

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: P1026324

Luminaire Tested: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1026324
REPORT IS A COMBINATION OF REPORTS P999344 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIP-B350D590UB27-4F0-XX-W2A-F4
Description: Define 4 Regressed Direct/Indirect Pendant with 2700K BioUP LEDs {m-DER=0.473}
{m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

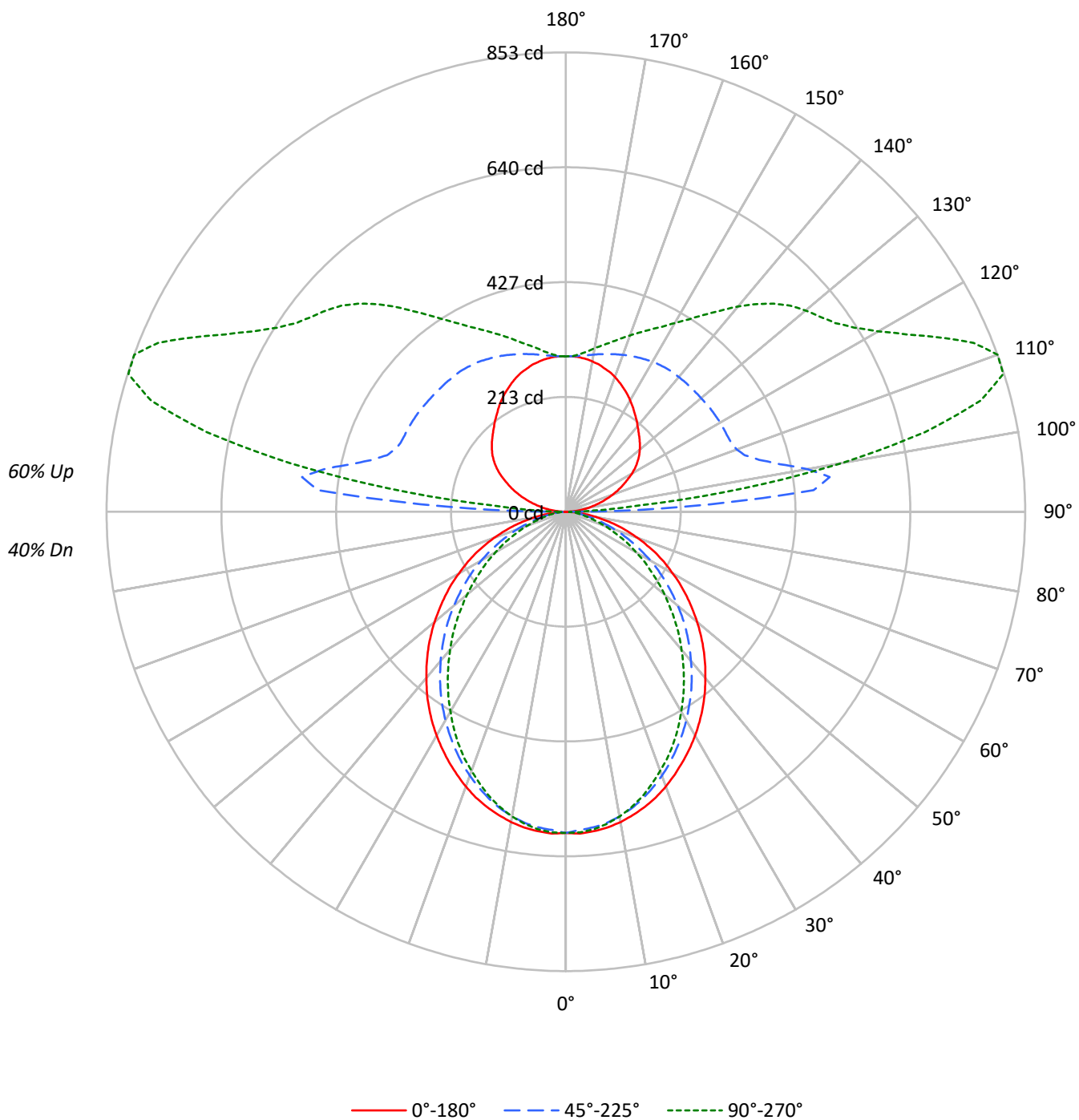
Lumens per Lamp: N/A
Luminaire Lumens: 3484.2 lumens
Efficiency: N/A
Efficacy: 122.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 28.4
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: P1026324

