

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: P293957

Luminaire Tested: **24GR-LD5-85-A19/156-UNV-L83050-W2A1-U-3000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P293957
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-L83050-W2A1-U-3000K
Description: GRLED 2x4 TUNABLE WHITE TROFFER
WITH A19/156 LENS
Light Source: (336) 80 CRI LEDS TUNED TO 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7624.0 lumens
Efficiency: N/A
Efficacy: 122.4 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

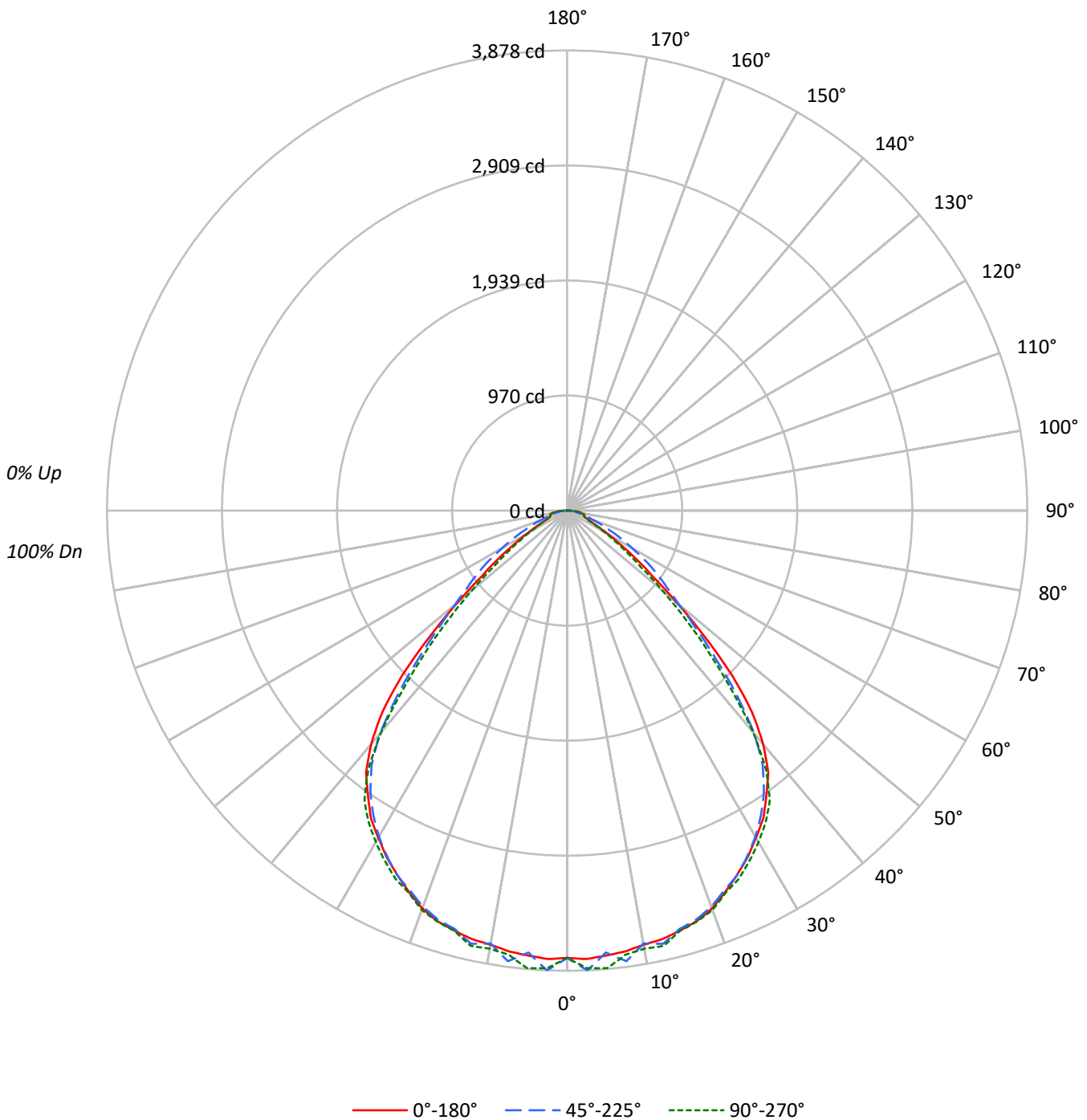
Input Watts (W): 62.31
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P293957

