

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: P1026354

Luminaire Tested: S124RDIP-B350D810UB27-4F0-XX-W2A-F4

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1026354
REPORT IS A COMBINATION OF REPORTS P999384 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIP-B350D810UB27-4F0-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

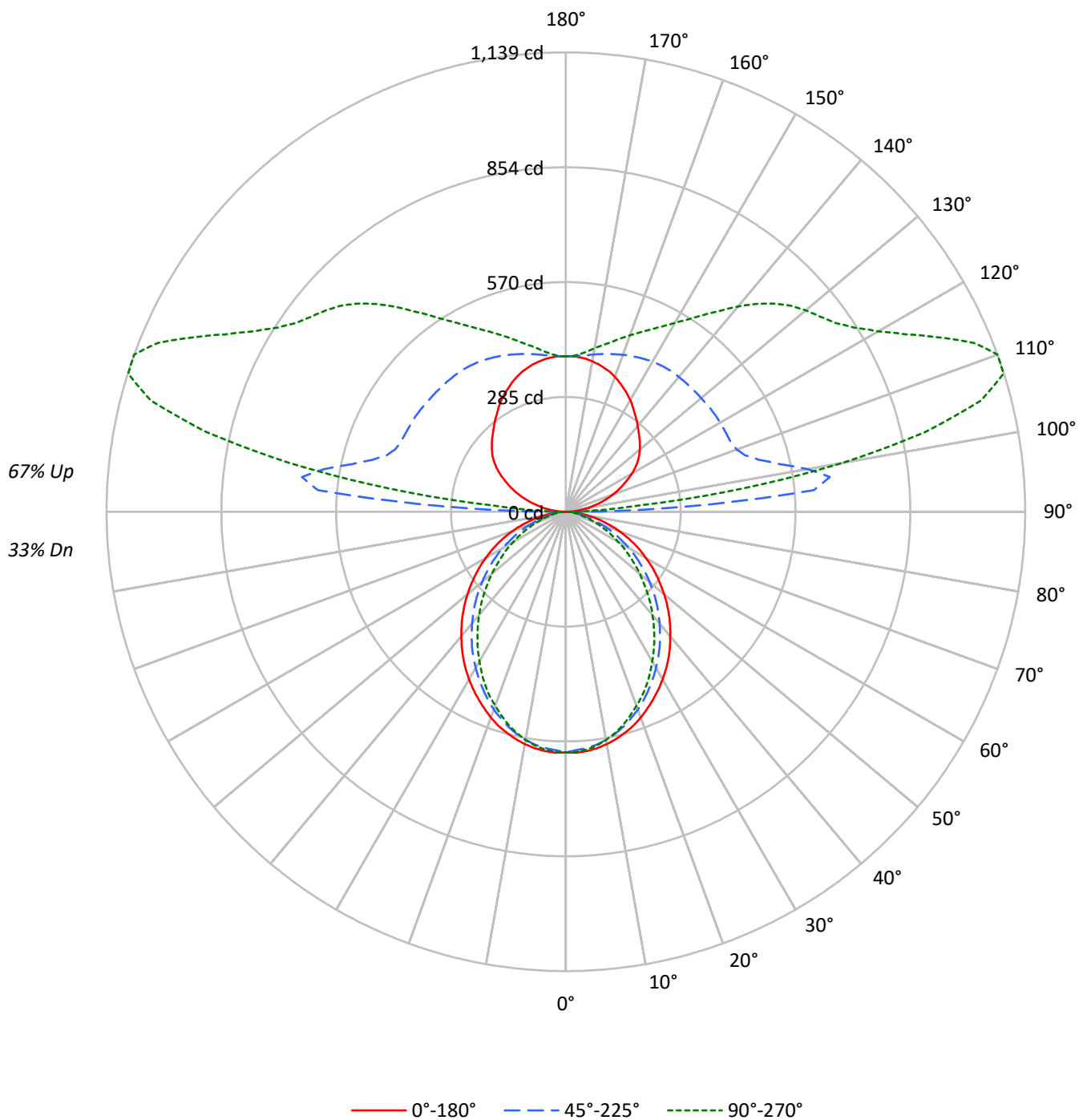
Lumens per Lamp: N/A
Luminaire Lumens: 4191.7 lumens
Efficiency: N/A
Efficacy: 122.9 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 34.1
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	103	103	103	103	93	93	93	93	74	74	74	56	56	56	40	40	40
1	94	90	86	83	85	81	78	75	65	63	61	50	48	47	36	35	34
2	86	79	73	68	77	71	66	62	57	54	51	44	42	40	32	30	29
3	78	69	62	57	70	63	57	52	50	46	43	39	36	34	28	27	25
4	72	61	54	48	64	56	49	44	45	40	36	35	32	29	25	23	22
5	66	55	47	41	59	50	43	38	40	35	31	31	28	25	23	21	19
6	61	49	41	36	54	44	38	33	36	31	27	28	25	22	21	19	17
7	56	44	36	31	50	40	33	29	33	28	24	26	22	19	19	17	15
8	52	40	32	27	47	36	30	25	30	25	21	23	20	17	18	15	13
9	48	36	29	24	43	33	27	23	27	22	19	22	18	16	16	14	12
10	45	33	26	22	41	30	24	20	25	20	17	20	16	14	15	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

