

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: FAIL-SAFE

Report Number: P412181

Luminaire Tested: **MRI-4ASR-4-250-L850-OPL**

Issue Date: 10/5/2020

Test Information

Test Method: LM-79-08
Report Number: P412181
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2006-829-8)
Test Lab: INNOVATION CENTER
Issue Date: 10/5/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: MRI-4ASR-4-250-L850-OPL
Description: 4 FT, 4 INCH CHANNEL, OPAL LENS
Light Source: (336) 5000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

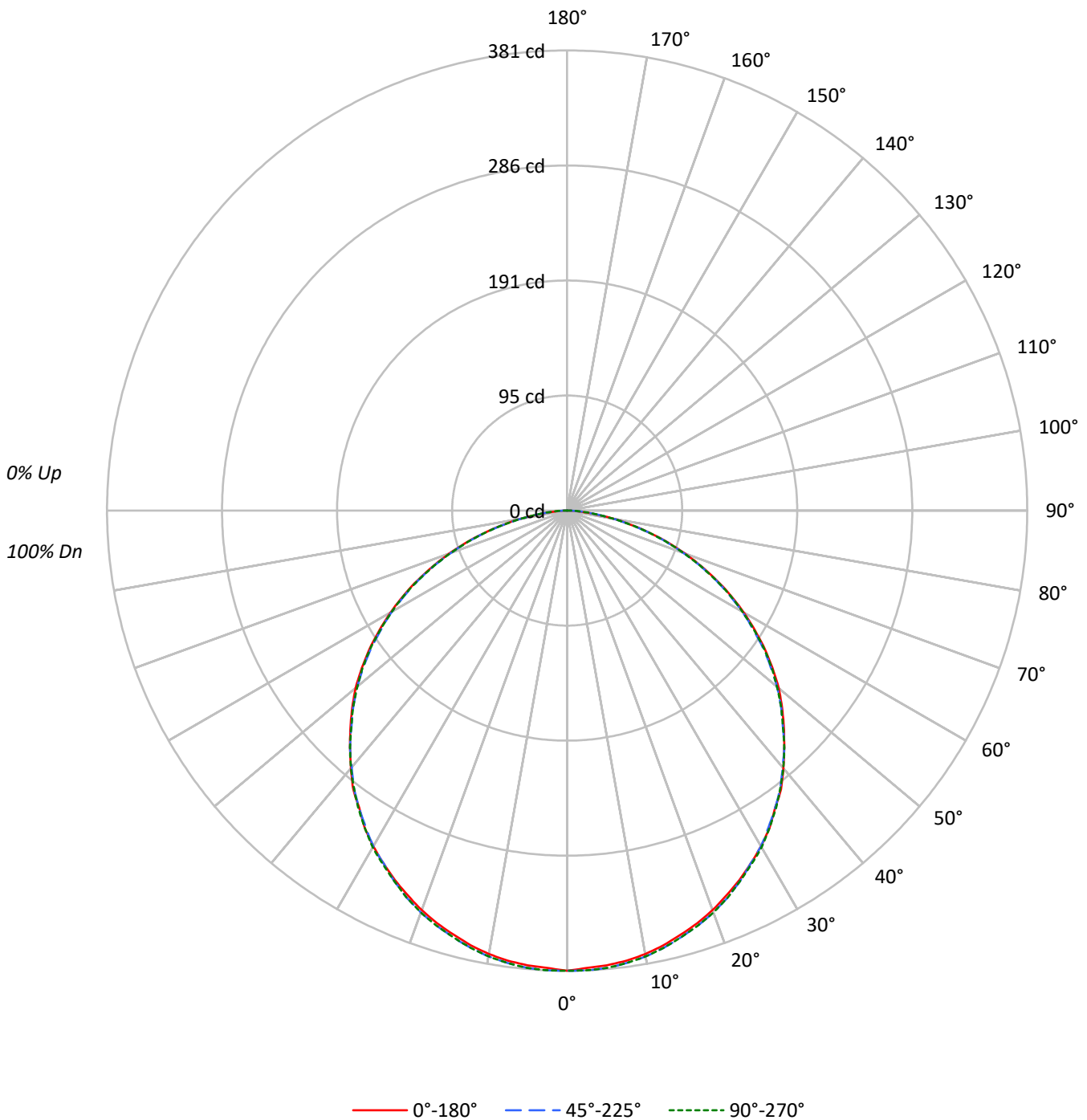
Lumens per Lamp: N/A
Luminaire Lumens: 1081.0 lumens
Efficiency: N/A
Efficacy: 67.1 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.25 / 1.37
Luminous Opening: Rectangular (W 0.33' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 16.1
Input Voltage (V): NR
Input Current (A_{in}): 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	109	104	100	96	106	102	98	94	98	94	91	94	91	89	90	88	86	84
2	99	91	84	78	96	89	82	77	85	80	75	82	77	74	79	75	72	70
3	90	80	71	65	88	78	70	64	75	68	63	72	67	62	70	65	61	59
4	82	70	62	55	80	69	61	54	67	59	54	64	58	53	62	57	52	50
5	76	63	54	47	74	62	53	47	60	52	46	58	51	46	56	50	45	43
6	70	57	48	41	68	56	47	41	54	46	41	52	45	40	51	45	40	38
7	65	51	42	36	63	50	42	36	49	41	36	47	41	36	46	40	35	33
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	30
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	29	27
10	53	40	32	26	52	39	31	26	38	31	26	37	31	26	36	30	26	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3076	3076	3076
5°	3062	3079	3079
10°	3056	3072	3072
15°	3037	3055	3055
20°	3024	3042	3042
25°	3007	3016	3016
30°	2992	2992	3002
35°	2960	2960	2969
40°	2935	2924	2935
45°	2896	2884	2884
50°	2874	2848	2848
55°	2812	2784	2798
60°	2725	2708	2708
65°	2611	2590	2590
70°	2443	2419	2419
75°	2196	2165	2165
80°	1827	1781	1781
85°	1149	1250	1343



