

Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P1031863

Luminaire Tested: S123DIW-B775D1030UB50-4F0-XX-W2A-D

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1031863
REPORT IS A COMBINATION OF REPORTS P991899 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIW-B775D1030UB50-4F0-XX-W2A-D
Description: Define 3 Direct/Indirect Wall Mount with 5000K BioUP LEDs {m-DER=1.015} {m-EER=1.115}
Light Source: -
Ballast/Driver: -

Summary

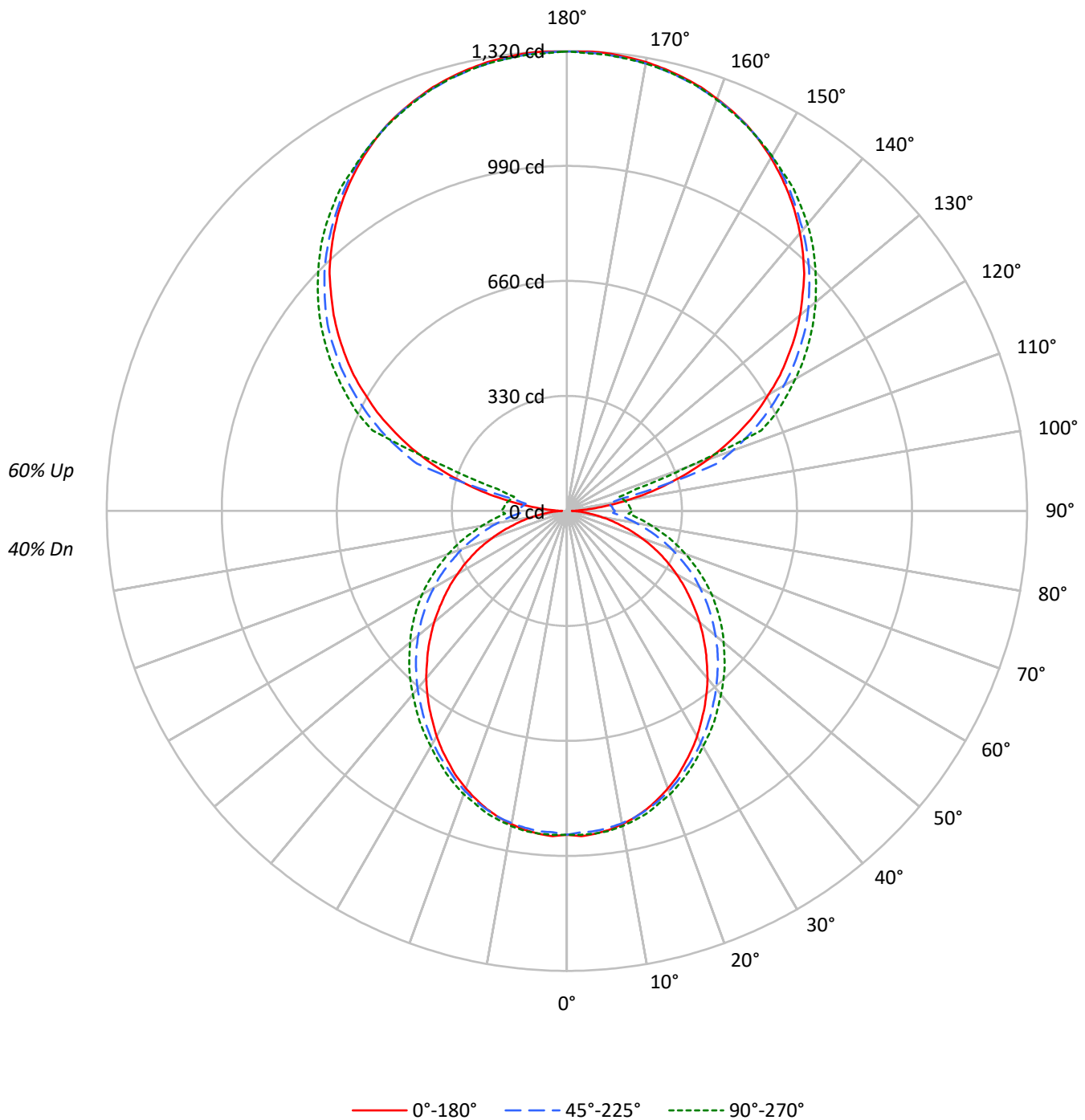
Lumens per Lamp: N/A
Luminaire Lumens: 7145.0 lumens
Efficiency: N/A
Efficacy: 106.0 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.25 / 1.37
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 67.4
Input Voltage (V):
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: 24 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					0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10
RCR																				
0	105	105	105	105	95	95	95	95	78	78	78	62	62	62	47	47	47	40		
1	95	90	86	82	86	82	78	75	67	64	62	53	51	50	40	39	38	32		
2	86	78	72	66	78	71	66	61	58	54	51	46	43	41	35	33	31	26		
3	78	68	61	55	71	62	56	51	51	46	42	40	37	34	31	28	26	22		
4	71	60	52	46	64	55	48	43	45	40	36	36	32	29	27	25	22	18		
5	65	54	45	39	59	49	42	36	40	35	31	32	28	25	24	22	19	16		
6	60	48	40	34	54	44	37	31	36	31	26	29	25	22	22	19	17	14		
7	55	43	35	29	50	39	32	27	33	27	23	26	22	19	20	17	15	12		
8	51	39	31	26	47	36	29	24	30	24	20	24	20	17	18	16	13	11		
9	48	36	28	23	43	33	26	21	27	22	18	22	18	15	17	14	12	10		
10	45	32	25	20	40	30	23	19	25	20	16	20	16	14	16	13	11	9		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10002	10002	10002
5°	10030	9709	9701
10°	9936	9446	9374
15°	9804	9155	9027
20°	9618	8832	8654
25°	9388	8467	8268
30°	9152	8137	7880
35°	8889	7791	7564
40°	8637	7475	7231
45°	8358	7168	6956
50°	8082	6864	6658
55°	7777	6552	6384
60°	7478	6234	6102
65°	7170	5895	5773
70°	6708	5515	5434
75°	6121	5079	5083
80°	5440	4642	4684
85°	4764	4286	4397

