

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: P238763

Luminaire Tested: **14EN-LD2-33-UNV-L840-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P238763
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1710-395-5)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 14EN-LD2-33-UNV-L840-CD1-U
Description: METALUX ENCOUNTER 1X4 LED TROFFER
STANDARD OPTION
Light Source: (224)4000K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3395.6 lumens
Efficiency: N/A
Efficacy: 120.8 lumens/watt
Spacing Criteria (0/90/45): 1.28 / 1.27 / 1.39
Luminous Opening: Rectangular (W 1' x L: 3.83' x H: 0')
CIE Type: Direct

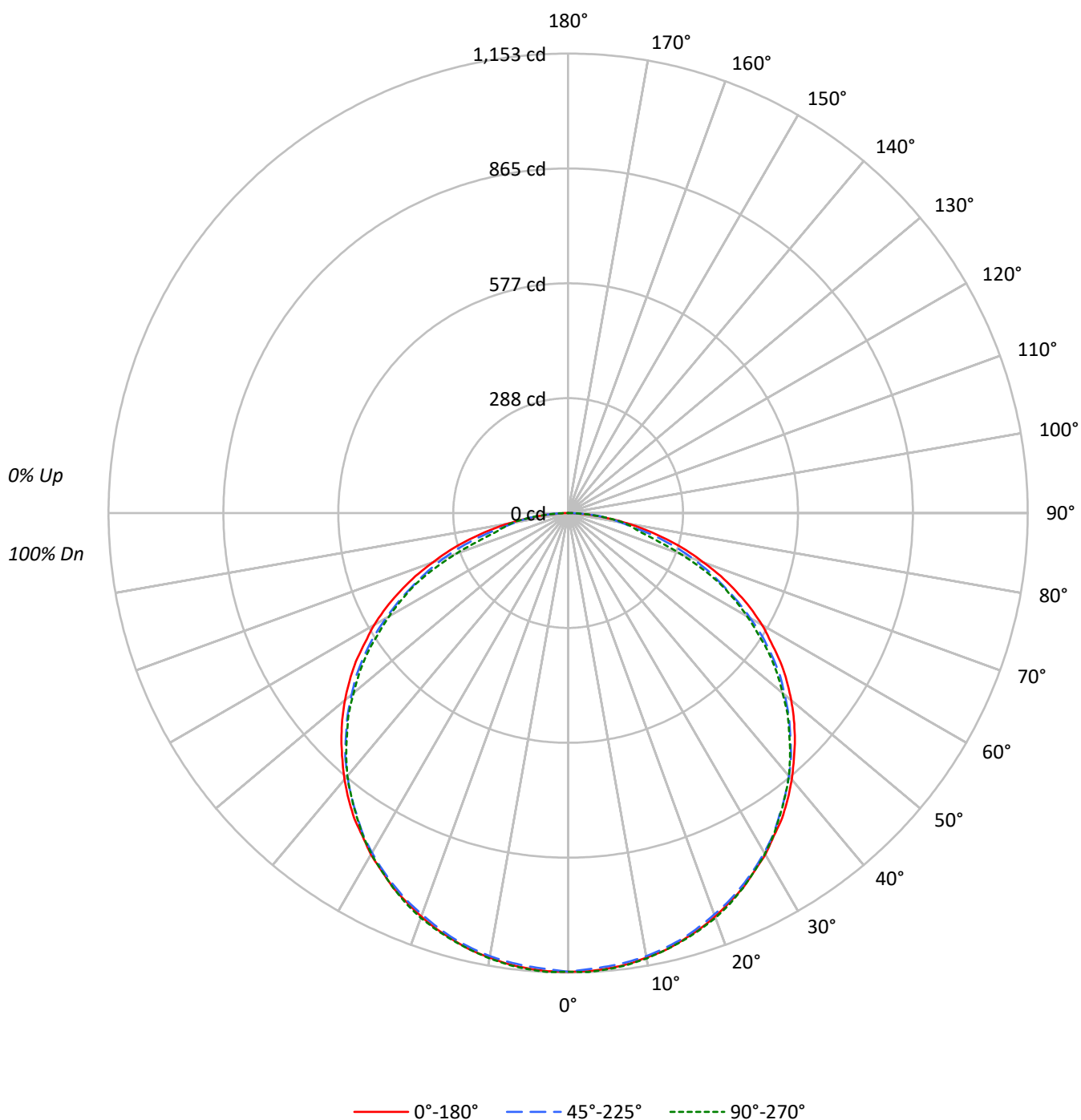
Input Watts (W): 28.1
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				0
RW	70	50	30	10	70	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		100
1	109	104	99	95	106	101	97	94	97	94	91		93	90	88		83
2	99	90	83	77	96	88	82	76	85	79	75		81	77	73		69
3	90	79	71	64	87	77	70	63	74	68	62		72	66	61		58
4	82	70	61	54	80	68	60	54	66	59	53		64	57	52		49
5	75	62	53	46	73	61	53	46	59	51	46		57	50	45		42
6	69	56	47	40	68	55	46	40	53	46	40		51	45	39		37
7	64	51	42	36	63	50	41	35	48	41	35		47	40	35		33
8	60	46	38	32	58	45	37	32	44	37	31		43	36	31		29
9	56	42	34	28	54	42	34	28	41	33	28		40	33	28		26
10	52	39	31	26	51	39	31	26	38	30	26		37	30	25		24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3231	3231	3231
5°	3234	3218	3239
10°	3230	3220	3235
15°	3225	3215	3231
20°	3219	3203	3230
25°	3215	3198	3215
30°	3207	3190	3202
35°	3206	3169	3176
40°	3198	3159	3159
45°	3194	3130	3115
50°	3192	3098	3067
55°	3182	3059	3015
60°	3156	2964	2914
65°	3090	2839	2803
70°	2963	2727	2461
75°	2785	2454	2065
80°	2468	2120	2322
85°	1907	2197	2081



