

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: P1011770

Luminaire Tested: S123DIP-B560D365UB27-4F0-XX-W2A-D1

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1011770
REPORT IS A COMBINATION OF REPORTS P990043 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIP-B560D365UB27-4F0-XX-W2A-D1
Description: Define 3 Direct/Indirect Pendant with 2700K BioUP LEDs {m-DER=0.473} {m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

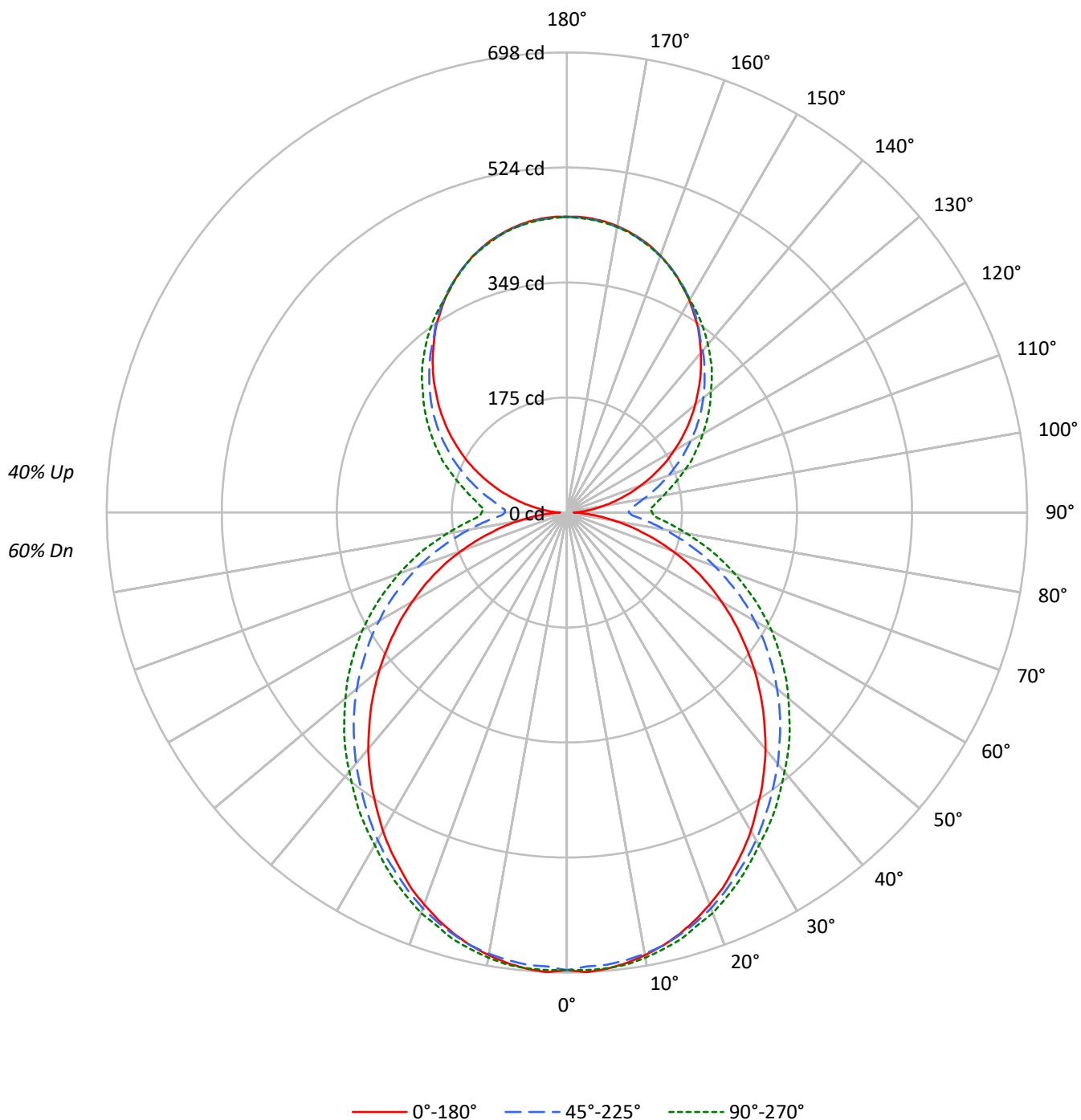
Lumens per Lamp: N/A
Luminaire Lumens: 3577.0 lumens
Efficiency: N/A
Efficacy: 107.4 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.25 / 1.37
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 33.3
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: P1011770

