

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: P230850

Luminaire Tested: **22CZ-LD5-29-RDP-UNV-L940-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P230850
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25714)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ-LD5-29-RDP-UNV-L940-CD1-U
Description: CRUZE 2x2 LED TROFFER
WITH RDP LENS
Light Source: (84) 4000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1684.0 lumens
Efficiency: N/A
Efficacy: 71.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.28 / 1.36
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

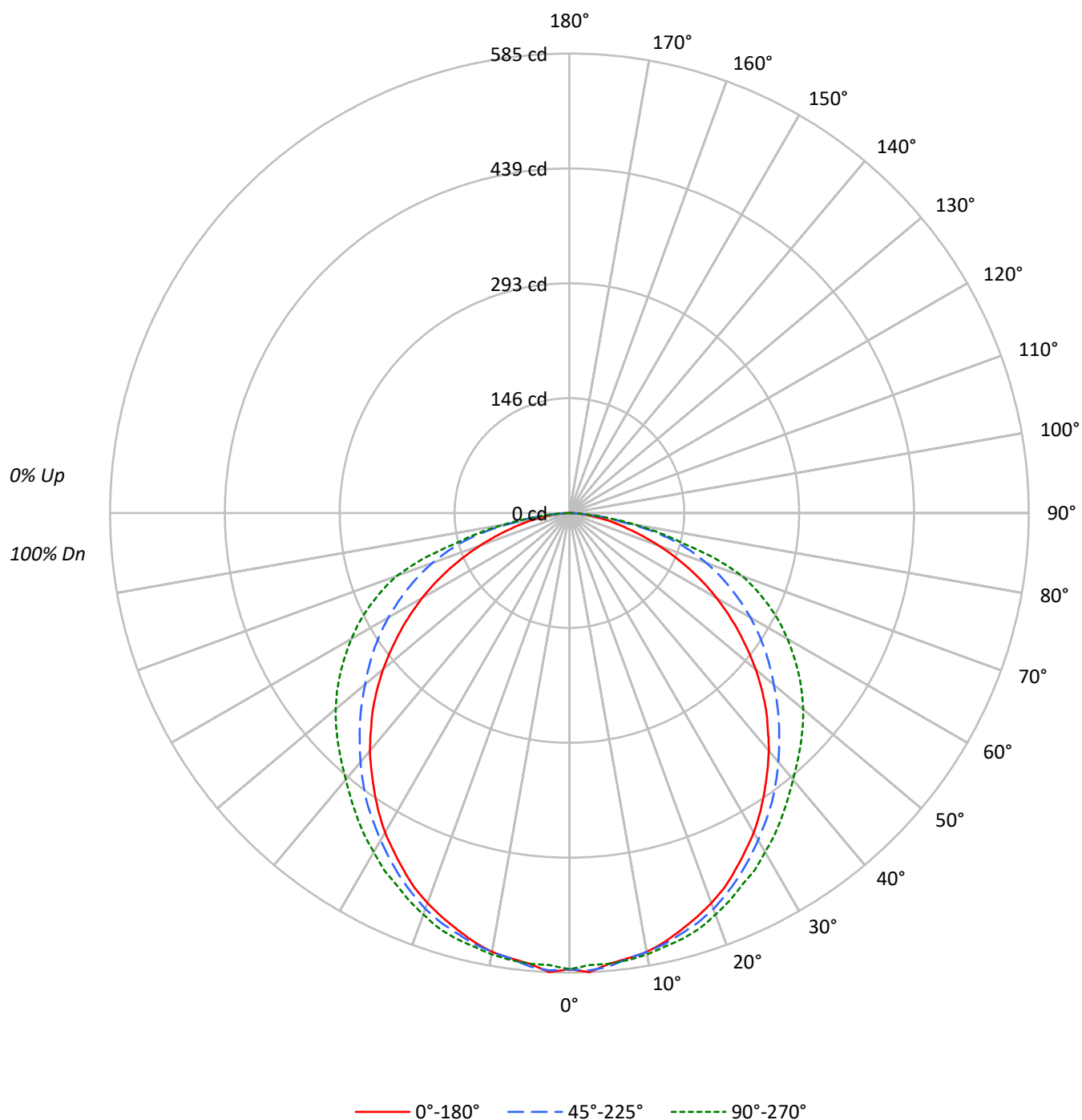
Input Watts (W): 23.5
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P230850

