

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: P292630

Luminaire Tested: **22GR-LD5-32-A19/156-UNV-L93050-W2A1-U-3000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P292630
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33284)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22GR-LD5-32-A19/156-UNV-L93050-W2A1-U-3000K
Description: GRLED 2x2 TUNABLE WHITE TROFFER
WITH A19/156 LENS
Light Source: (168) 90 CRI LEDS TUNED TO 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2469.0 lumens
Efficiency: N/A
Efficacy: 98.3 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.24 / 1.21
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

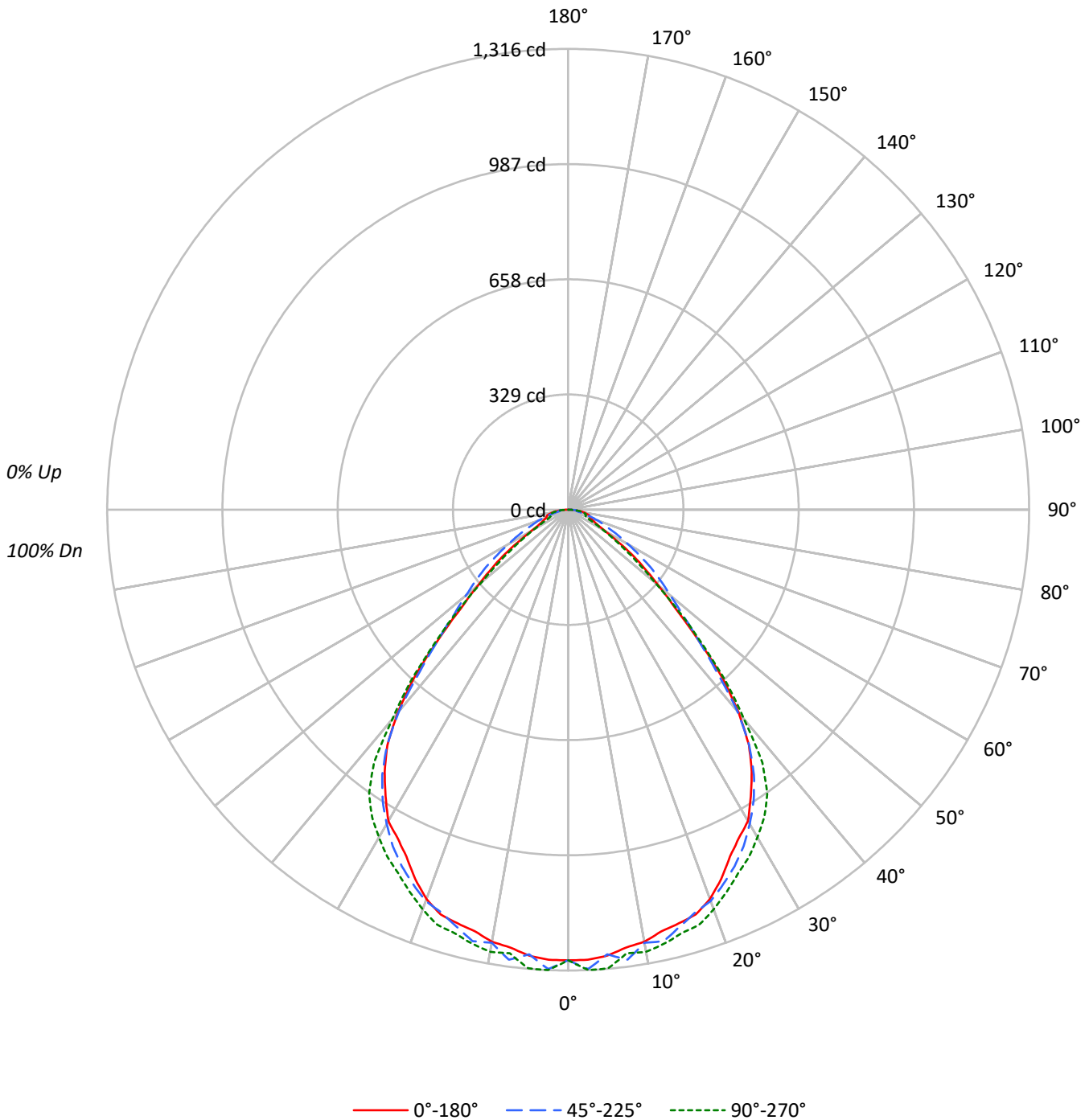
Input Watts (W): 25.11
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P292630

