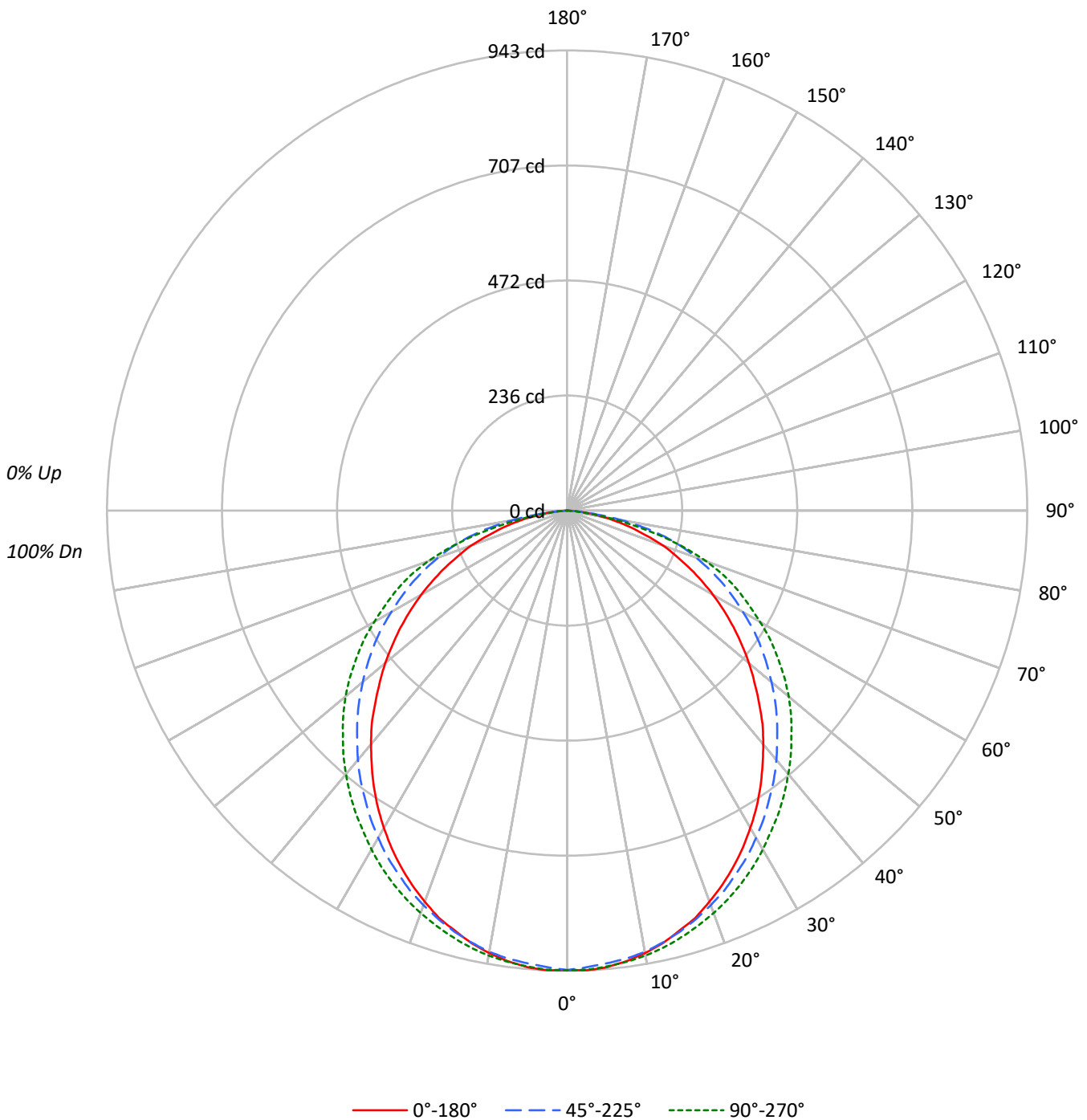
Lumens per Lamp: N/A
Luminaire Lumens: 2638.0 lumens
Efficiency: N/A
Efficacy: 108.6 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.26 / 1.36
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 24.3
Input Voltage (V): NR
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	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°	2534	2534	2534
5°	2537	2516	2533
10°	2516	2509	2530
15°	2481	2489	2522
20°	2442	2464	2513
25°	2392	2435	2505
30°	2333	2406	2491
35°	2269	2372	2484
40°	2196	2343	2477
45°	2116	2315	2474
50°	2037	2289	2480
55°	1951	2270	2473
60°	1858	2238	2457
65°	1749	2232	2457
70°	1647	2212	2387
75°	1428	2163	2040
80°	1156	1743	1358
85°	769	605	404



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	88.9	3.4
10°-20°	253.0	9.6
20°-30°	379.6	14.4
30°-40°	452.8	17.2
40°-50°	468.1	17.7
50°-60°	427.4	16.2
60°-70°	336.3	12.7
70°-80°	195.8	7.4
80°-90°	36.1	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°	721.5	27.4
0°-40°	1174.3	44.5
0°-60°	2069.8	78.5
0°-90°	2638.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2638.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	942	942	942	942	942	
5°	939	936	931	939	938	89
15°	891	892	893	905	905	251
25°	806	810	820	840	844	371
35°	691	700	722	750	756	432
45°	556	574	608	642	650	429
55°	416	438	484	519	527	372
65°	275	303	350	378	386	273
75°	137	170	208	204	196	146
85°	25	35	20	16	13	32
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	941.7	941.7	941.7	941.7	941.7
2.5°	943.0	940.4	936.5	943.0	941.7
5°	939.1	936.5	931.3	939.1	937.8
7.5°	931.3	928.6	926.0	933.9	932.6
10°	920.8	919.5	918.2	927.3	926.0
12.5°	907.7	907.7	906.4	916.9	916.9
15°	890.7	892.0	893.3	905.1	905.1
17.5°	875.0	873.7	877.6	890.7	892.0
20°	852.8	855.4	860.6	876.3	877.6
22.5°	830.5	833.2	842.3	858.0	861.9
25°	805.7	809.6	820.1	839.7	843.6
27.5°	779.5	784.8	799.2	820.1	824.0
30°	750.8	758.6	774.3	797.8	801.8
32.5°	722.0	729.8	749.5	773.0	778.2
35°	690.6	699.8	722.0	749.5	756.0
37.5°	657.9	669.7	695.8	723.3	731.1
40°	625.2	638.3	667.1	695.8	705.0
42.5°	592.5	605.6	637.0	669.7	678.8
45°	555.9	574.2	608.2	642.2	650.0
47.5°	520.6	540.2	578.1	612.1	622.6
50°	486.6	506.2	546.7	582.0	592.5
52.5°	451.2	472.2	515.3	552.0	561.1
55°	415.9	438.2	483.9	519.3	527.1
57.5°	380.6	404.2	451.2	485.2	494.4
60°	345.3	370.1	415.9	449.9	456.5
62.5°	310.0	336.1	383.2	413.3	419.9
65°	274.7	303.4	350.5	378.0	385.8
67.5°	240.7	269.4	315.2	341.4	347.9
70°	209.3	235.4	281.2	300.8	303.4
72.5°	170.0	202.7	247.2	257.7	251.1
75°	137.3	170.0	208.0	204.0	196.2
77.5°	104.6	137.3	162.2	149.1	138.6
80°	74.6	107.3	112.5	92.9	87.6
82.5°	48.4	74.6	62.8	48.4	39.2
85°	24.9	35.3	19.6	15.7	13.1
87.5°	7.8	5.2	2.6	2.6	1.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)