

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: P1011796

Luminaire Tested: S123DIP-B560D365UB40-4F0-XX-W2A-D

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1011796
REPORT IS A COMBINATION OF REPORTS P990084 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIP-B560D365UB40-4F0-XX-W2A-D
Description: Define 3 Direct/Indirect Pendant with 4000K BioUP LEDs {m-DER=0.865} {m-EER=0.951}
Light Source: -
Ballast/Driver: -

Summary

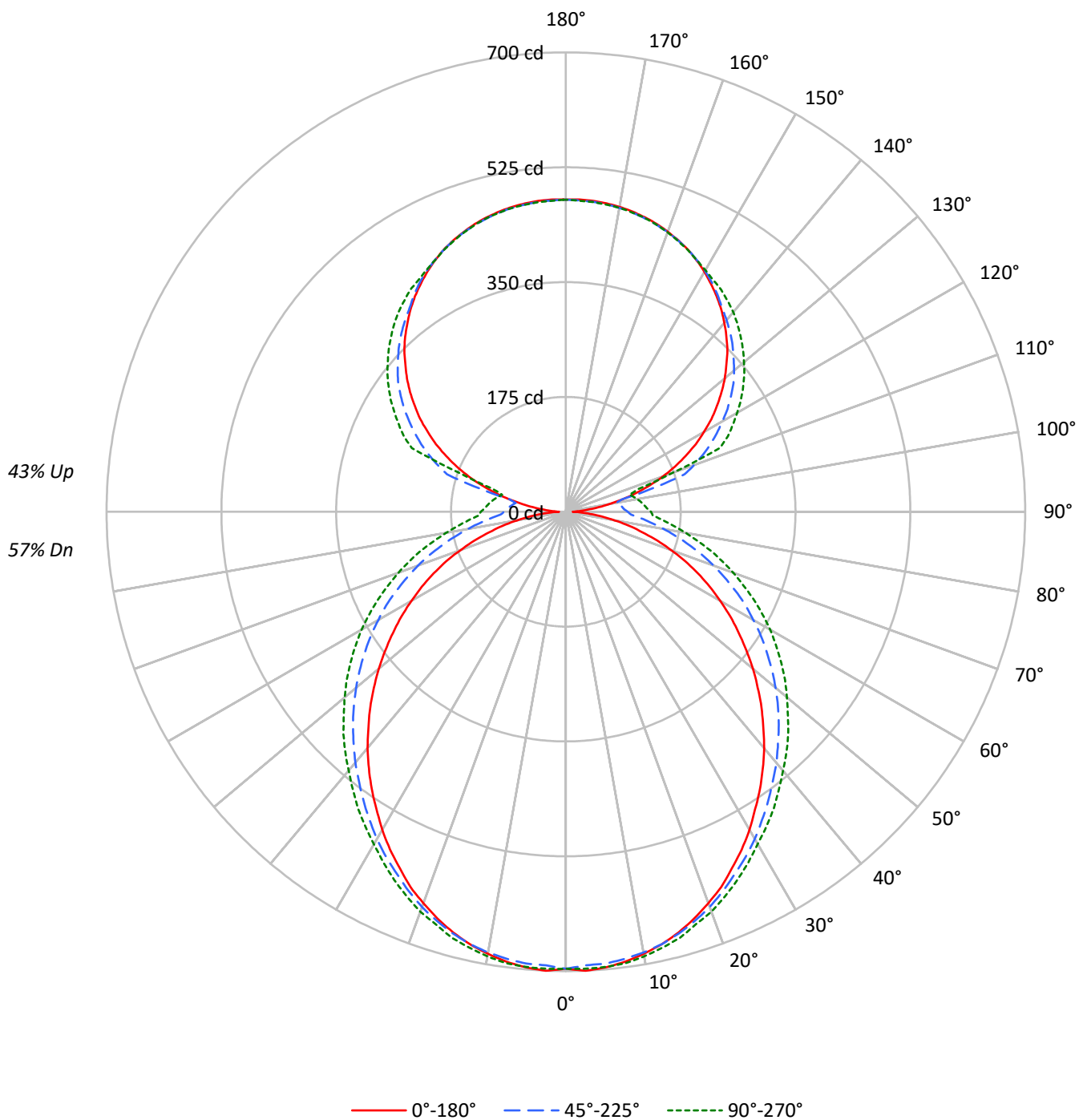
Lumens per Lamp: N/A
Luminaire Lumens: 3791.0 lumens
Efficiency: N/A
Efficacy: 113.8 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.25 / 1.37
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

