

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: P307451

Luminaire Tested: **14FCZ2-39-UNV-L82765-RDP-CP125-W2A-U-4000K**

Issue Date: 3/3/2020

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.

Test Information

Test Method: LM-79-08
Report Number: P307451
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-43)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: 14FCZ2-39-UNV-L82765-RDP-CP125-W2A-U-4000K
Description: 1'X4' TROFFER LED MODULE, SMOOTH LENS WITH INSERT , 0.125" POLYCARB SHEET
Light Source: (168) 4000K TUNABLE CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER
Luminaire Equipment:

<u>Sample No.</u>	<u>Condition</u>	<u>Description</u>
AS-5443-1	Good	WHITE TWIN R-EVOLVE FLOOD
AS-5443-2	Good	REFLECTOR
AS-5443-3	Good	DRIVER
AS-5443-4	Good	UPPER MODULE
AS-5443-5	Good	LENS
AS-5443-6	Good	DRIVER 2
AS-5443-7	Good	TRIM RING

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2327.0 lumens
Efficiency: N/A
Efficacy: 69.1 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.28 / 1.4
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

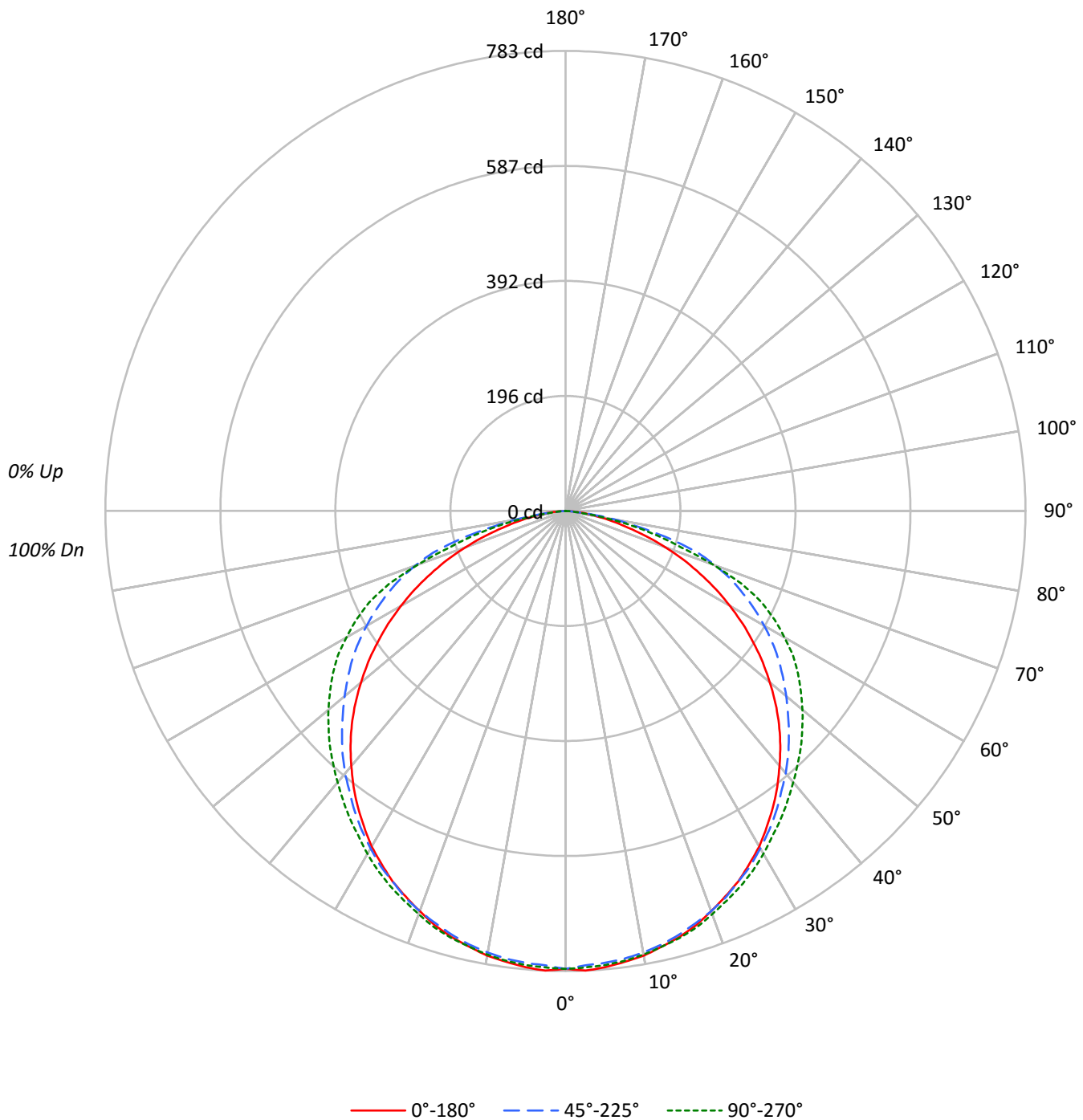
Input Watts (W): 33.7
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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				0
RW	70	50	30	10	70	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		100
1	109	104	100	96	106	102	98	94	97	94	91		93	91	88		84
2	99	90	83	77	96	88	82	76	85	79	75		81	77	73		69
3	90	79	71	64	87	77	70	63	74	68	62		71	66	61		58
4	82	70	61	54	80	68	60	53	66	58	53		63	57	52		49
5	75	62	53	46	73	61	52	46	59	51	45		57	50	45		42
6	69	56	47	40	67	55	46	40	53	45	40		51	44	39		37
7	64	50	42	35	62	50	41	35	48	40	35		47	40	35		32
8	60	46	37	31	58	45	37	31	44	36	31		43	36	31		29
9	56	42	34	28	54	42	34	28	40	33	28		39	33	28		26
10	52	39	31	25	51	38	31	25	37	30	25		36	30	25		23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2097	2097	2097
5°	2105	2086	2095
10°	2100	2085	2095
15°	2090	2080	2095
20°	2076	2076	2091
25°	2066	2066	2093
30°	2049	2060	2094
35°	2023	2053	2101
40°	1991	2049	2119
45°	1956	2046	2157
50°	1901	2053	2205
55°	1833	2080	2267
60°	1741	2102	2317
65°	1608	2129	2348
70°	1430	2144	2102
75°	1152	1927	1681
80°	900	1351	1099
85°	618	392	281



