

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: P258726

Luminaire Tested: **14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P258726
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35112)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K
Description: CRUZE 1x4 TUNABLE WHITE LED TROFFER WITH SMOOTH LENS
Light Source: (168) 80 CRI LEDS TUNED AT 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4178.0 lumens
Efficiency: N/A
Efficacy: 131.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.26 / 1.35
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

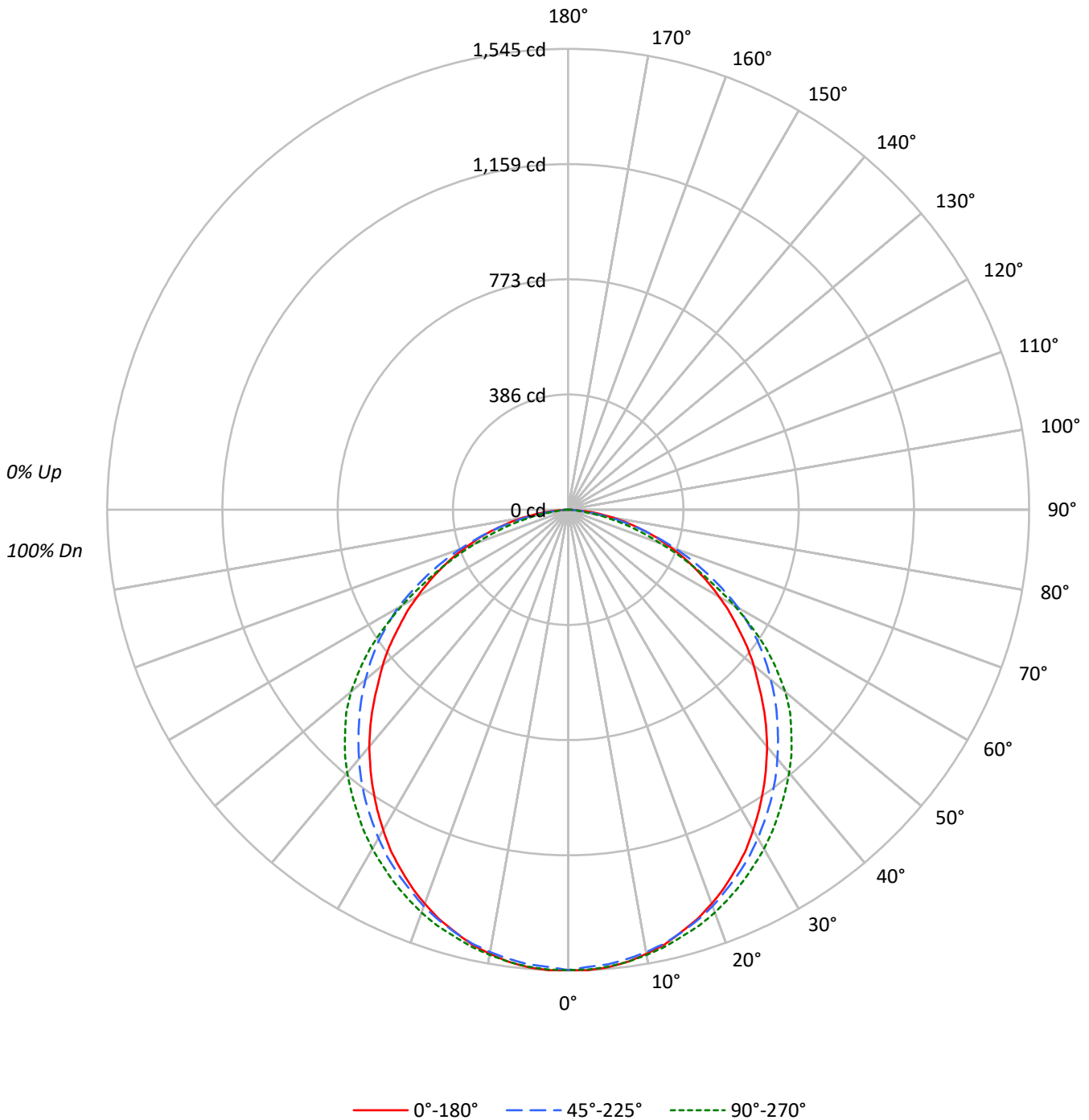
Input Watts (W): 31.713
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P258726

