

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: P1011290

Luminaire Tested: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1011290
REPORT IS A COMBINATION OF REPORTS P989386 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1
Description: Define 3 Direct/Indirect Pendant with 2700K BioUP LEDs {m-DER=0.473} {m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

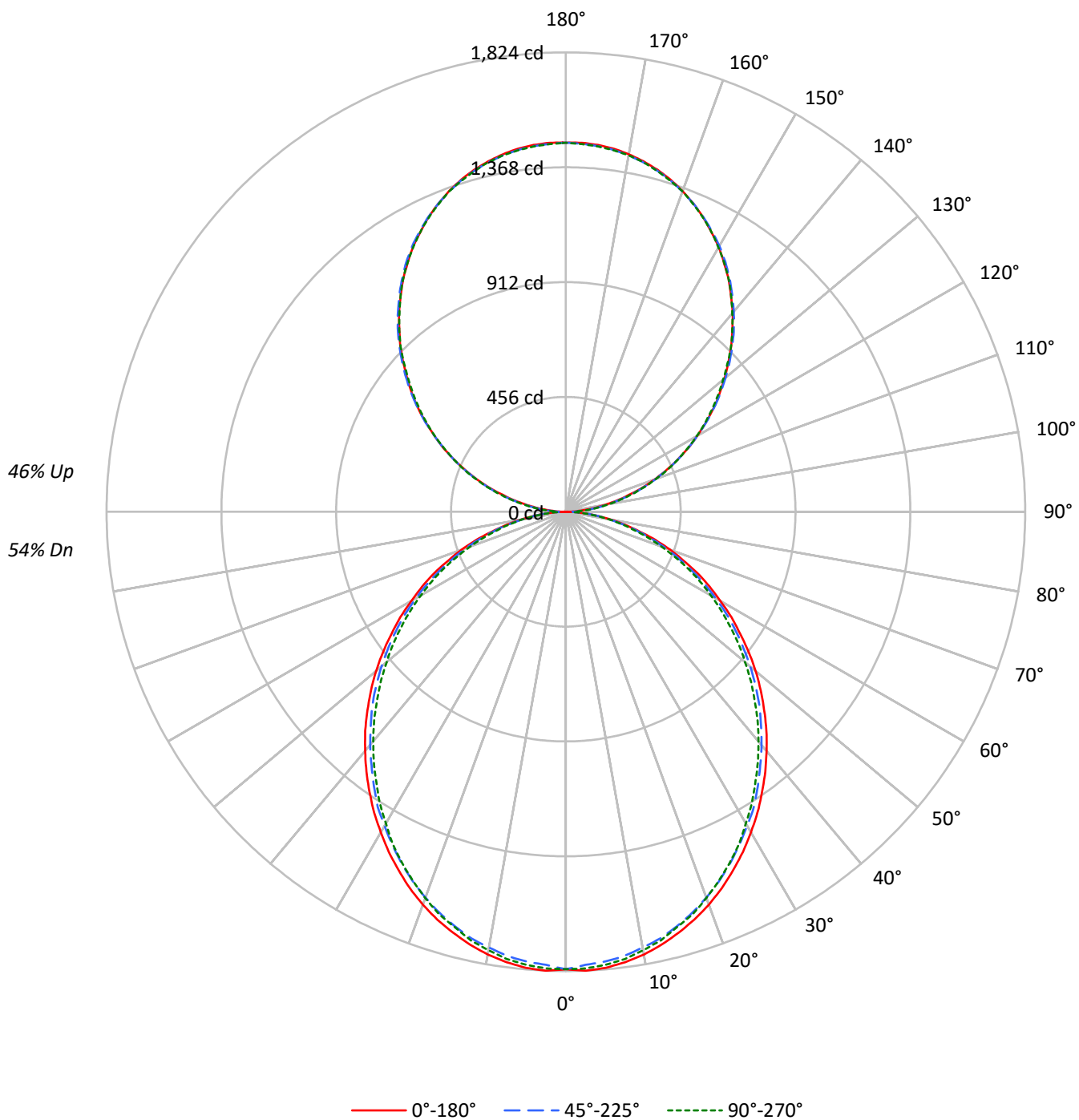
Lumens per Lamp: N/A
Luminaire Lumens: 8791.0 lumens
Efficiency: N/A
Efficacy: 91.3 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.18 / 1.3
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 96.3
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: P1011290

