

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: P475355

Luminaire Tested: **14CZ2-44-UNV-L835-CD1-U**

Issue Date: 02/10/2021

Test Information

Test Method: LM-79-08
Report Number: P475355
Test Lab: INNOVATION CENTER(G3)
Issue Date: 02/10/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 14CZ2-44-UNV-L835-CD1-U
Description: 1'X4' TROFFER LED MODULE, RIBBED LENS
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

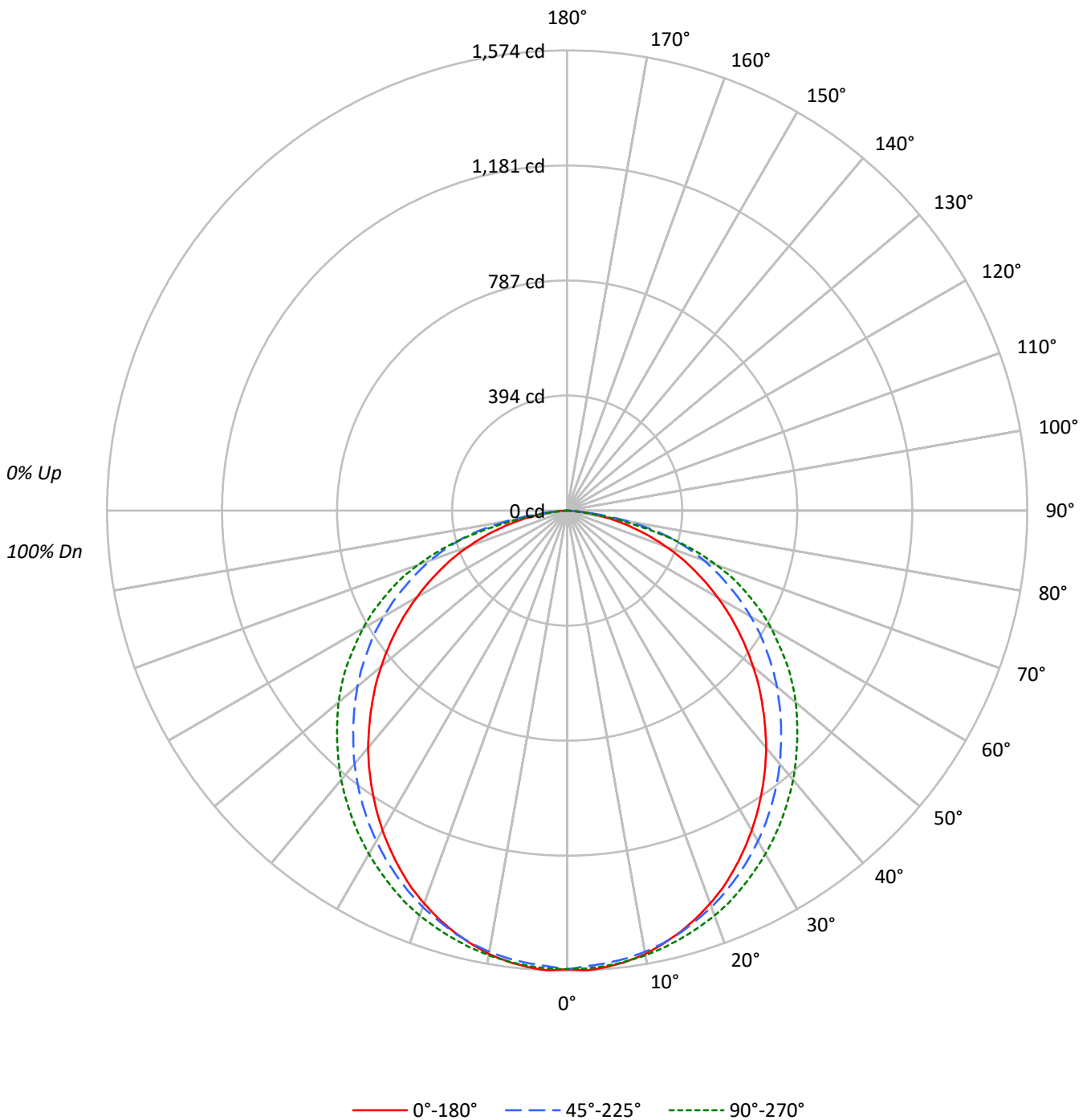
Lumens per Lamp: N/A
Luminaire Lumens: 4521.8 lumens
Efficiency: N/A
Efficacy: 130.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.29 / 1.37
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 34.6
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	109	104	99	96	106	102	98	94	97	94	91		93	91	88		90	88	86	83
2	99	90	83	77	96	88	82	76	85	79	75		81	77	73		78	75	71	69
3	90	79	71	64	87	77	70	63	74	68	62		72	66	61		69	64	60	58
4	82	70	61	54	80	68	60	54	66	59	53		64	57	52		61	56	51	49
5	75	62	53	46	73	61	53	46	59	51	46		57	50	45		55	49	45	42
6	69	56	47	40	68	55	46	40	53	46	40		51	45	39		50	44	39	37
7	64	51	42	36	63	50	41	35	48	41	35		47	40	35		46	39	35	33
8	60	46	38	32	58	46	37	32	44	37	31		43	36	31		42	36	31	29
9	56	42	34	29	55	42	34	28	41	33	28		40	33	28		39	32	28	26
10	52	39	31	26	51	39	31	26	38	31	26		37	30	26		36	30	25	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4221	4221	4221
5°	4233	4196	4221
10°	4208	4187	4220
15°	4159	4165	4218
20°	4095	4134	4221
25°	4017	4095	4217
30°	3926	4055	4215
35°	3822	4014	4215
40°	3720	3975	4225
45°	3597	3938	4235
50°	3476	3919	4274
55°	3344	3902	4311
60°	3196	3897	4342
65°	3033	3887	4350
70°	2825	3910	4267
75°	2505	3859	3827
80°	2101	3228	2607
85°	1473	1263	303



