

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: P1011455

Luminaire Tested: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1011455
REPORT IS A COMBINATION OF REPORTS P989617 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIP-B1165D805UB50-4F0-XX-W2A-F1
Description: Define 3 Direct/Indirect Pendant with 5000K BioUP LEDs {m-DER=1.015} {m-EER=1.115}
Light Source: -
Ballast/Driver: -

Summary

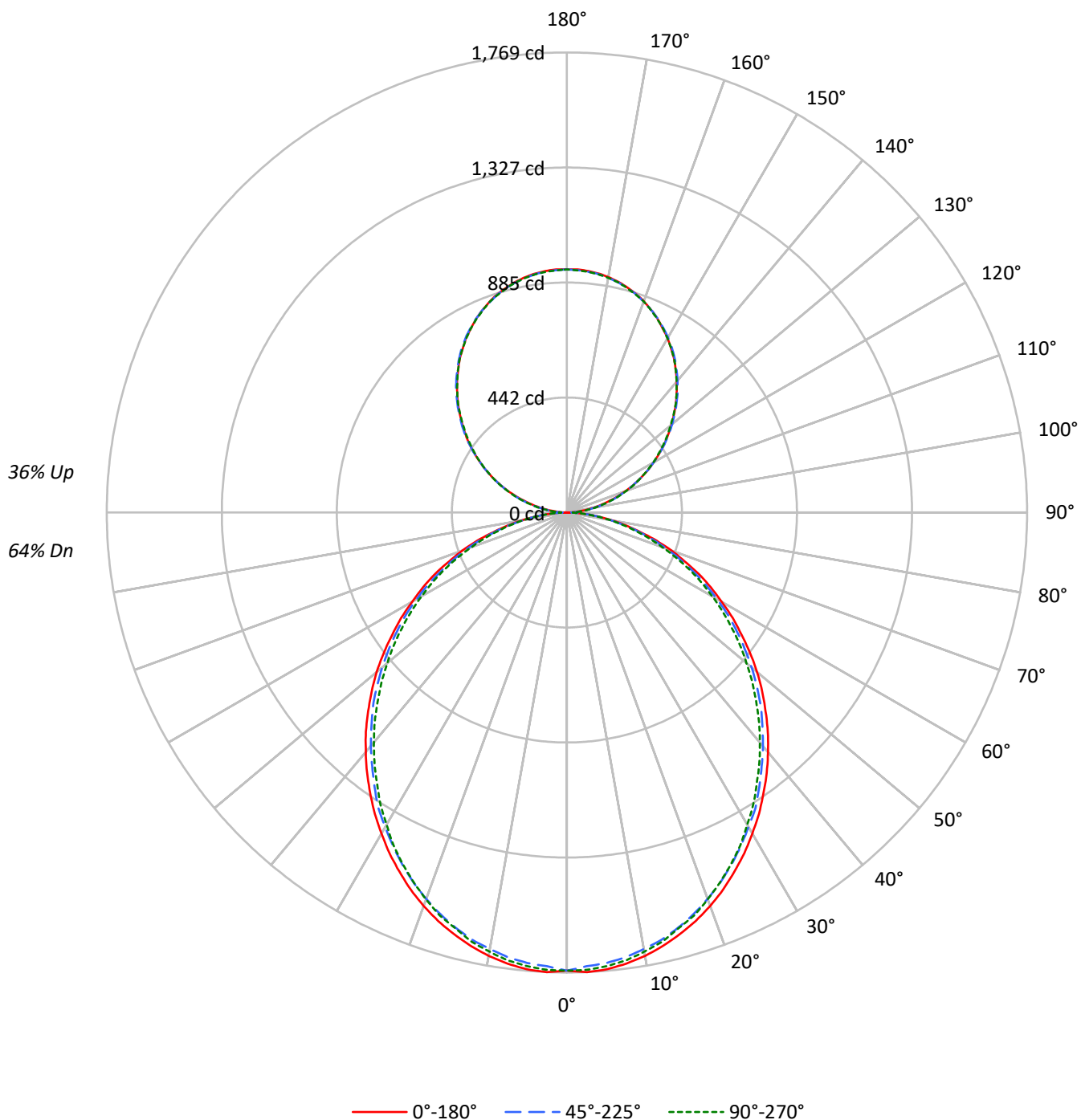
Lumens per Lamp: N/A
Luminaire Lumens: 7177.0 lumens
Efficiency: N/A
Efficacy: 87.1 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.18 / 1.3
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: Semi-Direct