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	36.1	3.3
10°-20°	103.1	9.5
20°-30°	156.0	14.4
30°-40°	188.1	17.4
40°-50°	195.4	18.1
50°-60°	177.0	16.4
60°-70°	134.1	12.4
70°-80°	73.9	6.8
80°-90°	17.3	1.6
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°	295.2	27.3
0°-40°	483.3	44.7
0°-60°	855.7	79.2
0°-90°	1081.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1081.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	381	381	381	381	381	
5°	378	379	380	381	380	36
15°	363	364	366	366	366	103
25°	338	338	339	339	339	156
35°	300	300	300	300	301	188
45°	254	253	253	254	253	196
55°	200	198	198	198	199	178
65°	137	136	136	136	136	135
75°	70	70	69	69	69	74
85°	12	14	14	14	14	16
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	381.0	381.0	381.0	381.0	381.0
2.5°	379.0	380.0	381.0	382.1	381.0
5°	377.9	379.0	380.0	381.0	380.0
7.5°	375.9	376.9	377.9	379.0	377.9
10°	372.8	373.8	374.8	375.9	374.8
12.5°	368.6	369.7	370.7	370.7	370.7
15°	363.4	364.5	365.5	366.5	365.5
17.5°	358.3	359.3	360.3	360.3	360.3
20°	352.0	353.1	354.1	354.1	354.1
22.5°	344.8	345.8	346.9	346.9	346.9
25°	337.6	337.6	338.6	338.6	338.6
27.5°	329.3	329.3	329.3	330.3	330.3
30°	321.0	321.0	321.0	321.0	322.0
32.5°	311.7	311.7	310.6	311.7	311.7
35°	300.3	300.3	300.3	300.3	301.3
37.5°	291.0	288.9	289.9	289.9	289.9
40°	278.5	278.5	277.5	278.5	278.5
42.5°	266.1	266.1	266.1	266.1	266.1
45°	253.7	252.6	252.6	253.7	252.6
47.5°	241.3	240.2	240.2	240.2	240.2
50°	228.8	226.8	226.8	226.8	226.8
52.5°	214.3	212.3	212.3	212.3	213.3
55°	199.8	197.8	197.8	197.8	198.8
57.5°	184.3	183.3	182.2	183.3	183.3
60°	168.8	167.7	167.7	167.7	167.7
62.5°	153.2	152.2	151.2	151.2	152.2
65°	136.7	135.6	135.6	135.6	135.6
67.5°	120.1	119.1	119.1	119.1	119.1
70°	103.5	102.5	102.5	103.5	102.5
72.5°	87.0	85.9	85.9	85.9	85.9
75°	70.4	70.4	69.4	69.4	69.4
77.5°	53.8	53.8	53.8	53.8	53.8
80°	39.3	38.3	38.3	38.3	38.3
82.5°	23.8	23.8	24.9	24.9	24.9
85°	12.4	13.5	13.5	14.5	14.5
87.5°	4.1	5.2	6.2	7.2	7.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)