

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: P292929

Luminaire Tested: **24GR-LD5-48-F1-UNV-L83050-W2A1-U-3000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P292929
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1901-084-12)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24GR-LD5-48-F1-UNV-L83050-W2A1-U-3000K
Description: GRLED 2x4 TUNABLE WHITE TROFFER
WITH F1 LENS
Light Source: (336) 80 CRI LEDS TUNED TO 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4582.0 lumens
Efficiency: N/A
Efficacy: 140.0 lumens/watt
Spacing Criteria (0/90/45): 1.18 / 1.18 / 1.25
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

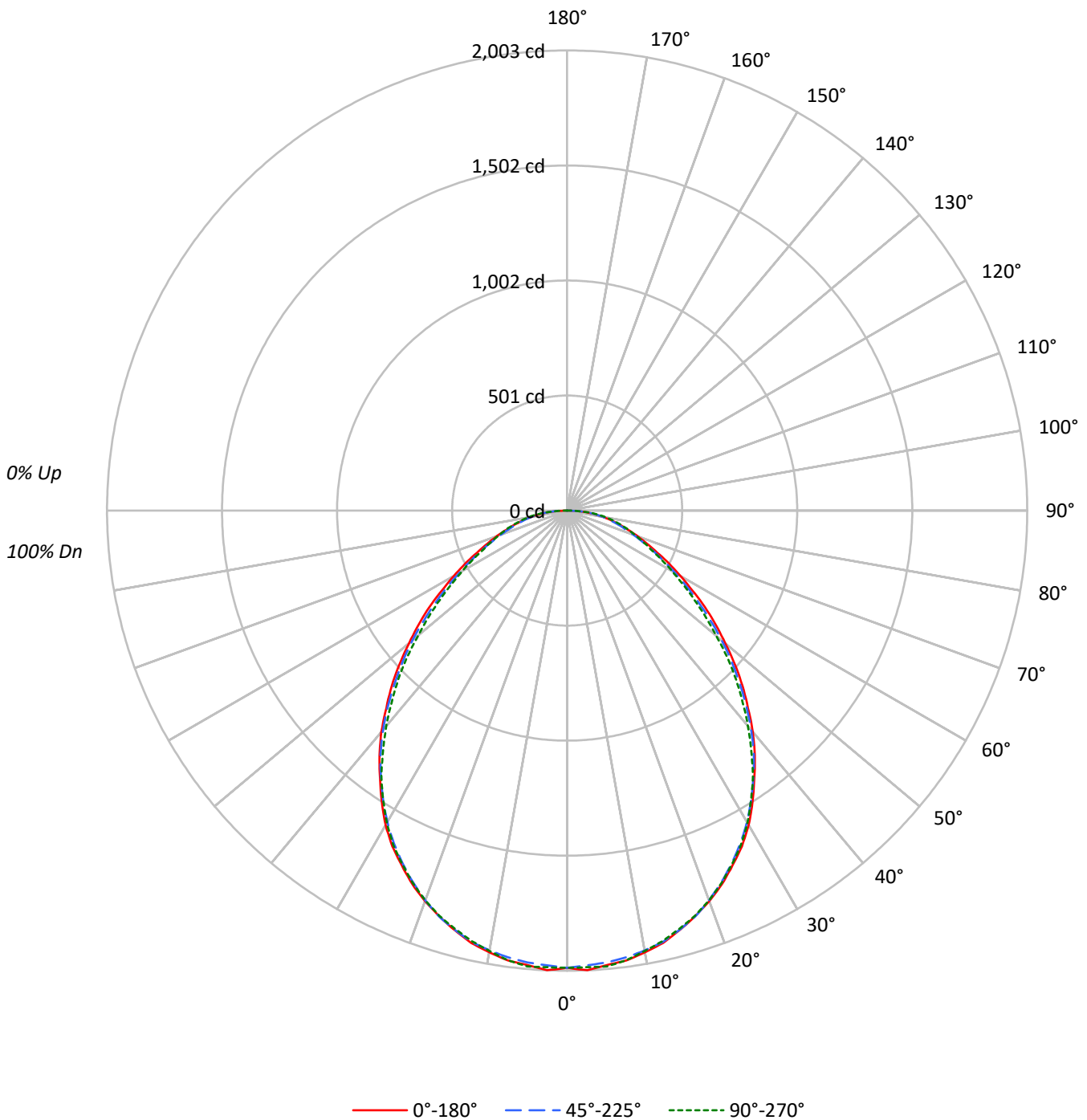
Input Watts (W): 32.736
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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	105	101	97	107	103	99	96	98	95	93	95	92	90	91	89	87	85					85			
2	100	93	86	81	98	91	85	80	87	82	78	84	80	76	81	78	75	72					72			
3	92	82	74	68	90	81	73	68	78	72	67	75	70	65	72	68	64	62					62			
4	85	73	65	59	83	72	64	58	70	63	58	67	62	57	65	60	56	54					54			
5	78	66	58	51	76	65	57	51	63	56	50	61	55	50	59	54	49	47					47			
6	73	60	51	45	71	59	51	45	57	50	45	56	49	44	54	48	44	42					42			
7	68	55	46	40	66	54	46	40	52	45	40	51	44	40	50	44	39	37					37			
8	63	50	42	36	62	49	42	36	48	41	36	47	40	36	46	40	36	34					34			
9	59	46	38	33	58	46	38	33	44	38	33	43	37	32	42	37	32	31					31			
10	56	43	35	30	54	42	35	30	41	34	30	40	34	30	39	34	30	28					28			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2678	2678	2678
5°	2682	2666	2690
10°	2668	2656	2659
15°	2634	2632	2625
20°	2590	2585	2585
25°	2530	2516	2521
30°	2456	2431	2439
35°	2333	2322	2316
40°	2209	2189	2151
45°	2054	2018	1978
50°	1881	1840	1770
55°	1718	1640	1585
60°	1531	1457	1419
65°	1378	1306	1288
70°	1279	1201	1249
75°	1223	1169	1267
80°	1223	1223	1354
85°	1269	1284	1430



