

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: P1034121

Luminaire Tested: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1034121
REPORT IS A COMBINATION OF REPORTS P1000483 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1
Description: Define 4 Regressed Direct/Indirect Wall Mount with 2700K BioUP LEDs {m-DER=0.473}
{m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

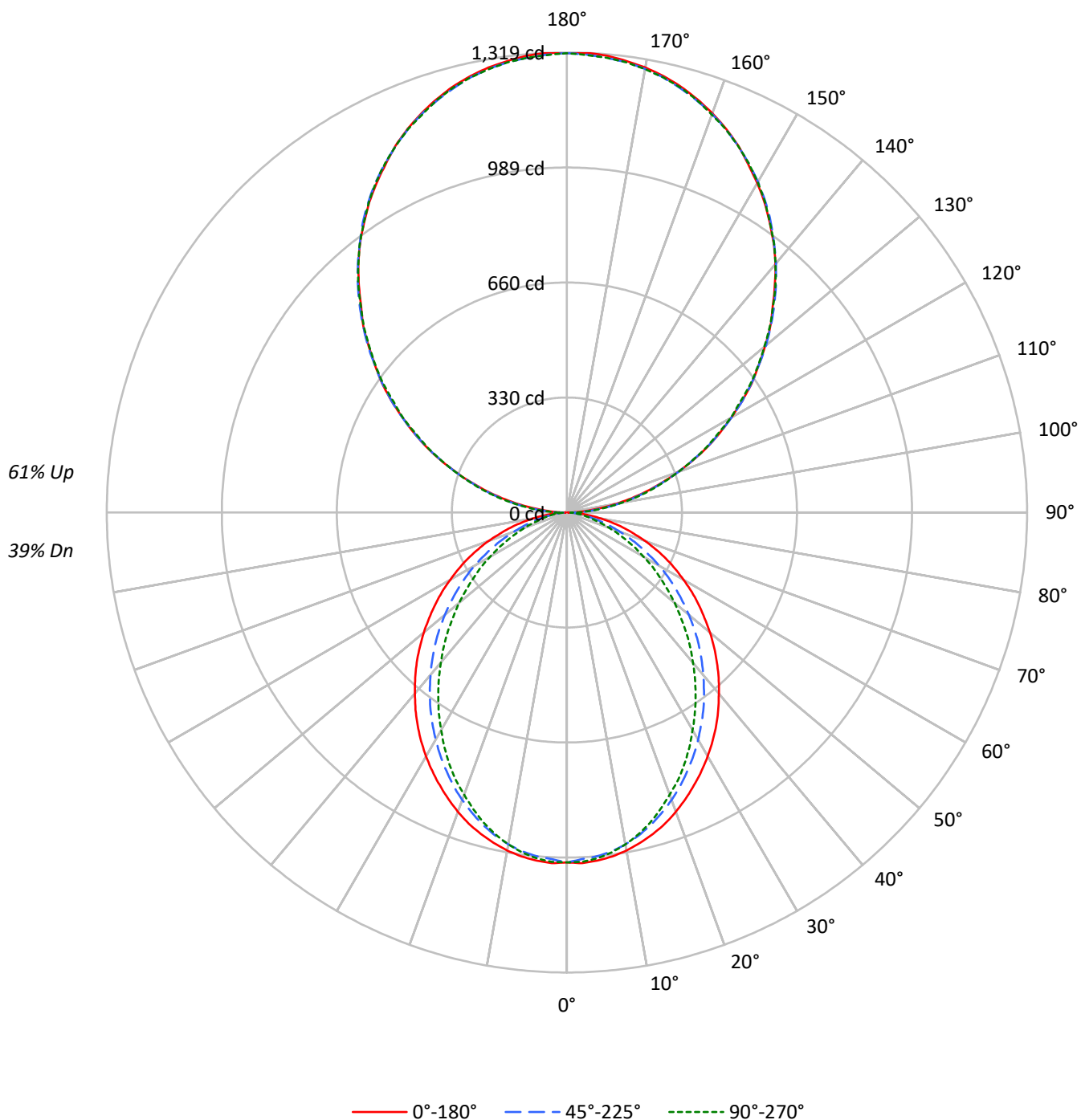
Lumens per Lamp: N/A
Luminaire Lumens: 5975.0 lumens
Efficiency: N/A
Efficacy: 107.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 55.5
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

