

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: P293818

Luminaire Tested: **24GR-LD5-56-A125-UNV-L93050-W2A1-U-4000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P293818  
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-LD5-56-A125-UNV-L93050-W2A1-U-4000K  
Description: GRLED 2x4 TUNABLE WHITE TROFFER  
WITH A125 LENS  
Light Source: (336) 90 CRI LEDS TUNED TO 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5183.0 lumens  
Efficiency: N/A  
Efficacy: 129.6 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

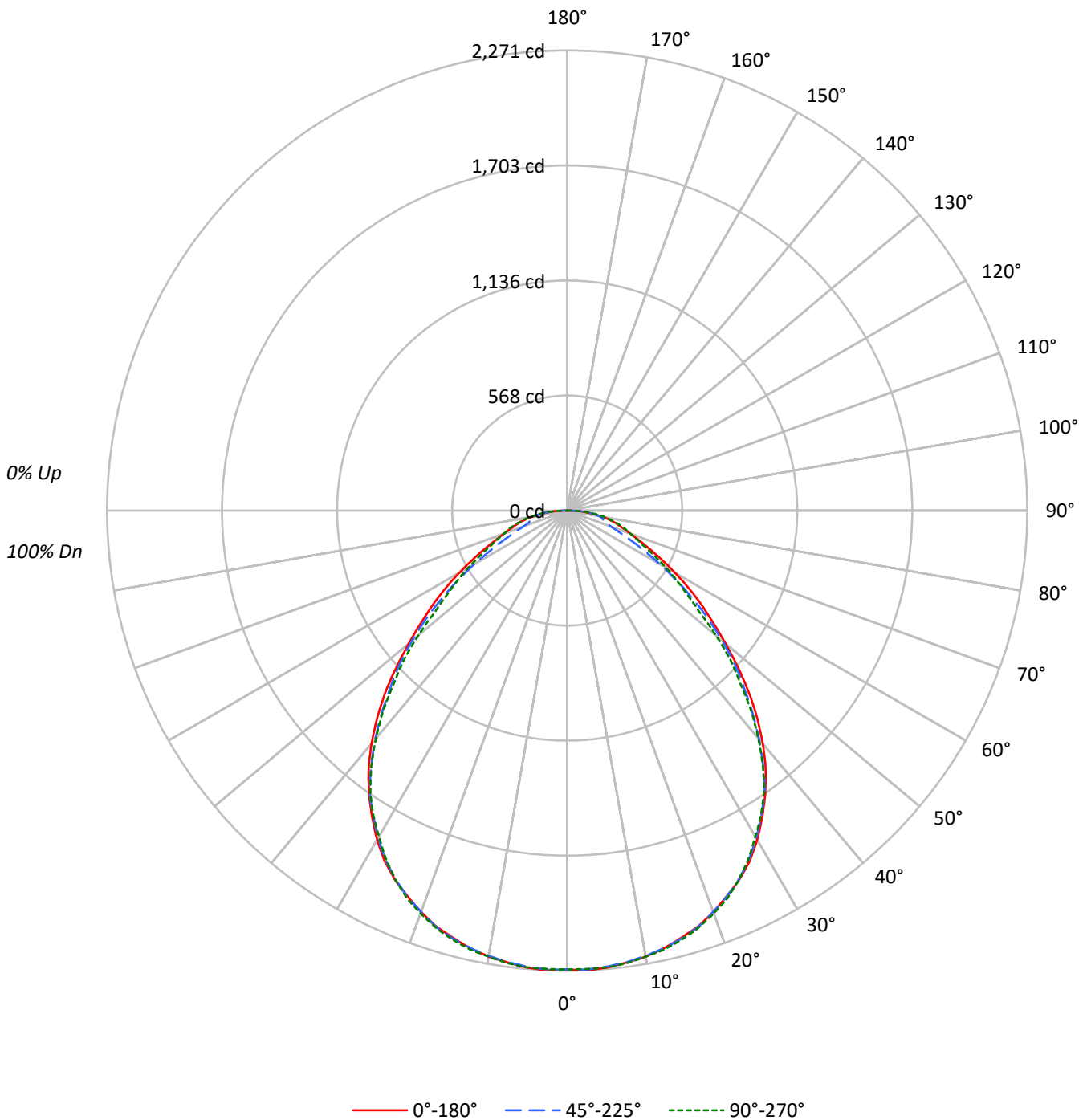
Input Watts (W): 39.980142  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P293818

