

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: P260817

Luminaire Tested: **24CZ-LD5-40SE-UNV-L82765-W2A1-U-5700K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P260817
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-LD5-40SE-UNV-L82765-W2A1-U-5700K
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER WITH RIBBED LENS
Light Source: (168) 80 CRI LEDS TUNED AT 5700K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4220.0 lumens
Efficiency: N/A
Efficacy: 135.0 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

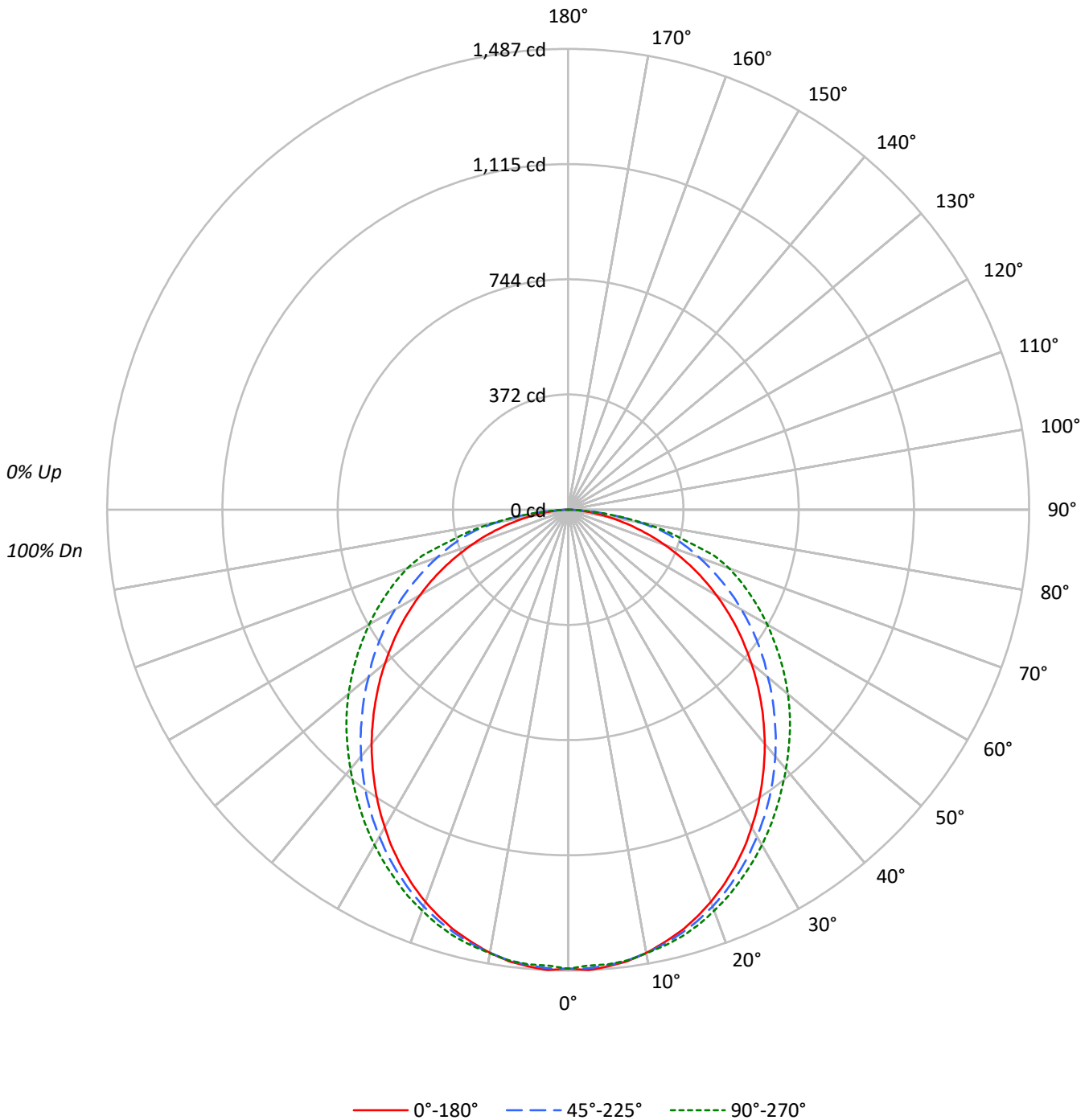
Input Watts (W): 31.248
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P260817