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	148.4	3.3
10°-20°	423.6	9.4
20°-30°	638.3	14.1
30°-40°	766.1	16.9
40°-50°	797.6	17.6
50°-60°	737.0	16.3
60°-70°	590.3	13.1
70°-80°	353.2	7.8
80°-90°	67.3	1.5
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°	1210.3	26.8
0°-40°	1976.4	43.7
0°-60°	3511.0	77.6
0°-90°	4521.8	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4521.8	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1569	1569	1569	1569	1569	
5°	1567	1563	1554	1565	1563	149
15°	1493	1493	1495	1514	1514	421
25°	1353	1360	1379	1414	1420	623
35°	1163	1181	1222	1270	1283	728
45°	945	973	1035	1096	1113	730
55°	713	751	832	896	919	638
65°	476	526	610	670	683	472
75°	241	302	371	376	368	257
85°	48	70	41	17	10	61
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1568.7	1568.7	1568.7	1568.7	1568.7
2.5°	1574.0	1569.4	1559.6	1569.4	1567.2
5°	1567.2	1563.4	1553.5	1564.9	1562.6
7.5°	1555.8	1552.8	1545.2	1557.3	1555.1
10°	1539.9	1537.6	1532.3	1546.0	1544.4
12.5°	1517.9	1518.7	1515.7	1532.3	1530.8
15°	1492.9	1492.9	1495.2	1514.2	1514.2
17.5°	1463.4	1464.9	1469.5	1494.5	1495.2
20°	1430.1	1433.9	1443.7	1469.5	1474.0
22.5°	1394.5	1399.0	1412.7	1442.9	1449.8
25°	1352.8	1360.4	1379.3	1414.2	1420.2
27.5°	1308.9	1320.2	1343.7	1381.6	1389.2
30°	1263.4	1275.6	1305.1	1346.0	1356.6
32.5°	1214.2	1230.1	1265.7	1308.9	1321.0
35°	1163.4	1180.9	1221.8	1270.3	1283.1
37.5°	1112.7	1131.6	1177.8	1230.1	1243.0
40°	1058.9	1080.9	1131.6	1185.4	1202.8
42.5°	1002.1	1026.4	1082.4	1141.5	1158.1
45°	945.3	973.3	1034.7	1096.0	1112.7
47.5°	890.0	918.8	985.4	1049.1	1066.5
50°	830.2	863.5	936.2	999.1	1021.0
52.5°	771.8	809.0	885.5	949.1	971.1
55°	712.8	751.4	831.7	896.1	918.8
57.5°	655.2	696.1	780.9	844.6	860.5
60°	593.8	638.5	724.1	788.5	806.7
62.5°	536.3	582.5	668.8	730.9	748.4
65°	476.4	525.7	610.5	670.3	683.2
67.5°	420.4	469.6	555.2	606.7	619.6
70°	359.0	413.6	496.9	540.8	542.3
72.5°	300.7	356.0	437.1	465.1	461.3
75°	240.9	301.5	371.2	376.5	368.1
77.5°	187.1	247.7	295.4	278.7	262.1
80°	135.6	194.7	208.3	182.5	168.2
82.5°	89.4	136.3	125.7	90.1	77.3
85°	47.7	69.7	40.9	16.7	9.8
87.5°	18.2	12.1	4.5	3.8	3.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)