

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: P275577

Luminaire Tested: **14CZ2-39-S-UNV-L83050-W2A1-U-3500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P275577  
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: 14CZ2-39-S-UNV-L83050-W2A1-U-3500K  
Description: CRUZE 2.0 1x4 TUNABLE WHITE LED TROFFER  
WITH SMOOTH LENS  
Light Source: (168) 80 CRI LEDS TUNED TO 3500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3887.0 lumens  
Efficiency: N/A  
Efficacy: 125.5 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

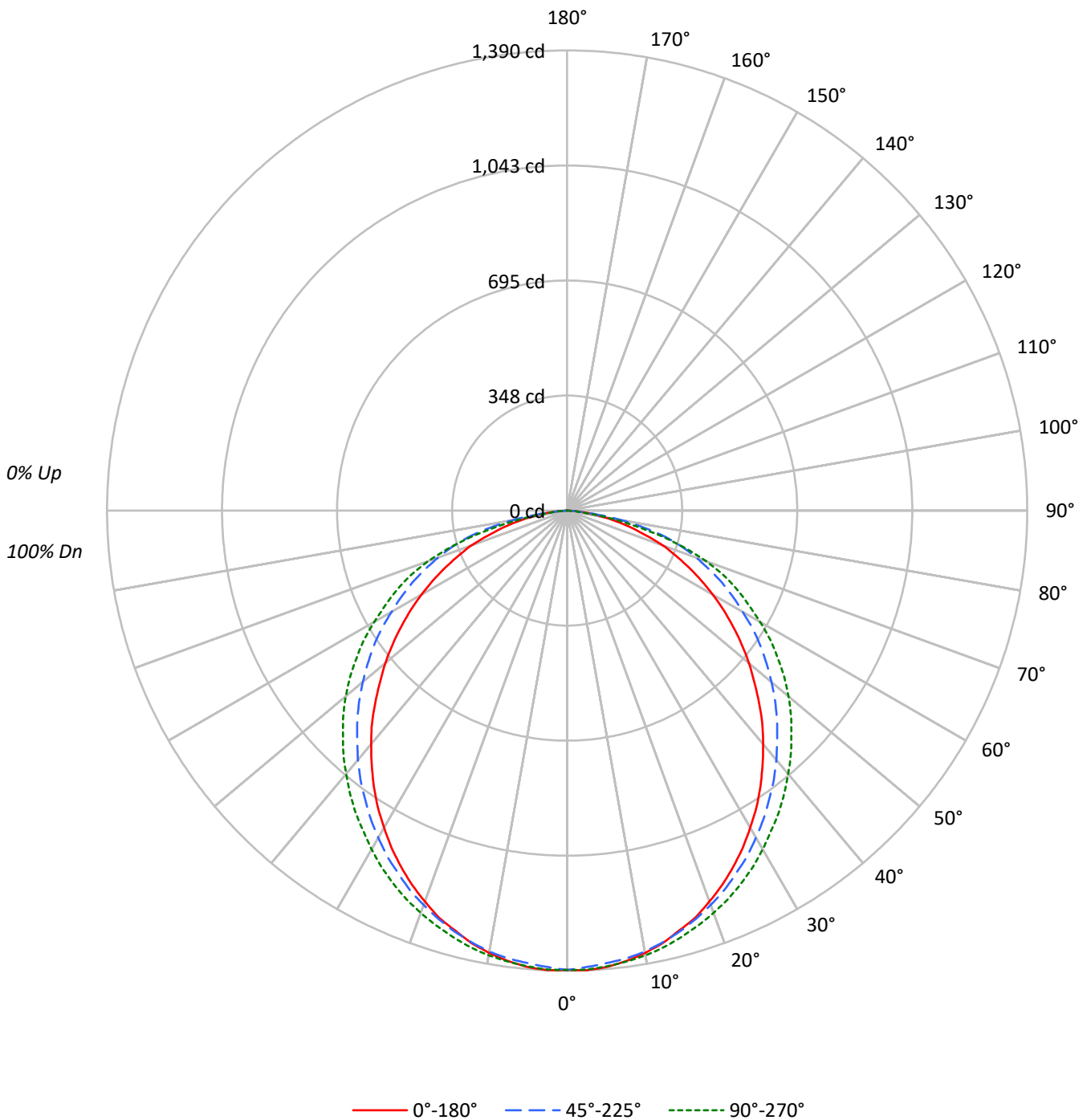
Input Watts (W): 30.969  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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	109	104	100	96	106	102	98	94	97	94	91	94	91	89	90	88	86	84					84			
2	99	90	84	78	96	89	82	77	85	80	75	82	77	73	79	75	72	70					70			
3	90	79	71	65	87	78	70	64	75	68	63	72	66	62	69	65	61	58					58			
4	82	70	61	55	80	69	61	54	66	59	53	64	58	53	62	56	52	50					50			
5	76	63	54	47	74	62	53	47	59	52	46	57	51	46	56	50	45	43					43			
6	70	56	47	41	68	55	47	41	54	46	40	52	45	40	50	44	40	38					38			
7	65	51	42	36	63	50	42	36	49	41	36	47	41	35	46	40	35	33					33			
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	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	52	39	31	26	38	31	26	37	31	26	36	30	26	24					24			

