

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: io LED

Report Number: P397424

Luminaire Tested: **VRVT4S-LD5-12-PC-LA59-CD2-U**

Issue Date: 3/3/2020



Test Information

Test Method: LM-79-08
Report Number: P397424
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1801-511-6)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: VRVT4S-LD5-12-PC-LA59-CD2-U
Description:
Light Source: -
Ballast/Driver: -

Summary

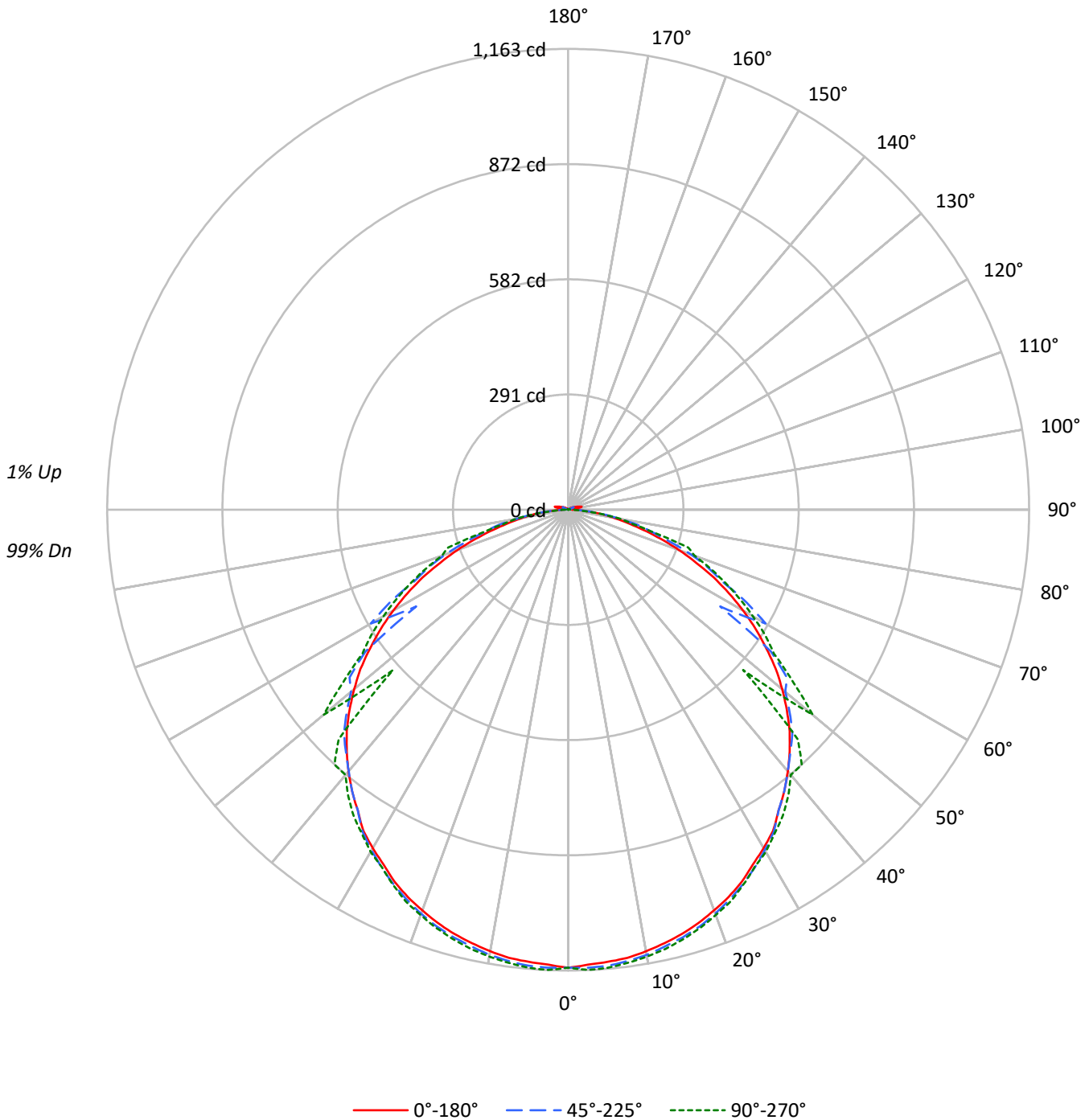
Lumens per Lamp: N/A
Luminaire Lumens: 3401.7 lumens
Efficiency: N/A
Efficacy: 26.5 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.28 / 1.4
Luminous Opening: Rectangular w/ Sides (W: 1.08' x L: 2.08' x H: 0.25')
CIE Type: Direct