CATALOG NUMBER: 22CZ-LD5-29-RDP-UNV-L940-CD1-U

Luminous Intensity Polar Plot





TEST NUMBER: P230850

CATALOG NUMBER: 22CZ-LD5-29-RDP-UNV-L940-CD1-U

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					10
RW	70	50	30	10	70	50	30	10		50	30	10		50	30	10		50	30	10
RCR																				
0	119	119	119	119	116	116	116	116		111	111	111		106	106	106		102	102	102
1	108	104	99	95	106	101	97	94		97	94	91		93	90	88		89	87	85
2	98	90	83	77	96	88	81	76		84	79	74		81	77	73		78	74	71
3	89	79	70	64	87	77	69	63		74	67	62		71	66	61		69	64	60
4	82	69	60	54	79	68	60	53		66	58	52		63	57	52		61	56	51
5	75	62	53	46	73	61	52	46		59	51	45		57	50	45		55	49	44
6	69	56	47	40	67	55	46	40		53	45	40		51	44	39		50	44	39
7	64	50	42	35	62	50	41	35		48	40	35		47	40	35		45	39	34
8	60	46	37	31	58	45	37	31		44	37	31		43	36	31		42	35	31
9	56	42	34	28	54	42	34	28		40	33	28		39	33	28		38	32	28
10	52	39	31	26	51	38	31	26		37	30	25		36	30	25		36	30	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1562	1562	1562
5°	1556	1565	1556
10°	1550	1550	1559
15°	1531	1543	1562
20°	1513	1536	1558
25°	1487	1516	1549
30°	1459	1494	1549
35°	1422	1477	1550
40°	1388	1455	1556
45°	1348	1436	1584
50°	1297	1422	1626
55°	1234	1427	1672
60°	1165	1434	1727
65°	1074	1442	1789
70°	952	1459	1843
75°	808	1455	1570
80°	671	1170	1308
85°	584	787	753



TEST NUMBER: P230850

CATALOG NUMBER: 22CZ-LD5-29-RDP-UNV-L940-CD1-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	54.9	3.3
10°-20°	156.5	9.3
20°-30°	235.4	14.0
30°-40°	282.1	16.8
40°-50°	294.2	17.5
50°-60°	273.9	16.3
60°-70°	222.4	13.2
70°-80°	134.0	8.0
80°-90°	30.7	1.8
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°	446.7	26.5
0°-40°	728.8	43.3
0°-60°	1296.9	77.0
0°-90°	1684.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1684.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	581	581	581	581	581	
5°	576	576	580	581	576	55
15°	550	552	554	557	561	155
25°	501	504	511	517	522	231
35°	433	438	450	463	472	271
45°	354	361	377	402	416	273
55°	263	274	304	338	356	235
65°	169	186	226	262	281	167
75°	78	103	140	149	151	84
85°	19	23	26	24	24	22
90°	0	0	0	0	0	



TEST NUMBER: P230850

CATALOG NUMBER: 22CZ-LD5-29-RDP-UNV-L940-CD1-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	580.6	580.6	580.6	580.6	580.6
2.5°	585.0	583.9	582.8	579.5	576.1
5°	576.1	576.1	579.5	580.6	576.1
7.5°	571.7	571.7	571.7	576.1	573.9
10°	567.3	567.3	567.3	570.6	570.6
12.5°	559.5	560.6	561.7	562.8	565.0
15°	549.5	551.7	553.9	557.3	560.6
17.5°	539.5	541.7	546.2	549.5	553.9
20°	528.4	530.6	536.2	539.5	543.9
22.5°	516.2	517.3	524.0	528.4	534.0
25°	500.7	504.0	510.6	517.3	521.7
27.5°	485.1	488.4	496.2	505.1	511.8
30°	469.6	472.9	480.7	491.8	498.4
32.5°	451.8	456.2	465.1	478.5	486.2
35°	432.9	438.5	449.6	462.9	471.8
37.5°	414.1	419.6	431.8	448.5	457.4
40°	395.2	400.7	414.1	431.8	442.9
42.5°	374.1	380.8	395.2	416.3	429.6
45°	354.1	360.8	377.4	401.9	416.3
47.5°	331.9	339.7	358.6	386.3	403.0
50°	309.7	318.6	339.7	370.8	388.5
52.5°	286.4	296.4	321.9	354.1	373.0
55°	263.1	274.2	304.2	337.5	356.3
57.5°	239.8	252.0	285.3	319.7	338.6
60°	216.5	229.8	266.4	301.9	320.8
62.5°	193.2	207.6	246.4	282.0	301.9
65°	168.7	186.5	226.5	262.0	280.9
67.5°	144.3	165.4	206.5	240.9	258.7
70°	121.0	144.3	185.4	217.6	234.2
72.5°	98.8	123.2	163.2	190.9	197.6
75°	77.7	103.2	139.9	148.8	151.0
77.5°	59.9	83.3	111.0	113.2	118.8
80°	43.3	63.3	75.5	82.1	84.4
82.5°	30.0	43.3	50.0	51.1	52.2
85°	18.9	23.3	25.5	24.4	24.4
87.5°	10.0	8.9	7.8	5.6	4.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)