

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: P260725

Luminaire Tested: **24CZ-LD5-40-UNV-L82765-W2A1-U-5000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P260725  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25697)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ-LD5-40-UNV-L82765-W2A1-U-5000K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER WITH RIBBED LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4194.0 lumens  
Efficiency: N/A  
Efficacy: 145.0 lumens/watt  
Spacing Criteria (0/90/45): 1.19 / 1.25 / 1.35  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

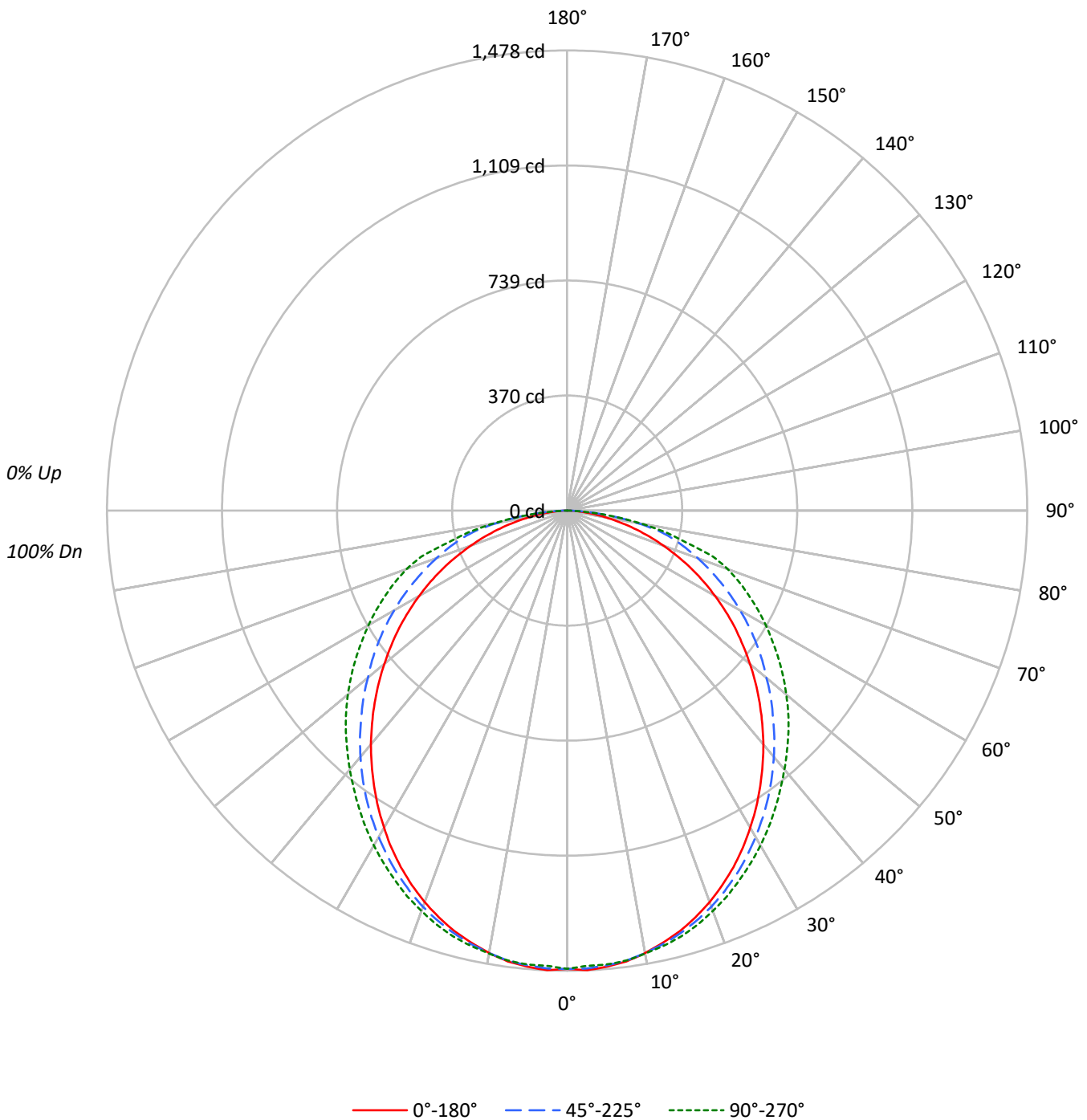
Input Watts (W): 28.923  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P260725

