

Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: io LED

Report Number: P251882

Luminaire Tested: **LD4B50D010TE EU4B30508030 4LBDW1LI**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P251882
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1712-453-14)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: io LED
Catalog Number: LD4B50D010TE EU4B30508030 4LBDW1LI
Description: PORTFOLIO 4 INCH DOUBLE WALLWASH RECESSED DOWNLIGHT, WITH SPECULAR CLEAR TRIM
Light Source: (1) HIGH LUMEN LED 80CRI / 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4695.0 lumens
Efficiency: N/A
Efficacy: 79.9 lumens/watt
Spacing Criteria (0/90/45): 1.13 / 1.32 / 1.18
Luminous Opening: Circular (Dia: 7.42' x H: 0')
CIE Type: Direct

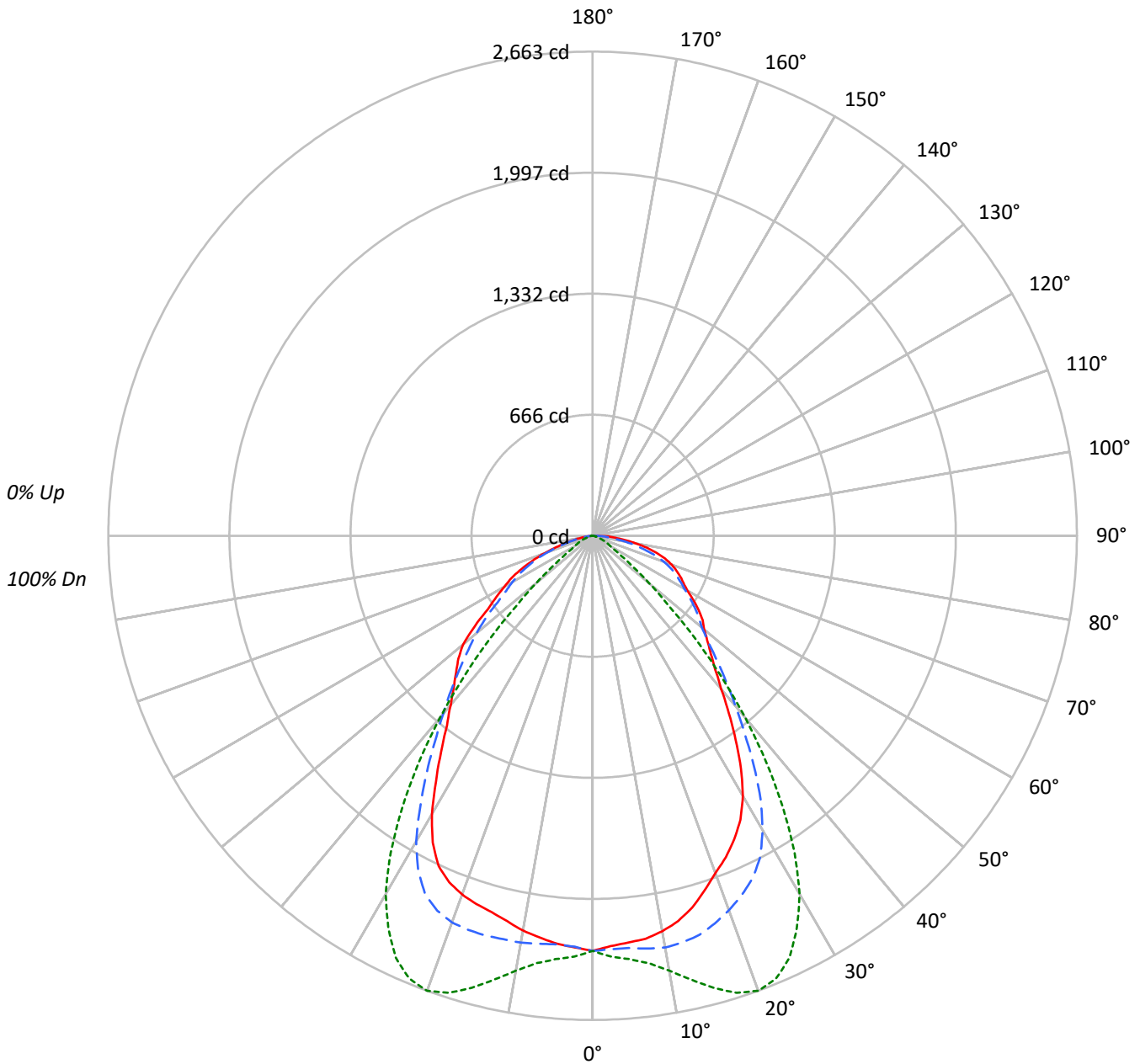
Input Watts (W): 58.77
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P251882