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

	0°	45°	90°
0°	3734	3734	3734
5°	3738	3707	3733
10°	3707	3697	3728
15°	3656	3667	3715
20°	3598	3631	3703
25°	3525	3588	3691
30°	3437	3545	3671
35°	3343	3495	3659
40°	3236	3453	3649
45°	3117	3411	3645
50°	3001	3373	3655
55°	2875	3346	3644
60°	2738	3299	3620
65°	2577	3289	3620
70°	2426	3260	3518
75°	2104	3186	3006
80°	1703	2568	2001
85°	1130	892	596



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	131.0	3.4
10°-20°	372.9	9.6
20°-30°	559.3	14.4
30°-40°	667.2	17.2
40°-50°	689.7	17.7
50°-60°	629.7	16.2
60°-70°	495.6	12.7
70°-80°	288.5	7.4
80°-90°	53.2	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°	1063.2	27.4
0°-40°	1730.4	44.5
0°-60°	3049.8	78.5
0°-90°	3887.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3887.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1388	1388	1388	1388	1388	
5°	1384	1380	1372	1384	1382	131
15°	1312	1314	1316	1334	1334	370
25°	1187	1193	1208	1237	1243	547
35°	1018	1031	1064	1104	1114	636
45°	819	846	896	946	958	632
55°	613	646	713	765	777	548
65°	405	447	516	557	568	402
75°	202	250	306	301	289	215
85°	37	52	29	23	19	47
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1387.6	1387.6	1387.6	1387.6	1387.6
2.5°	1389.5	1385.7	1379.9	1389.5	1387.6
5°	1383.7	1379.9	1372.2	1383.7	1381.8
7.5°	1372.2	1368.3	1364.5	1376.0	1374.1
10°	1356.8	1354.8	1352.9	1366.4	1364.5
12.5°	1337.5	1337.5	1335.6	1351.0	1351.0
15°	1312.4	1314.4	1316.3	1333.6	1333.6
17.5°	1289.3	1287.4	1293.2	1312.4	1314.4
20°	1256.5	1260.4	1268.1	1291.2	1293.2
22.5°	1223.8	1227.6	1241.1	1264.3	1270.0
25°	1187.2	1192.9	1208.4	1237.3	1243.1
27.5°	1148.6	1156.3	1177.5	1208.4	1214.1
30°	1106.2	1117.8	1140.9	1175.6	1181.4
32.5°	1063.8	1075.4	1104.3	1139.0	1146.7
35°	1017.6	1031.1	1063.8	1104.3	1113.9
37.5°	969.4	986.7	1025.3	1065.7	1077.3
40°	921.2	940.5	982.9	1025.3	1038.8
42.5°	873.0	892.3	938.6	986.7	1000.2
45°	819.1	846.0	896.2	946.3	957.8
47.5°	767.0	795.9	851.8	901.9	917.4
50°	716.9	745.8	805.6	857.6	873.0
52.5°	664.9	695.7	759.3	813.3	826.8
55°	612.9	645.6	713.1	765.1	776.7
57.5°	560.8	595.5	664.9	715.0	728.5
60°	508.8	545.4	612.9	663.0	672.6
62.5°	456.7	495.3	564.7	609.0	618.6
65°	404.7	447.1	516.5	557.0	568.5
67.5°	354.6	397.0	464.5	503.0	512.6
70°	308.4	346.9	414.4	443.3	447.1
72.5°	250.5	298.7	364.2	379.7	370.0
75°	202.4	250.5	306.4	300.6	289.1
77.5°	154.2	202.4	239.0	219.7	204.3
80°	109.9	158.0	165.7	136.8	129.1
82.5°	71.3	109.9	92.5	71.3	57.8
85°	36.6	52.0	28.9	23.1	19.3
87.5°	11.6	7.7	3.9	3.9	1.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)