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	73.8	3.2
10°-20°	211.6	9.1
20°-30°	322.3	13.8
30°-40°	392.5	16.9
40°-50°	416.4	17.9
50°-60°	393.0	16.9
60°-70°	317.3	13.6
70°-80°	172.1	7.4
80°-90°	27.8	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°	607.7	26.1
0°-40°	1000.2	43.0
0°-60°	1809.7	77.8
0°-90°	2327.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2327.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	779	779	779	779	779	
5°	779	778	772	778	776	74
15°	750	748	747	752	752	212
25°	696	694	696	703	705	320
35°	616	620	625	638	640	385
45°	514	521	538	558	567	396
55°	391	407	443	472	483	349
65°	252	283	334	362	369	250
75°	111	162	185	167	162	121
85°	20	22	13	11	9	26
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	779.4	779.4	779.4	779.4	779.4
2.5°	783.0	779.4	773.9	779.4	777.6
5°	779.4	777.6	772.1	777.6	775.7
7.5°	773.9	773.9	768.5	772.1	772.1
10°	768.5	766.7	763.0	768.5	766.7
12.5°	759.4	757.6	755.8	761.2	759.4
15°	750.3	748.5	746.7	752.1	752.1
17.5°	739.4	737.6	735.8	743.0	743.0
20°	724.9	724.9	724.9	732.1	730.3
22.5°	710.3	710.3	712.2	719.4	717.6
25°	695.8	694.0	695.8	703.1	704.9
27.5°	677.6	679.5	681.3	688.5	690.4
30°	659.5	661.3	663.1	672.2	674.0
32.5°	637.7	641.3	644.9	655.8	655.8
35°	615.9	619.5	625.0	637.7	639.5
37.5°	592.2	595.9	603.2	617.7	621.3
40°	566.8	572.3	583.2	597.7	603.2
42.5°	541.4	548.6	561.4	577.7	585.0
45°	514.1	521.4	537.7	557.7	566.8
47.5°	485.1	494.1	514.1	539.6	546.8
50°	454.2	466.9	490.5	517.8	526.8
52.5°	423.3	437.8	466.9	496.0	505.0
55°	390.6	406.9	443.3	472.3	483.2
57.5°	357.9	376.1	417.8	448.7	459.6
60°	323.4	345.2	390.6	421.5	430.6
62.5°	288.9	314.3	363.3	394.2	401.5
65°	252.5	283.4	334.3	361.5	368.8
67.5°	218.0	254.3	305.2	325.2	325.2
70°	181.7	221.6	272.5	278.0	267.1
72.5°	145.3	190.8	236.2	216.2	207.1
75°	110.8	161.7	185.3	167.1	161.7
77.5°	83.6	130.8	130.8	119.9	116.3
80°	58.1	99.9	87.2	76.3	70.9
82.5°	38.2	56.3	45.4	36.3	30.9
85°	20.0	21.8	12.7	10.9	9.1
87.5°	7.3	3.6	1.8	3.6	1.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)