

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: P238942

Luminaire Tested: **24ENA-LD2-58-UNV-L835-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P238942
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: 24ENA-LD2-58-UNV-L835-CD1-U
Description: METALUX ENCOUNTER 2X4 LED TROFFER
AIR-VENTED OPTION
Light Source: (308)3500K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5692.1 lumens
Efficiency: N/A
Efficacy: 121.1 lumens/watt
Spacing Criteria (0/90/45): 1.29 / 1.29 / 1.4
Luminous Opening: Rectangular (W 1.67' x L: 3.83' x H: 0')
CIE Type: Direct

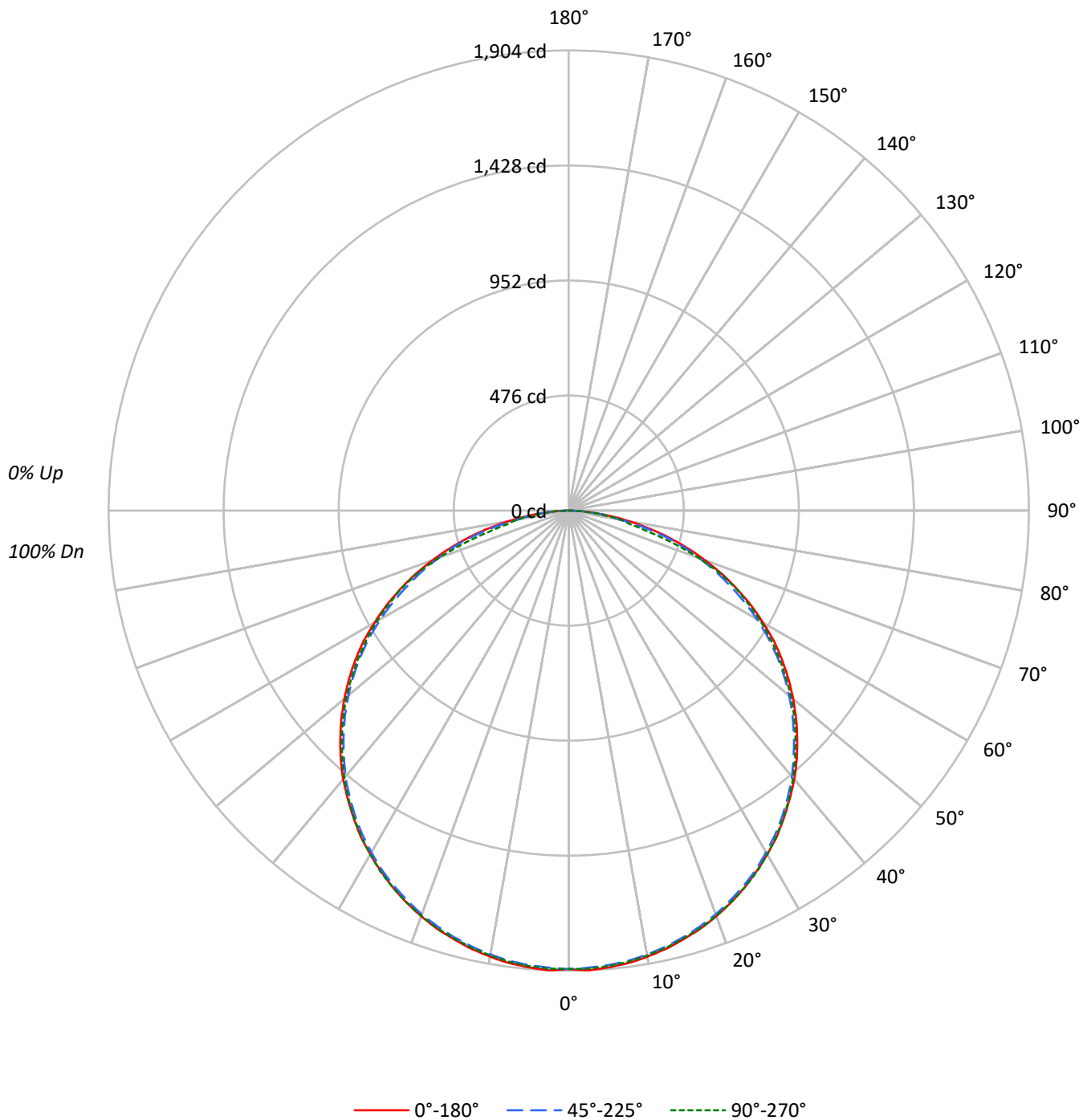
Input Watts (W): 47
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100		
1	109	104	99	95	106	101	97	94	97	94	91	93	90	88	90	87	85	83		
2	98	90	83	77	96	88	82	76	84	79	74	81	77	73	78	74	71	69		
3	90	79	70	64	87	77	69	63	74	67	62	71	66	61	69	64	60	58		
4	82	70	61	54	79	68	60	53	66	58	53	63	57	52	61	56	51	49		
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42		
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37		
7	64	50	42	35	62	50	41	35	48	40	35	47	40	35	45	39	34	32		
8	60	46	37	31	58	45	37	31	44	36	31	43	36	31	41	35	31	29		
9	56	42	34	28	54	42	34	28	40	33	28	39	33	28	38	32	28	26		
10	52	39	31	26	51	38	31	25	37	30	25	36	30	25	35	29	25	23		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3196	3196	3196
5°	3208	3192	3200
10°	3207	3190	3198
15°	3203	3188	3197
20°	3203	3188	3198
25°	3199	3184	3199
30°	3195	3177	3195
35°	3192	3170	3187
40°	3194	3160	3178
45°	3185	3140	3162
50°	3176	3120	3148
55°	3165	3088	3119
60°	3126	3030	3094
65°	3063	2935	3044
70°	2953	2829	2824
75°	2780	2655	2245
80°	2446	2077	2135
85°	1931	1817	1678



