

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: P294160

Luminaire Tested: **24GR-LD5-85-A19/156-UNV-L92765-W2A1-U-2700K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P294160
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33308)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24GR-LD5-85-A19/156-UNV-L92765-W2A1-U-2700K
Description: GRLED 2x4 TUNABLE WHITE TROFFER
WITH A19/156 LENS
Light Source: (336) 90 CRI LEDS TUNED TO 2700K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6322.0 lumens
Efficiency: N/A
Efficacy: 101.6 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.27 / 1.25
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

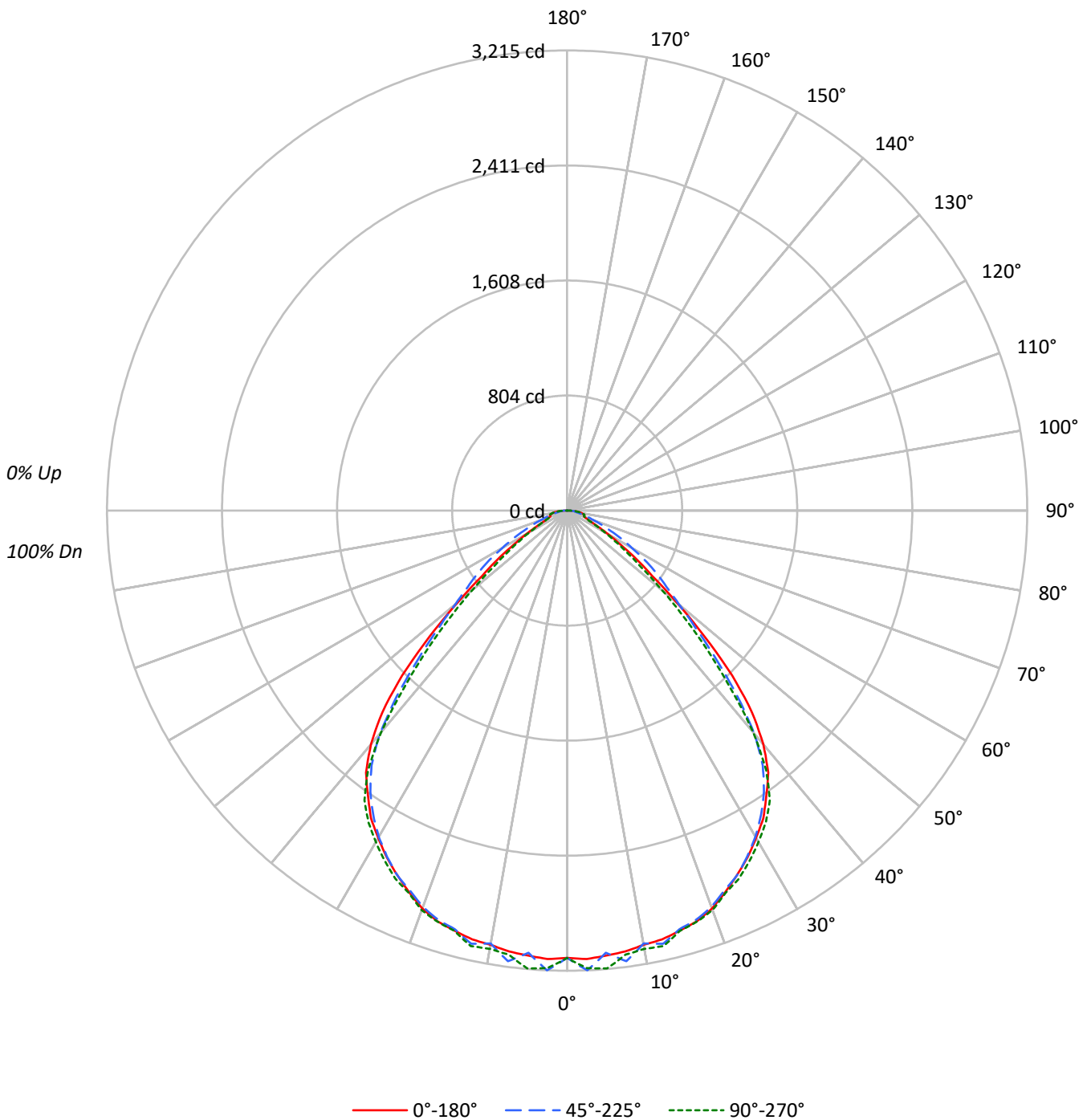
Input Watts (W): 62.217
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	111	107	103	100	108	105	102	99	101	98	96	97	95	93	93	92	90	88					88			
2	103	96	90	86	100	94	89	85	91	86	83	88	84	81	85	82	79	77					77			
3	95	86	79	74	93	85	78	73	82	77	72	79	75	71	77	73	70	68					68			
4	88	78	71	65	86	77	70	64	74	68	64	72	67	63	70	66	62	60					60			
5	82	71	63	57	80	70	62	57	68	61	56	66	60	56	64	59	55	53					53			
6	76	65	57	51	75	64	56	51	62	55	50	60	55	50	59	54	50	48					48			
7	71	59	51	46	70	58	51	46	57	50	45	56	50	45	54	49	45	43					43			
8	67	55	47	42	65	54	47	41	53	46	41	51	45	41	50	45	41	39					39			
9	63	50	43	38	61	50	43	38	49	42	38	48	42	37	47	41	37	36					36			
10	59	47	39	35	58	46	39	35	45	39	34	44	38	34	44	38	34	33					33			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4206	4206	4206
5°	4215	4188	4336
10°	4209	4196	4247
15°	4233	4219	4236
20°	4236	4219	4254
25°	4171	4174	4214
30°	4101	4089	4155
35°	3986	3937	4056
40°	3743	3575	3556
45°	3103	2807	2662
50°	2087	2129	1819
55°	1377	1786	1193
60°	882	1410	817
65°	569	1076	553
70°	503	771	503
75°	649	612	655
80°	794	527	834
85°	925	784	971