Input Watts (W): 82.4
Input Voltage (V):
Input Current (A_{in}): 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: P1011455

CATALOG NUMBER: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

Luminous Intensity Polar Plot



TEST NUMBER: P1011455

CATALOG NUMBER: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

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	104	104	104	104	91	91	91	80	80	80	69	69	69
1	101	96	92	89	94	91	87	84	80	77	75	70	68	66	61	59	58
2	92	84	78	72	86	79	74	69	70	66	62	61	58	55	53	51	49
3	84	74	66	60	78	70	63	58	62	56	52	54	50	47	47	44	42
4	77	66	57	51	72	62	55	49	55	49	44	48	44	40	42	39	36
5	70	58	50	44	66	55	48	42	49	43	38	43	39	35	38	34	31
6	65	53	44	38	61	50	42	37	44	38	34	39	34	30	35	31	27
7	60	47	39	34	56	45	38	32	40	34	30	36	31	27	32	28	24
8	56	43	35	30	52	41	34	29	37	31	26	33	28	24	29	25	22
9	52	40	32	27	49	38	30	26	34	28	24	30	25	22	27	23	20
10	49	36	29	24	46	35	28	23	31	25	21	28	23	20	25	21	18

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	18963	18963	18963
5°	19010	18309	18281
10°	18841	17689	17508
15°	18579	17045	16664
20°	18278	16330	15828
25°	17890	15574	14935
30°	17464	14793	13996
35°	17020	13994	13061
40°	16554	13157	12144
45°	16041	12340	11184
50°	15518	11431	10221
55°	14849	10482	9245
60°	14159	9436	8206
65°	13513	8305	7123
70°	12581	7050	5860
75°	11237	5583	4550
80°	9702	3924	3218
85°	7569	2108	1611

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 16041 cd/sqm

TEST NUMBER: P1011455

CATALOG NUMBER: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	166.1	2.3
10°-20°	469.0	6.5
20°-30°	692.6	9.7
30°-40°	808.9	11.3
40°-50°	813.2	11.3
50°-60°	714.4	10.0
60°-70°	532.0	7.4
70°-80°	302.8	4.2
80°-90°	88.0	1.2
90°-100°	60.2	0.8
100°-110°	182.1	2.5
110°-120°	310.1	4.3
120°-130°	407.9	5.7
130°-140°	458.5	6.4
140°-150°	450.7	6.3
150°-160°	379.5	5.3
160°-170°	252.6	3.5
170°-180°	88.5	1.2
0°-30°	1327.7	18.5
0°-40°	2136.6	29.8
0°-60°	3664.1	51.1
0°-90°	4587.0	63.9
90°-120°	552.3	7.7
90°-150°	1869.5	26.0
90°-180°	2590.0	36.1
0°-180°	7177.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1762	1762	1762	1762	1762	
5°	1763	1756	1739	1754	1751	167
15°	1678	1672	1653	1665	1656	473
25°	1524	1515	1495	1497	1492	702
35°	1318	1309	1289	1280	1272	825
45°	1080	1074	1054	1036	1029	834
55°	820	818	798	782	774	734
65°	559	551	536	524	520	551
75°	295	289	285	277	273	316
85°	79	76	76	73	73	84
90°	1	8	18	21	22	9
95°	43	48	54	57	57	48
105°	165	167	173	173	175	177
115°	312	314	313	314	313	309
125°	457	459	458	454	452	407
135°	593	597	596	593	592	457
145°	719	720	722	722	719	449
155°	823	823	824	827	822	379
165°	897	894	894	899	894	253
175°	932	930	930	934	929	89
180°	935	935	935	935	935	

