

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: P1026642

Luminaire Tested: S124RDIP-B795D590UB40-4F0-XX-W2A-F4

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1026642
REPORT IS A COMBINATION OF REPORTS P999772 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIP-B795D590UB40-4F0-XX-W2A-F4
Description: Define 4 Regressed Direct/Indirect Pendant with 4000K BioUP LEDs {m-DER=0.865}
{m-EER=0.951}
Light Source: -
Ballast/Driver: -

Summary

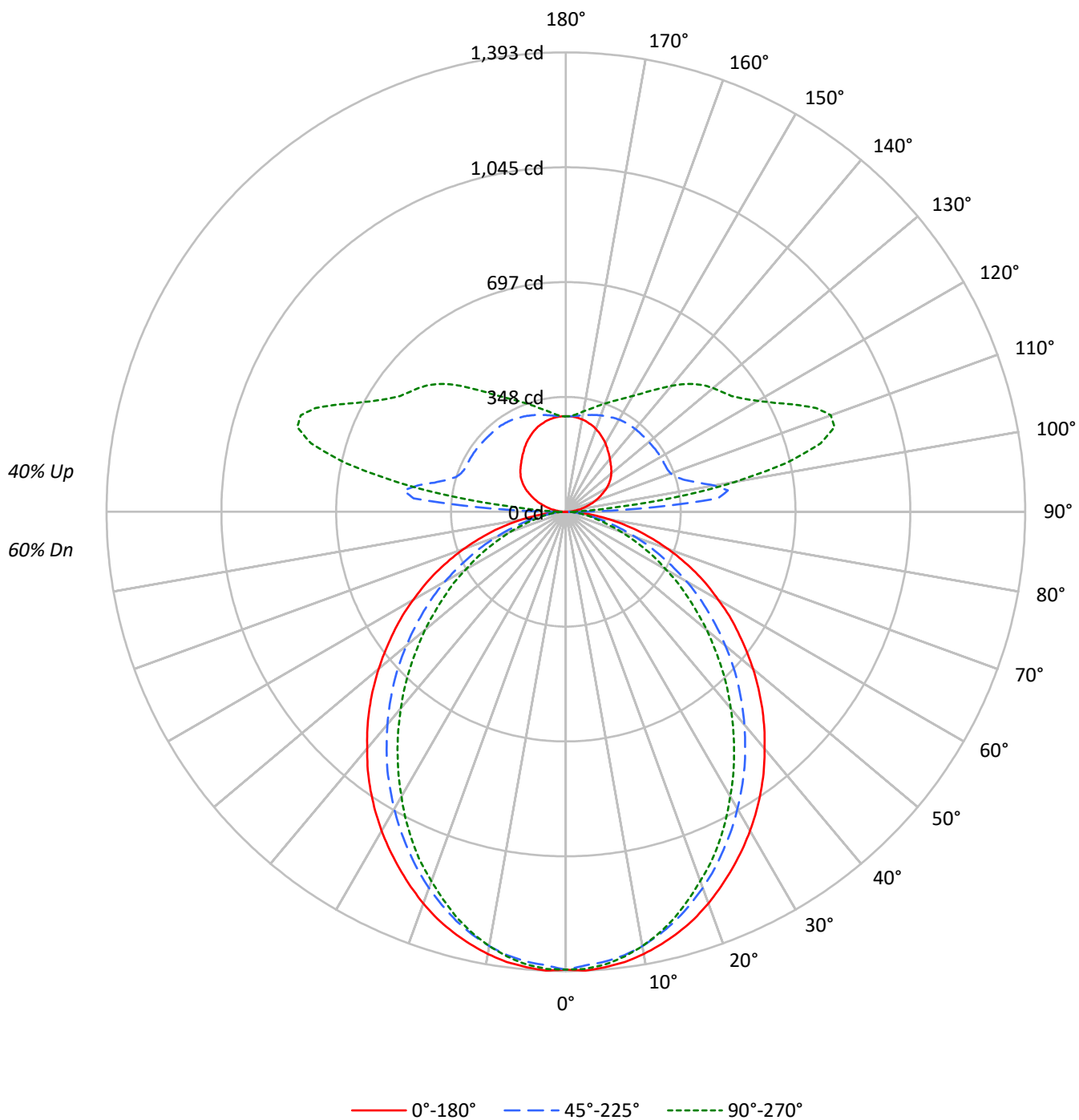
Lumens per Lamp: N/A
Luminaire Lumens: 5320.2 lumens
Efficiency: N/A
Efficacy: 103.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: Semi-Direct