CATALOG NUMBER: S123DIP-B560D365UB27-4F0-XX-W2A-D1

Luminous Intensity Polar Plot



TEST NUMBER: P1011770

CATALOG NUMBER: S123DIP-B560D365UB27-4F0-XX-W2A-D1

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	89	89	89	76	76	76	65	65	65
1	99	94	89	85	92	88	84	80	76	73	70	65	63	61	56	54	52
2	89	81	74	69	83	76	70	65	66	61	57	57	53	50	48	46	43
3	81	71	63	57	75	66	59	54	58	52	48	50	45	42	42	39	36
4	74	63	54	48	69	59	51	45	51	45	40	44	39	36	38	34	31
5	68	56	47	41	63	52	44	39	46	39	35	39	35	31	34	30	27
6	63	50	41	35	58	47	39	33	41	35	30	36	31	27	31	27	23
7	58	45	37	31	54	42	35	29	37	31	26	32	27	24	28	24	21
8	54	41	33	27	50	38	31	26	34	28	23	30	25	21	26	22	19
9	50	37	30	24	47	35	28	23	31	25	21	27	22	19	24	20	17
10	47	34	27	22	44	32	25	21	29	23	19	25	20	17	22	18	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7472	7472	7472
5°	7492	7253	7247
10°	7423	7056	7003
15°	7325	6840	6743
20°	7184	6598	6464
25°	7013	6325	6177
30°	6838	6078	5887
35°	6641	5820	5651
40°	6452	5584	5402
45°	6243	5355	5196
50°	6038	5128	4974
55°	5809	4895	4769
60°	5586	4657	4558
65°	5357	4403	4313
70°	5009	4120	4059
75°	4572	3795	3797
80°	4066	3466	3499
85°	3564	3200	3285

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 6243 cd/sqm

TEST NUMBER: P1011770

CATALOG NUMBER: S123DIP-B560D365UB27-4F0-XX-W2A-D1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	65.9	1.8
10°-20°	187.7	5.2
20°-30°	280.7	7.8
30°-40°	335.2	9.4
40°-50°	350.7	9.8
50°-60°	329.1	9.2
60°-70°	274.9	7.7
70°-80°	196.5	5.5
80°-90°	117.9	3.3
90°-100°	102.4	2.9
100°-110°	141.4	4.0
110°-120°	184.9	5.2
120°-130°	216.3	6.0
130°-140°	229.3	6.4
140°-150°	218.3	6.1
150°-160°	182.1	5.1
160°-170°	121.2	3.4
170°-180°	42.5	1.2
0°-30°	534.3	14.9
0°-40°	869.5	24.3
0°-60°	1549.3	43.3
0°-90°	2138.6	59.8
90°-120°	428.7	12.0
90°-150°	1092.6	30.5
90°-180°	1438.0	40.2
0°-180°	3577.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	694	694	694	694	694	
5°	695	693	689	695	694	66
15°	662	664	663	671	670	186
25°	597	605	607	617	617	275
35°	514	526	536	548	550	322
45°	420	439	458	472	478	324
55°	321	346	373	393	399	287
65°	222	251	284	307	315	219
75°	120	156	194	218	228	128
85°	37	75	115	141	148	38
90°	10	51	94	121	129	9
95°	29	61	101	126	133	29
105°	85	104	140	161	169	91
115°	154	164	190	209	214	152
125°	222	223	244	258	262	198
135°	286	287	295	308	310	220
145°	346	346	347	352	354	216
155°	395	395	395	397	394	182
165°	430	429	429	431	429	121
175°	448	446	446	448	446	43
180°	449	449	449	449	449	

