

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: P229384

Luminaire Tested: **24ALNG-LD5-60-UNV-L840-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P229384
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P36066)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24ALNG-LD5-60-UNV-L840-CD1-U
Description: METALUX 2X4 ARCLINE LED TROFFER WITH CURVED LENS
Light Source: (252)3500K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6027.0 lumens
Efficiency: N/A
Efficacy: 133.6 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.23 / 1.33
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

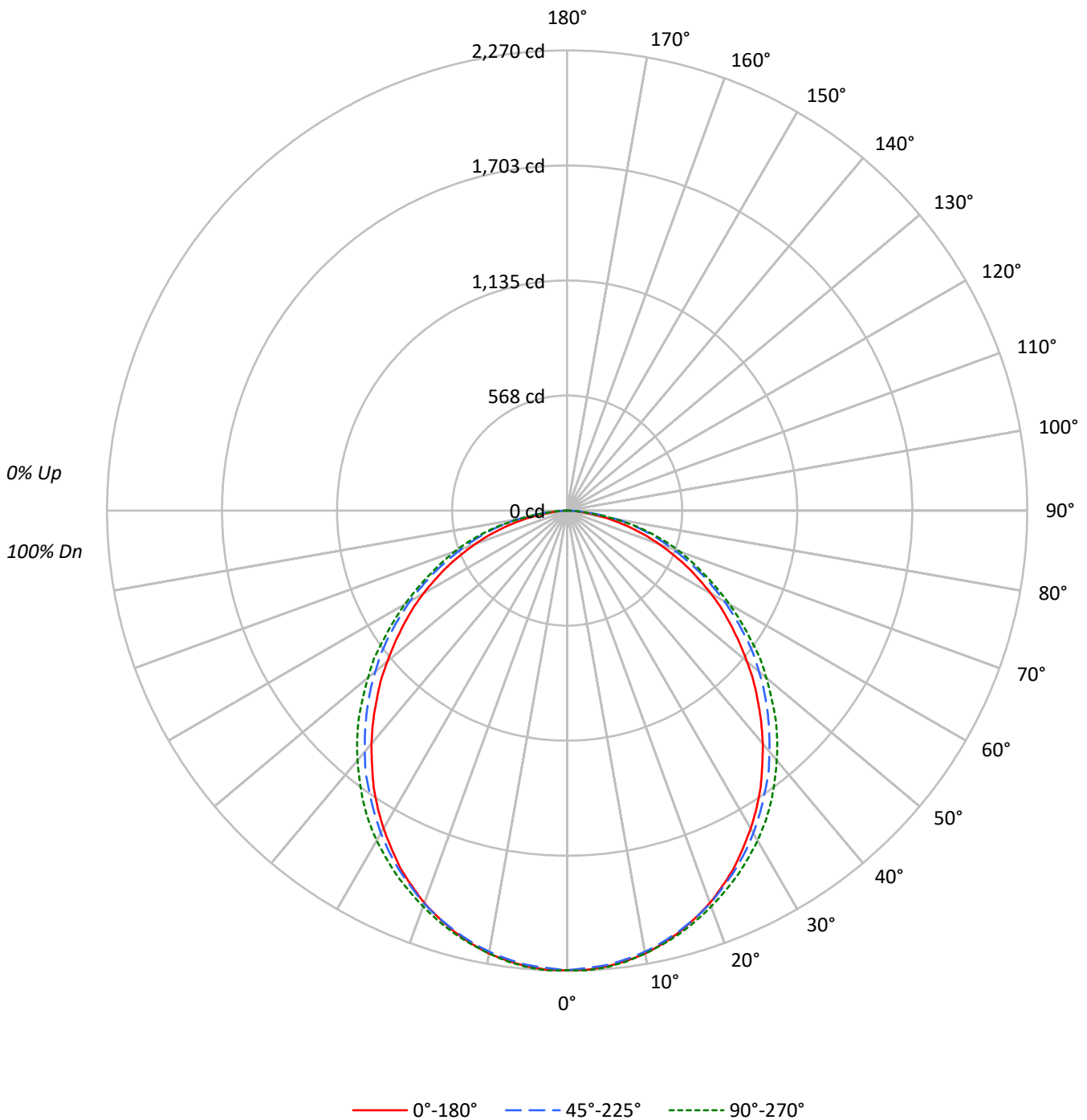
Input Watts (W): 45.1
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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					10	0
RW	70	50	30	10	70	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	95	98	95	92	94	91	89	90	88	86	84				84
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	72	70				70
3	90	80	72	65	88	78	71	65	75	69	64	73	67	63	70	66	62	59				59
4	83	71	62	56	81	70	62	55	67	60	54	65	59	54	63	57	53	51				51
5	76	64	55	48	74	62	54	48	60	53	47	58	52	47	56	51	46	44				44
6	71	57	48	42	69	56	48	42	55	47	41	53	46	41	51	45	41	39				39
7	65	52	43	37	64	51	43	37	50	42	37	48	41	36	47	41	36	34				34
8	61	47	39	33	59	47	39	33	45	38	33	44	38	33	43	37	32	31				31
9	57	44	35	30	56	43	35	30	42	35	30	41	34	30	40	34	29	28				28
10	53	40	32	27	52	40	32	27	39	32	27	38	31	27	37	31	27	25				25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3472	3472	3472
5°	3470	3460	3475
10°	3451	3438	3451
15°	3409	3402	3423
20°	3358	3363	3388
25°	3289	3309	3357
30°	3203	3250	3324
35°	3111	3177	3280
40°	3003	3103	3217
45°	2884	3025	3152
50°	2759	2942	3054
55°	2632	2851	2945
60°	2508	2743	2830
65°	2355	2622	2713
70°	2162	2484	2641
75°	1898	2382	2511
80°	1533	2225	2107
85°	1086	1467	1174