CATALOG NUMBER: 24GR-LD5-56-A125-UNV-L93050-W2A1-U-4000K

### Luminous Intensity Polar Plot





TEST NUMBER: P293818

CATALOG NUMBER: 24GR-LD5-56-A125-UNV-L93050-W2A1-U-4000K

**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°	3047	3047	3047
5°	3058	3051	3057
10°	3053	3049	3055
15°	3039	3044	3052
20°	3018	3018	3030
25°	2984	2978	2981
30°	2914	2899	2886
35°	2800	2792	2781
40°	2637	2589	2578
45°	2412	2346	2303
50°	2133	2090	2009
55°	1897	1768	1700
60°	1651	1414	1517
65°	1426	1096	1341
70°	1301	897	1298
75°	1312	967	1379
80°	1366	1259	1454
85°	1423	1497	1610



TEST NUMBER: P293818

CATALOG NUMBER: 24GR-LD5-56-A125-UNV-L93050-W2A1-U-4000K

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	214.8	4.1
10°-20°	616.1	11.9
20°-30°	922.3	17.8
30°-40°	1053.9	20.3
40°-50°	952.8	18.4
50°-60°	685.5	13.2
60°-70°	397.4	7.7
70°-80°	235.7	4.5
80°-90°	104.4	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°	1753.3	33.8
0°-40°	2807.2	54.2
0°-60°	4445.5	85.8
0°-90°	5183.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5183.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	2265	2265	2265	2265	2265	
5°	2264	2261	2259	2256	2263	215
15°	2182	2186	2186	2183	2191	616
25°	2010	2008	2006	2002	2008	924
35°	1704	1696	1700	1679	1693	1063
45°	1268	1246	1233	1222	1210	974
55°	809	793	754	734	724	723
65°	448	398	344	385	421	452
75°	252	211	186	230	265	267
85°	92	100	97	112	104	99
90°	0	0	0	0	0	



TEST NUMBER: P293818

CATALOG NUMBER: 24GR-LD5-56-A125-UNV-L93050-W2A1-U-4000K

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	2264.8	2264.8	2264.8	2264.8	2264.8
2.5°	2271.3	2263.2	2267.2	2264.8	2264.0
5°	2264.0	2260.7	2259.1	2255.9	2263.2
7.5°	2249.4	2247.0	2247.8	2248.6	2253.5
10°	2234.9	2230.8	2231.6	2233.3	2235.7
12.5°	2212.2	2209.8	2210.6	2212.2	2217.9
15°	2181.5	2185.6	2185.6	2183.1	2191.2
17.5°	2150.8	2150.0	2154.0	2146.7	2158.1
20°	2107.9	2108.7	2107.9	2108.7	2116.0
22.5°	2059.4	2063.5	2061.0	2061.0	2069.1
25°	2010.1	2007.7	2006.1	2002.0	2007.7
27.5°	1951.1	1946.2	1942.2	1934.1	1938.1
30°	1875.9	1876.7	1866.2	1858.9	1857.3
32.5°	1791.8	1791.8	1782.1	1776.4	1781.3
35°	1704.5	1696.4	1699.6	1678.6	1693.1
37.5°	1609.9	1596.9	1589.6	1582.4	1587.2
40°	1501.5	1484.5	1474.0	1459.5	1467.5
42.5°	1387.5	1366.5	1353.5	1343.0	1346.3
45°	1267.8	1246.0	1233.1	1221.7	1210.4
47.5°	1141.7	1127.9	1121.5	1106.9	1094.0
50°	1018.8	1013.9	998.6	986.4	959.8
52.5°	906.4	902.4	878.1	857.9	823.9
55°	808.6	793.2	753.6	734.2	724.5
57.5°	709.1	684.0	636.3	633.9	640.4
60°	613.7	583.0	525.6	538.5	563.6
62.5°	527.2	481.1	426.1	456.8	486.8
65°	447.9	397.8	344.4	384.9	421.3
67.5°	382.5	332.3	277.3	331.5	373.6
70°	330.7	279.8	228.0	290.3	329.9
72.5°	287.8	241.8	198.9	257.9	299.2
75°	252.3	211.0	186.0	229.6	265.2
77.5°	216.7	183.5	177.9	204.6	226.4
80°	176.3	160.9	162.5	179.5	187.6
82.5°	131.8	132.6	136.6	150.4	147.2
85°	92.2	99.5	97.0	111.6	104.3
87.5°	50.9	55.8	52.6	63.9	57.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)