

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: P1025854

Luminaire Tested: S124DIP-B795D590UB30-4F0-XX-W2A-F

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1025854
REPORT IS A COMBINATION OF REPORTS P996529 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124DIP-B795D590UB30-4F0-XX-W2A-F
Description: Define 4 Direct/Indirect Pendant with 3000K BioUP LEDs {m-DER=0.589} {m-EER=0.647}
Light Source: -
Ballast/Driver: -

Summary

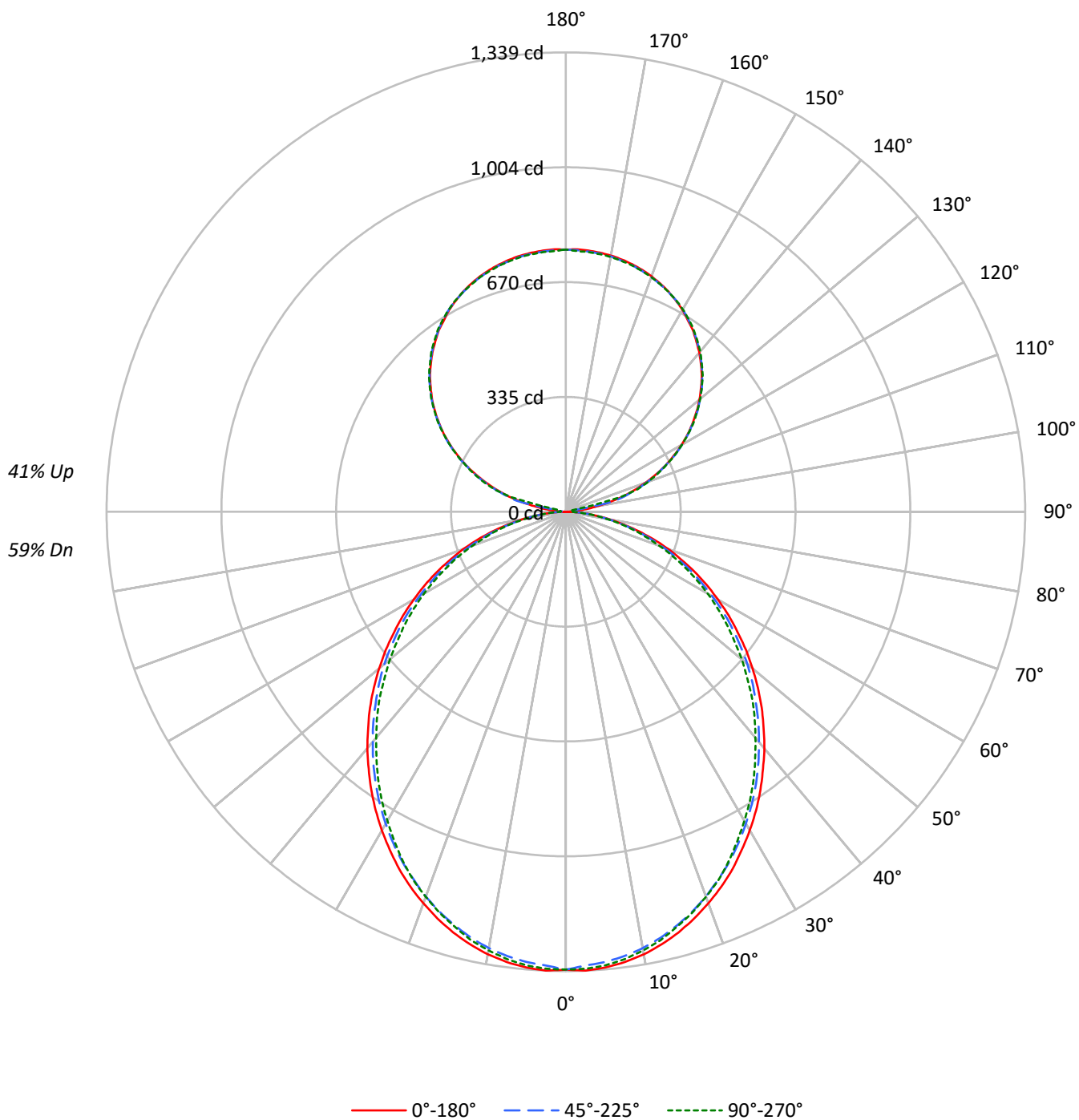
Lumens per Lamp: N/A
Luminaire Lumens: 5791.0 lumens
Efficiency: N/A
Efficacy: 112.9 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.17 / 1.29
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 51.3
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: P1025854

