

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: P238963

Luminaire Tested: **24EN-LD2-34-UNV-L940-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P238963
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1708-234-34)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24EN-LD2-34-UNV-L940-CD1-U
Description: METALUX ENCOUNTER 2X4 LED TROFFER
STANDARD OPTION
Light Source: (224)4000K CCT, 90 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3251.4 lumens
Efficiency: N/A
Efficacy: 113.3 lumens/watt
Spacing Criteria (0/90/45): 1.29 / 1.29 / 1.4
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

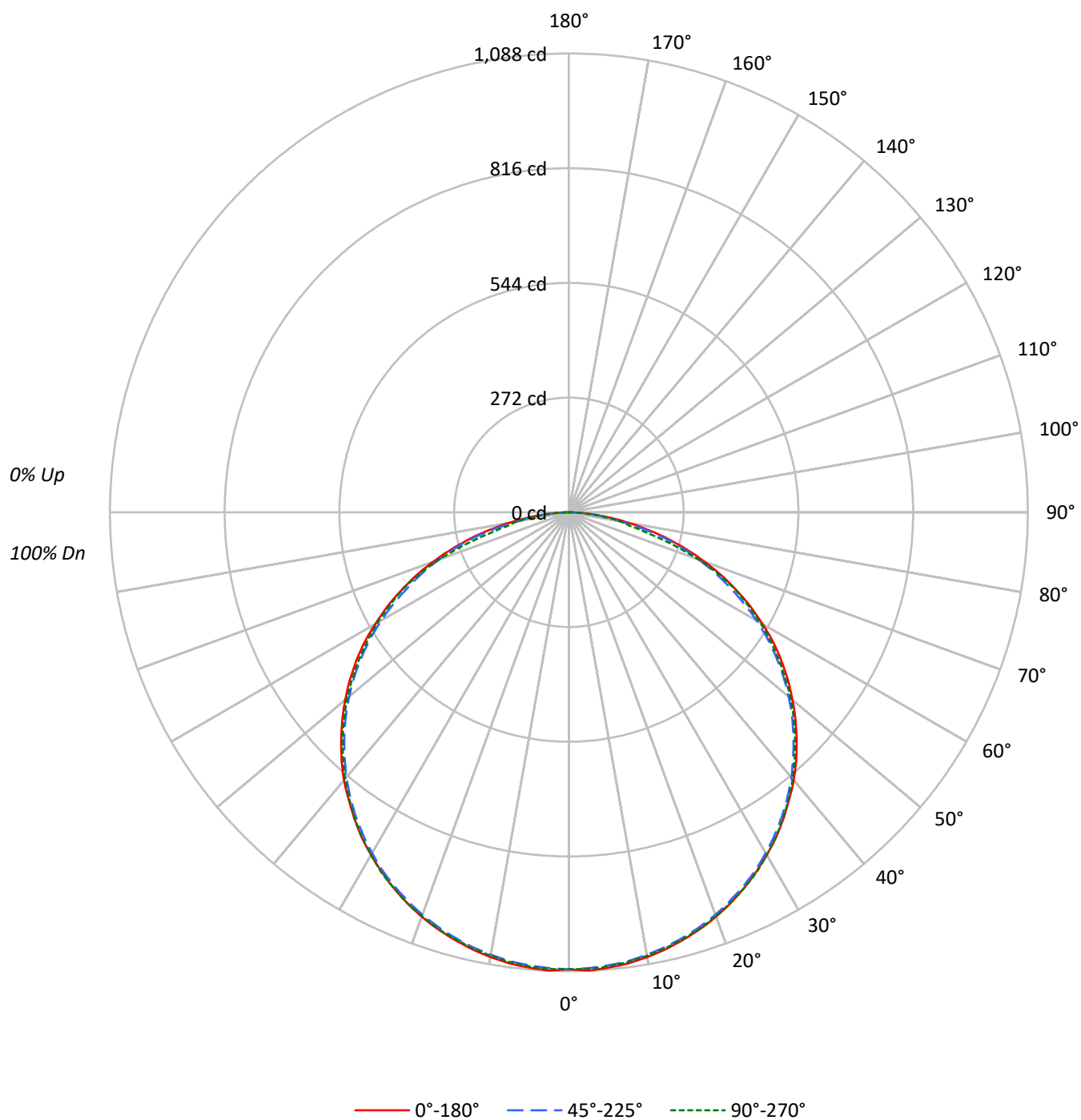
Input Watts (W): 28.7
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	98	90	83	77	96	88	82	76	84	79	74		81	77	73		69
3	90	79	70	64	87	77	69	63	74	67	62		71	66	61		58
4	82	70	61	54	79	68	60	53	66	58	53		63	57	52		49
5	75	62	53	46	73	61	52	46	59	51	45		57	50	45		42
6	69	56	47	40	67	55	46	40	53	45	40		51	44	39		37
7	64	50	42	35	62	50	41	35	48	40	35		47	40	35		32
8	60	46	37	31	58	45	37	31	44	36	31		43	36	31		29
9	56	42	34	28	54	42	34	28	40	33	28		39	33	28		26
10	52	39	31	26	51	38	31	25	37	30	25		36	30	25		23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1660	1660	1660
5°	1666	1658	1662
10°	1665	1657	1661
15°	1663	1656	1660
20°	1663	1655	1661
25°	1661	1653	1661
30°	1659	1650	1659
35°	1658	1646	1655
40°	1658	1641	1650
45°	1654	1630	1642
50°	1650	1620	1635
55°	1644	1604	1620
60°	1623	1573	1607
65°	1591	1524	1580
70°	1533	1469	1466
75°	1443	1379	1166
80°	1270	1079	1109
85°	1003	944	872