CATALOG NUMBER: 24CZ-LD5-40SE-UNV-L82765-W2A1-U-5700K

Luminous Intensity Polar Plot





TEST NUMBER: P260817

CATALOG NUMBER: 24CZ-LD5-40SE-UNV-L82765-W2A1-U-5700K

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°	1993	1993	1993
5°	1998	1992	1989
10°	1984	1984	1986
15°	1960	1970	1985
20°	1928	1951	1972
25°	1888	1924	1956
30°	1839	1892	1942
35°	1787	1861	1927
40°	1733	1825	1919
45°	1674	1790	1925
50°	1615	1760	1936
55°	1556	1749	1956
60°	1485	1738	1995
65°	1408	1739	2061
70°	1302	1768	2171
75°	1164	1848	2065
80°	974	1769	1892
85°	736	1360	1294



TEST NUMBER: P260817

CATALOG NUMBER: 24CZ-LD5-40SE-UNV-L82765-W2A1-U-5700K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	139.9	3.3
10°-20°	398.3	9.4
20°-30°	595.5	14.1
30°-40°	706.4	16.7
40°-50°	727.1	17.2
50°-60°	667.0	15.8
60°-70°	539.3	12.8
70°-80°	350.0	8.3
80°-90°	96.5	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°	1133.7	26.9
0°-40°	1840.1	43.6
0°-60°	3234.2	76.6
0°-90°	4220.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4220.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1481	1481	1481	1481	1481	
5°	1480	1469	1475	1474	1472	140
15°	1407	1402	1414	1420	1425	396
25°	1272	1273	1296	1308	1318	585
35°	1088	1097	1133	1157	1173	680
45°	880	894	941	985	1011	679
55°	663	683	746	806	834	592
65°	442	468	546	618	647	437
75°	224	266	355	397	397	238
85°	48	81	88	85	84	58
90°	0	0	0	0	0	



TEST NUMBER: P260817

CATALOG NUMBER: 24CZ-LD5-40SE-UNV-L82765-W2A1-U-5700K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1481.0	1481.0	1481.0	1481.0	1481.0
2.5°	1486.8	1475.2	1481.0	1479.6	1472.3
5°	1479.6	1469.4	1475.2	1473.8	1472.3
7.5°	1469.4	1459.3	1466.6	1465.1	1466.6
10°	1452.1	1443.4	1452.1	1453.5	1453.5
12.5°	1430.4	1423.2	1434.8	1437.7	1440.5
15°	1407.3	1401.5	1414.5	1420.3	1424.7
17.5°	1378.4	1374.1	1390.0	1397.2	1403.0
20°	1346.6	1345.2	1362.5	1369.7	1377.0
22.5°	1310.5	1310.5	1330.7	1339.4	1349.5
25°	1271.5	1272.9	1296.1	1307.6	1317.7
27.5°	1229.6	1231.0	1258.5	1272.9	1284.5
30°	1183.4	1189.1	1218.0	1236.8	1249.8
32.5°	1137.1	1144.3	1176.1	1197.8	1212.3
35°	1088.0	1096.7	1132.8	1157.3	1173.2
37.5°	1037.4	1047.5	1086.5	1114.0	1132.8
40°	986.9	998.4	1038.9	1070.7	1092.3
42.5°	933.4	946.4	991.2	1028.8	1051.9
45°	879.9	894.4	940.6	985.4	1011.4
47.5°	826.5	843.8	892.9	942.1	969.5
50°	771.6	788.9	840.9	897.3	924.7
52.5°	716.7	736.9	794.7	852.5	879.9
55°	663.2	683.4	745.6	806.2	833.7
57.5°	608.3	628.5	696.4	760.0	787.5
60°	551.9	575.1	645.9	710.9	741.2
62.5°	497.0	521.6	596.7	666.1	695.0
65°	442.1	468.1	546.2	618.4	647.3
67.5°	385.8	416.1	497.0	570.7	601.1
70°	330.9	364.1	449.4	523.0	551.9
72.5°	277.4	313.5	401.7	476.8	494.1
75°	224.0	265.9	355.4	397.3	397.3
77.5°	173.4	219.6	303.4	319.3	328.0
80°	125.7	176.3	228.3	247.1	244.2
82.5°	83.8	134.4	163.3	163.3	158.9
85°	47.7	80.9	88.1	85.2	83.8
87.5°	20.2	30.3	27.5	21.7	18.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)