TEST NUMBER: P1011770

CATALOG NUMBER: S123DIP-B560D365UB27-4F0-XX-W2A-D1

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	694.2	694.2	694.2	694.2	694.2
2.5°	698.0	695.7	689.6	695.7	694.9
5°	694.9	693.4	688.9	694.9	694.2
7.5°	689.6	689.6	685.1	692.7	691.9
10°	682.1	683.6	679.8	687.4	685.9
12.5°	673.0	675.3	673.0	679.8	678.3
15°	661.7	663.9	663.2	670.7	670.0
17.5°	648.1	652.6	651.8	658.6	657.1
20°	632.9	637.5	639.0	645.8	646.5
22.5°	617.1	621.6	623.9	632.9	632.2
25°	597.4	605.0	607.2	617.1	617.1
27.5°	578.5	586.8	591.3	599.7	600.4
30°	558.1	567.9	573.9	583.0	583.0
32.5°	535.4	546.7	555.0	564.9	567.1
35°	514.2	526.3	536.1	547.5	550.5
37.5°	491.5	505.1	516.5	529.3	531.6
40°	468.8	482.4	497.6	510.4	513.5
42.5°	443.9	461.3	477.2	491.5	496.1
45°	420.4	438.6	457.5	471.9	477.9
47.5°	395.5	415.9	437.1	453.0	457.5
50°	371.3	392.5	415.9	433.3	438.6
52.5°	345.6	368.3	394.7	412.9	419.7
55°	320.6	345.6	372.8	393.2	399.3
57.5°	296.4	322.1	351.6	372.0	378.9
60°	270.7	297.9	328.9	350.1	358.4
62.5°	246.5	274.5	307.8	328.9	336.5
65°	221.6	251.1	284.3	307.0	314.6
67.5°	196.6	227.6	260.9	285.8	291.9
70°	170.1	202.7	239.0	263.2	270.7
72.5°	145.9	178.5	216.3	241.2	248.8
75°	120.2	155.8	193.6	218.5	227.6
77.5°	98.3	133.8	171.7	198.1	204.9
80°	74.9	111.9	151.2	176.9	184.5
82.5°	54.4	92.3	132.3	158.0	165.6
85°	37.1	74.9	114.9	140.7	148.2
87.5°	22.7	60.5	99.1	124.8	132.3
90°	10.2	50.8	93.9	121.1	129.3
92.5°	19.7	54.3	94.2	120.3	126.4
95°	29.1	61.1	101.0	125.8	133.4
97.5°	41.8	70.7	108.4	132.8	140.1
100°	54.7	81.0	117.6	140.6	148.9
102.5°	69.8	92.0	128.6	150.8	158.0
105°	85.3	104.2	139.9	161.1	168.6
107.5°	102.9	119.2	151.6	173.0	179.5
110°	119.0	133.3	164.3	185.5	190.7



TEST NUMBER: P1011770

CATALOG NUMBER: S123DIP-B560D365UB27-4F0-XX-W2A-D1

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	136.7	147.6	176.4	197.1	203.9
115°	153.6	163.7	190.2	208.7	214.4
117.5°	171.5	177.9	202.9	221.1	226.0
120°	187.3	193.2	216.5	233.5	238.0
122.5°	204.6	207.5	230.3	245.8	250.1
125°	221.5	222.6	243.8	258.2	262.1
127.5°	237.7	239.0	257.2	270.2	274.1
130°	253.9	255.9	270.0	283.0	285.0
132.5°	269.3	272.2	282.8	294.7	298.2
135°	285.9	287.3	295.3	307.5	310.5
137.5°	301.1	302.1	308.4	318.7	321.5
140°	316.2	318.0	320.5	331.6	332.8
142.5°	330.7	331.6	332.3	341.8	343.8
145°	345.8	345.7	346.8	352.4	354.1
147.5°	358.1	359.5	360.5	362.8	363.7
150°	371.8	372.5	373.2	373.2	372.6
152.5°	383.1	384.1	384.5	385.2	383.4
155°	395.1	395.1	395.4	396.8	394.4
157.5°	405.3	404.9	405.3	406.7	404.6
160°	414.8	414.1	414.1	415.8	414.4
162.5°	423.2	422.2	422.5	424.3	421.8
165°	430.3	429.2	429.2	431.4	428.9
167.5°	436.3	434.9	435.2	437.3	435.2
170°	441.2	439.8	439.8	442.3	439.8
172.5°	445.1	443.7	443.7	445.8	443.3
175°	447.6	446.2	446.2	448.3	445.8
177.5°	449.0	447.6	447.6	449.7	447.2
180°	448.6	448.6	448.6	448.6	448.6

(END OF REPORT)