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
Vertical Angle: 45°
Luminance: 8358 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	88.2	1.2
10°-20°	251.3	3.5
20°-30°	375.8	5.3
30°-40°	448.7	6.3
40°-50°	469.4	6.6
50°-60°	440.5	6.2
60°-70°	368.0	5.1
70°-80°	263.1	3.7
80°-90°	159.2	2.2
90°-100°	144.9	2.0
100°-110°	297.1	4.2
110°-120°	599.1	8.4
120°-130°	726.8	10.2
130°-140°	759.4	10.6
140°-150°	701.1	9.8
150°-160°	563.5	7.9
160°-170°	363.6	5.1
170°-180°	125.3	1.8
0°-30°	715.2	10.0
0°-40°	1163.9	16.3
0°-60°	2073.9	29.0
0°-90°	2864.2	40.1
90°-120°	1041.1	14.6
90°-150°	3228.4	45.2
90°-180°	4281.0	59.9
0°-180°	7145.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	929	929	929	929	929	
5°	930	928	922	930	929	88
15°	886	889	888	898	897	250
25°	800	810	813	826	826	369
35°	688	704	718	733	737	430
45°	563	587	612	632	640	434
55°	429	463	499	526	534	384
65°	297	336	381	411	421	293
75°	161	208	259	292	305	172
85°	50	100	154	188	198	51
90°	14	74	138	176	188	13
95°	71	70	131	169	179	80
105°	300	335	290	145	156	318
115°	553	571	616	650	662	546
125°	775	783	816	839	848	693
135°	963	968	983	1004	1006	741
145°	1110	1116	1118	1128	1132	695
155°	1222	1220	1220	1225	1220	563
165°	1288	1285	1284	1292	1285	364
175°	1318	1314	1314	1321	1314	125
180°	1318	1318	1318	1318	1318	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	929.2	929.2	929.2	929.2	929.2
2.5°	934.3	931.3	923.2	931.3	930.3
5°	930.3	928.2	922.2	930.3	929.2
7.5°	923.2	923.2	917.1	927.2	926.2
10°	913.1	915.1	910.0	920.1	918.1
12.5°	900.9	903.9	900.9	910.0	908.0
15°	885.7	888.8	887.7	897.9	896.9
17.5°	867.5	873.6	872.6	881.7	879.6
20°	847.3	853.3	855.4	864.5	865.5
22.5°	826.0	832.1	835.1	847.3	846.2
25°	799.7	809.8	812.8	826.0	826.0
27.5°	774.4	785.5	791.6	802.7	803.7
30°	747.0	760.2	768.3	780.4	780.4
32.5°	716.7	731.9	743.0	756.2	759.2
35°	688.3	704.5	717.7	732.9	736.9
37.5°	658.0	676.2	691.4	708.6	711.6
40°	627.6	645.8	666.1	683.3	687.3
42.5°	594.2	617.5	638.7	658.0	664.0
45°	562.8	587.1	612.4	631.6	639.7
47.5°	529.4	556.7	585.1	606.3	612.4
50°	497.0	525.4	556.7	580.0	587.1
52.5°	462.6	493.0	528.4	552.7	561.8
55°	429.2	462.6	499.0	526.4	534.5
57.5°	396.8	431.2	470.7	498.0	507.1
60°	362.4	398.8	440.3	468.7	479.8
62.5°	330.0	367.4	412.0	440.3	450.5
65°	296.6	336.1	380.6	411.0	421.1
67.5°	263.2	304.7	349.2	382.6	390.7
70°	227.8	271.3	319.9	352.3	362.4
72.5°	195.4	238.9	289.5	322.9	333.0
75°	160.9	208.5	259.1	292.5	304.7
77.5°	131.6	179.2	229.8	265.2	274.3
80°	100.2	149.8	202.5	236.9	247.0
82.5°	72.9	123.5	177.1	211.6	221.7
85°	49.6	100.2	153.9	188.3	198.4
87.5°	30.4	81.0	132.6	167.0	177.1
90°	14.2	73.6	137.9	176.2	188.3
92.5°	34.6	72.4	131.8	172.0	182.1
95°	70.9	70.2	130.6	168.8	178.9
97.5°	118.8	127.9	125.4	163.7	174.8
100°	174.6	226.6	120.4	157.6	168.6
102.5°	238.3	279.3	154.5	150.5	162.6
105°	300.0	335.1	290.4	145.4	156.5
107.5°	364.6	394.6	450.8	327.4	208.2
110°	429.3	455.3	506.6	500.5	368.6