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	179.7	3.2
10°-20°	516.7	9.1
20°-30°	790.7	13.9
30°-40°	966.5	17.0
40°-50°	1021.3	17.9
50°-60°	946.3	16.6
60°-70°	741.4	13.0
70°-80°	419.1	7.4
80°-90°	110.4	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°	1487.1	26.1
0°-40°	2453.6	43.1
0°-60°	4421.2	77.7
0°-90°	5692.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5692.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1897	1897	1897	1897	1897	
5°	1897	1891	1887	1886	1892	180
15°	1836	1829	1828	1827	1833	519
25°	1721	1714	1713	1713	1721	793
35°	1552	1545	1541	1541	1550	972
45°	1337	1327	1318	1318	1327	1032
55°	1078	1066	1051	1054	1062	962
65°	768	754	736	746	764	760
75°	427	415	408	364	345	449
85°	100	94	94	89	87	118
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1896.9	1896.9	1896.9	1896.9	1896.9
2.5°	1904.1	1895.7	1893.4	1891.0	1896.9
5°	1896.9	1891.0	1887.4	1886.2	1892.2
7.5°	1888.6	1881.5	1879.1	1876.7	1882.7
10°	1874.3	1867.2	1864.8	1863.6	1869.6
12.5°	1857.7	1849.4	1848.2	1847.0	1852.9
15°	1836.3	1829.1	1827.9	1826.8	1832.7
17.5°	1813.7	1806.5	1804.2	1803.0	1811.3
20°	1786.3	1779.2	1778.0	1776.8	1783.9
22.5°	1755.4	1748.3	1745.9	1747.1	1754.2
25°	1720.9	1713.8	1712.6	1712.6	1720.9
27.5°	1682.9	1675.7	1675.7	1675.7	1685.2
30°	1642.4	1636.5	1632.9	1634.1	1642.4
32.5°	1600.8	1591.3	1588.9	1590.1	1598.4
35°	1552.0	1544.9	1541.3	1541.3	1549.7
37.5°	1502.1	1494.9	1490.2	1490.2	1498.5
40°	1452.1	1441.4	1436.7	1434.3	1445.0
42.5°	1396.2	1387.9	1377.2	1377.2	1386.7
45°	1336.8	1327.3	1317.7	1317.7	1327.3
47.5°	1276.1	1266.6	1255.9	1255.9	1265.4
50°	1211.9	1202.4	1190.5	1190.5	1201.2
52.5°	1146.5	1135.8	1122.7	1121.5	1132.2
55°	1077.5	1065.6	1051.3	1053.7	1062.0
57.5°	1007.3	991.9	977.6	977.6	990.7
60°	927.7	914.6	899.1	901.5	918.1
62.5°	851.5	834.9	819.4	825.4	839.6
65°	768.3	754.0	736.2	745.7	763.5
67.5°	686.2	670.8	656.5	668.4	676.7
70°	599.4	585.1	574.4	574.4	573.2
72.5°	512.6	499.5	497.1	474.5	460.3
75°	427.0	415.1	407.9	363.9	344.9
77.5°	337.8	334.2	311.6	265.2	259.3
80°	252.1	254.5	214.1	215.3	220.0
82.5°	173.6	170.1	160.6	153.4	151.0
85°	99.9	94.0	94.0	89.2	86.8
87.5°	33.3	36.9	36.9	36.9	38.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)