CATALOG NUMBER: LD4B50D010TE EU4B30508030 4LBDW1LI

Luminous Intensity Polar Plot





TEST NUMBER: P251882

CATALOG NUMBER: LD4B50D010TE EU4B30508030 4LBDW1LI

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20									
RC	80									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	0																
RCR																																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100																			
1	110	106	103	100	108	104	101	98	100	97	95	96	94	92	93	91	89	87																			
2	102	95	89	84	100	93	88	83	90	85	81	87	83	80	84	81	78	76																			
3	94	85	78	72	92	84	77	72	81	75	71	78	73	69	76	72	68	66																			
4	87	77	69	63	85	76	68	63	73	67	62	71	66	61	69	64	60	58																			
5	81	70	62	56	79	69	61	56	67	60	55	65	59	54	63	58	54	52																			
6	76	64	56	50	74	63	55	50	61	54	49	59	53	49	58	53	48	47																			
7	71	58	50	45	69	58	50	45	56	49	44	55	49	44	54	48	44	42																			
8	66	54	46	41	65	53	46	41	52	45	40	51	45	40	50	44	40	38																			
9	62	50	42	37	61	49	42	37	48	42	37	47	41	37	46	41	37	35																			
10	58	46	39	34	57	46	39	34	45	38	34	44	38	34	43	38	34	32																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	569	569	569
5°	562	585	563
10°	559	614	558
15°	546	664	553
20°	523	706	557
25°	506	704	551
30°	475	655	508
35°	417	555	442
40°	357	424	395
45°	324	278	374
50°	310	156	360
55°	309	84	305
60°	299	56	279
65°	314	46	254
70°	336	32	208
75°	353	23	144
80°	346	15	93
85°	359	10	0



TEST NUMBER: P251882

CATALOG NUMBER: LD4B50D010TE EU4B30508030 4LBDW1LI

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	218.6	4.7
10°-20°	654.2	13.9
20°-30°	997.9	21.3
30°-40°	996.0	21.2
40°-50°	734.5	15.6
50°-60°	501.8	10.7
60°-70°	354.3	7.5
70°-80°	189.2	4.0
80°-90°	48.6	1.0
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°	1870.7	39.8
0°-40°	2866.7	61.1
0°-60°	4103.0	87.4
0°-90°	4695.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4695.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	2283	2283	2283	2283	2283	
5°	2246	2276	2337	2256	2252	213
15°	2117	2273	2575	2276	2144	594
25°	1842	2079	2561	2178	2005	844
35°	1370	1547	1825	1591	1452	856
45°	919	963	790	1031	1062	717
55°	712	685	193	638	702	633
65°	533	505	78	390	431	527
75°	366	298	24	136	149	380
85°	126	81	3	17	0	139
90°	0	0	0	0	0	