TEST NUMBER: P1011455

CATALOG NUMBER: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1761.7	1761.7	1761.7	1761.7	1761.7
2.5°	1769.3	1763.2	1746.6	1761.7	1760.2
5°	1763.2	1755.7	1739.0	1754.2	1751.1
7.5°	1749.6	1742.0	1725.4	1739.0	1737.5
10°	1731.4	1723.9	1704.2	1717.8	1714.8
12.5°	1707.2	1701.1	1683.0	1692.0	1690.5
15°	1678.4	1672.4	1652.7	1664.8	1655.7
17.5°	1646.6	1639.0	1619.3	1628.4	1625.4
20°	1610.2	1601.2	1581.5	1587.5	1583.0
22.5°	1569.3	1560.3	1540.6	1545.1	1539.1
25°	1523.9	1514.8	1495.1	1496.6	1492.1
27.5°	1476.9	1467.9	1446.6	1448.2	1443.6
30°	1425.4	1417.9	1396.7	1396.7	1386.1
32.5°	1373.9	1363.3	1348.2	1337.6	1333.0
35°	1317.9	1308.8	1289.1	1280.0	1272.4
37.5°	1261.8	1249.7	1230.0	1219.4	1214.9
40°	1202.8	1193.7	1172.5	1160.3	1154.3
42.5°	1143.7	1133.1	1111.9	1099.8	1093.7
45°	1080.1	1074.0	1054.3	1036.1	1028.6
47.5°	1018.0	1008.9	990.7	972.5	966.5
50°	954.3	946.8	927.1	910.4	901.3
52.5°	887.7	883.1	861.9	848.3	839.2
55°	819.5	818.0	798.3	781.6	774.1
57.5°	755.9	749.8	734.7	719.5	710.4
60°	686.2	684.7	666.5	652.9	645.3
62.5°	624.1	619.6	601.4	587.7	583.2
65°	559.0	551.4	536.2	524.1	519.6
67.5°	489.3	483.2	471.1	460.5	454.4
70°	427.2	418.1	409.0	398.4	390.8
72.5°	362.0	356.0	345.4	336.3	333.3
75°	295.4	289.3	284.8	277.2	272.7
77.5°	236.3	233.3	227.2	221.2	221.2
80°	178.7	174.2	171.2	169.7	169.7
82.5°	122.7	122.7	122.7	119.7	118.2
85°	78.8	75.7	75.7	72.7	72.7
87.5°	39.4	34.8	33.3	31.8	31.8
90°	0.7	8.1	17.6	20.6	22.0
92.5°	22.0	26.4	30.8	33.0	31.6
95°	43.3	48.5	54.3	57.3	57.3
97.5°	71.2	74.9	79.3	83.0	82.2
100°	99.9	104.3	107.9	110.1	111.6
102.5°	132.9	135.1	140.2	142.5	141.7
105°	165.2	166.7	173.3	173.3	174.8
107.5°	203.4	204.1	207.1	209.3	208.5
110°	238.6	240.1	241.6	244.5	243.0

TEST NUMBER: P1011455

CATALOG NUMBER: S123DIP-B1165D805UB50-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	275.4	276.1	276.1	279.8	279.8
115°	312.1	314.3	312.8	313.5	312.8
117.5°	349.5	350.3	348.8	348.8	346.6
120°	384.0	388.4	384.8	384.0	382.6
122.5°	420.0	423.0	421.5	419.3	417.1
125°	456.7	458.9	457.5	454.5	451.6
127.5°	490.5	494.9	493.4	489.0	486.1
130°	524.3	530.2	528.0	525.0	519.9
132.5°	558.1	563.9	562.5	558.8	555.1
135°	592.6	597.0	596.2	593.3	591.8
137.5°	624.1	627.8	630.0	626.3	624.1
140°	657.2	660.9	661.6	660.9	655.7
142.5°	687.3	691.0	692.4	691.7	688.0
145°	718.9	720.3	722.5	721.8	718.9
147.5°	746.0	749.0	751.2	751.2	746.8
150°	774.7	776.1	777.6	777.6	773.2
152.5°	798.2	800.4	801.1	802.6	798.9
155°	823.1	823.1	823.9	826.8	821.7
157.5°	844.4	843.7	844.4	847.4	843.0
160°	864.3	862.8	862.8	866.5	863.5
162.5°	881.9	879.7	880.4	884.1	878.9
165°	896.6	894.4	894.4	898.8	893.6
167.5°	909.1	906.1	906.8	911.3	906.8
170°	919.3	916.4	916.4	921.5	916.4
172.5°	927.4	924.5	924.5	928.9	923.7
175°	932.5	929.6	929.6	934.0	928.9
177.5°	935.5	932.5	932.5	937.0	931.8
180°	934.8	934.8	934.8	934.8	934.8

(END OF REPORT)