

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: P292724

Luminaire Tested: **22GR-LD5-28-FGW080-UNV-L83050-W2A1-U-3500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P292724  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1901-084-26)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 22GR-LD5-28-FGW080-UNV-L83050-W2A1-U-3500K  
Description: GRLED 2x2 TUNABLE WHITE TROFFER  
WITH FGW080 LENS  
Light Source: (168) 80 CRI LEDS TUNED TO 3500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2437.0 lumens  
Efficiency: N/A  
Efficacy: 110.6 lumens/watt  
Spacing Criteria (0/90/45): 1.25 / 1.24 / 1.36  
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')  
CIE Type: Direct

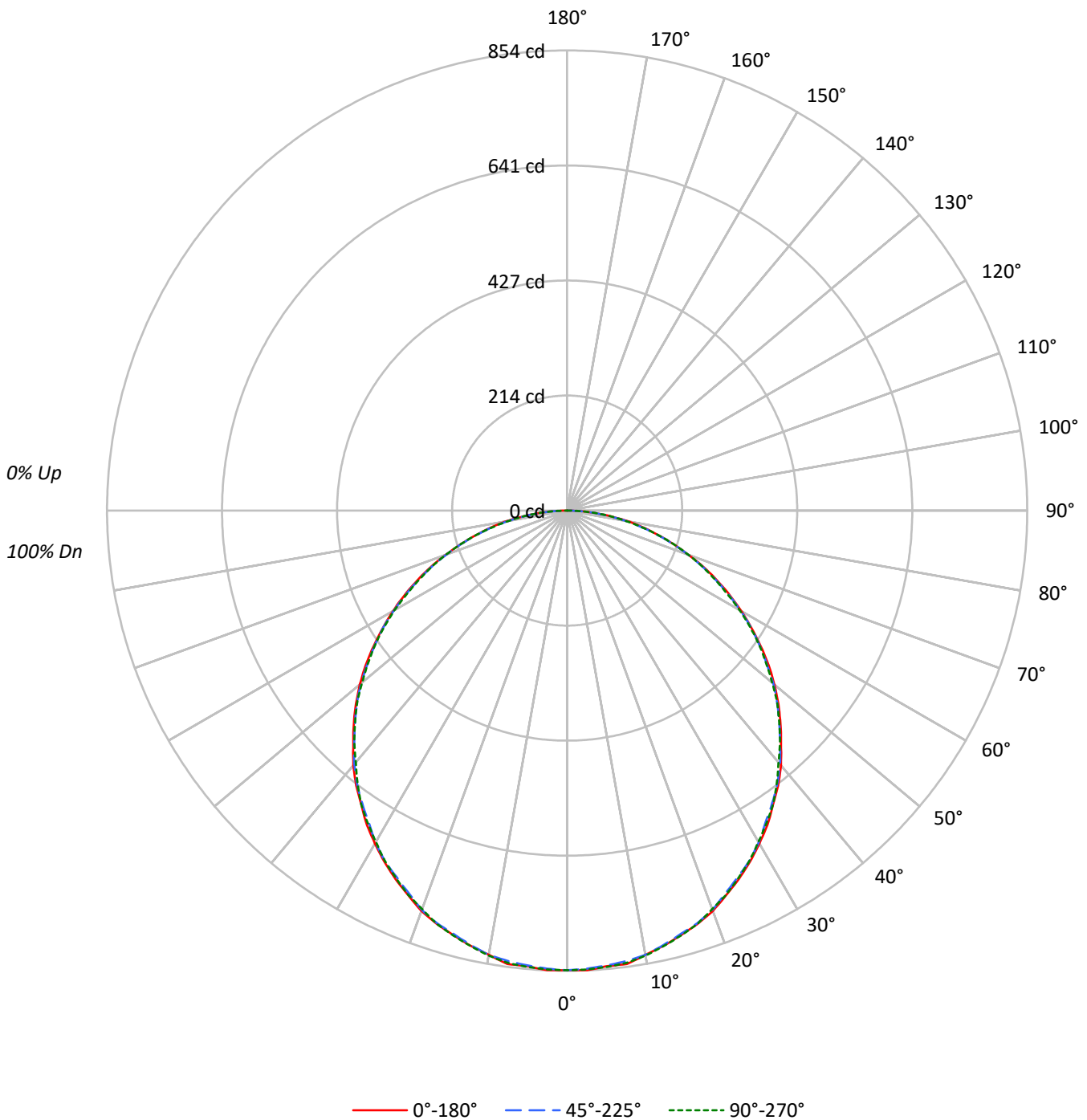
Input Watts (W): 22.041  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	0
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111		106	106	106		102	102	102	100
1	108	103	99	95	106	101	97	94	97	94	91		93	90	88		89	87	85	83
2	98	90	83	77	96	88	82	76	85	79	74		81	77	73		78	74	71	69
3	90	79	71	64	87	77	70	63	74	68	62		71	66	61		69	64	60	58
4	82	70	61	54	80	68	60	54	66	59	53		64	57	52		61	56	51	49
5	75	62	53	46	73	61	53	46	59	51	46		57	50	45		55	49	45	43
6	70	56	47	41	68	55	47	40	53	46	40		52	45	40		50	44	39	37
7	65	51	42	36	63	50	42	36	48	41	35		47	40	35		46	40	35	33
8	60	46	38	32	58	46	37	32	44	37	32		43	36	31		42	36	31	29
9	56	43	34	29	55	42	34	29	41	34	28		40	33	28		39	33	28	26
10	53	39	31	26	51	39	31	26	38	31	26		37	30	26		36	30	26	24

