

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: P225889

Luminaire Tested: **14GR-LD5-32-F1-UNV-L935-CD1-U**

Issue Date: 3/12/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P225889  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35602)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/12/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14GR-LD5-32-F1-UNV-L935-CD1-U  
Description: METALUX GR 1X4 LED TROFFER WITH F1 LENS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2768.5 lumens  
Efficiency: N/A  
Efficacy: 92.6 lumens/watt  
Spacing Criteria (0/90/45): 1.18 / 1.15 / 1.23  
Luminous Opening: Rectangular (W 0.83' x L: 3.83' x H: 0')  
CIE Type: Direct

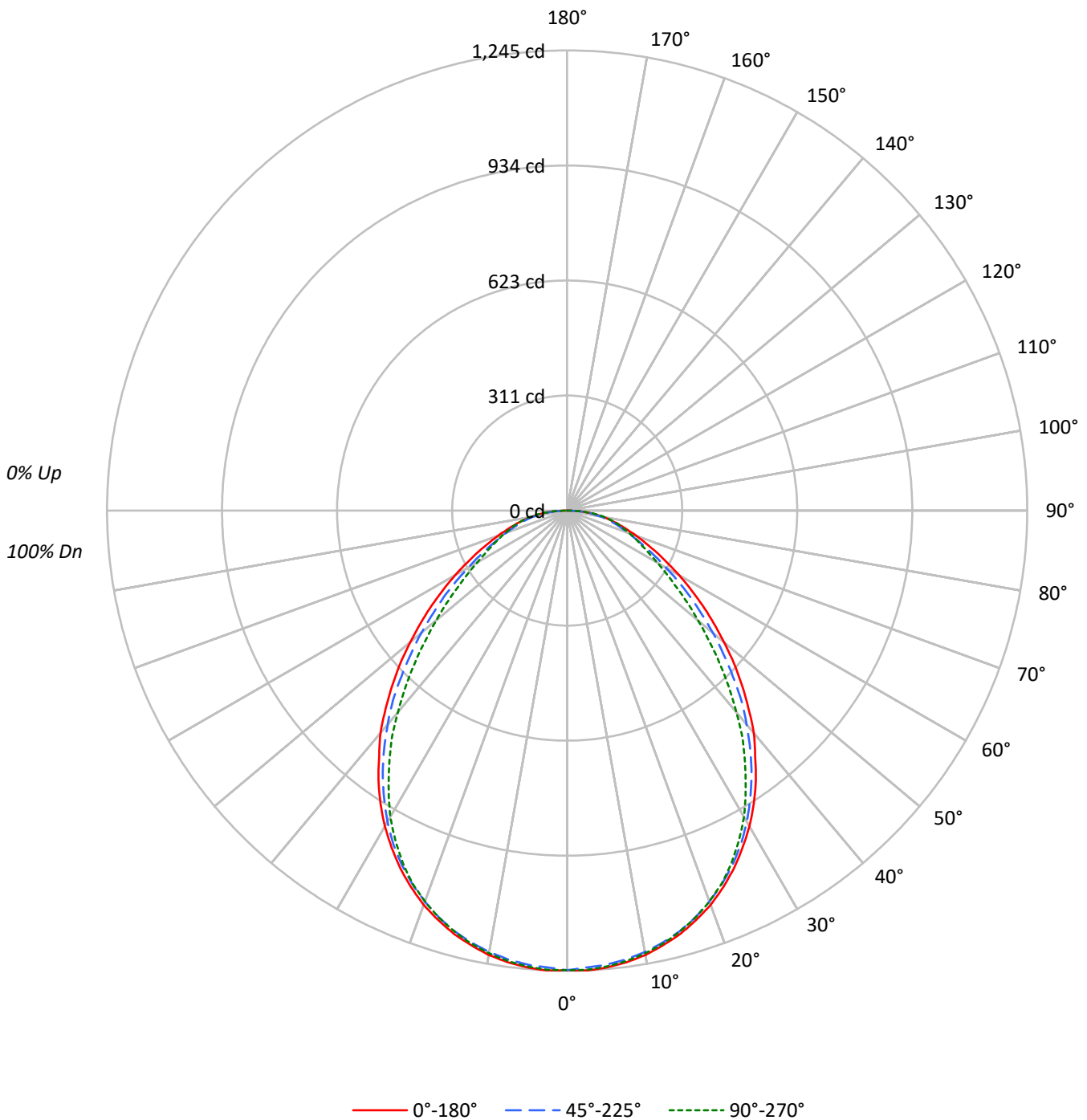
Input Watts (W): 29.9  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	110	105	101	98	107	103	99	96	99	96	93		95	92	90		91	89	87	85
2	101	93	87	81	98	91	85	80	88	83	78		84	80	77		81	78	75	73
3	92	83	75	69	90	81	74	68	78	72	67		75	70	66		73	69	65	63
4	85	74	66	59	83	73	65	59	70	64	58		68	62	58		66	61	57	55
5	79	67	58	52	77	66	58	52	64	57	51		62	55	51		60	54	50	48
6	73	61	52	46	71	60	52	46	58	51	45		56	50	45		55	49	45	43
7	68	55	47	41	66	54	47	41	53	46	41		52	45	40		50	45	40	38
8	64	51	43	37	62	50	42	37	49	42	37		48	41	37		46	41	36	34
9	60	47	39	34	58	46	39	34	45	38	33		44	38	33		43	37	33	31
10	56	43	36	31	55	43	36	31	42	35	30		41	35	30		40	34	30	29