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	188.0	4.1
10°-20°	531.9	11.6
20°-30°	780.7	17.0
30°-40°	882.6	19.3
40°-50°	815.7	17.8
50°-60°	628.5	13.7
60°-70°	416.2	9.1
70°-80°	247.7	5.4
80°-90°	90.8	2.0
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°	1500.6	32.7
0°-40°	2383.2	52.0
0°-60°	3827.3	83.5
0°-90°	4582.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4582.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1990	1990	1990	1990	1990	
5°	1986	1986	1974	1975	1991	189
15°	1891	1887	1889	1888	1884	533
25°	1704	1699	1694	1693	1698	785
35°	1420	1418	1414	1407	1410	889
45°	1079	1072	1060	1042	1040	831
55°	732	717	699	680	676	653
65°	433	426	410	406	404	434
75°	235	230	225	235	244	251
85°	82	78	83	92	93	87
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1990.3	1990.3	1990.3	1990.3	1990.3
2.5°	2002.6	1992.2	1980.9	1980.9	1989.4
5°	1985.6	1985.6	1974.2	1975.2	1991.3
7.5°	1975.2	1969.5	1962.0	1962.0	1974.2
10°	1952.5	1947.8	1944.0	1942.1	1945.9
12.5°	1927.9	1920.4	1923.2	1920.4	1919.4
15°	1891.1	1887.3	1889.2	1888.2	1884.5
17.5°	1851.4	1849.5	1853.3	1846.7	1849.5
20°	1808.9	1803.2	1805.1	1801.3	1805.1
22.5°	1760.7	1756.9	1752.2	1747.4	1755.0
25°	1704.0	1699.2	1694.5	1692.6	1698.3
27.5°	1647.3	1639.7	1633.1	1631.2	1639.7
30°	1581.1	1572.6	1565.0	1563.1	1569.8
32.5°	1502.7	1500.8	1491.3	1487.5	1490.4
35°	1420.4	1418.5	1413.8	1407.2	1410.0
37.5°	1342.0	1341.1	1334.4	1323.1	1315.5
40°	1257.9	1251.3	1246.5	1230.5	1224.8
42.5°	1165.3	1163.4	1154.9	1136.9	1130.3
45°	1079.3	1071.7	1060.4	1041.5	1039.6
47.5°	990.4	980.0	969.6	946.0	945.1
50°	898.8	891.2	878.9	855.3	845.8
52.5°	813.7	803.3	786.3	763.6	758.9
55°	732.4	717.3	699.3	680.4	675.7
57.5°	645.5	638.9	617.1	602.0	596.3
60°	568.9	563.3	541.5	527.3	527.3
62.5°	499.9	491.4	472.5	463.1	463.1
65°	432.8	426.2	410.2	406.4	404.5
67.5°	375.2	366.7	355.3	354.4	359.1
70°	325.1	314.7	305.3	314.7	317.5
72.5°	277.8	271.2	262.7	275.0	280.7
75°	235.3	229.7	224.9	235.3	243.8
77.5°	196.6	190.9	190.9	202.2	209.8
80°	157.8	154.0	157.8	167.3	174.8
82.5°	121.0	118.1	122.9	132.3	137.0
85°	82.2	77.5	83.2	91.7	92.6
87.5°	38.7	37.8	41.6	47.3	46.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)