TEST NUMBER: P1034121

CATALOG NUMBER: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

Luminous Intensity Polar Plot





TEST NUMBER: P1034121

CATALOG NUMBER: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

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	104	104	104	104	95	95	95	95	77	77	77	61	61	61	46	46	46	39			
1	96	91	88	84	87	83	80	77	68	66	64	54	52	51	41	40	39	33			
2	87	80	74	69	79	73	68	64	60	56	53	47	45	43	36	35	33	28			
3	80	70	63	58	72	64	58	53	53	48	45	42	39	36	32	30	29	24			
4	73	62	55	49	66	57	50	45	47	42	38	38	34	31	29	27	25	21			
5	67	56	48	42	61	51	44	39	42	37	33	34	30	27	26	24	22	18			
6	62	50	42	36	56	46	39	34	38	33	29	31	27	24	24	21	19	16			
7	57	45	37	32	52	41	34	30	34	29	25	28	24	21	22	19	17	14			
8	53	41	33	28	48	38	31	26	31	26	23	25	22	19	20	17	15	13			
9	49	37	30	25	45	34	28	23	29	24	20	23	20	17	18	16	14	12			
10	46	34	27	22	42	31	25	21	26	22	18	22	18	15	17	14	13	11			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	8181	8181	8181
5°	8182	7938	7938
10°	8112	7687	7595
15°	8000	7375	7191
20°	7854	7020	6730
25°	7672	6636	6280
30°	7493	6245	5774
35°	7298	5848	5280
40°	7064	5421	4772
45°	6845	4998	4269
50°	6596	4535	3759
55°	6327	4060	3232
60°	6028	3557	2711
65°	5739	2979	2210
70°	5330	2371	1689
75°	4804	1726	1181
80°	4014	1059	850
85°	3020	610	467

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 6845 cd/sqm

TEST NUMBER: P1034121

CATALOG NUMBER: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	94.3	1.6
10°-20°	263.0	4.4
20°-30°	379.7	6.4
30°-40°	430.4	7.2
40°-50°	415.5	7.0
50°-60°	345.5	5.8
60°-70°	238.4	4.0
70°-80°	120.5	2.0
80°-90°	33.4	0.6
90°-100°	85.9	1.4
100°-110°	257.1	4.3
110°-120°	436.8	7.3
120°-130°	576.1	9.6
130°-140°	647.0	10.8
140°-150°	635.9	10.6
150°-160°	534.9	9.0
160°-170°	355.9	6.0
170°-180°	124.6	2.1
0°-30°	737.1	12.3
0°-40°	1167.5	19.5
0°-60°	1928.5	32.3
0°-90°	2320.8	38.8
90°-120°	779.8	13.1
90°-150°	2638.8	44.2
90°-180°	3654.0	61.2
0°-180°	5975.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1003	1003	1003	1003	1003	
5°	1002	999	989	997	996	95
15°	954	947	928	926	921	269
25°	863	849	817	804	797	397
35°	746	721	683	657	643	466
45°	608	580	534	496	482	469
55°	461	430	380	340	326	412
65°	313	280	231	198	189	309
75°	167	138	102	84	80	176
85°	42	26	24	22	22	46
90°	3	14	22	28	31	7
95°	61	70	77	80	80	66
105°	237	238	242	246	248	252
115°	444	444	442	441	440	438
125°	647	647	646	644	642	577
135°	834	840	840	838	835	645
145°	1014	1018	1019	1018	1014	634
155°	1161	1161	1160	1164	1160	534
165°	1264	1261	1259	1265	1261	356
175°	1315	1310	1309	1316	1309	125
180°	1317	1317	1317	1317	1317	