CATALOG NUMBER: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

Luminous Intensity Polar Plot



TEST NUMBER: P1026324

CATALOG NUMBER: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

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	61	61	61	47	47	47	47	47	40
1	96	92	88	84	87	83	80	77	68	66	64	54	53	52	41	41	40	40	40	34
2	87	80	74	69	79	73	68	64	60	56	53	48	45	43	37	35	34	34	34	29
3	80	71	63	58	72	64	58	53	53	49	45	43	39	37	33	31	29	29	29	24
4	73	63	55	49	66	57	51	45	47	42	38	38	34	32	29	27	25	25	25	21
5	67	56	48	42	61	51	44	39	42	37	33	34	30	28	27	24	22	22	22	18
6	62	50	42	36	56	46	39	34	38	33	29	31	27	24	24	21	19	19	19	16
7	57	45	37	32	52	41	35	30	35	29	26	28	24	21	22	19	17	17	17	15
8	53	41	33	28	48	38	31	26	32	26	23	26	22	19	20	18	16	16	16	13
9	49	37	30	25	45	34	28	23	29	24	20	24	20	17	19	16	14	14	14	12
10	46	34	27	22	42	32	25	21	27	22	18	22	18	16	17	15	13	13	13	11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4863	4863	4863
5°	4864	4719	4719
10°	4823	4570	4516
15°	4757	4384	4275
20°	4670	4173	4001
25°	4561	3945	3733
30°	4454	3713	3432
35°	4338	3477	3139
40°	4200	3223	2837
45°	4069	2971	2538
50°	3921	2695	2234
55°	3761	2414	1921
60°	3583	2114	1612
65°	3412	1772	1313
70°	3168	1410	1004
75°	2856	1025	702
80°	2385	631	504
85°	1797	364	277

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
Vertical Angle: 45°
Luminance: 4069 cd/sqm

TEST NUMBER: P1026324

CATALOG NUMBER: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	56.1	1.6
10°-20°	156.4	4.5
20°-30°	225.7	6.5
30°-40°	255.9	7.3
40°-50°	247.0	7.1
50°-60°	205.4	5.9
60°-70°	141.8	4.1
70°-80°	71.6	2.1
80°-90°	19.3	0.6
90°-100°	214.3	6.1
100°-110°	435.8	12.5
110°-120°	388.4	11.1
120°-130°	326.3	9.4
130°-140°	272.3	7.8
140°-150°	207.9	6.0
150°-160°	146.2	4.2
160°-170°	86.0	2.5
170°-180°	28.0	0.8
0°-30°	438.2	12.6
0°-40°	694.0	19.9
0°-60°	1146.4	32.9
0°-90°	1379.1	39.6
90°-120°	1038.5	29.8
90°-150°	1845.0	53.0
90°-180°	2105.0	60.4
0°-180°	3484.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	596	596	596	596	596	
5°	596	594	588	593	592	57
15°	567	563	552	551	548	160
25°	513	505	486	478	474	236
35°	443	429	406	390	382	277
45°	362	345	317	295	287	279
55°	274	256	226	202	194	245
65°	186	167	138	118	112	184
75°	99	82	61	50	48	105
85°	25	16	14	13	13	27
90°	1	4	10	11	12	3
95°	19	59	462	229	138	21
105°	66	96	372	800	797	71
115°	117	146	332	637	766	116
125°	163	193	330	542	611	145
135°	193	230	327	481	546	149
145°	223	255	325	406	446	140
155°	253	273	316	358	374	117
165°	276	284	303	321	326	78
175°	288	288	291	295	294	27
180°	288	288	288	288	288	