CATALOG NUMBER: 22GR-LD5-32-A19/156-UNV-L93050-W2A1-U-3000K

Luminous Intensity Polar Plot





TEST NUMBER: P292630

CATALOG NUMBER: 22GR-LD5-32-A19/156-UNV-L93050-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	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	111	107	103	100	108	105	102	99	101	98	96	97	95	93	93	91	90	88
2	103	96	90	85	100	94	89	85	91	86	83	88	84	81	85	82	79	77
3	95	86	79	74	93	85	79	73	82	77	72	79	75	71	77	73	70	68
4	88	78	71	65	86	77	70	64	75	68	64	72	67	63	70	66	62	60
5	82	71	63	58	80	70	63	57	68	62	57	66	61	56	64	59	56	54
6	77	65	57	51	75	64	57	51	62	56	51	61	55	50	59	54	50	48
7	72	60	52	46	70	59	51	46	57	51	46	56	50	46	55	49	45	44
8	67	55	47	42	66	54	47	42	53	46	42	52	46	41	51	45	41	40
9	63	51	43	38	62	50	43	38	49	43	38	48	42	38	47	42	38	36
10	59	47	40	35	58	47	40	35	46	39	35	45	39	35	44	39	35	33

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3463	3463	3463
5°	3454	3443	3551
10°	3422	3432	3503
15°	3407	3433	3488
20°	3388	3405	3478
25°	3244	3335	3404
30°	3190	3219	3357
35°	3000	3038	3255
40°	2659	2640	2745
45°	1986	1990	2046
50°	1398	1590	1354
55°	1032	1343	925
60°	645	1061	604
65°	526	841	422
70°	522	700	416
75°	647	514	539
80°	721	406	659
85°	719	753	738



TEST NUMBER: P292630

CATALOG NUMBER: 22GR-LD5-32-A19/156-UNV-L93050-W2A1-U-3000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	122.5	5.0
10°-20°	348.9	14.1
20°-30°	516.8	20.9
30°-40°	578.8	23.4
40°-50°	425.3	17.2
50°-60°	237.7	9.6
60°-70°	132.5	5.4
70°-80°	77.8	3.2
80°-90°	28.6	1.2
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°	988.1	40.0
0°-40°	1567.0	63.5
0°-60°	2230.0	90.3
0°-90°	2469.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2469.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1287	1287	1287	1287	1287	
5°	1279	1302	1275	1301	1315	121
15°	1223	1230	1232	1251	1252	345
25°	1092	1101	1123	1139	1147	506
35°	913	914	925	967	991	566
45°	522	564	523	560	538	408
55°	220	268	286	286	197	196
65°	83	147	132	169	66	85
75°	62	88	49	100	52	63
85°	23	34	24	31	24	26
90°	0	0	0	0	0	



TEST NUMBER: P292630

CATALOG NUMBER: 22GR-LD5-32-A19/156-UNV-L93050-W2A1-U-3000K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1286.8	1286.8	1286.8	1286.8	1286.8
2.5°	1286.2	1297.8	1313.0	1314.7	1315.9
5°	1278.6	1302.5	1274.6	1300.7	1314.7
7.5°	1261.2	1275.7	1296.1	1269.9	1277.5
10°	1252.5	1255.9	1255.9	1288.5	1282.1
12.5°	1232.7	1255.9	1261.8	1255.4	1269.3
15°	1222.8	1230.3	1232.1	1250.7	1251.9
17.5°	1211.7	1210.0	1205.9	1219.3	1243.1
20°	1183.2	1176.8	1189.0	1205.3	1214.6
22.5°	1141.3	1143.1	1157.6	1171.0	1181.5
25°	1092.5	1101.2	1123.3	1139.0	1146.6
27.5°	1055.8	1068.6	1083.8	1102.4	1117.5
30°	1026.7	1025.6	1036.1	1062.8	1080.3
32.5°	970.3	974.4	985.4	1017.4	1041.9
35°	913.3	913.9	924.9	966.8	990.7
37.5°	847.6	842.9	849.3	894.7	910.4
40°	756.8	758.0	751.6	783.6	781.3
42.5°	650.9	660.3	627.1	669.0	666.1
45°	521.8	564.3	523.0	560.2	537.5
47.5°	411.9	474.7	440.4	467.7	425.2
50°	333.9	398.5	379.9	392.1	323.4
52.5°	274.0	326.3	332.2	335.1	252.5
55°	219.9	267.6	286.2	285.6	197.2
57.5°	162.3	217.6	239.1	247.8	149.5
60°	119.8	180.9	197.2	216.4	112.3
62.5°	96.6	158.8	162.9	189.6	85.5
65°	82.6	146.6	132.1	169.3	66.3
67.5°	73.3	136.7	107.6	151.2	56.4
70°	66.3	121.6	89.0	135.5	52.9
72.5°	64.6	103.5	68.6	121.0	52.4
75°	62.2	87.8	49.4	99.5	51.8
77.5°	53.5	75.0	35.5	76.8	48.3
80°	46.5	59.9	26.2	57.6	42.5
82.5°	36.1	45.4	23.3	43.6	34.3
85°	23.3	34.3	24.4	31.4	23.9
87.5°	11.1	19.2	17.5	16.9	12.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)