

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: P1034231

Luminaire Tested: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1034231
REPORT IS A COMBINATION OF REPORTS P1000735 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1
Description: Define 4 Regressed Direct/Indirect Wall Mount with 4000K BioUP LEDs {m-DER=0.865}
{m-EER=0.951}
Light Source: -
Ballast/Driver: -

Summary

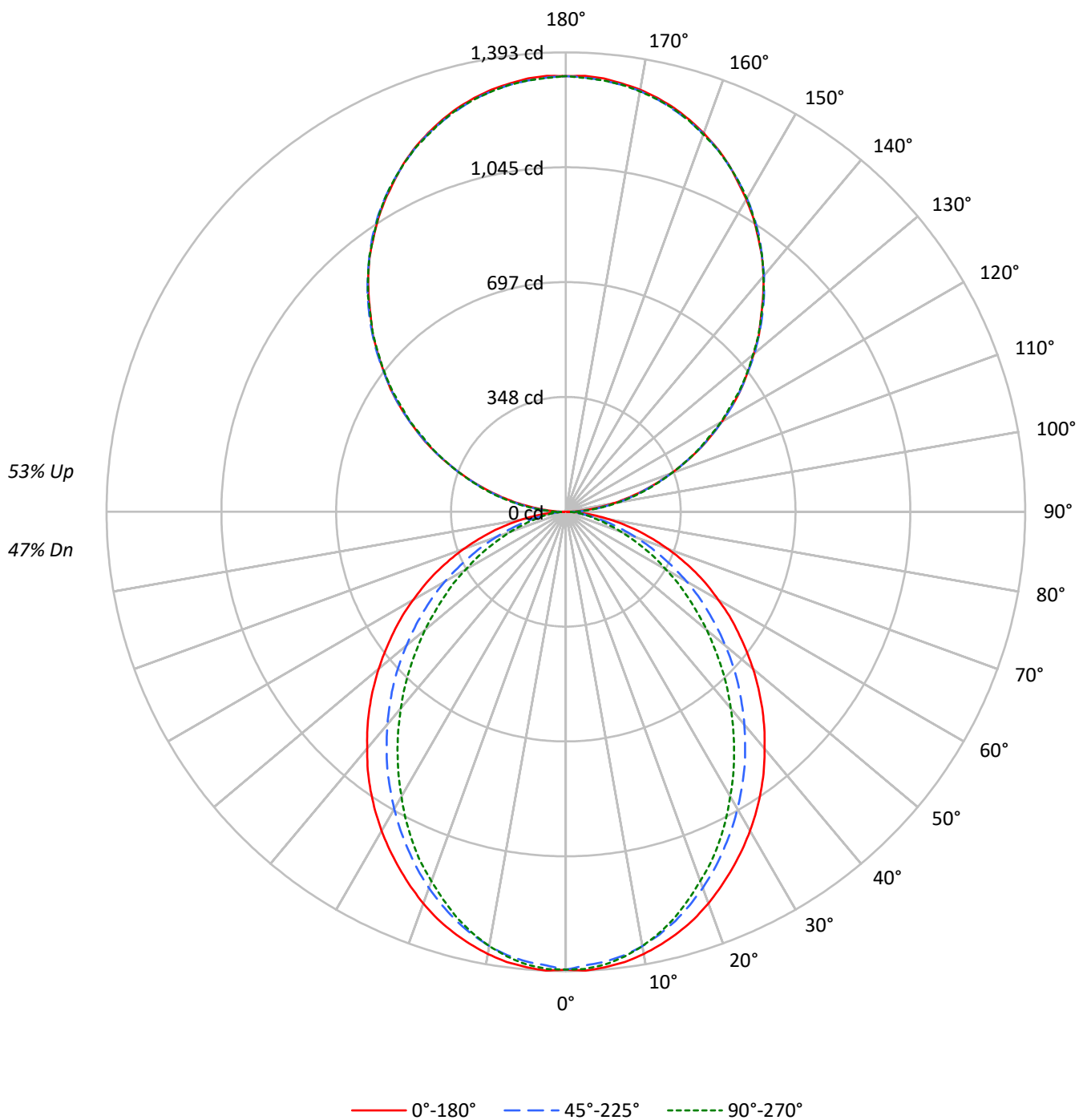
Lumens per Lamp: N/A
Luminaire Lumens: 6876.0 lumens
Efficiency: N/A
Efficacy: 102.0 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: General Diffuse