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	102.6	3.2
10°-20°	295.2	9.1
20°-30°	451.7	13.9
30°-40°	552.1	17.0
40°-50°	583.4	17.9
50°-60°	540.5	16.6
60°-70°	423.5	13.0
70°-80°	239.4	7.4
80°-90°	63.1	1.9
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°	849.5	26.1
0°-40°	1401.5	43.1
0°-60°	2525.5	77.7
0°-90°	3251.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3251.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1084	1084	1084	1084	1084	
5°	1084	1080	1078	1078	1081	103
15°	1049	1045	1044	1044	1047	296
25°	983	979	978	978	983	453
35°	887	882	880	880	885	555
45°	764	758	753	753	758	589
55°	616	609	600	602	607	550
65°	439	431	420	426	436	434
75°	244	237	233	208	197	257
85°	57	54	54	51	50	67
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1083.6	1083.6	1083.6	1083.6	1083.6
2.5°	1087.6	1082.9	1081.5	1080.2	1083.6
5°	1083.6	1080.2	1078.1	1077.5	1080.8
7.5°	1078.8	1074.7	1073.4	1072.0	1075.4
10°	1070.7	1066.6	1065.2	1064.5	1067.9
12.5°	1061.1	1056.4	1055.7	1055.0	1058.4
15°	1048.9	1044.8	1044.2	1043.5	1046.9
17.5°	1036.0	1031.9	1030.6	1029.9	1034.7
20°	1020.4	1016.3	1015.6	1015.0	1019.0
22.5°	1002.7	998.6	997.3	998.0	1002.0
25°	983.0	978.9	978.3	978.3	983.0
27.5°	961.3	957.2	957.2	957.2	962.6
30°	938.2	934.8	932.8	933.4	938.2
32.5°	914.4	909.0	907.6	908.3	913.0
35°	886.6	882.5	880.4	880.4	885.2
37.5°	858.0	853.9	851.2	851.2	856.0
40°	829.5	823.4	820.7	819.3	825.4
42.5°	797.6	792.8	786.7	786.7	792.1
45°	763.6	758.2	752.7	752.7	758.2
47.5°	728.9	723.5	717.4	717.4	722.8
50°	692.3	686.8	680.0	680.0	686.1
52.5°	654.9	648.8	641.3	640.6	646.7
55°	615.5	608.7	600.5	601.9	606.7
57.5°	575.4	566.6	558.4	558.4	565.9
60°	529.9	522.4	513.6	514.9	524.5
62.5°	486.4	476.9	468.1	471.5	479.6
65°	438.9	430.7	420.5	426.0	436.1
67.5°	392.0	383.2	375.0	381.8	386.6
70°	342.4	334.2	328.1	328.1	327.4
72.5°	292.8	285.3	284.0	271.1	262.9
75°	243.9	237.1	233.0	207.9	197.0
77.5°	192.9	190.9	178.0	151.5	148.1
80°	144.0	145.4	122.3	123.0	125.7
82.5°	99.2	97.1	91.7	87.6	86.3
85°	57.1	53.7	53.7	51.0	49.6
87.5°	19.0	21.1	21.1	21.1	21.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)