

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: P307716

Luminaire Tested: **14FCZ2-39-UNV-L82765-CA125-W2A-U-5700K**

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: P307716
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-49)
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-CA125-W2A-U-5700K
Description: 1'X4' TROFFER LED MODULE,RIBBED LENS, 0.125" ACRYLIC SHEET
Light Source: (168) 5700K 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: 3862.0 lumens
Efficiency: N/A
Efficacy: 112.9 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.28 / 1.37
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

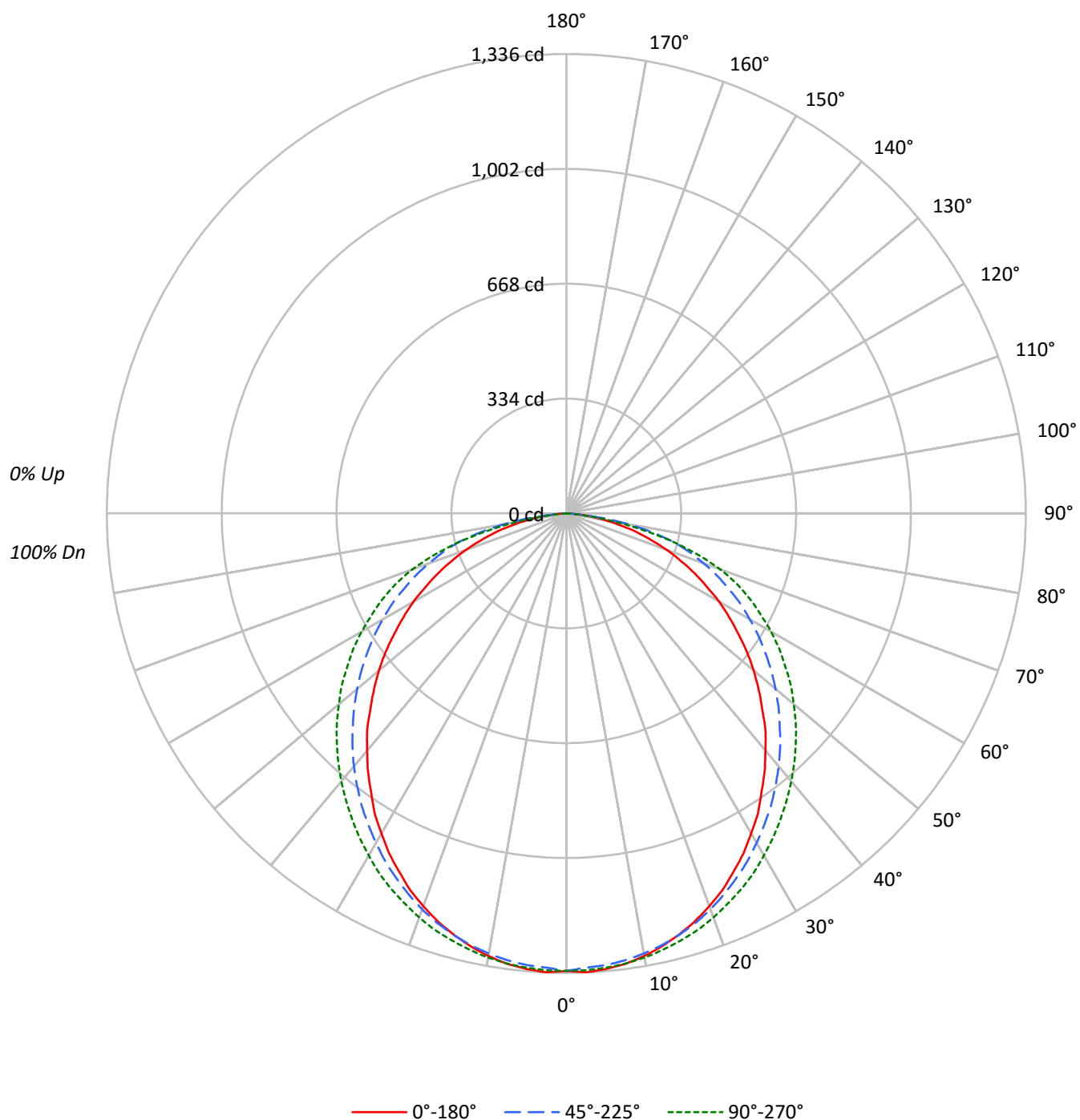
Input Watts (W): 34.2
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P307716