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

	0°	45°	90°
0°	2295	2295	2295
5°	2293	2289	2296
10°	2288	2288	2292
15°	2273	2267	2275
20°	2264	2258	2254
25°	2239	2227	2233
30°	2217	2210	2206
35°	2189	2179	2189
40°	2169	2159	2144
45°	2132	2119	2119
50°	2103	2091	2079
55°	2058	2045	2041
60°	2010	1999	1991
65°	1959	1936	1927
70°	1880	1875	1880
75°	1815	1794	1808
80°	1796	1708	1697
85°	1590	1547	1568



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	80.7	3.3
10°-20°	230.2	9.4
20°-30°	346.7	14.2
30°-40°	416.0	17.1
40°-50°	430.5	17.7
50°-60°	390.1	16.0
60°-70°	302.4	12.4
70°-80°	183.6	7.5
80°-90°	56.8	2.3
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°	657.6	27.0
0°-40°	1073.7	44.1
0°-60°	1894.2	77.7
0°-90°	2437.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2437.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	853	853	853	853	853	
5°	849	849	847	849	850	81
15°	816	816	814	817	816	230
25°	754	753	750	753	752	348
35°	666	666	663	664	666	418
45°	560	560	557	557	557	432
55°	439	438	436	435	435	392
65°	308	308	304	306	303	304
75°	175	174	172	172	174	186
85°	52	51	50	50	51	59
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	853.0	853.0	853.0	853.0	853.0
2.5°	853.7	850.1	850.8	852.3	852.3
5°	848.7	848.7	847.2	849.4	850.1
7.5°	848.7	845.1	843.0	845.1	846.5
10°	837.2	835.8	837.2	836.5	838.7
12.5°	827.2	825.8	825.8	827.9	827.9
15°	815.8	815.8	813.6	817.2	816.5
17.5°	804.3	804.3	802.9	802.9	804.3
20°	790.7	787.1	788.6	787.9	787.1
22.5°	772.1	770.0	768.5	770.7	771.4
25°	754.2	752.8	749.9	752.8	752.1
27.5°	734.9	733.5	732.8	731.3	732.8
30°	713.4	712.0	711.3	709.9	709.9
32.5°	692.0	689.1	685.5	689.1	688.4
35°	666.2	666.2	663.3	664.1	666.2
37.5°	643.3	641.9	640.4	638.3	639.0
40°	617.5	615.4	614.7	613.3	610.4
42.5°	587.5	587.5	584.6	585.3	584.6
45°	560.3	559.6	556.7	556.7	556.7
47.5°	531.7	531.0	528.8	527.4	528.8
50°	502.3	499.5	499.5	497.3	496.6
52.5°	471.6	469.4	466.6	467.3	465.8
55°	438.7	437.9	435.8	435.1	435.1
57.5°	405.7	406.5	405.0	402.2	402.9
60°	373.5	372.8	371.4	370.0	370.0
62.5°	340.6	340.6	337.8	337.8	334.9
65°	307.7	307.7	304.1	305.6	302.7
67.5°	274.8	274.1	271.9	271.2	271.9
70°	239.0	239.7	238.3	238.3	239.0
72.5°	206.8	206.1	205.4	205.4	206.8
75°	174.6	173.9	172.5	172.5	173.9
77.5°	145.3	141.7	141.0	142.4	140.3
80°	115.9	110.9	110.2	109.5	109.5
82.5°	81.6	79.4	80.1	79.4	80.9
85°	51.5	50.8	50.1	50.1	50.8
87.5°	24.3	22.9	22.9	22.2	22.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)