

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: P230416

Luminaire Tested: **24CZ-LD5-65-SQP-UNV-L930-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P230416
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25695)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ-LD5-65-SQP-UNV-L930-CD1-U
Description: CRUZE 2x4 LED TROFFER
WITH SQP LENS
Light Source: (168) 3000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3764.9 lumens
Efficiency: N/A
Efficacy: 65.3 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.31 / 1.42
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

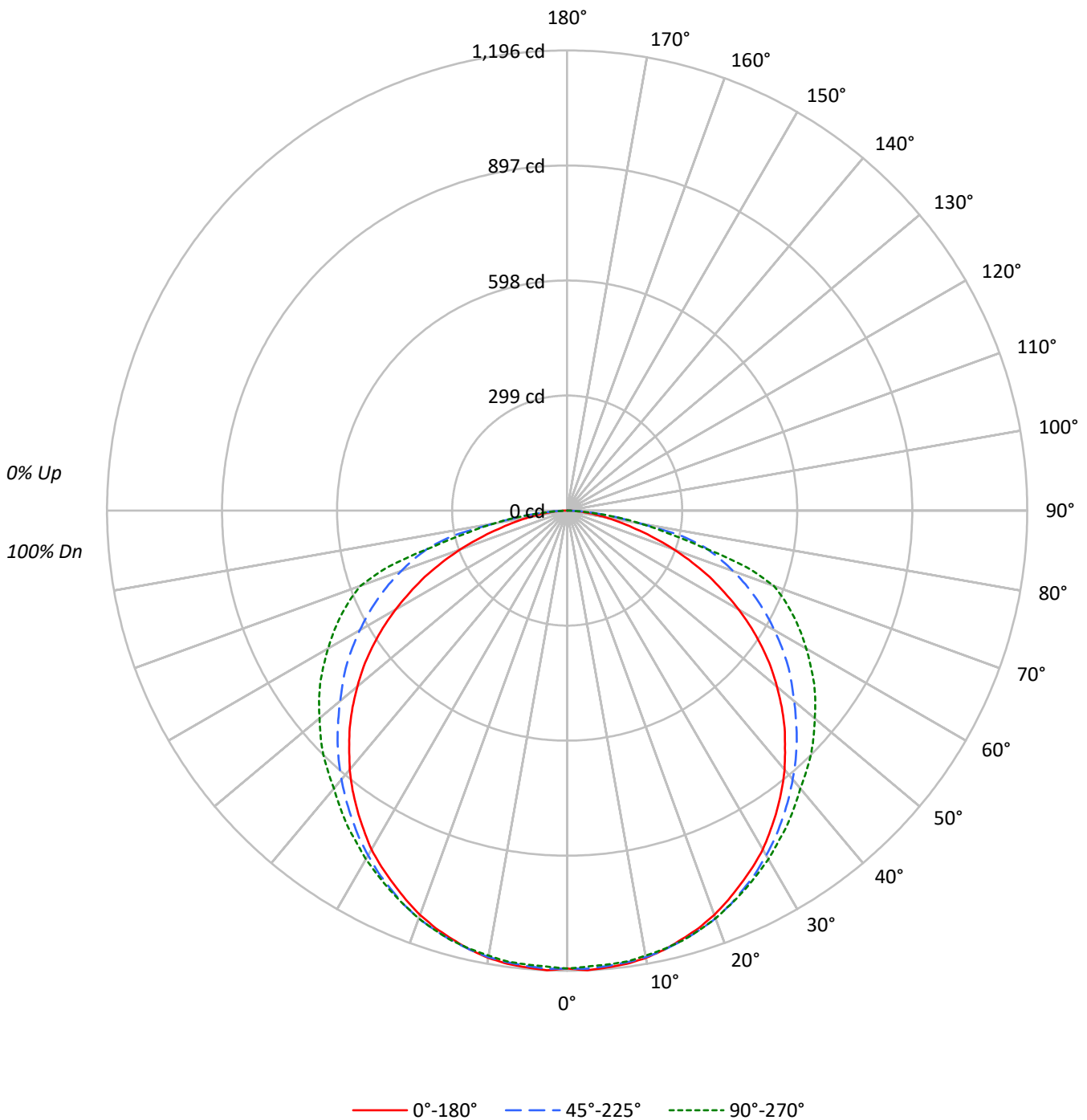
Input Watts (W): 57.64
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	108	103	98	94	105	101	97	93	96	93	90		92	90	87		89	87	84	82
2	98	89	82	76	95	87	80	75	83	78	73		80	75	71		77	73	70	67
3	89	78	69	62	86	76	68	62	73	66	60		70	64	59		67	63	58	56
4	81	68	59	52	79	67	58	52	64	57	51		62	56	50		60	54	50	47
5	74	61	51	45	72	60	51	44	57	50	44		55	49	43		54	48	43	41
6	68	55	45	39	66	54	45	38	52	44	38		50	43	38		48	42	37	35
7	63	49	40	34	62	49	40	34	47	39	34		45	39	33		44	38	33	31
8	59	45	36	30	57	44	36	30	43	35	30		42	35	30		40	34	29	28
9	55	41	33	27	54	41	33	27	39	32	27		38	32	27		37	31	27	25
10	51	38	30	24	50	37	30	24	36	29	24		35	29	24		35	28	24	22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1601	1601	1601
5°	1610	1605	1600
10°	1613	1610	1605
15°	1606	1612	1612
20°	1601	1615	1615
25°	1588	1611	1617
30°	1580	1607	1625
35°	1562	1603	1639
40°	1544	1602	1657
45°	1521	1606	1706
50°	1490	1612	1759
55°	1451	1642	1838
60°	1387	1675	1931
65°	1300	1727	2068
70°	1163	1805	2249
75°	960	1931	1860
80°	783	1492	1507
85°	630	991	931