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

TEST NUMBER: P1034231

CATALOG NUMBER: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

Luminous Intensity Polar Plot



TEST NUMBER: P1034231

CATALOG NUMBER: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

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	106	106	106	106	98	98	98	98	81	81	81	67	67	67	53	53	53	47	47	47
1	97	93	89	86	89	86	82	80	72	70	67	59	57	56	47	46	45	40	40	40
2	89	82	76	71	81	75	70	66	63	59	56	52	50	47	42	40	39	34	34	34
3	81	72	65	59	74	66	60	55	56	51	48	46	43	40	37	35	33	29	29	29
4	74	64	56	50	68	59	52	47	50	45	41	41	38	35	34	31	29	25	25	25
5	68	57	49	43	63	53	46	40	45	39	35	37	33	30	30	27	25	22	22	22
6	63	51	43	37	58	47	40	35	40	35	31	34	30	26	28	25	22	19	19	19
7	58	46	38	33	53	43	36	31	37	31	27	31	27	23	25	22	20	17	17	17
8	54	42	34	29	50	39	32	27	33	28	24	28	24	21	23	20	18	15	15	15
9	50	38	31	26	46	36	29	25	31	25	22	26	22	19	21	18	16	14	14	14
10	47	35	28	23	43	33	26	22	28	23	20	24	20	17	20	17	15	13	13	13

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11322	11322	11322
5°	11323	10985	10986
10°	11227	10639	10512
15°	11072	10207	9952
20°	10870	9715	9314
25°	10617	9184	8691
30°	10371	8643	7991
35°	10099	8094	7307
40°	9776	7503	6605
45°	9473	6916	5908
50°	9128	6276	5202
55°	8755	5619	4472
60°	8343	4923	3752
65°	7942	4123	3058
70°	7376	3282	2338
75°	6648	2388	1635
80°	5552	1466	1175
85°	4177	846	646

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 9473 cd/sqm

TEST NUMBER: P1034231

CATALOG NUMBER: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	130.6	1.9
10°-20°	364.0	5.3
20°-30°	525.5	7.6
30°-40°	595.6	8.7
40°-50°	575.1	8.4
50°-60°	478.1	7.0
60°-70°	330.0	4.8
70°-80°	166.8	2.4
80°-90°	45.2	0.7
90°-100°	86.1	1.3
100°-110°	257.9	3.8
110°-120°	438.1	6.4
120°-130°	577.8	8.4
130°-140°	649.0	9.4
140°-150°	637.9	9.3
150°-160°	536.5	7.8
160°-170°	356.9	5.2
170°-180°	125.0	1.8
0°-30°	1020.1	14.8
0°-40°	1615.7	23.5
0°-60°	2668.9	38.8
0°-90°	3210.8	46.7
90°-120°	782.1	11.4
90°-150°	2646.7	38.5
90°-180°	3665.0	53.3
0°-180°	6876.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1388	1388	1388	1388	1388	
5°	1386	1382	1369	1380	1378	132
15°	1320	1311	1284	1282	1275	372
25°	1194	1175	1131	1113	1102	550
35°	1032	998	945	909	890	645
45°	842	803	739	687	668	649
55°	638	595	526	471	451	571
65°	434	388	320	274	262	428
75°	231	191	141	117	111	243
85°	57	36	33	31	31	63
90°	3	14	22	29	31	8
95°	61	70	78	81	81	66
105°	238	239	243	246	249	252
115°	445	445	443	442	441	439
125°	649	649	648	646	644	578
135°	837	843	843	841	838	647
145°	1016	1021	1022	1021	1018	636
155°	1165	1165	1164	1168	1164	536
165°	1268	1265	1263	1269	1265	357
175°	1319	1314	1313	1320	1313	125
180°	1321	1321	1321	1321	1321	