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

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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				10
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	110	110	110	110	102	102	102	102	89	89	89	77	77	77	66	66	66
1	100	96	92	89	94	90	87	84	79	76	74	68	66	65	59	57	56
2	92	84	78	73	86	79	74	69	69	65	62	60	57	55	52	50	48
3	84	74	67	61	78	70	63	58	61	56	52	54	50	47	46	43	41
4	77	66	58	52	72	62	55	50	55	49	45	48	44	40	42	38	36
5	71	59	51	45	66	56	48	43	49	43	39	43	39	35	38	34	31
6	65	53	45	39	61	50	43	38	44	39	34	39	34	31	34	30	28
7	60	48	40	35	56	46	38	33	40	35	30	36	31	27	31	28	25
8	56	44	36	31	53	42	34	29	37	31	27	33	28	25	29	25	22
9	52	40	33	28	49	38	31	26	34	28	24	30	26	22	27	23	20
10	49	37	30	25	46	35	28	24	31	26	22	28	23	20	25	21	18

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

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	130.6	2.5
10°-20°	364.0	6.8
20°-30°	525.5	9.9
30°-40°	595.6	11.2
40°-50°	575.1	10.8
50°-60°	478.1	9.0
60°-70°	330.0	6.2
70°-80°	166.8	3.1
80°-90°	43.5	0.8
90°-100°	214.9	4.0
100°-110°	437.0	8.2
110°-120°	389.5	7.3
120°-130°	327.2	6.2
130°-140°	273.1	5.1
140°-150°	208.5	3.9
150°-160°	146.6	2.8
160°-170°	86.2	1.6
170°-180°	28.0	0.5
0°-30°	1020.1	19.2
0°-40°	1615.7	30.4
0°-60°	2668.9	50.2
0°-90°	3209.1	60.3
90°-120°	1041.5	19.6
90°-150°	1850.3	34.8
90°-180°	2111.0	39.7
0°-180°	5320.2	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°	1	4	10	11	12	5
95°	19	59	463	229	139	21
105°	66	96	373	803	800	71
115°	117	147	332	639	768	116
125°	163	194	331	544	613	145
135°	194	231	328	482	548	150
145°	223	256	326	407	447	140
155°	254	274	317	359	374	117
165°	277	285	304	322	327	78
175°	289	289	292	296	294	27
180°	289	289	289	289	289	

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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°	0.6	4.5	10.2	11.4	11.9
92.5°	8.0	43.8	222.8	73.6	51.7
95°	18.8	59.1	463.2	229.4	138.7
97.5°	31.3	65.4	495.6	468.3	333.0
100°	43.2	73.9	456.9	647.9	521.1
102.5°	54.6	84.1	408.6	760.4	684.8
105°	66.5	96.4	372.8	802.8	799.6
107.5°	79.6	108.8	349.5	790.0	854.2
110°	92.6	121.4	338.7	744.5	855.3

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	105.1	133.8	333.6	688.8	821.8
115°	117.1	146.9	332.5	638.8	767.8
117.5°	129.6	159.1	331.9	599.6	714.9
120°	142.1	171.0	331.9	573.2	671.8
122.5°	153.4	182.7	331.3	555.8	637.7
125°	163.1	193.8	330.8	543.6	612.6
127.5°	172.2	204.0	329.6	532.0	596.7
130°	179.6	214.0	329.1	518.0	583.1
132.5°	187.0	222.5	328.5	501.6	567.8
135°	193.8	230.7	327.9	482.5	547.9
137.5°	200.6	237.8	327.9	462.0	524.6
140°	208.0	244.4	327.4	442.2	499.0
142.5°	216.0	250.4	327.4	423.6	471.7
145°	223.3	255.8	326.2	407.0	447.3
147.5°	231.9	260.8	324.5	393.0	424.5
150°	239.8	265.7	322.8	380.2	405.8
152.5°	247.2	270.2	320.0	369.4	388.7
155°	254.0	274.2	317.1	359.2	374.5
157.5°	260.9	277.9	314.3	349.5	361.5
160°	267.1	281.0	310.9	339.8	349.5
162.5°	272.8	283.6	307.5	330.5	338.2
165°	276.8	285.3	304.1	322.0	326.8
167.5°	281.3	286.7	300.6	314.5	317.7
170°	284.2	287.8	297.2	307.2	309.2
172.5°	287.0	288.7	293.8	300.6	300.6
175°	288.7	289.3	291.5	295.5	294.4
177.5°	289.8	289.3	289.8	291.8	289.8
180°	289.3	289.3	289.3	289.3	289.3

(END OF REPORT)