CATALOG NUMBER: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1

Luminous Intensity Polar Plot



TEST NUMBER: P1011290

CATALOG NUMBER: S123DIP-B1165D1195UB27-4F0-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	108	108	108	108	100	100	100	100	85	85	85	72	72	72	60	60	60
1	99	94	90	87	91	87	84	81	75	72	70	63	61	60	53	51	50
2	90	82	76	71	83	76	71	66	66	61	58	56	53	50	46	44	42
3	82	72	65	59	76	67	61	55	58	53	49	49	45	42	41	38	36
4	75	64	56	50	69	60	52	47	51	46	42	44	40	36	37	33	31
5	69	57	49	43	63	53	46	40	46	40	36	39	35	31	33	30	27
6	63	51	43	37	58	48	40	35	41	36	31	35	31	27	30	26	24
7	59	46	38	33	54	43	36	31	38	32	28	32	28	24	27	24	21
8	54	42	34	29	50	39	32	27	34	29	24	30	25	22	25	22	19
9	51	38	31	26	47	36	29	24	31	26	22	27	23	19	23	20	17
10	47	35	28	23	44	33	26	22	29	24	20	25	21	18	21	18	16

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	19550	19550	19550
5°	19600	18876	18848
10°	19425	18237	18050
15°	19155	17572	17181
20°	18845	16834	16318
25°	18444	16057	15398
30°	18006	15251	14429
35°	17547	14428	13467
40°	17066	13565	12519
45°	16537	12723	11530
50°	15999	11785	10537
55°	15309	10807	9531
60°	14599	9730	8461
65°	13931	8563	7344
70°	12969	7269	6041
75°	11583	5755	4690
80°	10006	4046	3317
85°	7800	2175	1662

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 16537 cd/sqm

TEST NUMBER: P1011290

CATALOG NUMBER: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	171.2	1.9
10°-20°	483.5	5.5
20°-30°	714.1	8.1
30°-40°	834.0	9.5
40°-50°	838.4	9.5
50°-60°	736.5	8.4
60°-70°	548.5	6.2
70°-80°	312.1	3.6
80°-90°	91.8	1.0
90°-100°	94.3	1.1
100°-110°	285.6	3.2
110°-120°	486.1	5.5
120°-130°	639.5	7.3
130°-140°	718.9	8.2
140°-150°	706.7	8.0
150°-160°	595.0	6.8
160°-170°	396.1	4.5
170°-180°	138.7	1.6
0°-30°	1368.8	15.6
0°-40°	2202.7	25.1
0°-60°	3777.6	43.0
0°-90°	4730.1	53.8
90°-120°	866.0	9.9
90°-150°	2931.1	33.3
90°-180°	4061.0	46.2
0°-180°	8791.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1816	1816	1816	1816	1816	
5°	1818	1810	1793	1808	1805	172
15°	1730	1724	1704	1716	1707	488
25°	1571	1562	1541	1543	1538	724
35°	1359	1349	1329	1320	1312	850
45°	1114	1107	1087	1068	1060	860
55°	845	843	823	806	798	757
65°	576	568	553	540	536	569
75°	304	298	294	286	281	325
85°	81	78	78	75	75	87
90°	1	13	28	32	34	11
95°	68	76	85	90	90	75
105°	259	261	272	272	274	277
115°	489	493	490	492	490	484
125°	716	720	717	713	708	639
135°	929	936	935	930	928	716
145°	1127	1129	1133	1132	1127	704
155°	1291	1291	1292	1296	1288	594
165°	1406	1402	1402	1409	1401	396
175°	1462	1458	1458	1464	1456	139
180°	1466	1466	1466	1466	1466	