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

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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	109	109	109	109		101	101	101	101		87	87	87		74	74	74		62	62	62
1	98	93	89	85		91	87	83	79		75	72	69		63	61	59		53	52	50
2	89	81	74	68		82	75	69	64		65	60	56		55	52	49		46	44	41
3	81	71	63	56		75	66	59	53		57	51	47		48	44	41		40	37	35
4	74	62	54	47		68	58	51	45		50	44	40		43	38	34		36	32	30
5	68	55	47	40		62	52	44	38		45	39	34		38	33	30		32	29	26
6	62	50	41	35		58	46	39	33		40	34	29		35	30	26		29	25	22
7	58	45	36	31		53	42	34	29		36	30	26		31	26	23		27	23	20
8	53	41	33	27		49	38	31	26		33	27	23		29	24	20		24	21	18
9	50	37	29	24		46	35	28	23		30	25	21		26	22	18		23	19	16
10	46	34	26	22		43	32	25	21		28	22	18		24	20	16		21	17	14

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7495	7495	7495
5°	7515	7275	7269
10°	7444	7078	7023
15°	7347	6860	6764
20°	7206	6618	6484
25°	7034	6344	6195
30°	6858	6097	5905
35°	6661	5837	5668
40°	6471	5601	5418
45°	6263	5371	5212
50°	6056	5144	4988
55°	5827	4910	4783
60°	5602	4671	4572
65°	5371	4417	4325
70°	5027	4132	4071
75°	4588	3807	3809
80°	4077	3477	3510
85°	3573	3211	3296