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	214.0	3.6
10°-20°	606.6	10.1
20°-30°	903.9	15.0
30°-40°	1066.4	17.7
40°-50°	1076.6	17.9
50°-60°	945.5	15.7
60°-70°	705.2	11.7
70°-80°	410.7	6.8
80°-90°	98.1	1.6
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°	1724.5	28.6
0°-40°	2790.9	46.3
0°-60°	4813.0	79.9
0°-90°	6027.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6027.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2267	2267	2267	2267	2267	
5°	2257	2256	2250	2257	2260	214
15°	2150	2149	2145	2155	2159	606
25°	1946	1948	1958	1980	1986	895
35°	1664	1674	1699	1739	1754	1039
45°	1332	1352	1397	1438	1455	1028
55°	986	1016	1068	1101	1103	883
65°	650	677	723	745	748	642
75°	321	359	403	423	424	342
85°	62	90	84	70	67	77
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2267.2	2267.2	2267.2	2267.2	2267.2
2.5°	2267.2	2265.5	2258.8	2265.5	2270.5
5°	2257.2	2255.5	2250.5	2257.2	2260.5
7.5°	2240.5	2238.8	2232.1	2242.1	2243.8
10°	2218.7	2215.4	2210.4	2217.1	2218.7
12.5°	2187.0	2185.3	2180.3	2188.7	2190.3
15°	2150.2	2148.6	2145.2	2155.2	2158.6
17.5°	2106.8	2108.5	2106.8	2118.5	2120.2
20°	2060.0	2061.7	2063.4	2076.7	2078.4
22.5°	2003.2	2004.9	2009.9	2028.3	2033.3
25°	1946.4	1948.1	1958.1	1979.8	1986.5
27.5°	1877.9	1884.6	1899.6	1926.4	1933.0
30°	1811.1	1817.8	1837.8	1869.6	1879.6
32.5°	1739.2	1745.9	1769.3	1804.4	1819.4
35°	1664.1	1674.1	1699.1	1739.2	1754.3
37.5°	1580.5	1598.9	1632.3	1670.7	1680.8
40°	1502.0	1515.4	1552.1	1598.9	1608.9
42.5°	1416.8	1435.2	1475.3	1522.0	1533.7
45°	1331.6	1351.6	1396.7	1438.5	1455.2
47.5°	1248.0	1269.8	1318.2	1361.6	1366.7
50°	1157.8	1184.6	1234.7	1276.4	1281.5
52.5°	1070.9	1102.7	1156.1	1189.6	1201.3
55°	985.7	1015.8	1067.6	1101.0	1102.7
57.5°	905.5	930.6	980.7	1009.1	1014.1
60°	818.7	843.7	895.5	918.9	923.9
62.5°	731.8	758.5	808.6	832.0	835.4
65°	649.9	676.6	723.4	745.1	748.5
67.5°	563.0	596.5	636.5	665.0	668.3
70°	482.8	516.3	554.7	583.1	589.8
72.5°	402.6	441.1	479.5	501.2	509.6
75°	320.8	359.2	402.6	422.7	424.4
77.5°	245.6	282.4	327.5	339.2	334.1
80°	173.8	213.9	252.3	250.6	238.9
82.5°	110.3	148.7	163.7	153.7	147.0
85°	61.8	90.2	83.5	70.2	66.8
87.5°	25.1	26.7	20.0	13.4	11.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)