

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: P293683

Luminaire Tested: **24GR-LD5-42-A125-UNV-L83050-W2A1-U-4500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P293683  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33307)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24GR-LD5-42-A125-UNV-L83050-W2A1-U-4500K  
Description: GRLED 2x4 TUNABLE WHITE TROFFER  
WITH A125 LENS  
Light Source: (336) 80 CRI LEDS TUNED TO 4500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4452.0 lumens  
Efficiency: N/A  
Efficacy: 151.5 lumens/watt  
Spacing Criteria (0/90/45): 1.22 / 1.22 / 1.27  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

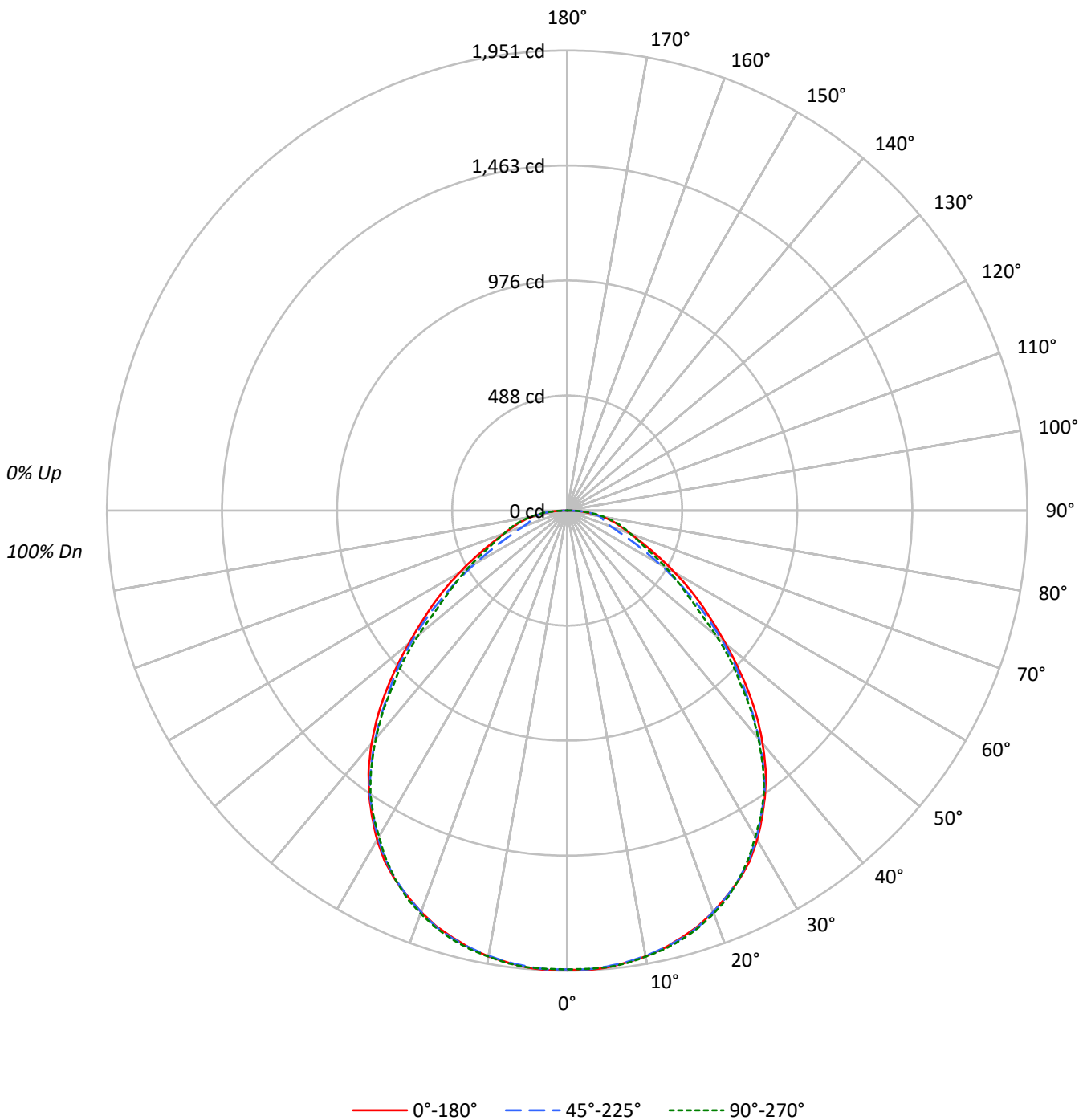
Input Watts (W): 29.388  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	110	105	101	98	107	103	100	96	99	96	93	95	93	90	91	90	88	86					86			
2	101	93	87	82	98	91	86	81	88	83	79	85	81	77	82	79	76	74					74			
3	93	83	76	70	90	82	75	69	79	73	68	76	71	67	73	69	66	64					64			
4	86	75	66	60	83	73	66	60	71	64	59	68	63	58	66	61	57	55					55			
5	79	67	59	53	77	66	58	52	64	57	52	62	56	51	60	55	51	49					49			
6	73	61	53	47	72	60	52	46	58	51	46	57	50	46	55	50	45	43					43			
7	68	56	47	42	67	55	47	41	53	46	41	52	46	41	51	45	41	39					39			
8	64	51	43	37	62	50	43	37	49	42	37	48	41	37	47	41	37	35					35			
9	60	47	39	34	58	46	39	34	45	38	34	44	38	33	43	38	33	32					32			
10	56	44	36	31	55	43	36	31	42	35	31	41	35	31	40	35	30	29					29			

