

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: P263152

Luminaire Tested: **24CZ-LD5-35-SQP-UNV-L93050-W2A1-U-3000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P263152  
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-LD5-35-SQP-UNV-L93050-W2A1-U-3000K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER  
WITH SQP LENS  
Light Source: (336) 90 CRI LEDS TUNED AT 3000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1812.4 lumens  
Efficiency: N/A  
Efficacy: 73.3 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

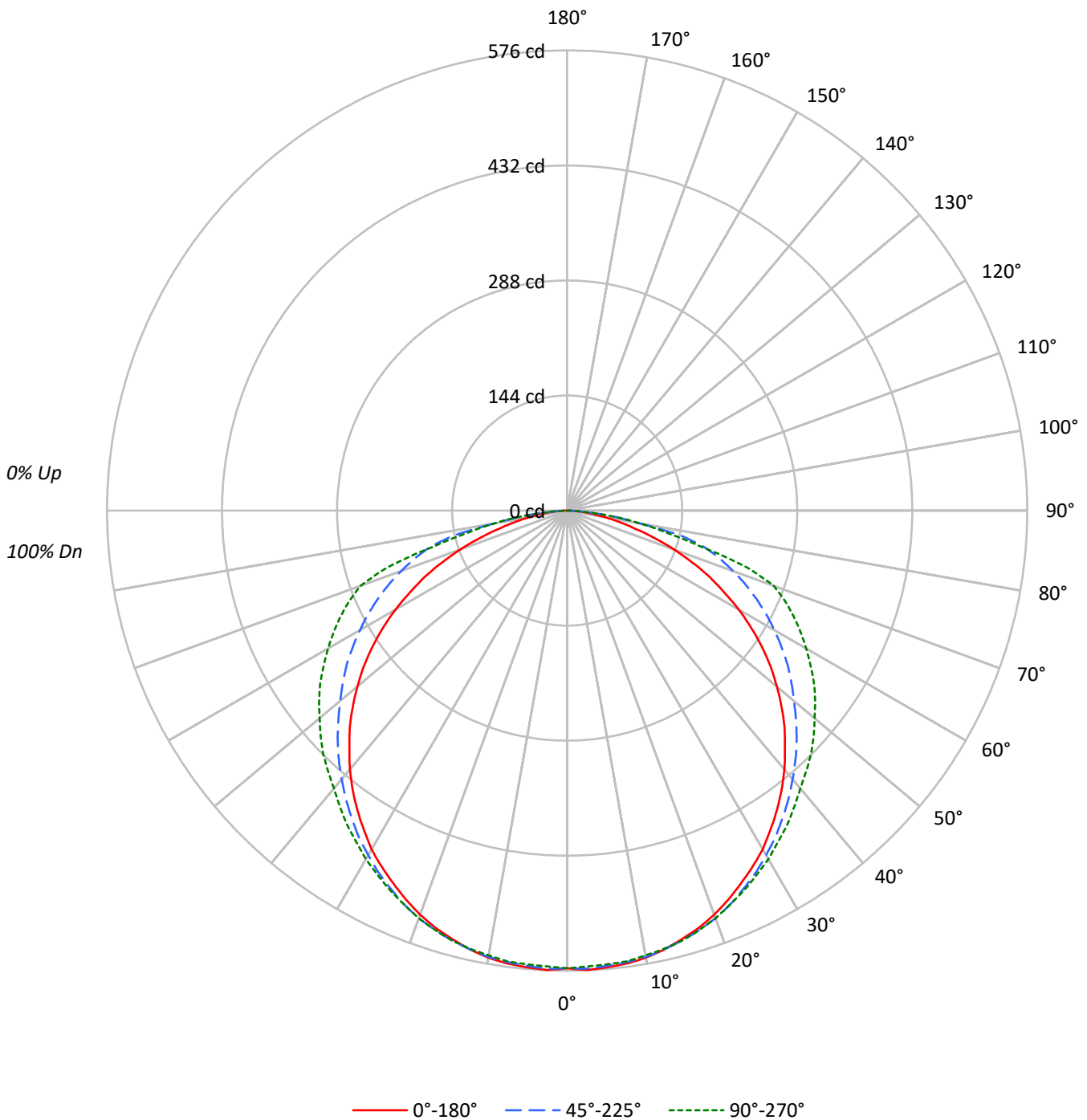
Input Watts (W): 24.73614  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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°	771	771	771
5°	775	773	770
10°	776	775	772
15°	773	776	776
20°	771	777	777
25°	764	776	778
30°	761	774	783
35°	752	772	789
40°	743	771	797
45°	732	773	821
50°	717	776	846
55°	698	791	885
60°	668	806	929
65°	626	832	996
70°	560	869	1083
75°	462	930	896
80°	377	718	725
85°	304	477	448