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 6263 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	66.0	1.7
10°-20°	188.3	5.0
20°-30°	281.6	7.4
30°-40°	336.2	8.9
40°-50°	351.8	9.3
50°-60°	330.1	8.7
60°-70°	275.7	7.3
70°-80°	197.1	5.2
80°-90°	118.3	3.1
90°-100°	90.5	2.4
100°-110°	135.3	3.6
110°-120°	234.9	6.2
120°-130°	272.9	7.2
130°-140°	278.8	7.4
140°-150°	254.0	6.7
150°-160°	203.3	5.4
160°-170°	131.2	3.5
170°-180°	45.2	1.2
0°-30°	535.9	14.1
0°-40°	872.1	23.0
0°-60°	1553.9	41.0
0°-90°	2145.0	56.6
90°-120°	460.7	12.2
90°-150°	1266.3	33.4
90°-180°	1646.0	43.4
0°-180°	3791.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	696	696	696	696	696	
5°	697	696	691	697	696	66
15°	664	666	665	673	672	187
25°	599	607	609	619	619	276
35°	516	528	538	549	552	323
45°	422	440	459	473	479	325
55°	322	347	374	394	400	288
65°	222	252	285	308	316	220
75°	121	156	194	219	228	129
85°	37	75	115	141	149	38
90°	10	51	94	121	130	8
95°	30	45	86	112	120	32
105°	111	134	134	93	100	118
115°	201	213	243	265	272	199
125°	281	284	307	324	330	251
135°	348	350	359	374	377	268
145°	401	402	403	410	413	251
155°	441	440	440	442	440	203
165°	465	464	463	466	464	131
175°	476	474	474	477	474	45
180°	476	476	476	476	476	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	696.3	696.3	696.3	696.3	696.3
2.5°	700.1	697.8	691.7	697.8	697.0
5°	697.0	695.5	691.0	697.0	696.3
7.5°	691.7	691.7	687.2	694.7	694.0
10°	684.1	685.6	681.9	689.4	687.9
12.5°	675.0	677.3	675.0	681.9	680.3
15°	663.7	665.9	665.2	672.8	672.0
17.5°	650.0	654.6	653.8	660.6	659.1
20°	634.8	639.4	640.9	647.7	648.5
22.5°	618.9	623.5	625.7	634.8	634.1
25°	599.2	606.8	609.0	618.9	618.9
27.5°	580.2	588.6	593.1	601.5	602.2
30°	559.7	569.6	575.7	584.8	584.8
32.5°	537.0	548.4	556.7	566.6	568.8
35°	515.8	527.9	537.7	549.1	552.2
37.5°	493.0	506.7	518.0	530.9	533.2
40°	470.2	483.9	499.1	512.0	515.0
42.5°	445.2	462.7	478.6	493.0	497.5
45°	421.7	439.9	458.9	473.3	479.3
47.5°	396.7	417.2	438.4	454.3	458.9
50°	372.4	393.6	417.2	434.6	439.9
52.5°	346.6	369.4	395.9	414.1	420.9
55°	321.6	346.6	373.9	394.4	400.5
57.5°	297.3	323.1	352.7	373.2	380.0
60°	271.5	298.8	329.9	351.2	359.5
62.5°	247.3	275.3	308.7	329.9	337.5
65°	222.2	251.8	285.2	307.9	315.5
67.5°	197.2	228.3	261.7	286.7	292.8
70°	170.7	203.3	239.7	263.9	271.5
72.5°	146.4	179.0	216.9	241.9	249.5
75°	120.6	156.2	194.2	219.2	228.3
77.5°	98.6	134.2	172.2	198.7	205.5
80°	75.1	112.3	151.7	177.5	185.1
82.5°	54.6	92.5	132.7	158.5	166.1
85°	37.2	75.1	115.3	141.1	148.7
87.5°	22.8	60.7	99.4	125.1	132.7
90°	10.3	50.9	94.2	121.4	129.7
92.5°	17.2	47.7	88.8	116.4	123.5
95°	29.9	45.0	86.1	112.0	119.6
97.5°	46.8	64.2	81.8	107.4	115.4
100°	66.5	97.9	77.7	102.5	110.4
102.5°	89.1	114.9	87.5	97.2	105.5
105°	111.4	133.5	134.3	92.9	100.4
107.5°	134.3	153.4	189.8	155.8	116.4
110°	157.3	173.7	207.9	216.0	171.5



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	179.9	192.9	225.6	247.8	253.9
115°	201.3	212.6	243.0	264.8	272.3
117.5°	223.2	231.8	259.3	280.4	286.8
120°	242.6	249.6	275.7	296.0	301.3
122.5°	263.1	267.2	292.1	310.4	316.2
125°	280.8	283.6	307.0	323.6	329.6
127.5°	299.1	301.2	321.9	338.1	342.8
130°	316.1	318.1	334.7	350.6	354.3
132.5°	331.6	334.4	346.8	361.9	366.2
135°	348.2	349.6	359.3	374.1	376.7
137.5°	362.3	364.4	370.4	384.3	387.4
140°	375.7	377.9	381.1	393.9	397.0
142.5°	388.8	390.1	391.2	402.1	404.9
145°	400.8	402.5	403.2	410.0	413.0
147.5°	411.7	413.5	414.2	417.2	418.4
150°	422.3	423.3	424.1	424.8	425.2
152.5°	431.8	432.2	432.5	433.9	432.2
155°	440.7	440.0	440.3	442.1	440.0
157.5°	447.7	447.7	447.4	449.5	446.7
160°	454.1	453.7	453.4	455.5	453.0
162.5°	460.1	459.0	458.7	461.2	459.0
165°	464.7	463.6	463.3	466.1	463.6
167.5°	468.6	467.2	467.2	470.0	467.2
170°	471.8	470.3	470.3	473.2	470.3
172.5°	473.9	472.1	472.5	475.3	472.1
175°	475.6	473.9	474.2	476.7	473.9
177.5°	476.4	474.6	474.9	477.8	474.2
180°	475.6	475.6	475.6	475.6	475.6

(END OF REPORT)