

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: P295692

Luminaire Tested: **14RLN-LD5-35-RDP-UNV-L83050-W2A1-U-5000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P295692  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P36061-R2)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14RLN-LD5-35-RDP-UNV-L83050-W2A1-U-5000K  
Description: RLN LED 1x4 TUNABLE WHITE TROFFER  
WITH RDP LENS  
Light Source: (168) 80 CRI LEDS TUNED TO 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3206.0 lumens  
Efficiency: N/A  
Efficacy: 91.0 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.35 / 1.39  
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')  
CIE Type: Direct

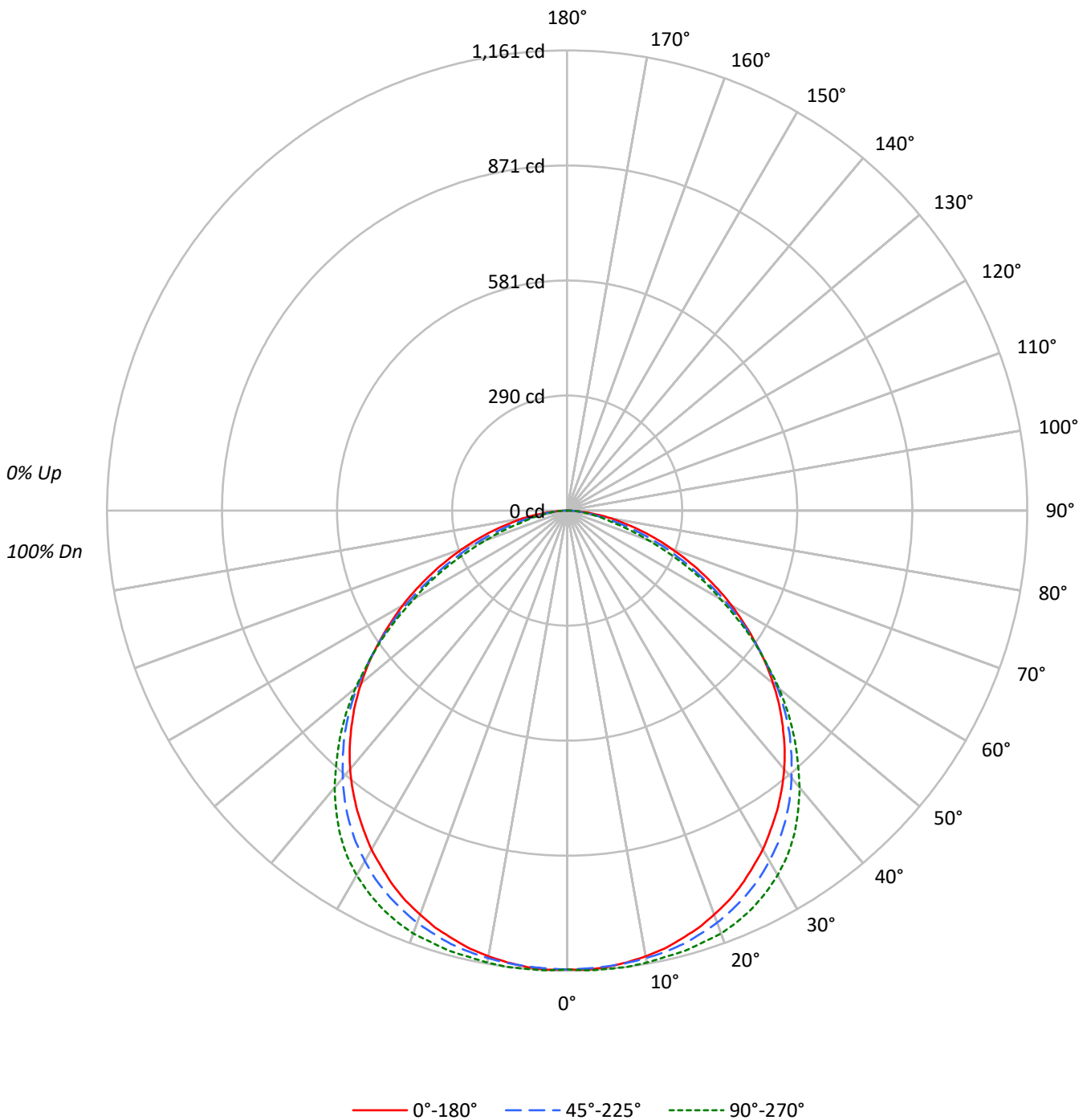
Input Watts (W): 35.247  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P295692