CATALOG NUMBER: S124DIP-B795D590UB30-4F0-XX-W2A-F

Luminous Intensity Polar Plot



TEST NUMBER: P1025854

CATALOG NUMBER: S124DIP-B795D590UB30-4F0-XX-W2A-F

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20
RC	80				70				50				30				10
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	109	109	109	109	102	102	102	102	88	88	88	76	76	76	65	65	65
1	100	95	91	88	93	89	86	83	78	75	73	67	65	63	57	56	54
2	91	83	77	72	85	78	72	68	68	64	60	59	56	53	50	48	46
3	83	73	66	60	77	69	62	57	60	55	51	52	48	45	44	42	39
4	76	65	57	51	71	61	54	48	53	48	43	46	42	38	40	36	34
5	70	58	50	43	65	54	47	41	48	42	37	42	37	33	36	32	29
6	64	52	44	38	60	49	41	36	43	37	33	38	33	29	33	29	26
7	59	47	39	33	55	44	37	32	39	33	29	34	29	26	30	26	23
8	55	43	35	29	51	40	33	28	36	30	26	31	27	23	27	23	21
9	51	39	31	26	48	37	30	25	33	27	23	29	24	21	25	21	19
10	48	36	29	24	45	34	27	23	30	25	21	27	22	19	23	20	17

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10881	10881	10881
5°	10890	10568	10581
10°	10798	10275	10203
15°	10643	9926	9777
20°	10445	9549	9334
25°	10223	9150	8859
30°	9954	8719	8338
35°	9676	8278	7833
40°	9387	7803	7296
45°	9083	7327	6794
50°	8747	6865	6238
55°	8380	6326	5687
60°	8007	5735	5111
65°	7578	5126	4464
70°	7086	4390	3770
75°	6349	3540	3019
80°	5408	2559	2125
85°	4199	1425	1142

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 9083 cd/sqm

TEST NUMBER: P1025854

CATALOG NUMBER: S124DIP-B795D590UB30-4F0-XX-W2A-F

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	125.8	2.2
10°-20°	354.3	6.1
20°-30°	521.5	9.0
30°-40°	606.2	10.5
40°-50°	606.2	10.5
50°-60°	530.2	9.2
60°-70°	393.6	6.8
70°-80°	223.3	3.9
80°-90°	65.5	1.1
90°-100°	25.4	0.4
100°-110°	167.0	2.9
110°-120°	319.0	5.5
120°-130°	404.9	7.0
130°-140°	433.2	7.5
140°-150°	405.0	7.0
150°-160°	326.6	5.6
160°-170°	210.7	3.6
170°-180°	72.6	1.3
0°-30°	1001.6	17.3
0°-40°	1607.8	27.8
0°-60°	2744.1	47.4
0°-90°	3426.6	59.2
90°-120°	511.4	8.8
90°-150°	1754.5	30.3
90°-180°	2364.0	40.8
0°-180°	5791.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1334	1334	1334	1334	1334	
5°	1333	1329	1317	1329	1327	127
15°	1269	1265	1249	1255	1252	358
25°	1149	1142	1127	1128	1124	529
35°	989	982	967	959	954	618
45°	807	800	783	771	768	622
55°	610	607	592	580	573	547
65°	414	408	398	387	382	410
75°	220	215	210	205	204	234
85°	58	58	56	56	54	62
90°	2	8	13	16	17	5
95°	31	12	13	16	17	39
105°	172	176	178	184	163	180
115°	321	323	322	324	324	316
125°	452	454	453	454	455	403
135°	560	560	562	563	564	432
145°	646	648	648	648	649	404
155°	708	709	707	709	708	327
165°	747	744	744	749	744	211
175°	764	761	761	766	760	73
180°	764	764	764	764	764	