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

	0°	45°	90°
0°	4190	4190	4190
5°	4197	4171	4188
10°	4177	4148	4162
15°	4135	4110	4112
20°	4071	4037	4034
25°	3969	3933	3912
30°	3837	3782	3724
35°	3661	3578	3451
40°	3456	3323	3133
45°	3188	3021	2778
50°	2904	2700	2426
55°	2624	2388	2115
60°	2361	2078	1890
65°	2118	1855	1772
70°	1955	1725	1757
75°	1885	1708	1851
80°	1894	1781	2006
85°	2026	1852	2099



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	117.5	4.2
10°-20°	332.7	12.0
20°-30°	487.0	17.6
30°-40°	541.2	19.5
40°-50°	486.5	17.6
50°-60°	363.8	13.1
60°-70°	239.6	8.7
70°-80°	145.7	5.3
80°-90°	54.5	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°	937.1	33.8
0°-40°	1478.3	53.4
0°-60°	2328.7	84.1
0°-90°	2768.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2768.5	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1243	1243	1243	1243	1243	
5°	1241	1238	1233	1240	1238	118
15°	1185	1183	1178	1182	1179	334
25°	1068	1066	1058	1056	1052	491
35°	890	885	870	851	839	555
45°	669	662	634	600	583	516
55°	447	437	406	373	360	401
65°	266	256	233	223	222	266
75°	145	138	131	138	142	154
85°	52	48	48	56	54	56
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1243.4	1243.4	1243.4	1243.4	1243.4
2.5°	1245.3	1242.8	1236.9	1244.1	1243.4
5°	1240.8	1238.2	1233.1	1239.6	1238.2
7.5°	1232.4	1229.2	1224.7	1231.1	1229.2
10°	1220.8	1217.5	1212.4	1219.5	1216.3
12.5°	1203.9	1202.1	1196.9	1202.1	1200.1
15°	1185.2	1182.7	1178.1	1182.0	1178.8
17.5°	1161.4	1158.7	1153.5	1158.7	1154.9
20°	1135.4	1132.2	1125.7	1129.6	1125.1
22.5°	1103.1	1099.9	1094.1	1096.1	1092.2
25°	1067.6	1065.6	1057.9	1056.0	1052.1
27.5°	1028.2	1024.9	1017.9	1014.0	1006.2
30°	986.2	982.9	972.0	965.5	957.1
32.5°	940.3	935.2	922.2	911.2	899.0
35°	889.9	885.4	869.9	851.1	838.9
37.5°	835.6	833.0	813.6	790.3	780.6
40°	785.8	776.1	755.5	727.0	712.2
42.5°	726.4	719.9	697.9	666.3	647.5
45°	668.9	661.7	634.0	599.8	582.9
47.5°	612.7	604.9	573.2	539.7	520.2
50°	553.9	547.4	515.1	477.6	462.7
52.5°	499.0	490.5	456.9	423.3	410.4
55°	446.6	436.9	406.5	372.9	360.0
57.5°	396.8	385.1	356.1	327.0	318.6
60°	350.3	337.4	308.3	287.0	280.5
62.5°	305.1	295.4	269.4	253.3	249.5
65°	265.6	255.9	232.6	223.0	222.3
67.5°	229.4	219.7	201.6	199.1	200.3
70°	198.4	190.0	175.1	176.5	178.3
72.5°	169.3	161.6	152.5	155.7	159.6
75°	144.8	138.3	131.2	137.6	142.2
77.5°	121.5	115.0	111.2	117.6	122.8
80°	97.6	93.1	91.8	98.9	103.4
82.5°	75.6	71.7	69.8	78.9	80.8
85°	52.4	48.4	47.9	55.6	54.3
87.5°	27.8	24.6	24.6	29.1	25.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)