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	54.4	3.0
10°-20°	157.0	8.7
20°-30°	240.0	13.2
30°-40°	293.5	16.2
40°-50°	314.0	17.3
50°-60°	300.7	16.6
60°-70°	254.4	14.0
70°-80°	161.2	8.9
80°-90°	37.1	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°	451.4	24.9
0°-40°	744.9	41.1
0°-60°	1359.7	75.0
0°-90°	1812.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1812.4	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	573	573	573	573	573	
5°	574	571	572	571	570	55
15°	555	554	557	557	557	157
25°	515	515	522	524	524	238
35°	458	461	470	476	480	286
45°	385	391	406	423	432	296
55°	298	307	337	365	377	266
65°	197	215	261	297	313	194
75°	89	125	179	178	172	97
85°	20	30	31	28	29	23
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	572.9	572.9	572.9	572.9	572.9
2.5°	575.7	572.9	573.9	572.9	571.1
5°	573.9	571.1	572.0	571.1	570.1
7.5°	572.0	569.2	570.1	569.2	569.2
10°	568.3	565.4	567.3	566.4	565.4
12.5°	562.6	560.8	562.6	561.7	561.7
15°	555.2	554.2	557.0	557.0	557.0
17.5°	547.7	546.7	550.5	550.5	550.5
20°	538.3	537.4	543.0	543.0	543.0
22.5°	527.1	526.1	533.6	533.6	533.6
25°	514.9	514.9	522.4	524.3	524.3
27.5°	502.7	502.7	511.1	514.0	514.0
30°	489.6	489.6	498.0	501.8	503.7
32.5°	473.7	475.6	484.9	489.6	491.5
35°	457.8	460.6	470.0	476.5	480.3
37.5°	440.9	443.7	455.0	462.5	467.1
40°	423.1	426.9	439.1	448.4	454.0
42.5°	403.5	409.1	423.1	435.3	442.8
45°	384.8	391.3	406.3	423.1	431.6
47.5°	364.2	371.7	388.5	410.0	418.5
50°	342.6	350.1	370.7	395.1	404.4
52.5°	321.1	329.5	353.9	380.1	391.3
55°	297.7	307.1	337.0	365.1	377.3
57.5°	273.4	284.6	318.3	348.3	361.4
60°	248.1	262.1	299.6	331.4	345.4
62.5°	221.9	238.7	280.9	314.6	329.5
65°	196.6	215.3	261.2	296.8	312.7
67.5°	169.4	192.9	241.5	279.9	294.9
70°	142.3	169.4	220.9	260.3	275.2
72.5°	115.1	147.9	200.3	235.9	235.9
75°	88.9	125.4	178.8	177.9	172.3
77.5°	67.4	104.9	147.0	125.4	126.4
80°	48.7	84.3	92.7	92.7	93.6
82.5°	32.8	64.6	59.9	59.0	60.9
85°	19.7	30.0	30.9	28.1	29.0
87.5°	9.4	10.3	8.4	5.6	5.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)