

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: P277366

Luminaire Tested: **22CZ2-34HE-S-UNV-L93050-W2A1-U-3500K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P277366
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-23)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ2-34HE-S-UNV-L93050-W2A1-U-3500K
Description: CRUZE 2.0 2x2 TUNABLE WHITE LED TROFFER WITH SMOOTH LENS
Light Source: (168) 90 CRI LEDS TUNED TO 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2871.0 lumens
Efficiency: N/A
Efficacy: 109.8 lumens/watt
Spacing Criteria (0/90/45): 1.18 / 1.26 / 1.34
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

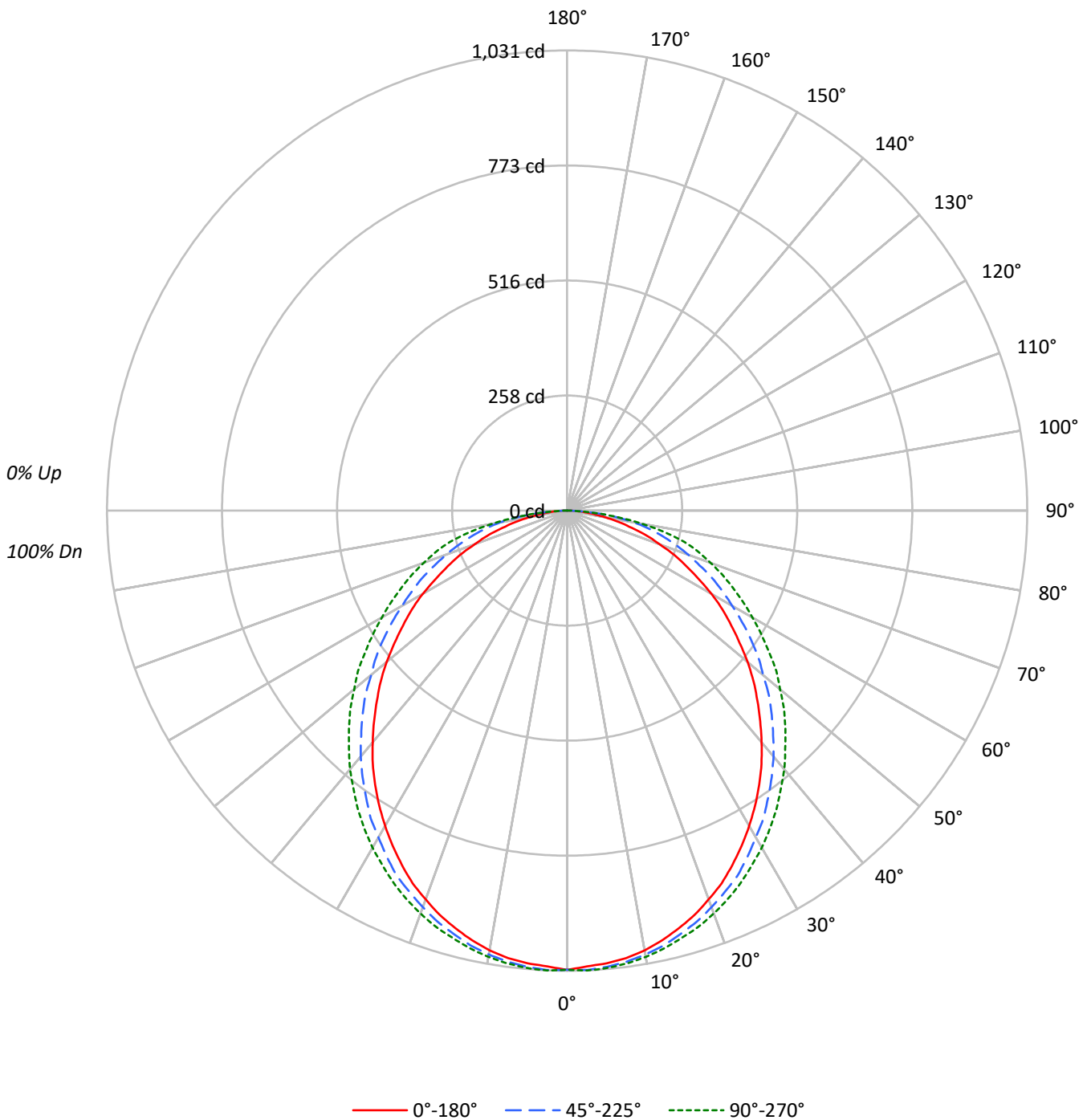
Input Watts (W): 26.155692
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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					100			
1	108	103	99	95	106	101	97	94	97	94	91	93	90	88	89	87	85	83					83			
2	98	90	83	77	96	88	82	76	84	79	74	81	77	73	78	74	71	69					69			
3	90	79	71	64	87	77	70	63	74	68	62	72	66	61	69	64	60	58					58			
4	82	70	61	54	80	69	60	54	66	59	53	64	57	52	61	56	52	49					49			
5	75	62	53	47	73	61	53	46	59	52	46	57	51	45	55	50	45	43					43			
6	70	56	47	41	68	55	47	41	53	46	40	52	45	40	50	44	39	37					37			
7	65	51	42	36	63	50	42	36	49	41	36	47	40	35	46	40	35	33					33			
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	31	30					30			
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	28	27					27			
10	53	40	32	26	51	39	31	26	38	31	26	37	31	26	36	30	26	24					24			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2768	2768	2768
5°	2750	2772	2779
10°	2734	2760	2775
15°	2698	2735	2762
20°	2655	2708	2751
25°	2601	2681	2733
30°	2535	2627	2710
35°	2464	2579	2684
40°	2381	2527	2659
45°	2294	2467	2630
50°	2210	2400	2608
55°	2105	2357	2589
60°	2011	2300	2581
65°	1876	2286	2610
70°	1729	2266	2688
75°	1560	2298	2827
80°	1350	2366	2658
85°	1118	1985	1985