TEST NUMBER: P1026324

CATALOG NUMBER: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	596.4	596.4	596.4	596.4	596.4
2.5°	598.2	596.4	591.4	596.4	595.9
5°	595.5	593.6	588.2	592.7	591.8
7.5°	591.4	589.5	582.7	585.9	584.5
10°	585.0	582.7	574.5	576.3	574.5
12.5°	576.7	574.0	564.0	564.9	562.1
15°	567.2	563.0	551.6	550.7	547.5
17.5°	556.2	550.3	537.0	534.7	530.2
20°	543.0	537.0	521.5	517.8	511.9
22.5°	528.3	521.5	504.6	498.7	494.1
25°	512.8	504.6	485.9	478.1	473.5
27.5°	496.8	486.8	467.1	458.0	451.6
30°	479.9	468.5	447.1	435.6	428.3
32.5°	462.1	448.9	426.5	412.8	406.0
35°	443.4	428.8	406.0	390.4	382.2
37.5°	423.8	408.7	383.6	366.7	358.5
40°	402.8	387.7	361.7	342.5	334.3
42.5°	382.7	366.7	339.3	319.7	311.0
45°	361.7	344.8	317.4	295.0	286.8
47.5°	340.2	322.8	294.5	271.2	262.1
50°	318.3	300.5	271.2	248.4	239.7
52.5°	295.9	278.6	248.4	225.1	216.0
55°	274.0	255.7	226.0	202.3	193.6
57.5°	252.5	233.3	204.1	179.9	173.5
60°	229.2	211.0	181.7	158.0	150.7
62.5°	208.2	189.1	158.9	137.5	132.0
65°	186.3	166.7	137.5	117.8	112.3
67.5°	163.5	144.8	117.4	100.0	93.6
70°	142.0	122.8	96.8	81.7	77.2
72.5°	119.2	102.3	78.1	65.8	61.6
75°	99.1	82.2	60.7	50.2	47.5
77.5°	78.1	63.5	45.2	37.9	37.0
80°	58.0	44.8	31.1	29.7	29.2
82.5°	40.6	28.8	22.4	21.5	21.0
85°	24.7	15.5	14.2	13.2	13.2
87.5°	10.5	6.8	6.4	5.9	6.4
90°	0.6	4.5	10.2	11.3	11.9
92.5°	7.9	43.6	222.1	73.4	51.6
95°	18.7	58.9	461.9	228.6	138.3
97.5°	31.2	65.2	494.2	467.0	332.1
100°	43.1	73.6	455.6	646.0	519.7
102.5°	54.4	83.9	407.5	758.2	682.9
105°	66.3	96.0	371.8	800.4	797.4
107.5°	79.3	108.5	348.5	787.7	851.8
110°	92.4	121.0	337.8	742.4	852.9

TEST NUMBER: P1026324

CATALOG NUMBER: S124RDIP-B350D590UB27-4F0-XX-W2A-F4

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	104.8	133.4	332.7	686.8	819.5
115°	116.7	146.4	331.5	637.0	765.6
117.5°	129.2	158.6	331.0	597.9	712.9
120°	141.7	170.6	331.0	571.5	669.8
122.5°	153.0	182.2	330.4	554.2	635.8
125°	162.6	193.2	329.8	542.0	610.9
127.5°	171.7	203.4	328.7	530.4	595.0
130°	179.1	213.4	328.1	516.6	581.4
132.5°	186.4	221.8	327.6	500.1	566.1
135°	193.2	230.0	327.0	481.2	546.3
137.5°	200.0	237.2	327.0	460.8	523.1
140°	207.4	243.7	326.4	440.9	497.6
142.5°	215.3	249.6	326.4	422.5	470.4
145°	222.7	255.0	325.3	405.8	446.0
147.5°	231.2	260.1	323.6	391.9	423.3
150°	239.1	264.9	321.9	379.1	404.6
152.5°	246.5	269.5	319.1	368.4	387.6
155°	253.3	273.4	316.2	358.2	373.5
157.5°	260.1	277.1	313.4	348.5	360.4
160°	266.4	280.2	310.0	338.9	348.5
162.5°	272.0	282.8	306.6	329.6	337.2
165°	276.0	284.5	303.2	321.0	325.9
167.5°	280.5	285.9	299.8	313.6	316.8
170°	283.4	287.0	296.4	306.4	308.3
172.5°	286.2	287.9	293.0	299.8	299.8
175°	287.9	288.5	290.7	294.7	293.6
177.5°	289.0	288.5	289.0	291.0	289.0
180°	288.5	288.5	288.5	288.5	288.5

(END OF REPORT)