CATALOG NUMBER: 24CZ-LD5-40-UNV-L82765-W2A1-U-5000K

### Luminous Intensity Polar Plot





TEST NUMBER: P260725

CATALOG NUMBER: 24CZ-LD5-40-UNV-L82765-W2A1-U-5000K

**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	108	103	99	95	106	101	97	93	97	93	90	93	90	88	89	87	85	83
2	98	90	83	77	95	88	81	76	84	79	74	81	76	72	78	74	71	68
3	89	78	70	63	87	77	69	63	74	67	62	71	65	61	68	64	60	57
4	82	69	60	54	79	68	60	53	66	58	52	63	57	52	61	56	51	49
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37
7	64	51	42	35	63	50	41	35	48	41	35	47	40	35	45	39	35	32
8	60	46	38	32	58	45	37	32	44	37	31	43	36	31	42	36	31	29
9	56	42	34	28	54	42	34	28	41	33	28	40	33	28	38	32	28	26
10	52	39	31	26	51	39	31	26	38	31	26	37	30	25	36	30	25	24

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	1980	1980	1980
5°	1986	1980	1976
10°	1972	1972	1974
15°	1948	1958	1972
20°	1916	1939	1959
25°	1876	1912	1944
30°	1827	1881	1930
35°	1776	1849	1915
40°	1723	1813	1907
45°	1664	1779	1913
50°	1605	1749	1924
55°	1546	1738	1944
60°	1476	1727	1982
65°	1399	1728	2048
70°	1293	1757	2158
75°	1157	1837	2053
80°	968	1758	1881
85°	732	1352	1286



TEST NUMBER: P260725

CATALOG NUMBER: 24CZ-LD5-40-UNV-L82765-W2A1-U-5000K

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	139.1	3.3
10°-20°	395.9	9.4
20°-30°	591.8	14.1
30°-40°	702.1	16.7
40°-50°	722.6	17.2
50°-60°	662.9	15.8
60°-70°	536.0	12.8
70°-80°	347.9	8.3
80°-90°	95.9	2.3
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°	1126.7	26.9
0°-40°	1828.8	43.6
0°-60°	3214.3	76.6
0°-90°	4194.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4194.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1472	1472	1472	1472	1472	
5°	1470	1460	1466	1465	1463	140
15°	1399	1393	1406	1412	1416	394
25°	1264	1265	1288	1300	1310	582
35°	1081	1090	1126	1150	1166	676
45°	874	889	935	979	1005	675
55°	659	679	741	801	829	589
65°	439	465	543	615	643	434
75°	223	264	353	395	395	237
85°	47	80	88	85	83	58
90°	0	0	0	0	0	



TEST NUMBER: P260725

CATALOG NUMBER: 24CZ-LD5-40-UNV-L82765-W2A1-U-5000K

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1471.9	1471.9	1471.9	1471.9	1471.9
2.5°	1477.6	1466.1	1471.9	1470.4	1463.3
5°	1470.4	1460.4	1466.1	1464.7	1463.3
7.5°	1460.4	1450.3	1457.5	1456.1	1457.5
10°	1443.2	1434.5	1443.2	1444.6	1444.6
12.5°	1421.6	1414.4	1425.9	1428.8	1431.7
15°	1398.6	1392.9	1405.8	1411.6	1415.9
17.5°	1369.9	1365.6	1381.4	1388.6	1394.3
20°	1338.3	1336.9	1354.1	1361.3	1368.5
22.5°	1302.4	1302.4	1322.5	1331.2	1341.2
25°	1263.7	1265.1	1288.1	1299.6	1309.6
27.5°	1222.0	1223.5	1250.7	1265.1	1276.6
30°	1176.1	1181.8	1210.5	1229.2	1242.1
32.5°	1130.1	1137.3	1168.9	1190.4	1204.8
35°	1081.3	1089.9	1125.8	1150.2	1166.0
37.5°	1031.0	1041.1	1079.9	1107.1	1125.8
40°	980.8	992.3	1032.5	1064.1	1085.6
42.5°	927.6	940.6	985.1	1022.4	1045.4
45°	874.5	888.9	934.8	979.3	1005.2
47.5°	821.4	838.6	887.4	936.3	963.5
50°	766.8	784.0	835.7	891.7	919.0
52.5°	712.2	732.3	789.8	847.2	874.5
55°	659.1	679.2	741.0	801.3	828.6
57.5°	604.5	624.6	692.1	755.3	782.6
60°	548.5	571.5	641.9	706.5	736.7
62.5°	494.0	518.4	593.1	662.0	690.7
65°	439.4	465.3	542.8	614.6	643.3
67.5°	383.4	413.6	494.0	567.2	597.4
70°	328.8	361.9	446.6	519.8	548.5
72.5°	275.7	311.6	399.2	473.9	491.1
75°	222.6	264.2	353.3	394.9	394.9
77.5°	172.3	218.3	301.6	317.4	326.0
80°	124.9	175.2	226.9	245.6	242.7
82.5°	83.3	133.5	162.3	162.3	158.0
85°	47.4	80.4	87.6	84.7	83.3
87.5°	20.1	30.2	27.3	21.5	18.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)