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	109.0	3.2
10°-20°	313.0	9.2
20°-30°	477.0	14.0
30°-40°	580.9	17.1
40°-50°	610.8	18.0
50°-60°	560.7	16.5
60°-70°	430.8	12.7
70°-80°	240.4	7.1
80°-90°	73.0	2.1
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°	899.0	26.5
0°-40°	1479.9	43.6
0°-60°	2651.4	78.1
0°-90°	3395.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3395.6	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1151	1151	1151	1151	1151	
5°	1147	1147	1142	1147	1149	109
15°	1110	1110	1106	1110	1111	313
25°	1038	1034	1032	1036	1038	478
35°	935	932	925	926	926	585
45°	804	799	788	784	784	621
55°	650	644	625	614	616	580
65°	465	452	427	422	422	459
75°	257	244	226	196	190	271
85°	59	61	68	66	65	72
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1150.8	1150.8	1150.8	1150.8	1150.8
2.5°	1150.8	1150.8	1145.4	1150.8	1152.6
5°	1147.2	1147.2	1141.8	1147.2	1149.0
7.5°	1141.8	1141.8	1136.4	1140.0	1143.6
10°	1132.8	1132.8	1129.2	1132.8	1134.6
12.5°	1123.8	1122.1	1118.5	1122.1	1123.8
15°	1109.5	1109.5	1105.9	1109.5	1111.3
17.5°	1095.1	1093.3	1089.7	1095.1	1096.9
20°	1077.2	1075.4	1071.8	1077.2	1080.8
22.5°	1057.4	1055.6	1053.8	1059.2	1061.0
25°	1037.7	1034.1	1032.3	1035.9	1037.7
27.5°	1012.5	1010.7	1008.9	1010.7	1012.5
30°	989.2	985.6	983.8	983.8	987.4
32.5°	960.5	958.7	956.9	958.7	958.7
35°	935.3	931.8	924.6	926.4	926.4
37.5°	904.8	899.4	894.1	894.1	894.1
40°	872.5	868.9	861.7	859.9	861.7
42.5°	838.4	834.8	827.6	822.2	824.0
45°	804.3	798.9	788.1	784.5	784.5
47.5°	768.4	763.0	750.4	745.0	746.8
50°	730.7	723.5	709.1	702.0	702.0
52.5°	691.2	684.0	669.6	660.7	660.7
55°	649.9	644.5	624.8	614.0	615.8
57.5°	603.2	597.8	578.1	565.5	565.5
60°	561.9	551.2	527.8	518.8	518.8
62.5°	515.2	502.7	479.3	468.6	470.4
65°	465.0	452.4	427.3	421.9	421.9
67.5°	414.7	403.9	380.6	371.6	362.6
70°	360.9	350.1	332.1	310.6	299.8
72.5°	310.6	298.0	281.9	249.5	238.8
75°	256.7	244.2	226.2	195.7	190.3
77.5°	204.7	193.9	168.8	161.6	165.2
80°	152.6	149.0	131.1	138.2	143.6
82.5°	102.3	100.5	104.1	107.7	107.7
85°	59.2	61.0	68.2	66.4	64.6
87.5°	25.1	30.5	28.7	28.7	28.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)