Input Watts (W): 128.4
Input Voltage (V): NR
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		101	101	101	99
1	108	104	99	95	106	101	97	94	97	94	91		93	90	88		89	87	85	83
2	99	90	83	78	96	88	82	77	85	79	75		81	77	73		78	74	71	69
3	90	79	71	64	87	77	70	64	74	68	62		71	66	61		69	64	60	58
4	82	70	61	54	80	69	60	54	66	59	53		63	57	52		61	56	51	49
5	75	62	53	47	73	61	53	46	59	52	46		57	50	45		55	49	45	42
6	70	56	47	41	68	55	47	40	53	46	40		51	45	40		50	44	39	37
7	64	51	42	36	63	50	42	36	48	41	35		47	40	35		45	39	35	33
8	60	46	38	32	58	46	37	32	44	37	32		43	36	31		42	36	31	29
9	56	43	34	29	55	42	34	29	41	33	28		40	33	28		38	32	28	26
10	53	39	31	26	51	39	31	26	38	31	26		37	30	26		36	30	25	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5516	5516	5516
5°	5430	5416	5447
10°	5370	5296	5332
15°	5306	5174	5220
20°	5235	5053	5098
25°	5165	4922	4966
30°	5081	4782	4847
35°	4976	4594	4732
40°	4878	4441	4559
45°	4759	4323	4489
50°	4576	4096	4688
55°	4331	3835	3965
60°	4031	3834	3670
65°	3636	3158	3306
70°	3122	2729	2891
75°	2484	2100	2217
80°	1898	1494	1579
85°	1209	764	670