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	97.3	3.4
10°-20°	276.9	9.6
20°-30°	414.3	14.4
30°-40°	490.6	17.1
40°-50°	500.0	17.4
50°-60°	448.1	15.6
60°-70°	350.8	12.2
70°-80°	226.2	7.9
80°-90°	66.8	2.3
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°	788.4	27.5
0°-40°	1279.0	44.5
0°-60°	2227.1	77.6
0°-90°	2871.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2871.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1029	1029	1029	1029	1029	
5°	1018	1021	1026	1027	1029	97
15°	968	974	982	990	991	273
25°	876	884	903	915	920	403
35°	750	760	785	809	817	469
45°	603	616	648	682	691	466
55°	449	464	502	537	552	402
65°	295	312	359	394	410	293
75°	150	173	221	258	272	161
85°	36	50	64	64	64	42
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1028.8	1028.8	1028.8	1028.8	1028.8
2.5°	1022.1	1024.8	1030.1	1031.4	1031.4
5°	1018.1	1020.7	1026.1	1027.4	1028.8
7.5°	1011.4	1012.7	1019.4	1022.1	1023.4
10°	1000.6	1003.3	1010.0	1014.0	1015.4
12.5°	985.9	989.9	998.0	1003.3	1004.7
15°	968.5	973.8	981.9	989.9	991.3
17.5°	949.7	955.1	965.8	975.2	977.9
20°	927.0	933.7	945.7	956.4	960.5
22.5°	904.2	909.5	924.3	937.7	941.7
25°	876.1	884.1	902.9	914.9	920.3
27.5°	846.6	856.0	874.7	890.8	896.2
30°	815.8	825.2	845.3	865.3	872.0
32.5°	783.6	794.3	818.5	838.6	845.3
35°	750.1	759.5	785.0	809.1	817.1
37.5°	715.3	723.4	752.8	778.3	786.3
40°	677.8	688.5	719.3	748.8	756.8
42.5°	640.3	652.4	683.2	715.3	723.4
45°	602.8	616.2	648.3	681.8	691.2
47.5°	566.6	577.3	613.5	645.7	659.1
50°	527.8	538.5	573.3	609.5	622.9
52.5°	487.6	502.3	539.8	574.7	590.7
55°	448.7	463.5	502.3	537.2	551.9
57.5°	412.6	424.6	464.8	501.0	515.7
60°	373.7	384.4	427.3	466.2	479.6
62.5°	332.2	348.3	392.5	428.7	444.7
65°	294.7	312.1	359.0	393.8	409.9
67.5°	259.9	275.9	321.5	359.0	376.4
70°	219.7	241.1	288.0	325.5	341.6
72.5°	187.5	206.3	254.5	292.0	309.4
75°	150.0	172.8	221.0	258.5	271.9
77.5°	119.2	142.0	187.5	217.0	223.7
80°	87.1	109.8	152.7	167.4	171.5
82.5°	58.9	80.4	109.8	113.9	115.2
85°	36.2	49.6	64.3	64.3	64.3
87.5°	17.4	20.1	22.8	21.4	21.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)