CATALOG NUMBER: 14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K

Luminous Intensity Polar Plot





TEST NUMBER: P258726

CATALOG NUMBER: 14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K

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	105	100	97	106	102	98	95	98	95	92	94	92	89	91	89	87	85
2	99	91	85	79	97	89	83	78	86	81	76	83	78	75	80	76	73	71
3	91	80	72	66	88	79	71	65	76	69	64	73	68	63	70	66	62	60
4	83	71	63	56	81	70	62	56	67	60	55	65	59	54	63	58	53	51
5	76	64	55	48	74	63	54	48	60	53	47	58	52	47	57	51	46	44
6	71	57	48	42	69	56	48	42	55	47	42	53	46	41	51	45	41	39
7	65	52	43	37	64	51	43	37	50	42	37	48	42	37	47	41	36	34
8	61	47	39	33	59	47	39	33	45	38	33	44	38	33	43	37	32	31
9	57	44	35	30	56	43	35	30	42	35	30	41	34	30	40	34	29	28
10	53	40	32	27	52	40	32	27	39	32	27	38	31	27	37	31	27	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4153	4153	4153
5°	4159	4134	4154
10°	4131	4115	4141
15°	4082	4087	4123
20°	4025	4052	4116
25°	3947	4002	4096
30°	3853	3951	4078
35°	3749	3896	4055
40°	3643	3832	4048
45°	3514	3769	4024
50°	3398	3710	3975
55°	3267	3651	3799
60°	3146	3547	3467
65°	3011	3319	3047
70°	2842	3017	2578
75°	2652	2613	2129
80°	2337	2019	1557
85°	1840	976	861



TEST NUMBER: P258726

CATALOG NUMBER: 14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	145.8	3.5
10°-20°	415.5	9.9
20°-30°	623.5	14.9
30°-40°	743.3	17.8
40°-50°	765.6	18.3
50°-60°	682.3	16.3
60°-70°	491.6	11.8
70°-80°	257.1	6.2
80°-90°	53.2	1.3
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°	1184.8	28.4
0°-40°	1928.1	46.1
0°-60°	3376.0	80.8
0°-90°	4178.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4178.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1543	1543	1543	1543	1543	
5°	1540	1536	1530	1540	1538	146
15°	1465	1467	1467	1482	1480	413
25°	1329	1337	1348	1374	1380	612
35°	1141	1156	1186	1225	1234	714
45°	923	944	990	1046	1057	713
55°	696	719	778	814	810	624
65°	473	490	521	497	478	468
75°	255	268	251	218	205	270
85°	60	52	32	28	28	70
90°	0	0	0	0	0	



TEST NUMBER: P258726

CATALOG NUMBER: 14CZ-LD5-39-S-UNV-L83050-W2A1-U-4000K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1543.3	1543.3	1543.3	1543.3	1543.3
2.5°	1545.2	1541.5	1534.0	1543.3	1543.3
5°	1539.6	1535.9	1530.3	1539.6	1537.8
7.5°	1528.5	1524.7	1519.1	1530.3	1528.5
10°	1511.7	1509.8	1506.1	1517.3	1515.4
12.5°	1493.1	1491.2	1489.4	1500.5	1500.5
15°	1465.2	1467.0	1467.0	1481.9	1480.0
17.5°	1439.1	1441.0	1442.8	1461.4	1461.4
20°	1405.6	1407.4	1414.9	1435.4	1437.2
22.5°	1370.2	1372.1	1381.4	1405.6	1409.3
25°	1329.2	1336.7	1347.9	1373.9	1379.5
27.5°	1288.3	1293.9	1312.5	1342.3	1346.0
30°	1239.9	1251.1	1271.5	1305.0	1312.5
32.5°	1191.5	1204.5	1228.7	1266.0	1275.3
35°	1141.2	1156.1	1185.9	1225.0	1234.3
37.5°	1089.1	1102.1	1139.4	1180.3	1193.3
40°	1037.0	1050.0	1091.0	1137.5	1152.4
42.5°	981.1	999.7	1040.7	1092.8	1107.7
45°	923.4	943.9	990.4	1046.3	1057.4
47.5°	863.8	886.2	940.2	996.0	1009.0
50°	811.7	832.2	886.2	940.2	949.5
52.5°	755.8	774.5	834.0	878.7	880.6
55°	696.3	718.6	778.2	813.6	809.8
57.5°	642.3	660.9	718.6	737.2	726.1
60°	584.6	601.3	659.0	660.9	644.1
62.5°	528.7	545.5	590.2	577.1	556.6
65°	472.9	489.6	521.3	497.1	478.5
67.5°	418.9	433.8	452.4	420.7	402.1
70°	361.2	381.6	383.5	346.3	327.7
72.5°	310.9	322.1	318.3	283.0	266.2
75°	255.1	268.1	251.3	217.8	204.8
77.5°	202.9	212.2	189.9	158.2	148.9
80°	150.8	156.4	130.3	106.1	100.5
82.5°	102.4	102.4	74.5	57.7	52.1
85°	59.6	52.1	31.6	27.9	27.9
87.5°	20.5	13.0	13.0	13.0	13.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)