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	56.1	1.3
10°-20°	156.4	3.7
20°-30°	225.7	5.4
30°-40°	255.9	6.1
40°-50°	247.0	5.9
50°-60°	205.4	4.9
60°-70°	141.8	3.4
70°-80°	71.6	1.7
80°-90°	19.7	0.5
90°-100°	286.2	6.8
100°-110°	582.2	13.9
110°-120°	518.9	12.4
120°-130°	435.9	10.4
130°-140°	363.7	8.7
140°-150°	277.8	6.6
150°-160°	195.3	4.7
160°-170°	114.8	2.7
170°-180°	37.3	0.9
0°-30°	438.2	10.5
0°-40°	694.0	16.6
0°-60°	1146.4	27.4
0°-90°	1379.5	32.9
90°-120°	1387.3	33.1
90°-150°	2464.7	58.8
90°-180°	2812.0	67.1
0°-180°	4191.7	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	6	14	15	16	3
95°	25	79	617	305	185	27
105°	89	128	497	1069	1065	94
115°	156	196	443	851	1023	155
125°	217	258	441	724	816	194
135°	258	307	437	643	730	200
145°	298	341	434	542	596	187
155°	338	365	422	478	499	156
165°	369	380	405	429	435	104
175°	385	385	388	394	392	37
180°	385	385	385	385	385	

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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°	0.8	6.1	13.6	15.1	15.9
92.5°	10.6	58.3	296.8	98.0	68.9
95°	25.0	78.7	617.0	305.4	184.7
97.5°	41.6	87.1	660.1	623.8	443.6
100°	57.5	98.4	608.7	863.0	694.2
102.5°	72.7	112.0	544.3	1013.0	912.2
105°	88.6	128.3	496.6	1069.3	1065.2
107.5°	106.0	145.0	465.6	1052.3	1137.8
110°	123.4	161.6	451.2	991.8	1139.3

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	140.1	178.3	444.4	917.6	1094.7
115°	156.0	195.7	442.9	851.0	1022.8
117.5°	172.6	212.0	442.1	798.7	952.4
120°	189.3	227.9	442.1	763.5	894.8
122.5°	204.4	243.4	441.4	740.4	849.4
125°	217.3	258.2	440.6	724.1	816.1
127.5°	229.4	271.8	439.1	708.6	794.9
130°	239.2	285.0	438.3	690.0	776.7
132.5°	249.1	296.4	437.6	668.1	756.3
135°	258.2	307.4	436.8	642.8	729.8
137.5°	267.2	316.8	436.8	615.5	698.7
140°	277.1	325.5	436.1	589.0	664.7
142.5°	287.7	333.5	436.1	564.4	628.3
145°	297.5	340.6	434.5	542.0	595.8
147.5°	308.9	347.5	432.3	523.5	565.5
150°	319.5	353.9	430.0	506.4	540.5
152.5°	329.3	360.0	426.2	492.1	517.8
155°	338.4	365.3	422.4	478.4	498.9
157.5°	347.5	370.2	418.6	465.6	481.5
160°	355.8	374.4	414.1	452.7	465.6
162.5°	363.4	377.8	409.6	440.2	450.4
165°	368.7	380.0	405.0	428.9	435.3
167.5°	374.7	381.9	400.5	419.0	423.2
170°	378.5	383.5	395.9	409.2	411.8
172.5°	382.3	384.6	391.4	400.4	400.5
175°	384.6	385.3	388.4	393.7	392.1
177.5°	386.1	385.3	386.1	388.8	386.1
180°	385.3	385.3	385.3	385.3	385.3

(END OF REPORT)