CATALOG NUMBER: 14FCZ2-39-UNV-L82765-CA125-W2A-U-5700K

Luminous Intensity Polar Plot





TEST NUMBER: P307716

CATALOG NUMBER: 14FCZ2-39-UNV-L82765-CA125-W2A-U-5700K

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	99	95	106	101	97	94	97	94	91		93	90	88		83
2	98	90	83	77	96	88	82	76	84	79	74		81	77	73		69
3	89	79	70	64	87	77	69	63	74	67	62		71	66	61		58
4	82	70	61	54	79	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	51	42	35	63	50	41	35	48	41	35		47	40	35		32
8	60	46	37	32	58	45	37	31	44	37	31		43	36	31		29
9	56	42	34	28	54	42	34	28	41	33	28		39	33	28		26
10	52	39	31	26	51	39	31	26	37	30	26		37	30	25		24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3580	3580	3580
5°	3592	3561	3582
10°	3570	3551	3584
15°	3531	3534	3582
20°	3480	3509	3581
25°	3413	3475	3577
30°	3339	3439	3570
35°	3251	3409	3567
40°	3164	3376	3573
45°	3067	3339	3592
50°	2978	3324	3616
55°	2865	3313	3648
60°	2762	3319	3698
65°	2621	3328	3756
70°	2460	3354	3754
75°	2229	3384	3394
80°	1829	2923	2416
85°	1355	1383	559



TEST NUMBER: P307716

CATALOG NUMBER: 14FCZ2-39-UNV-L82765-CA125-W2A-U-5700K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	125.9	3.3
10°-20°	359.6	9.3
20°-30°	541.8	14.0
30°-40°	650.1	16.8
40°-50°	677.6	17.5
50°-60°	627.3	16.2
60°-70°	506.8	13.1
70°-80°	309.0	8.0
80°-90°	63.8	1.7
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°	1027.3	26.6
0°-40°	1677.4	43.4
0°-60°	2982.3	77.2
0°-90°	3862.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3862.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1330	1330	1330	1330	1330	
5°	1330	1326	1318	1328	1326	126
15°	1268	1268	1268	1286	1286	357
25°	1150	1156	1170	1200	1205	530
35°	990	1005	1038	1076	1086	620
45°	806	830	878	927	944	623
55°	611	642	706	761	778	547
65°	412	452	523	575	590	407
75°	214	262	326	331	326	225
85°	44	65	45	25	18	54
90°	0	0	0	0	0	



TEST NUMBER: P307716

CATALOG NUMBER: 14FCZ2-39-UNV-L82765-CA125-W2A-U-5700K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1330.5	1330.5	1330.5	1330.5	1330.5
2.5°	1335.6	1331.3	1321.9	1331.3	1329.6
5°	1329.6	1326.2	1318.4	1327.9	1326.2
7.5°	1321.0	1317.6	1310.7	1321.9	1320.1
10°	1306.4	1304.6	1299.5	1312.4	1311.5
12.5°	1289.1	1288.3	1285.7	1300.3	1299.5
15°	1267.6	1268.5	1268.5	1285.7	1285.7
17.5°	1243.5	1245.2	1248.7	1267.6	1270.2
20°	1215.1	1218.5	1225.4	1246.9	1250.4
22.5°	1185.8	1188.4	1198.7	1224.6	1228.0
25°	1149.6	1156.5	1170.3	1199.6	1204.7
27.5°	1115.2	1121.2	1140.2	1170.3	1178.9
30°	1074.7	1084.2	1106.6	1139.3	1148.8
32.5°	1036.0	1046.3	1072.1	1110.0	1118.6
35°	989.5	1005.0	1037.7	1075.6	1085.9
37.5°	947.3	961.9	998.9	1040.3	1052.3
40°	900.8	918.8	961.0	1005.0	1017.0
42.5°	857.7	874.9	920.6	965.3	981.7
45°	806.0	830.1	877.5	926.6	943.8
47.5°	758.7	782.8	837.0	889.6	905.1
50°	711.3	737.1	794.0	848.2	863.7
52.5°	662.2	689.8	750.9	805.2	823.3
55°	610.6	642.4	706.1	761.3	777.6
57.5°	561.5	594.2	662.2	718.2	734.6
60°	513.2	546.8	616.6	670.0	687.2
62.5°	459.9	499.5	571.8	624.3	637.2
65°	411.6	452.1	522.7	575.2	589.9
67.5°	360.8	404.7	475.4	523.6	537.4
70°	312.6	358.2	426.3	471.0	477.1
72.5°	260.9	307.4	376.3	404.7	404.7
75°	214.4	261.8	325.5	330.7	326.4
77.5°	163.6	216.1	257.5	247.1	236.8
80°	118.0	169.6	188.6	169.6	155.9
82.5°	79.2	123.1	113.7	90.4	80.1
85°	43.9	65.4	44.8	25.0	18.1
87.5°	16.4	14.6	4.3	4.3	4.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)