

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: P231798

Luminaire Tested: **24GR-LD5-100-A-UNV-L940-CD2-U**

Issue Date: 3/12/2020

Test Information

Test Method: LM-79-08
Report Number: P231798
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33306)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/12/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24GR-LD5-100-A-UNV-L940-CD2-U
Description: METALUX 2X4 GRLED TROFFER
WITH A LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 8727.3 lumens
Efficiency: N/A
Efficacy: 121.7 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.2 / 1.26
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

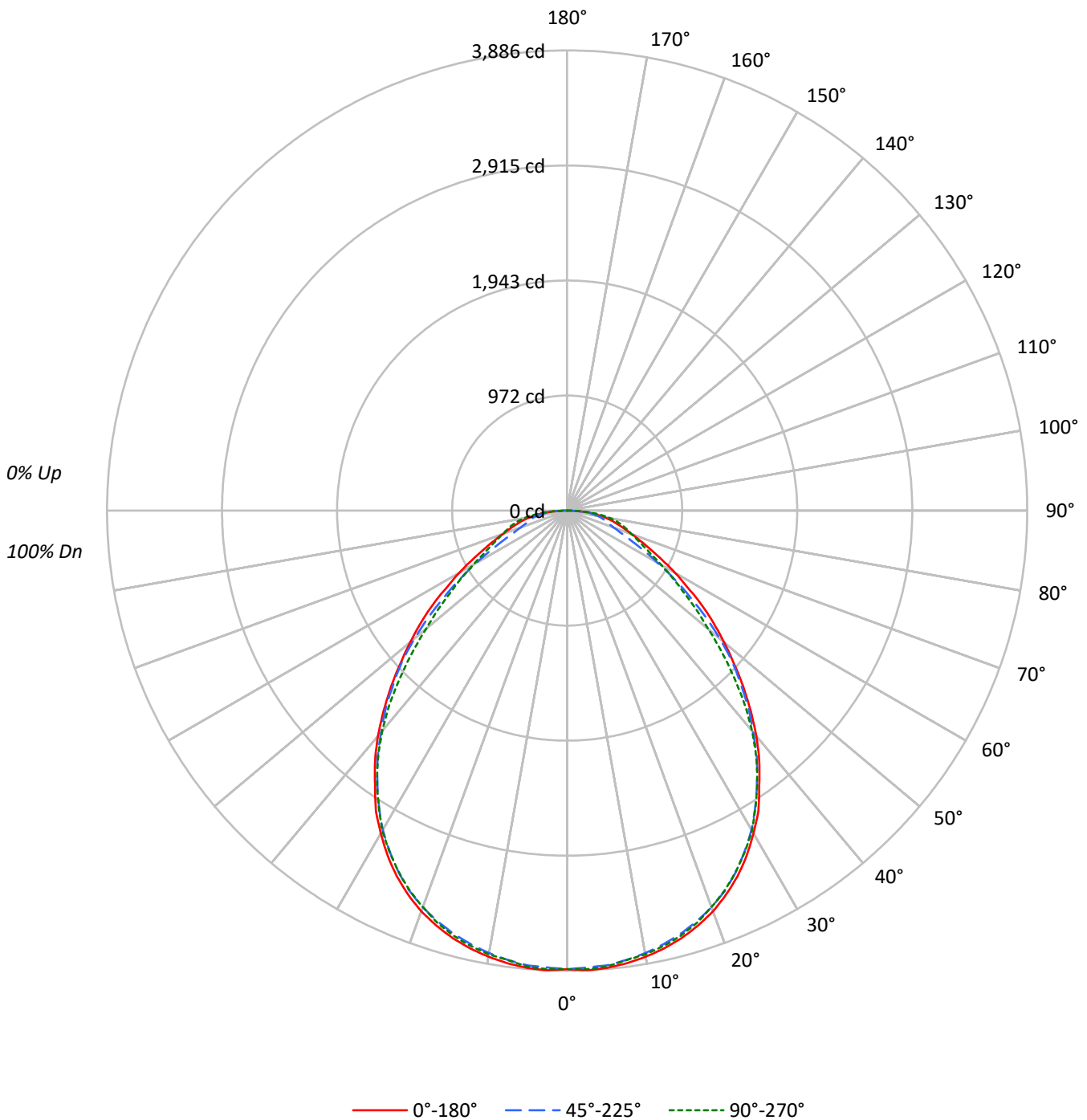
Input Watts (W): 71.7
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	93	90	91	89	88	86
2	101	93	87	82	98	91	86	81	88	83	79	85	81	77	82	78	75	73
3	93	83	75	69	90	81	74	69	79	73	68	76	71	67	73	69	65	63
4	86	74	66	60	83	73	65	60	71	64	59	68	63	58	66	61	57	55
5	79	67	59	53	77	66	58	52	64	57	52	62	56	51	60	55	51	49
6	73	61	53	46	72	60	52	46	58	51	46	57	50	45	55	49	45	43
7	68	56	47	42	67	55	47	41	53	46	41	52	46	41	51	45	41	39
8	64	51	43	37	62	50	43	37	49	42	37	48	41	37	47	41	37	35
9	60	47	39	34	58	46	39	34	45	38	34	44	38	33	43	38	33	32
10	56	44	36	31	55	43	36	31	42	35	31	41	35	31	40	35	30	29