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	109.7	3.2
10°-20°	315.3	9.3
20°-30°	480.1	14.1
30°-40°	584.2	17.2
40°-50°	608.4	17.9
50°-60°	556.1	16.3
60°-70°	423.5	12.4
70°-80°	229.9	6.8
80°-90°	63.3	1.9
90°-100°	8.1	0.2
100°-110°	11.0	0.3
110°-120°	7.4	0.2
120°-130°	2.8	0.1
130°-140°	1.1	0.0
140°-150°	0.3	0.0
150°-160°	0.2	0.0
160°-170°	0.2	0.0
170°-180°	0.1	0.0
0°-30°	905.1	26.6
0°-40°	1489.3	43.8
0°-60°	2653.8	78.0
0°-90°	3370.5	99.1
90°-120°	26.5	0.8
90°-150°	30.8	0.9
90°-180°	31.0	0.9
0°-180°	3401.7	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1156	1156	1156	1156	1156	
5°	1146	1150	1155	1160	1160	109
15°	1109	1114	1117	1121	1122	313
25°	1036	1041	1043	1045	1045	477
35°	926	932	926	937	944	581
45°	790	792	800	838	819	608
55°	610	612	624	666	634	545
65°	405	417	428	437	438	399
75°	195	217	219	224	224	210
85°	52	57	54	44	44	56
90°	10	15	14	13	12	7
95°	8	7	7	4	4	12
105°	30	39	4	4	4	31
115°	16	10	15	2	2	16
125°	7	5	2	0	1	6
135°	3	2	1	0	0	2
145°	1	0	0	0	0	1
155°	0	0	0	0	0	0
165°	1	1	1	1	1	0
175°	1	1	1	1	1	0
180°	1	1	1	1	1	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1156.0	1156.0	1156.0	1156.0	1156.0
2.5°	1149.4	1153.0	1156.9	1161.0	1162.6
5°	1145.5	1150.3	1155.3	1159.6	1160.1
7.5°	1140.8	1145.5	1149.0	1152.6	1153.7
10°	1131.7	1138.5	1140.8	1143.3	1145.3
12.5°	1120.6	1126.9	1129.0	1134.0	1135.1
15°	1108.6	1113.8	1117.0	1121.3	1122.0
17.5°	1093.8	1099.1	1102.7	1105.2	1106.8
20°	1076.1	1080.4	1085.0	1086.8	1088.4
22.5°	1057.8	1060.5	1064.8	1067.8	1070.5
25°	1036.0	1041.2	1043.0	1044.8	1044.8
27.5°	1009.2	1016.9	1018.3	1015.6	1017.8
30°	986.1	991.3	992.2	989.0	997.0
32.5°	961.6	961.8	964.5	963.8	969.1
35°	926.0	932.5	925.7	937.1	943.7
37.5°	895.6	901.0	895.4	912.6	911.5
40°	862.0	867.2	861.5	876.3	873.8
42.5°	826.8	831.4	830.0	836.8	872.4
45°	789.9	791.7	799.6	837.5	818.9
47.5°	748.1	749.7	758.1	744.5	598.9
50°	704.6	706.2	715.0	562.6	805.3
52.5°	660.5	658.3	695.5	756.5	716.1
55°	609.8	611.6	624.3	666.5	633.8
57.5°	561.0	565.1	454.6	586.4	589.6
60°	510.2	517.7	574.4	536.7	538.3
62.5°	457.5	470.2	507.9	487.3	488.9
65°	404.9	417.2	428.5	437.4	437.8
67.5°	348.9	367.7	382.2	378.8	388.1
70°	297.6	289.0	328.9	327.8	338.7
72.5°	244.5	265.6	270.2	234.6	317.8
75°	195.1	216.9	219.4	223.9	223.9
77.5°	151.1	163.8	182.6	173.8	167.4
80°	116.1	119.8	130.9	135.0	132.7
82.5°	86.4	81.4	90.3	94.1	85.3
85°	52.4	56.9	53.5	44.5	44.5
87.5°	21.6	27.2	24.1	22.0	19.5
90°	10.4	15.0	14.1	12.9	12.5
92.5°	10.9	10.4	7.5	5.2	4.1
95°	8.4	6.8	7.3	4.1	3.9
97.5°	15.9	5.0	5.0	3.6	2.9
100°	29.5	4.3	4.5	3.6	2.5
102.5°	35.2	6.4	4.5	3.6	3.6
105°	30.2	39.0	3.9	4.1	3.6
107.5°	25.6	17.7	2.9	3.6	4.1
110°	21.6	12.5	2.5	3.4	3.9



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	18.1	9.3	2.5	2.5	3.4
115°	15.7	9.7	15.4	2.0	2.0
117.5°	13.2	15.4	6.8	1.6	2.0
120°	10.7	8.8	4.1	2.0	1.4
122.5°	8.4	6.6	2.7	0.7	1.4
125°	7.0	5.2	2.0	0.4	0.7
127.5°	5.7	4.3	1.4	0.4	0.4
130°	4.5	4.1	0.9	0.4	0.4
132.5°	3.9	2.9	2.5	0.4	0.4
135°	2.9	2.3	0.9	0.4	0.4
137.5°	2.3	1.8	0.7	0.4	0.4
140°	1.8	1.4	0.4	0.4	0.2
142.5°	1.4	0.9	0.4	0.4	0.2
145°	0.9	0.4	0.4	0.4	0.2
147.5°	0.7	0.4	0.4	0.4	0.4
150°	0.4	0.4	0.4	0.4	0.4
152.5°	0.4	0.4	0.4	0.4	0.4
155°	0.4	0.4	0.4	0.4	0.4
157.5°	0.4	0.4	0.4	0.4	0.4
160°	0.4	0.4	0.4	0.4	0.4
162.5°	0.7	0.7	0.7	0.7	0.4
165°	0.7	0.7	0.7	0.7	0.7
167.5°	0.7	0.7	0.7	0.7	0.7
170°	0.7	0.7	0.7	0.7	0.7
172.5°	0.7	0.7	0.7	0.7	0.7
175°	0.7	0.7	0.7	0.7	0.7
177.5°	0.7	0.7	0.7	0.7	0.7
180°	0.7	0.7	0.7	0.7	0.7

(END OF REPORT)