TEST NUMBER: P1011290

CATALOG NUMBER: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1816.3	1816.3	1816.3	1816.3	1816.3
2.5°	1824.1	1817.9	1800.7	1816.3	1814.7
5°	1817.9	1810.0	1792.9	1808.5	1805.4
7.5°	1803.8	1796.0	1778.8	1792.9	1791.3
10°	1785.1	1777.2	1756.9	1771.0	1767.9
12.5°	1760.1	1753.8	1735.1	1744.5	1742.9
15°	1730.4	1724.1	1703.8	1716.3	1707.0
17.5°	1697.6	1689.8	1669.5	1678.9	1675.7
20°	1660.1	1650.7	1630.4	1636.7	1632.0
22.5°	1618.0	1608.6	1588.3	1593.0	1586.7
25°	1571.1	1561.7	1541.4	1543.0	1538.3
27.5°	1522.7	1513.3	1491.5	1493.0	1488.3
30°	1469.6	1461.8	1439.9	1439.9	1429.0
32.5°	1416.5	1405.6	1389.9	1379.0	1374.3
35°	1358.7	1349.3	1329.0	1319.7	1311.9
37.5°	1300.9	1288.4	1268.1	1257.2	1252.5
40°	1240.0	1230.6	1208.8	1196.3	1190.0
42.5°	1179.1	1168.2	1146.3	1133.8	1127.6
45°	1113.5	1107.3	1087.0	1068.2	1060.4
47.5°	1049.5	1040.1	1021.4	1002.6	996.4
50°	983.9	976.1	955.8	938.6	929.2
52.5°	915.2	910.5	888.6	874.6	865.2
55°	844.9	843.3	823.0	805.9	798.0
57.5°	779.3	773.1	757.4	741.8	732.5
60°	707.5	705.9	687.2	673.1	665.3
62.5°	643.4	638.7	620.0	606.0	601.3
65°	576.3	568.5	552.9	540.4	535.7
67.5°	504.4	498.2	485.7	474.8	468.5
70°	440.4	431.0	421.7	410.7	402.9
72.5°	373.3	367.0	356.1	346.7	343.6
75°	304.5	298.3	293.6	285.8	281.1
77.5°	243.6	240.5	234.3	228.0	228.0
80°	184.3	179.6	176.5	174.9	174.9
82.5°	126.5	126.5	126.5	123.4	121.8
85°	81.2	78.1	78.1	75.0	75.0
87.5°	40.6	35.9	34.4	32.8	32.8
90°	1.2	12.7	27.6	32.2	34.5
92.5°	34.5	41.4	48.4	51.8	49.5
95°	67.9	76.0	85.2	89.8	89.8
97.5°	111.7	117.4	124.3	130.1	128.9
100°	156.6	163.5	169.2	172.7	175.0
102.5°	208.4	211.8	219.9	223.4	222.2
105°	259.0	261.3	271.7	271.7	274.0
107.5°	318.9	320.1	324.7	328.1	327.0
110°	374.2	376.5	378.8	383.4	381.1

TEST NUMBER: P1011290

CATALOG NUMBER: S123DIP-B1165D1195UB27-4F0-XX-W2A-F1

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	431.7	432.9	432.9	438.6	438.6
115°	489.3	492.8	490.5	491.6	490.5
117.5°	548.0	549.2	546.9	546.9	543.4
120°	602.1	609.0	603.3	602.1	599.8
122.5°	658.5	663.1	660.8	657.4	653.9
125°	716.1	719.6	717.3	712.7	708.0
127.5°	769.1	776.0	773.7	766.8	762.2
130°	822.0	831.2	827.8	823.2	815.1
132.5°	875.0	884.2	881.9	876.1	870.4
135°	929.1	936.0	934.9	930.2	927.9
137.5°	978.6	984.4	987.8	982.1	978.6
140°	1030.4	1036.2	1037.3	1036.2	1028.1
142.5°	1077.6	1083.4	1085.7	1084.5	1078.8
145°	1127.1	1129.4	1132.9	1131.7	1127.1
147.5°	1169.7	1174.3	1177.8	1177.8	1170.9
150°	1214.6	1216.9	1219.2	1219.2	1212.3
152.5°	1251.5	1254.9	1256.1	1258.4	1252.6
155°	1290.6	1290.6	1291.8	1296.4	1288.3
157.5°	1324.0	1322.8	1324.0	1328.6	1321.7
160°	1355.1	1352.8	1352.8	1358.5	1353.9
162.5°	1382.7	1379.2	1380.4	1386.2	1378.1
165°	1405.7	1402.3	1402.3	1409.2	1401.1
167.5°	1425.3	1420.7	1421.8	1428.8	1421.8
170°	1441.4	1436.8	1436.8	1444.9	1436.8
172.5°	1454.1	1449.5	1449.5	1456.4	1448.3
175°	1462.1	1457.5	1457.5	1464.4	1456.4
177.5°	1466.7	1462.1	1462.1	1469.1	1461.0
180°	1465.6	1465.6	1465.6	1465.6	1465.6

(END OF REPORT)