CATALOG NUMBER: 14RLN-LD5-35-RDP-UNV-L83050-W2A1-U-5000K

### Luminous Intensity Polar Plot





TEST NUMBER: P295692

CATALOG NUMBER: 14RLN-LD5-35-RDP-UNV-L83050-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	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					100			
1	109	105	101	97	107	103	99	96	98	95	93	94	92	90	91	89	87	85					85			
2	100	92	85	80	97	90	84	79	87	81	77	83	79	75	80	77	74	72					72			
3	91	81	73	67	89	79	72	66	77	70	65	74	68	64	71	67	63	61					61			
4	84	72	63	57	81	71	63	57	68	61	56	66	60	55	64	59	54	52					52			
5	77	64	56	49	75	63	55	49	61	54	48	59	53	48	57	52	47	45					45			
6	71	58	49	43	69	57	49	43	55	48	42	54	47	42	52	46	42	40					40			
7	66	53	44	38	64	52	44	38	50	43	38	49	42	37	48	42	37	35					35			
8	61	48	40	34	60	47	39	34	46	39	34	45	38	33	44	38	33	31					31			
9	57	44	36	30	56	44	36	30	42	35	30	41	35	30	40	34	30	28					28			
10	54	41	33	28	53	40	33	28	39	32	27	38	32	27	37	31	27	25					25			

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

	0°	45°	90°
0°	3116	3116	3116
5°	3123	3119	3136
10°	3120	3133	3164
15°	3115	3154	3203
20°	3106	3170	3252
25°	3092	3178	3286
30°	3068	3172	3301
35°	3034	3149	3280
40°	2993	3094	3205
45°	2927	3018	3085
50°	2840	2894	2920
55°	2720	2712	2697
60°	2580	2494	2400
65°	2403	2231	2110
70°	2193	1954	1704
75°	1970	1623	1275
80°	1753	1184	1111
85°	1377	985	985



TEST NUMBER: P295692

CATALOG NUMBER: 14RLN-LD5-35-RDP-UNV-L83050-W2A1-U-5000K

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	110.2	3.4
10°-20°	320.3	10.0
20°-30°	494.3	15.4
30°-40°	599.5	18.7
40°-50°	608.7	19.0
50°-60°	514.9	16.1
60°-70°	348.4	10.9
70°-80°	168.5	5.3
80°-90°	41.1	1.3
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°	924.8	28.8
0°-40°	1524.4	47.5
0°-60°	2648.0	82.6
0°-90°	3206.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3206.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1158	1158	1158	1158	1158	
5°	1156	1156	1155	1159	1161	110
15°	1118	1124	1132	1145	1150	316
25°	1042	1050	1070	1097	1107	480
35°	924	933	959	989	998	577
45°	769	771	793	809	811	593
55°	580	575	578	578	575	518
65°	377	362	350	336	331	374
75°	190	175	156	135	123	202
85°	45	35	32	32	32	52
90°	0	0	0	0	0	



TEST NUMBER: P295692

CATALOG NUMBER: 14RLN-LD5-35-RDP-UNV-L83050-W2A1-U-5000K

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1157.8	1157.8	1157.8	1157.8	1157.8
2.5°	1159.4	1159.4	1156.2	1159.4	1161.0
5°	1156.2	1156.2	1154.6	1159.4	1161.0
7.5°	1149.8	1151.4	1151.4	1157.8	1161.0
10°	1141.9	1145.1	1146.7	1156.2	1157.8
12.5°	1132.3	1135.5	1140.3	1151.4	1153.0
15°	1118.0	1124.4	1132.3	1145.1	1149.8
17.5°	1103.7	1110.0	1119.6	1137.1	1141.9
20°	1084.5	1092.5	1106.8	1127.5	1135.5
22.5°	1065.4	1071.8	1089.3	1114.8	1122.8
25°	1041.5	1049.5	1070.2	1097.3	1106.8
27.5°	1014.5	1025.6	1047.9	1076.6	1086.1
30°	987.4	997.0	1020.8	1052.7	1062.2
32.5°	955.5	965.1	992.2	1022.4	1033.6
35°	923.7	933.3	958.7	989.0	998.5
37.5°	888.7	895.0	922.1	947.6	957.1
40°	852.0	856.8	880.7	906.2	912.5
42.5°	812.2	815.4	837.7	860.0	861.6
45°	769.2	770.8	793.1	809.0	810.6
47.5°	726.2	724.6	743.7	754.9	756.5
50°	678.4	678.4	691.2	697.5	697.5
52.5°	630.7	627.5	633.8	638.6	633.8
55°	579.7	574.9	578.1	578.1	574.9
57.5°	528.7	519.2	520.8	517.6	509.6
60°	479.4	468.2	463.4	452.3	445.9
62.5°	428.4	415.7	406.1	393.4	391.8
65°	377.4	361.5	350.4	336.0	331.3
67.5°	328.1	313.7	297.8	281.9	272.3
70°	278.7	262.8	248.4	227.7	216.6
72.5°	234.1	219.8	202.3	178.4	170.4
75°	189.5	175.2	156.1	135.4	122.6
77.5°	146.5	135.4	114.7	97.1	95.6
80°	113.1	100.3	76.4	71.7	71.7
82.5°	73.3	65.3	54.1	51.0	51.0
85°	44.6	35.0	31.9	31.9	31.9
87.5°	17.5	15.9	15.9	15.9	15.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)