TEST NUMBER: P1034231

CATALOG NUMBER: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1388.4	1388.4	1388.4	1388.4	1388.4
2.5°	1392.6	1388.4	1376.7	1388.4	1387.3
5°	1386.3	1382.0	1369.2	1379.9	1377.7
7.5°	1376.7	1372.4	1356.5	1363.9	1360.7
10°	1361.8	1356.5	1337.4	1341.6	1337.4
12.5°	1342.7	1336.3	1312.9	1315.0	1308.6
15°	1320.3	1310.8	1284.2	1282.1	1274.6
17.5°	1294.8	1281.0	1250.2	1244.9	1234.2
20°	1264.0	1250.2	1214.0	1205.5	1191.7
22.5°	1230.0	1214.0	1174.7	1160.9	1150.3
25°	1193.8	1174.7	1131.1	1113.0	1102.4
27.5°	1156.6	1133.2	1087.5	1066.3	1051.4
30°	1117.3	1090.7	1040.8	1014.2	997.2
32.5°	1075.8	1045.0	992.9	961.0	945.1
35°	1032.2	998.2	945.1	908.9	889.8
37.5°	986.5	951.5	893.0	853.7	834.5
40°	937.6	902.6	842.0	797.3	778.2
42.5°	890.9	853.7	789.9	744.2	724.0
45°	842.0	802.6	738.8	686.7	667.6
47.5°	792.0	751.6	685.7	631.5	610.2
50°	741.0	699.5	631.5	578.3	558.1
52.5°	688.9	648.5	578.3	524.1	502.8
55°	637.8	595.3	526.2	470.9	450.7
57.5°	587.9	543.2	475.2	418.9	404.0
60°	533.7	491.1	423.1	367.8	350.8
62.5°	484.8	440.1	370.0	320.0	307.2
65°	433.7	388.0	320.0	274.3	261.5
67.5°	380.6	337.0	273.2	232.8	217.9
70°	330.6	286.0	225.4	190.3	179.7
72.5°	277.5	238.1	181.8	153.1	143.5
75°	230.7	191.4	141.4	116.9	110.6
77.5°	181.8	147.8	105.2	88.2	86.1
80°	135.0	104.2	72.3	69.1	68.0
82.5°	94.6	67.0	52.1	50.0	48.9
85°	57.4	36.1	33.0	30.8	30.8
87.5°	24.5	15.9	14.9	13.8	14.9
90°	3.1	14.3	22.5	28.6	30.6
92.5°	26.6	39.8	45.0	48.0	49.0
95°	61.3	70.5	77.6	80.7	80.7
97.5°	98.1	106.2	114.4	118.5	118.5
100°	143.0	147.1	156.3	158.4	158.4
102.5°	190.0	191.0	199.2	202.3	203.3
105°	238.0	239.1	243.1	246.2	249.3
107.5°	288.1	289.1	290.1	294.2	293.2
110°	339.2	341.2	340.2	338.2	341.2

TEST NUMBER: P1034231

CATALOG NUMBER: S124RDIW-B795D1050UB40-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	392.3	392.3	390.3	390.3	390.3
115°	445.4	445.4	443.4	442.4	441.3
117.5°	495.5	495.5	494.5	491.4	488.3
120°	545.5	549.6	546.6	541.5	543.5
122.5°	597.6	598.7	597.6	594.6	589.5
125°	648.7	648.7	647.7	645.7	643.6
127.5°	694.7	697.8	695.7	693.7	692.7
130°	743.7	746.8	746.8	744.8	740.7
132.5°	793.8	795.8	794.8	792.8	791.8
135°	836.7	842.8	842.8	840.8	837.7
137.5°	884.7	887.8	889.8	886.8	887.8
140°	932.7	934.8	934.8	933.8	932.7
142.5°	976.7	978.7	977.7	977.7	977.7
145°	1016.5	1020.6	1021.6	1020.6	1017.5
147.5°	1057.4	1062.5	1061.5	1060.4	1059.4
150°	1094.2	1098.2	1098.2	1098.2	1097.2
152.5°	1128.9	1130.9	1132.0	1135.0	1132.0
155°	1164.7	1164.7	1163.6	1167.7	1163.6
157.5°	1195.3	1193.3	1193.3	1196.3	1193.3
160°	1221.9	1220.8	1219.8	1222.9	1217.8
162.5°	1246.4	1243.3	1242.3	1248.4	1243.3
165°	1267.8	1264.8	1262.7	1268.9	1264.8
167.5°	1285.2	1281.1	1281.1	1287.2	1281.1
170°	1299.5	1294.4	1295.4	1301.5	1294.4
172.5°	1309.7	1305.6	1305.6	1312.8	1305.6
175°	1318.9	1313.8	1312.8	1319.9	1312.8
177.5°	1323.0	1317.9	1317.9	1325.0	1316.9
180°	1321.0	1321.0	1321.0	1321.0	1321.0

(END OF REPORT)