CATALOG NUMBER: 24GR-LD5-85-A19/156-UNV-L83050-W2A1-U-3000K

Luminous Intensity Polar Plot





TEST NUMBER: P293957

CATALOG NUMBER: 24GR-LD5-85-A19/156-UNV-L83050-W2A1-U-3000K

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

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5072	5072	5072
5°	5083	5050	5229
10°	5075	5060	5122
15°	5105	5087	5108
20°	5109	5087	5130
25°	5029	5033	5082
30°	4946	4931	5010
35°	4807	4748	4891
40°	4514	4312	4288
45°	3741	3385	3210
50°	2517	2568	2194
55°	1660	2154	1439
60°	1064	1700	985
65°	686	1298	667
70°	607	930	607
75°	783	738	789
80°	958	635	1006
85°	1115	945	1172



TEST NUMBER: P293957

CATALOG NUMBER: 24GR-LD5-85-A19/156-UNV-L83050-W2A1-U-3000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	360.9	4.7
10°-20°	1036.4	13.6
20°-30°	1560.3	20.5
30°-40°	1808.5	23.7
40°-50°	1412.7	18.5
50°-60°	754.3	9.9
60°-70°	387.9	5.1
70°-80°	219.4	2.9
80°-90°	83.3	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°	2957.7	38.8
0°-40°	4766.2	62.5
0°-60°	6933.3	90.9
0°-90°	7624.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7624.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3770	3770	3770	3770	3770	
5°	3764	3869	3739	3842	3872	358
15°	3665	3688	3652	3676	3667	1035
25°	3388	3377	3390	3385	3423	1561
35°	2926	2913	2891	2948	2978	1824
45°	1966	1968	1779	1763	1687	1482
55°	708	895	918	828	613	653
65°	216	449	408	448	209	237
75°	151	283	142	264	152	153
85°	72	94	61	94	76	74
90°	0	0	0	0	0	



TEST NUMBER: P293957

CATALOG NUMBER: 24GR-LD5-85-A19/156-UNV-L83050-W2A1-U-3000K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3769.8	3769.8	3769.8	3769.8	3769.8
2.5°	3782.1	3850.7	3877.6	3844.5	3859.2
5°	3763.7	3869.0	3739.2	3842.1	3871.5
7.5°	3746.6	3735.6	3829.8	3731.9	3773.5
10°	3714.8	3722.1	3703.7	3773.5	3749.0
12.5°	3700.1	3742.9	3739.2	3703.7	3757.6
15°	3664.6	3687.8	3652.3	3675.6	3667.0
17.5°	3629.0	3618.0	3614.4	3624.1	3632.7
20°	3567.8	3531.1	3553.1	3555.6	3582.5
22.5°	3479.7	3457.6	3462.5	3484.6	3487.0
25°	3387.8	3376.8	3390.3	3385.4	3423.4
27.5°	3292.3	3277.7	3286.2	3304.6	3327.9
30°	3183.4	3179.7	3173.6	3189.5	3225.0
32.5°	3075.6	3046.2	3041.3	3074.4	3114.8
35°	2926.3	2912.8	2890.7	2948.3	2977.7
37.5°	2784.2	2742.6	2707.1	2741.4	2753.6
40°	2570.0	2538.1	2454.9	2458.5	2441.4
42.5°	2306.7	2283.5	2124.3	2096.1	2048.4
45°	1966.3	1967.6	1779.0	1763.1	1687.2
47.5°	1570.9	1640.7	1476.6	1458.2	1345.6
50°	1202.3	1328.4	1226.8	1197.4	1048.1
52.5°	902.4	1087.2	1055.4	991.7	786.0
55°	707.7	895.0	918.3	827.7	613.4
57.5°	532.6	737.1	775.0	700.3	473.8
60°	395.5	620.8	631.8	602.4	366.1
62.5°	293.8	527.7	513.0	516.7	271.8
65°	215.5	449.3	407.7	448.1	209.4
67.5°	176.3	389.4	317.1	388.1	170.2
70°	154.3	345.3	236.3	341.6	154.3
72.5°	149.4	317.1	187.3	303.6	150.6
75°	150.6	282.8	142.0	264.5	151.8
77.5°	138.4	232.6	107.7	225.3	144.5
80°	123.7	176.3	82.0	178.8	129.8
82.5°	105.3	128.6	66.1	132.2	109.0
85°	72.2	94.3	61.2	94.3	75.9
87.5°	34.3	56.3	38.0	53.9	39.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)