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5931	5931	5931
5°	5960	5927	5941
10°	5949	5901	5917
15°	5926	5866	5892
20°	5870	5810	5808
25°	5755	5694	5689
30°	5565	5508	5520
35°	5286	5226	5233
40°	4971	4885	4855
45°	4556	4495	4316
50°	4118	4006	3704
55°	3698	3366	3193
60°	3238	2709	2808
65°	2824	2130	2585
70°	2584	1860	2584
75°	2585	1979	2848
80°	2807	2331	3247
85°	3081	2629	3483



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	366.7	4.2
10°-20°	1046.5	12.0
20°-30°	1551.7	17.8
30°-40°	1750.5	20.1
40°-50°	1585.4	18.2
50°-60°	1143.8	13.1
60°-70°	682.9	7.8
70°-80°	422.1	4.8
80°-90°	177.8	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°	2964.8	34.0
0°-40°	4715.3	54.0
0°-60°	7444.4	85.3
0°-90°	8727.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	8727.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	3872	3872	3872	3872	3872	
5°	3876	3871	3855	3851	3864	368
15°	3737	3714	3700	3701	3716	1054
25°	3406	3387	3369	3357	3367	1565
35°	2827	2823	2795	2796	2799	1769
45°	2103	2090	2075	2024	1993	1621
55°	1385	1342	1261	1199	1196	1236
65°	779	686	588	667	713	784
75°	437	379	334	417	481	466
85°	175	154	150	196	198	183
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3872.2	3872.2	3872.2	3872.2	3872.2
2.5°	3885.7	3874.9	3861.4	3869.5	3876.3
5°	3876.3	3870.9	3854.7	3850.6	3864.1
7.5°	3856.0	3842.6	3827.7	3834.5	3829.1
10°	3825.0	3812.9	3794.0	3795.4	3804.8
12.5°	3787.3	3772.4	3752.2	3757.6	3765.7
15°	3737.4	3714.4	3699.6	3700.9	3715.8
17.5°	3674.0	3656.5	3637.6	3641.7	3648.4
20°	3601.2	3591.8	3564.8	3556.7	3563.4
22.5°	3509.5	3491.9	3477.2	3473.1	3474.5
25°	3405.7	3386.9	3369.3	3357.2	3366.6
27.5°	3284.3	3268.2	3245.3	3241.2	3249.3
30°	3146.8	3134.7	3114.5	3109.1	3121.2
32.5°	3006.6	2986.4	2958.1	2958.1	2960.8
35°	2827.3	2823.2	2794.9	2796.3	2799.0
37.5°	2665.5	2646.6	2630.5	2614.2	2622.4
40°	2486.2	2464.6	2443.0	2432.3	2428.2
42.5°	2293.4	2277.2	2267.7	2228.7	2219.2
45°	2103.3	2089.8	2075.0	2023.8	1992.7
47.5°	1909.1	1906.4	1894.3	1803.9	1773.0
50°	1728.4	1724.4	1681.3	1585.6	1554.5
52.5°	1557.2	1530.3	1473.6	1379.3	1373.8
55°	1384.7	1341.5	1260.6	1198.6	1195.9
57.5°	1202.6	1151.5	1069.2	1035.4	1053.0
60°	1057.0	978.9	884.4	888.5	916.8
62.5°	906.0	818.4	725.3	765.8	799.5
65°	779.3	686.3	587.8	667.4	713.2
67.5°	668.7	582.5	488.0	594.6	639.1
70°	577.1	507.0	415.3	527.2	577.1
72.5°	504.2	439.5	368.1	473.3	531.2
75°	436.8	378.8	334.4	416.6	481.3
77.5°	378.8	322.2	302.0	368.1	431.5
80°	318.2	266.9	264.3	320.9	368.1
82.5°	248.1	213.0	213.0	268.3	296.6
85°	175.3	153.7	149.6	195.5	198.2
87.5°	90.3	86.3	78.2	102.4	102.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)