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	2618	2618	2618
5°	2627	2621	2626
10°	2623	2619	2624
15°	2610	2615	2622
20°	2592	2592	2603
25°	2563	2558	2560
30°	2503	2490	2479
35°	2405	2398	2389
40°	2265	2224	2214
45°	2072	2015	1978
50°	1832	1795	1726
55°	1629	1518	1460
60°	1418	1215	1303
65°	1225	942	1152
70°	1118	771	1115
75°	1127	830	1184
80°	1173	1082	1248
85°	1223	1286	1383



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	184.5	4.1
10°-20°	529.2	11.9
20°-30°	792.2	17.8
30°-40°	905.2	20.3
40°-50°	818.4	18.4
50°-60°	588.8	13.2
60°-70°	341.4	7.7
70°-80°	202.5	4.5
80°-90°	89.7	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°	1506.0	33.8
0°-40°	2411.2	54.2
0°-60°	3818.5	85.8
0°-90°	4452.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4452.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1945	1945	1945	1945	1945	
5°	1945	1942	1940	1938	1944	185
15°	1874	1877	1877	1875	1882	529
25°	1727	1724	1723	1720	1724	794
35°	1464	1457	1460	1442	1454	913
45°	1089	1070	1059	1049	1040	837
55°	694	681	647	631	622	621
65°	385	342	296	331	362	388
75°	217	181	160	197	228	229
85°	79	85	83	96	90	85
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1945.4	1945.4	1945.4	1945.4	1945.4
2.5°	1950.9	1944.0	1947.5	1945.4	1944.7
5°	1944.7	1941.9	1940.5	1937.7	1944.0
7.5°	1932.2	1930.1	1930.8	1931.5	1935.6
10°	1919.7	1916.2	1916.9	1918.3	1920.4
12.5°	1900.2	1898.1	1898.8	1900.2	1905.1
15°	1873.8	1877.3	1877.3	1875.2	1882.2
17.5°	1847.4	1846.7	1850.2	1844.0	1853.7
20°	1810.6	1811.3	1810.6	1811.3	1817.6
22.5°	1769.0	1772.4	1770.3	1770.3	1777.3
25°	1726.6	1724.5	1723.1	1719.6	1724.5
27.5°	1675.9	1671.7	1668.3	1661.3	1664.8
30°	1611.3	1612.0	1603.0	1596.7	1595.3
32.5°	1539.1	1539.1	1530.7	1525.9	1530.0
35°	1464.1	1457.1	1459.9	1441.8	1454.3
37.5°	1382.8	1371.7	1365.4	1359.2	1363.4
40°	1289.7	1275.2	1266.1	1253.6	1260.6
42.5°	1191.8	1173.8	1162.6	1153.6	1156.4
45°	1089.0	1070.3	1059.2	1049.4	1039.7
47.5°	980.7	968.9	963.3	950.8	939.7
50°	875.1	870.9	857.7	847.3	824.4
52.5°	778.6	775.1	754.3	736.9	707.7
55°	694.5	681.3	647.3	630.6	622.3
57.5°	609.1	587.6	546.6	544.5	550.1
60°	527.1	500.8	451.4	462.6	484.1
62.5°	452.8	413.2	366.0	392.4	418.1
65°	384.8	341.7	295.9	330.6	361.8
67.5°	328.5	285.5	238.2	284.8	320.9
70°	284.1	240.3	195.9	249.3	283.4
72.5°	247.3	207.7	170.9	221.6	257.0
75°	216.7	181.3	159.7	197.2	227.8
77.5°	186.1	157.7	152.8	175.7	194.5
80°	151.4	138.2	139.6	154.2	161.1
82.5°	113.2	113.9	117.4	129.2	126.4
85°	79.2	85.4	83.3	95.8	89.6
87.5°	43.8	47.9	45.1	54.9	49.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)