TEST NUMBER: P251882

CATALOG NUMBER: LD4B50D010TE EU4B30508030 4LBDW1LI

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	2282.9	2282.9	2282.9	2282.9	2282.9	2282.9	2282.9	2282.9	2282.9
2.5°	2259.2	2272.7	2276.1	2299.9	2316.8	2296.5	2262.5	2262.5	2265.9
5°	2245.6	2262.5	2276.1	2316.8	2337.2	2303.2	2255.8	2249.0	2252.4
7.5°	2235.4	2259.2	2289.7	2350.7	2371.1	2327.0	2262.5	2235.4	2228.6
10°	2208.3	2242.2	2299.9	2388.1	2428.8	2374.5	2272.7	2221.8	2204.9
12.5°	2171.0	2211.7	2289.7	2428.8	2500.0	2418.6	2272.7	2198.1	2171.0
15°	2116.7	2160.8	2272.7	2462.7	2574.6	2466.1	2276.1	2174.3	2143.8
17.5°	2045.4	2099.7	2235.4	2479.6	2635.7	2510.2	2272.7	2157.4	2123.5
20°	1974.2	2038.7	2191.3	2479.6	2662.8	2527.1	2262.5	2140.4	2099.7
22.5°	1913.2	1977.6	2140.4	2449.1	2635.7	2506.8	2232.0	2109.9	2062.4
25°	1841.9	1909.8	2079.4	2384.7	2561.1	2445.7	2177.7	2048.8	2004.7
27.5°	1760.5	1835.1	1994.6	2282.9	2432.2	2333.8	2076.0	1950.5	1903.0
30°	1652.0	1719.8	1869.1	2137.0	2276.1	2181.1	1940.3	1811.4	1767.3
32.5°	1519.7	1580.7	1719.8	1960.6	2065.8	1987.8	1763.9	1655.4	1604.5
35°	1370.4	1424.7	1546.8	1736.8	1825.0	1777.5	1590.9	1489.1	1451.8
37.5°	1231.3	1272.0	1373.8	1512.9	1567.2	1536.6	1421.3	1346.7	1316.1
40°	1099.0	1139.8	1221.2	1289.0	1302.6	1312.8	1278.8	1231.3	1214.4
42.5°	997.3	1034.6	1085.5	1078.7	1038.0	1095.7	1149.9	1143.1	1129.6
45°	919.3	946.4	963.4	861.6	790.4	885.3	1031.2	1068.5	1061.7
47.5°	854.8	868.4	858.2	688.6	559.7	688.6	926.0	1000.7	1000.7
50°	800.5	810.7	783.6	573.3	403.7	552.9	834.5	915.9	929.4
52.5°	763.2	766.6	732.7	485.1	278.2	437.6	736.1	807.3	817.5
55°	712.3	715.7	685.2	420.6	193.4	346.0	637.7	702.2	702.2
57.5°	654.7	661.5	630.9	366.3	135.7	288.3	563.1	624.2	627.5
60°	600.4	603.8	583.4	325.6	111.9	247.6	508.8	559.7	559.7
62.5°	563.1	566.5	542.7	301.9	95.0	217.1	451.2	498.6	502.0
65°	532.6	532.6	505.4	278.2	78.0	183.2	390.1	430.8	430.8
67.5°	498.6	491.9	464.7	247.6	61.1	149.3	329.0	359.6	356.2
70°	461.3	451.2	417.2	213.7	44.1	118.7	257.8	281.5	284.9
72.5°	417.2	403.7	359.6	176.4	33.9	88.2	190.0	210.3	210.3
75°	366.3	349.4	298.5	139.1	23.7	61.1	135.7	149.3	149.3
77.5°	305.3	288.3	237.4	101.8	17.0	40.7	91.6	101.8	101.8
80°	240.8	223.9	176.4	71.2	10.2	23.7	57.7	67.8	64.5
82.5°	179.8	162.8	118.7	44.1	6.8	13.6	37.3	37.3	33.9
85°	125.5	115.3	81.4	27.1	3.4	6.8	17.0	6.8	0.0
87.5°	84.8	74.6	50.9	13.6	0.0	3.4	3.4	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By E9808895 / USPTCWHP6082093





— 0°-180° - - 45°-225° - - - - 90°-270°







(END OF REPORT)