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	299.3	4.7
10°-20°	859.4	13.6
20°-30°	1293.9	20.5
30°-40°	1499.7	23.7
40°-50°	1171.5	18.5
50°-60°	625.5	9.9
60°-70°	321.7	5.1
70°-80°	182.0	2.9
80°-90°	69.1	1.1
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°	2452.6	38.8
0°-40°	3952.3	62.5
0°-60°	5749.3	90.9
0°-90°	6322.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6322.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3126	3126	3126	3126	3126	
5°	3121	3208	3101	3186	3210	297
15°	3039	3058	3029	3048	3041	858
25°	2809	2800	2811	2807	2839	1295
35°	2426	2415	2397	2445	2469	1513
45°	1630	1632	1475	1462	1399	1229
55°	587	742	762	686	509	542
65°	179	373	338	372	174	196
75°	125	234	118	219	126	127
85°	60	78	51	78	63	62
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3126.0	3126.0	3126.0	3126.0	3126.0
2.5°	3136.2	3193.1	3215.4	3188.0	3200.2
5°	3121.0	3208.3	3100.7	3185.9	3210.3
7.5°	3106.8	3097.6	3175.8	3094.6	3129.1
10°	3080.4	3086.5	3071.2	3129.1	3108.8
12.5°	3068.2	3103.7	3100.7	3071.2	3115.9
15°	3038.7	3058.0	3028.6	3047.9	3040.8
17.5°	3009.3	3000.2	2997.1	3005.2	3012.3
20°	2958.5	2928.1	2946.3	2948.4	2970.7
22.5°	2885.4	2867.2	2871.2	2889.5	2891.5
25°	2809.3	2800.1	2811.3	2807.2	2838.7
27.5°	2730.1	2717.9	2725.0	2740.2	2759.5
30°	2639.7	2636.7	2631.6	2644.8	2674.2
32.5°	2550.4	2526.0	2522.0	2549.4	2582.9
35°	2426.5	2415.4	2397.1	2444.8	2469.2
37.5°	2308.7	2274.2	2244.8	2273.2	2283.4
40°	2131.1	2104.7	2035.6	2038.7	2024.5
42.5°	1912.8	1893.5	1761.5	1738.2	1698.6
45°	1630.5	1631.6	1475.2	1462.0	1399.1
47.5°	1302.6	1360.5	1224.4	1209.2	1115.8
50°	997.0	1101.6	1017.3	992.9	869.1
52.5°	748.3	901.6	875.2	822.4	651.8
55°	586.8	742.2	761.5	686.3	508.7
57.5°	441.6	611.2	642.7	580.7	392.9
60°	327.9	514.7	523.9	499.5	303.6
62.5°	243.7	437.6	425.4	428.4	225.4
65°	178.7	372.6	338.1	371.6	173.6
67.5°	146.2	322.9	263.0	321.8	141.1
70°	127.9	286.3	195.9	283.3	127.9
72.5°	123.9	263.0	155.3	251.8	124.9
75°	124.9	234.5	117.8	219.3	125.9
77.5°	114.7	192.9	89.3	186.8	119.8
80°	102.5	146.2	68.0	148.2	107.6
82.5°	87.3	106.6	54.8	109.7	90.4
85°	59.9	78.2	50.8	78.2	62.9
87.5°	28.4	46.7	31.5	44.7	32.5
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)