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	491.9	512.9	562.2	596.3	603.4
115°	552.7	570.6	615.8	649.9	662.0
117.5°	613.4	628.3	667.6	699.8	708.9
120°	668.1	682.0	718.4	749.5	756.6
122.5°	724.9	733.9	769.2	796.3	804.4
125°	774.9	782.7	816.0	839.2	848.2
127.5°	825.8	832.6	862.8	886.1	891.2
130°	872.8	879.7	903.9	927.0	931.1
132.5°	916.9	924.7	942.8	965.0	969.1
135°	962.9	967.8	982.8	1004.0	1006.1
137.5°	1002.1	1008.9	1018.0	1039.1	1042.2
140°	1040.3	1046.2	1052.1	1071.2	1074.3
142.5°	1076.5	1081.4	1084.3	1100.5	1102.5
145°	1109.8	1115.7	1117.6	1127.7	1131.7
147.5°	1141.1	1146.0	1148.0	1153.0	1152.2
150°	1170.5	1173.5	1175.4	1177.4	1176.4
152.5°	1197.0	1198.0	1198.9	1202.9	1198.0
155°	1221.5	1219.5	1220.5	1225.4	1219.5
157.5°	1241.1	1241.1	1240.1	1246.0	1238.1
160°	1258.7	1257.7	1256.7	1262.6	1255.7
162.5°	1275.3	1272.4	1271.4	1278.3	1272.4
165°	1288.1	1285.1	1284.2	1292.0	1285.1
167.5°	1298.8	1294.9	1294.9	1302.8	1294.9
170°	1307.7	1303.7	1303.7	1311.6	1303.7
172.5°	1313.5	1308.6	1309.6	1317.5	1308.6
175°	1318.4	1313.5	1314.5	1321.4	1313.5
177.5°	1320.4	1315.5	1316.5	1324.3	1314.5
180°	1318.4	1318.4	1318.4	1318.4	1318.4

(END OF REPORT)