TEST NUMBER: P1025854

CATALOG NUMBER: S124DIP-B795D590UB30-4F0-XX-W2A-F

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1334.4	1334.4	1334.4	1334.4	1334.4
2.5°	1338.7	1335.5	1323.7	1334.4	1333.3
5°	1333.3	1329.1	1317.3	1329.1	1326.9
7.5°	1323.7	1319.4	1306.6	1316.2	1315.2
10°	1309.8	1305.5	1291.6	1300.2	1298.0
12.5°	1291.6	1287.4	1272.4	1282.0	1278.8
15°	1269.2	1264.9	1248.9	1255.3	1252.1
17.5°	1243.5	1238.2	1223.2	1227.5	1225.3
20°	1214.6	1209.3	1193.3	1196.5	1194.3
22.5°	1183.6	1176.2	1160.1	1166.5	1162.3
25°	1149.4	1141.9	1127.0	1128.0	1123.8
27.5°	1110.9	1103.4	1089.5	1087.4	1082.1
30°	1072.4	1063.9	1050.0	1045.7	1040.4
32.5°	1031.8	1024.3	1009.4	1004.0	998.7
35°	989.0	981.6	966.6	959.1	953.8
37.5°	944.1	937.7	921.7	914.2	906.7
40°	900.3	891.7	875.7	865.0	859.7
42.5°	853.2	849.0	830.8	818.0	814.8
45°	807.3	799.8	782.7	770.9	767.7
47.5°	759.2	753.8	737.8	724.9	716.4
50°	710.0	705.7	690.7	675.8	669.3
52.5°	661.9	656.5	640.5	627.6	619.1
55°	610.5	607.3	592.4	579.5	573.1
57.5°	562.4	559.2	544.2	531.4	525.0
60°	512.2	506.8	492.9	483.3	477.9
62.5°	463.0	458.7	443.7	435.2	429.8
65°	413.8	408.4	397.8	387.1	381.7
67.5°	363.5	359.3	348.6	337.9	336.8
70°	317.6	310.1	301.5	293.0	289.8
72.5°	268.4	260.9	254.5	248.1	244.9
75°	220.3	214.9	209.6	205.3	204.2
77.5°	173.2	171.1	165.7	164.7	161.5
80°	131.5	128.3	126.2	124.0	123.0
82.5°	90.9	89.8	89.8	88.7	87.7
85°	57.7	57.7	55.6	55.6	54.5
87.5°	27.8	26.7	25.7	25.7	25.7
90°	1.7	8.0	12.6	16.0	17.1
92.5°	8.6	7.4	12.0	15.4	15.4
95°	31.4	12.0	12.6	16.0	16.6
97.5°	60.0	72.6	12.6	15.4	16.0
100°	93.7	104.0	25.1	15.4	16.0
102.5°	131.4	138.3	145.2	16.6	16.6
105°	172.0	175.5	178.3	183.5	162.9
107.5°	209.2	210.9	214.9	217.7	220.0
110°	246.9	248.6	252.0	253.2	254.9

TEST NUMBER: P1025854

CATALOG NUMBER: S124DIP-B795D590UB30-4F0-XX-W2A-F

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	283.5	286.9	288.0	287.5	289.8
115°	321.2	322.9	322.3	323.5	323.5
117.5°	354.9	357.2	358.9	358.3	358.3
120°	389.2	391.5	390.9	392.1	390.9
122.5°	421.2	422.3	423.5	424.1	422.9
125°	451.5	453.8	452.6	454.4	454.9
127.5°	480.6	481.2	484.1	483.5	482.9
130°	508.6	509.2	510.9	511.5	511.5
132.5°	534.4	535.5	537.8	538.4	537.8
135°	560.1	559.5	561.8	562.9	564.1
137.5°	582.9	582.9	585.8	586.9	586.4
140°	605.2	606.4	607.5	609.2	609.8
142.5°	625.2	627.5	628.1	629.2	629.2
145°	645.8	647.5	647.5	648.1	649.2
147.5°	661.8	665.2	664.7	665.2	665.8
150°	679.5	681.8	681.2	681.2	681.8
152.5°	694.4	696.1	695.0	696.1	695.5
155°	708.1	708.7	707.0	709.2	707.5
157.5°	720.1	720.1	717.8	720.7	717.8
160°	730.4	728.7	728.1	731.5	728.1
162.5°	739.5	737.2	736.7	740.1	736.1
165°	747.0	744.1	744.1	748.7	743.5
167.5°	753.3	750.4	749.8	755.0	749.2
170°	758.4	755.0	755.5	760.1	754.4
172.5°	761.8	758.4	759.0	763.5	757.3
175°	764.1	760.7	761.3	766.4	759.5
177.5°	765.8	761.8	763.0	767.5	760.7
180°	764.1	764.1	764.1	764.1	764.1

(END OF REPORT)