TEST NUMBER: P1034121

CATALOG NUMBER: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1003.2	1003.2	1003.2	1003.2	1003.2
2.5°	1006.3	1003.2	994.8	1003.2	1002.4
5°	1001.7	998.6	989.4	997.1	995.5
7.5°	994.8	991.7	980.2	985.5	983.2
10°	984.0	980.2	966.3	969.4	966.3
12.5°	970.2	965.6	948.7	950.2	945.6
15°	954.0	947.1	927.9	926.4	921.0
17.5°	935.6	925.6	903.3	899.5	891.8
20°	913.3	903.3	877.2	871.1	861.1
22.5°	888.7	877.2	848.8	838.8	831.1
25°	862.6	848.8	817.3	804.2	796.6
27.5°	835.7	818.8	785.8	770.5	759.7
30°	807.3	788.1	752.0	732.8	720.5
32.5°	777.4	755.1	717.4	694.4	682.9
35°	745.9	721.3	682.9	656.8	642.9
37.5°	712.8	687.5	645.2	616.8	603.0
40°	677.5	652.2	608.4	576.1	562.3
42.5°	643.7	616.8	570.7	537.7	523.1
45°	608.4	580.0	533.9	496.2	482.4
47.5°	572.3	543.1	495.5	456.3	440.9
50°	535.4	505.4	456.3	417.9	403.3
52.5°	497.8	468.6	417.9	378.7	363.3
55°	460.9	430.2	380.2	340.3	325.7
57.5°	424.8	392.5	343.4	302.6	291.9
60°	385.6	354.9	305.7	265.8	253.5
62.5°	350.3	318.0	267.3	231.2	222.0
65°	313.4	280.4	231.2	198.2	189.0
67.5°	275.0	243.5	197.4	168.2	157.5
70°	238.9	206.6	162.8	137.5	129.8
72.5°	200.5	172.1	131.4	110.6	103.7
75°	166.7	138.3	102.2	84.5	79.9
77.5°	131.4	106.8	76.0	63.8	62.2
80°	97.6	75.3	52.2	49.9	49.2
82.5°	68.4	48.4	37.6	36.1	35.3
85°	41.5	26.1	23.8	22.3	22.3
87.5°	17.7	11.5	10.8	10.0	10.8
90°	3.1	14.3	22.4	28.5	30.6
92.5°	26.5	39.7	44.8	47.9	48.9
95°	61.1	70.3	77.4	80.5	80.5
97.5°	97.8	105.9	114.1	118.2	118.2
100°	142.6	146.7	155.8	157.9	157.9
102.5°	189.5	190.5	198.6	201.7	202.7
105°	237.3	238.3	242.4	245.5	248.5
107.5°	287.2	288.3	289.3	293.3	292.3
110°	338.2	340.2	339.2	337.1	340.2

TEST NUMBER: P1034121

CATALOG NUMBER: S124RDIW-B575D1050UB27-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	391.1	391.1	389.1	389.1	389.1
115°	444.1	444.1	442.1	441.0	440.0
117.5°	494.0	494.0	493.0	489.9	486.9
120°	543.9	548.0	544.9	539.8	541.9
122.5°	595.9	596.9	595.9	592.8	587.7
125°	646.8	646.8	645.8	643.7	641.7
127.5°	692.6	695.7	693.6	691.6	690.6
130°	741.5	744.6	744.6	742.5	738.5
132.5°	791.4	793.5	792.4	790.4	789.4
135°	834.2	840.3	840.3	838.3	835.2
137.5°	882.1	885.1	887.2	884.1	885.1
140°	929.9	932.0	932.0	931.0	929.9
142.5°	973.7	975.8	974.8	974.8	974.8
145°	1013.5	1017.5	1018.6	1017.5	1014.5
147.5°	1054.2	1059.3	1058.3	1057.3	1056.2
150°	1090.9	1095.0	1095.0	1095.0	1093.9
152.5°	1125.5	1127.5	1128.6	1131.6	1128.6
155°	1161.2	1161.2	1160.1	1164.2	1160.1
157.5°	1191.7	1189.7	1189.7	1192.7	1189.7
160°	1218.2	1217.2	1216.2	1219.2	1214.1
162.5°	1242.6	1239.6	1238.6	1244.7	1239.6
165°	1264.0	1261.0	1258.9	1265.1	1261.0
167.5°	1281.3	1277.3	1277.3	1283.4	1277.3
170°	1295.6	1290.5	1291.5	1297.6	1290.5
172.5°	1305.8	1301.7	1301.7	1308.8	1301.7
175°	1315.0	1309.9	1308.8	1316.0	1308.8
177.5°	1319.0	1313.9	1313.9	1321.1	1312.9
180°	1317.0	1317.0	1317.0	1317.0	1317.0

(END OF REPORT)