

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: P308057

Luminaire Tested: **14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K**

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: P308057
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-40)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: 14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K
Description: 1'X4' TROFFER LED MODULE,SMOOTH LENS, 0.250" POLYCARB SHEET
Light Source: (168) 5500K 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: 4053.0 lumens
Efficiency: N/A
Efficacy: 102.9 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.26 / 1.36
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

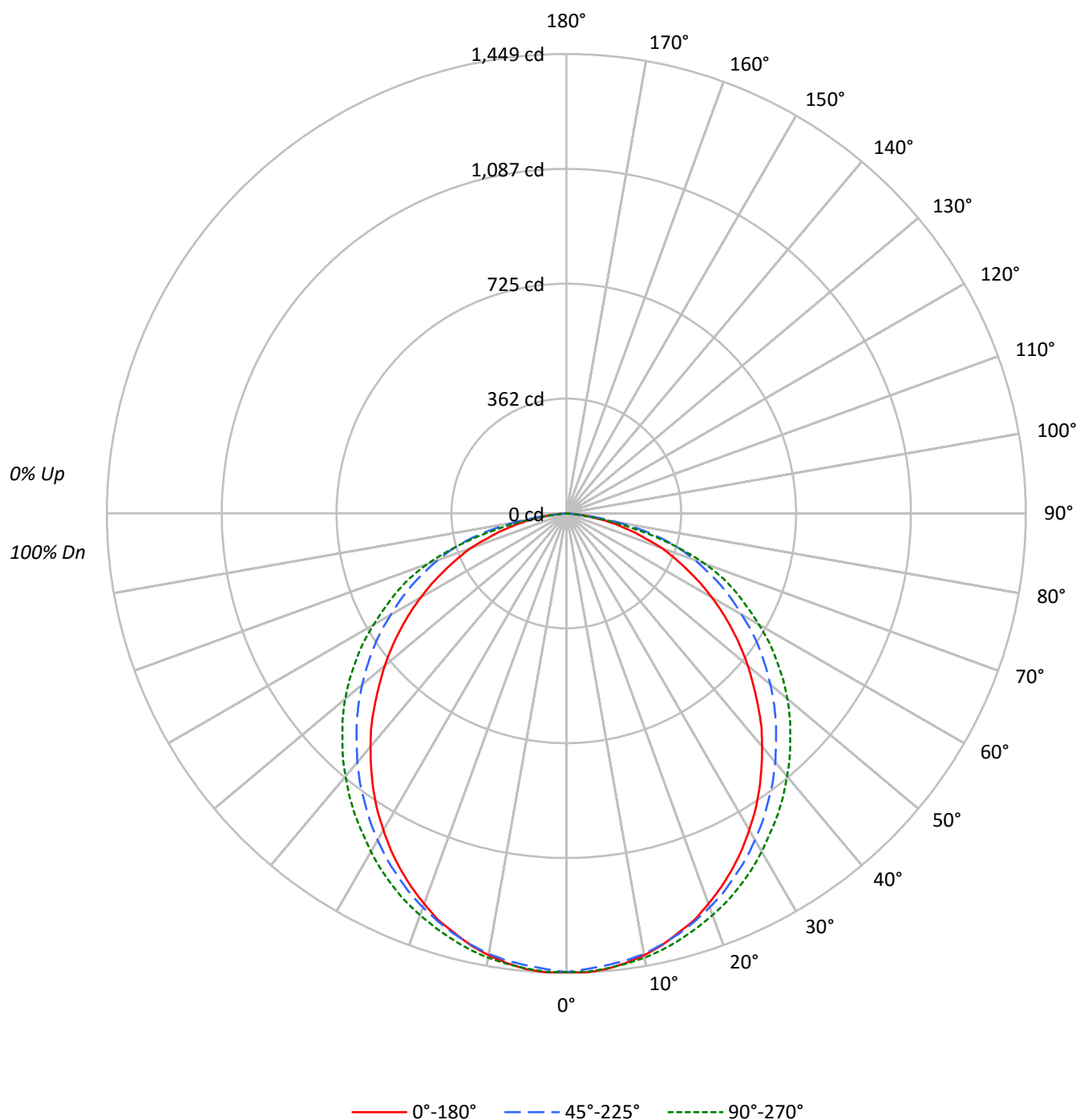
Input Watts (W): 39.4
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P308057