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	113.0	3.0
10°-20°	326.2	8.7
20°-30°	498.5	13.2
30°-40°	609.7	16.2
40°-50°	652.4	17.3
50°-60°	624.7	16.6
60°-70°	528.4	14.0
70°-80°	335.0	8.9
80°-90°	77.1	2.0
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°	937.7	24.9
0°-40°	1547.4	41.1
0°-60°	2824.4	75.0
0°-90°	3764.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3764.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1190	1190	1190	1190	1190	
5°	1192	1186	1188	1186	1184	113
15°	1153	1151	1157	1157	1157	326
25°	1070	1070	1085	1089	1089	493
35°	951	957	976	990	998	595
45°	799	813	844	879	896	616
55°	618	638	700	758	784	552
65°	408	447	543	616	650	402
75°	185	261	371	370	358	201
85°	41	62	64	58	60	49
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1190.1	1190.1	1190.1	1190.1	1190.1
2.5°	1196.0	1190.1	1192.1	1190.1	1186.3
5°	1192.1	1186.3	1188.2	1186.3	1184.3
7.5°	1188.2	1182.4	1184.3	1182.4	1182.4
10°	1180.4	1174.6	1178.5	1176.5	1174.6
12.5°	1168.8	1164.9	1168.8	1166.8	1166.8
15°	1153.2	1151.2	1157.1	1157.1	1157.1
17.5°	1137.6	1135.7	1143.5	1143.5	1143.5
20°	1118.2	1116.2	1127.9	1127.9	1127.9
22.5°	1094.9	1092.9	1108.5	1108.5	1108.5
25°	1069.6	1069.6	1085.1	1089.0	1089.0
27.5°	1044.3	1044.3	1061.8	1067.6	1067.6
30°	1017.1	1017.1	1034.6	1042.3	1046.2
32.5°	984.0	987.9	1007.3	1017.1	1021.0
35°	950.9	956.8	976.2	989.8	997.6
37.5°	915.9	921.8	945.1	960.7	970.4
40°	879.0	886.8	912.1	931.5	943.2
42.5°	838.2	849.8	879.0	904.3	919.8
45°	799.3	812.9	844.0	879.0	896.5
47.5°	756.5	772.0	807.0	851.8	869.3
50°	711.8	727.3	770.1	820.7	840.1
52.5°	667.0	684.5	735.1	789.5	812.9
55°	618.4	637.9	700.1	758.4	783.7
57.5°	567.8	591.2	661.2	723.4	750.6
60°	515.3	544.5	622.3	688.4	717.6
62.5°	460.9	495.9	583.4	653.4	684.5
65°	408.4	447.3	542.6	616.5	649.5
67.5°	352.0	400.6	501.7	581.5	612.6
70°	295.6	352.0	458.9	540.6	571.7
72.5°	239.2	307.3	416.2	490.1	490.1
75°	184.7	260.6	371.4	369.5	357.8
77.5°	140.0	217.8	305.3	260.6	262.5
80°	101.1	175.0	192.5	192.5	194.5
82.5°	68.1	134.2	124.5	122.5	126.4
85°	40.8	62.2	64.2	58.3	60.3
87.5°	19.4	21.4	17.5	11.7	11.7
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)