CATALOG NUMBER: 14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K

Luminous Intensity Polar Plot





TEST NUMBER: P308057

CATALOG NUMBER: 14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K

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		94	91	89		84
2	99	90	84	78	96	89	82	77	85	80	75		82	77	73		70
3	90	79	71	65	87	78	70	64	75	68	63		72	66	62		58
4	82	70	61	55	80	69	61	54	66	59	53		64	58	53		50
5	76	63	54	47	74	62	53	47	59	52	46		57	51	46		43
6	70	56	47	41	68	55	47	41	54	46	40		52	45	40		38
7	65	51	42	36	63	50	42	36	49	41	36		47	41	35		33
8	60	47	38	32	59	46	38	32	45	37	32		43	37	32		30
9	56	43	35	29	55	42	34	29	41	34	29		40	33	29		27
10	53	40	32	26	52	39	31	26	38	31	26		37	31	26		24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3894	3894	3894
5°	3897	3865	3892
10°	3866	3855	3888
15°	3813	3824	3874
20°	3752	3787	3861
25°	3676	3741	3848
30°	3584	3696	3828
35°	3485	3644	3816
40°	3374	3600	3805
45°	3250	3556	3801
50°	3129	3517	3811
55°	2998	3488	3799
60°	2855	3439	3774
65°	2687	3429	3775
70°	2530	3399	3668
75°	2194	3322	3134
80°	1774	2678	2086
85°	1179	929	621



TEST NUMBER: P308057

CATALOG NUMBER: 14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	136.6	3.4
10°-20°	388.8	9.6
20°-30°	583.2	14.4
30°-40°	695.7	17.2
40°-50°	719.2	17.7
50°-60°	656.6	16.2
60°-70°	516.7	12.7
70°-80°	300.8	7.4
80°-90°	55.4	1.4
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°	1108.6	27.4
0°-40°	1804.3	44.5
0°-60°	3180.1	78.5
0°-90°	4053.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4053.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1447	1447	1447	1447	1447	
5°	1443	1439	1431	1443	1441	137
15°	1368	1370	1372	1391	1391	386
25°	1238	1244	1260	1290	1296	570
35°	1061	1075	1109	1152	1162	663
45°	854	882	934	987	999	660
55°	639	673	744	798	810	571
65°	422	466	539	581	593	419
75°	211	261	320	314	301	224
85°	38	54	30	24	20	49
90°	0	0	0	0	0	



TEST NUMBER: P308057

CATALOG NUMBER: 14FCZ2-44-UNV-L82765-S-CP250-W2A-U-5500K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1446.9	1446.9	1446.9	1446.9	1446.9
2.5°	1448.9	1444.8	1438.8	1448.9	1446.9
5°	1442.8	1438.8	1430.8	1442.8	1440.8
7.5°	1430.8	1426.8	1422.7	1434.8	1432.8
10°	1414.7	1412.7	1410.7	1424.7	1422.7
12.5°	1394.6	1394.6	1392.6	1408.7	1408.7
15°	1368.5	1370.5	1372.5	1390.6	1390.6
17.5°	1344.4	1342.4	1348.4	1368.5	1370.5
20°	1310.2	1314.2	1322.3	1346.4	1348.4
22.5°	1276.0	1280.1	1294.1	1318.2	1324.3
25°	1237.9	1243.9	1260.0	1290.1	1296.1
27.5°	1197.7	1205.7	1227.8	1260.0	1266.0
30°	1153.5	1165.5	1189.6	1225.8	1231.8
32.5°	1109.3	1121.3	1151.5	1187.6	1195.7
35°	1061.0	1075.1	1109.3	1151.5	1161.5
37.5°	1010.8	1028.9	1069.1	1111.3	1123.3
40°	960.6	980.6	1024.9	1069.1	1083.1
42.5°	910.3	930.4	978.6	1028.9	1042.9
45°	854.0	882.2	934.4	986.7	998.7
47.5°	799.8	829.9	888.2	940.5	956.5
50°	747.5	777.7	840.0	894.2	910.3
52.5°	693.3	725.4	791.8	848.0	862.1
55°	639.0	673.2	743.5	797.8	809.8
57.5°	584.8	620.9	693.3	745.5	759.6
60°	530.5	568.7	639.0	691.3	701.3
62.5°	476.3	516.4	588.8	635.0	645.1
65°	422.0	466.2	538.6	580.8	592.8
67.5°	369.8	414.0	484.3	524.5	534.5
70°	321.5	361.7	432.0	462.2	466.2
72.5°	261.2	311.5	379.8	395.9	385.8
75°	211.0	261.2	319.5	313.5	301.4
77.5°	160.8	211.0	249.2	229.1	213.0
80°	114.5	164.8	172.8	142.7	134.6
82.5°	74.4	114.5	96.5	74.4	60.3
85°	38.2	54.3	30.1	24.1	20.1
87.5°	12.1	8.0	4.0	4.0	2.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)