

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: P1011244

Luminaire Tested: S123DIP-B1165D1025UB27-4F0-XX-W2A-F

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1011244
REPORT IS A COMBINATION OF REPORTS P989325 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123DIP-B1165D1025UB27-4F0-XX-W2A-F
Description: Define 3 Direct/Indirect Pendant with 2700K BioUP LEDs {m-DER=0.473} {m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

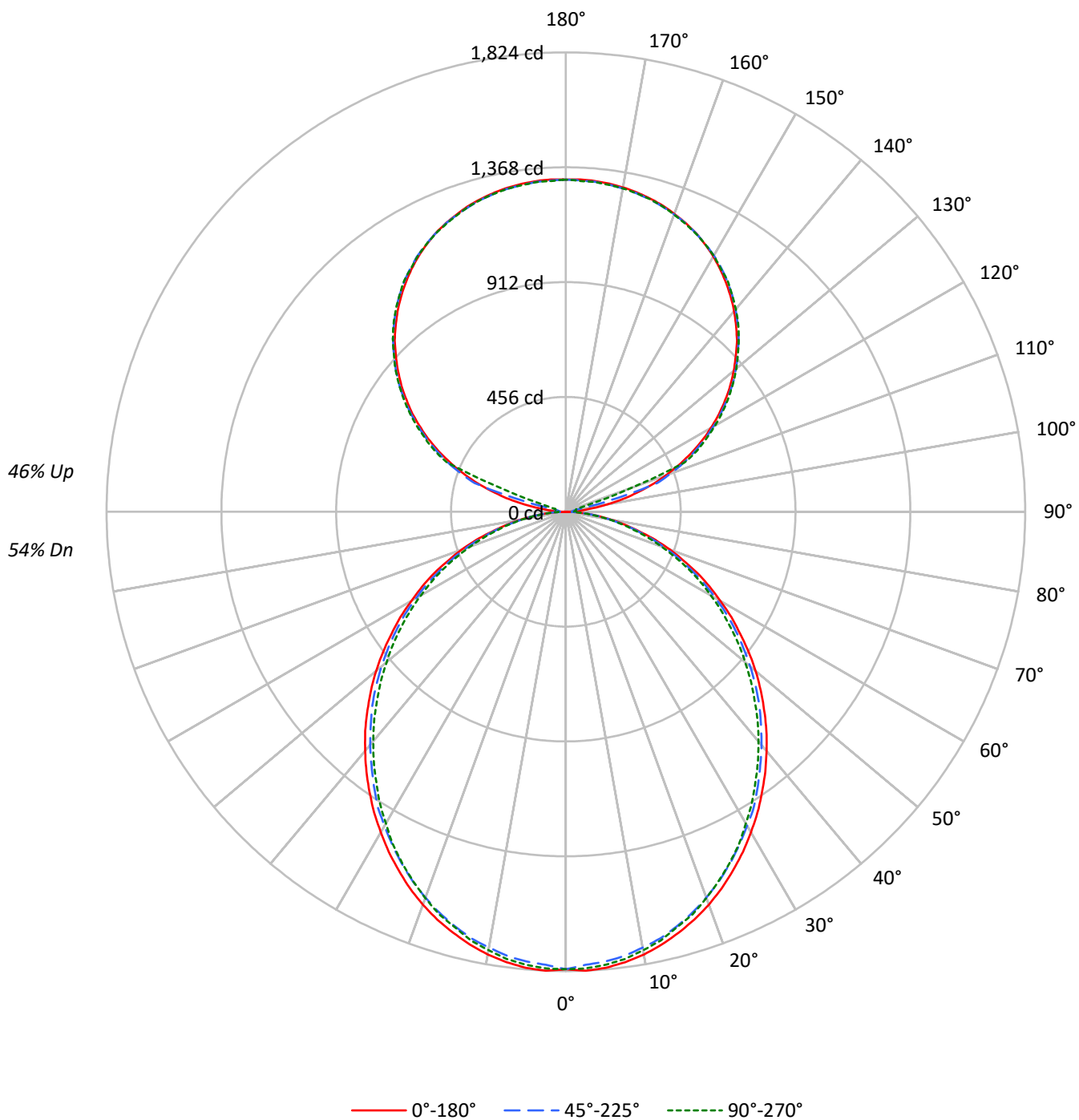
Lumens per Lamp: N/A
Luminaire Lumens: 8750.0 lumens
Efficiency: N/A
Efficacy: 97.4 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.18 / 1.3
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 89.8
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
RCR																	
0	108	108	108	108	100	100	100	100	86	86	86		72	72	72		60
1	99	94	90	87	91	88	84	81	75	72	70		63	62	60		53
2	90	82	76	71	83	77	71	66	66	62	58		56	53	50		46
3	82	72	65	59	76	67	61	56	58	53	49		49	45	42		41
4	75	64	56	50	69	60	53	47	51	46	42		44	40	36		37
5	69	57	49	43	64	53	46	40	46	40	36		39	35	31		33
6	63	51	43	37	59	48	40	35	41	36	31		36	31	28		30
7	59	46	38	33	54	43	36	31	38	32	28		32	28	24		27
8	54	42	34	29	50	39	32	27	34	29	25		30	25	22		25
9	51	38	31	26	47	36	29	24	31	26	22		27	23	20		23
10	47	35	28	23	44	33	26	22	29	24	20		25	21	18		22

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

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	171.2	2.0
10°-20°	483.5	5.5
20°-30°	714.1	8.2
30°-40°	834.0	9.5
40°-50°	838.4	9.6
50°-60°	736.5	8.4
60°-70°	548.5	6.3
70°-80°	312.1	3.6
80°-90°	91.4	1.0
90°-100°	46.5	0.5
100°-110°	224.8	2.6
110°-120°	551.0	6.3
120°-130°	699.5	8.0
130°-140°	747.2	8.5
140°-150°	698.7	8.0
150°-160°	563.6	6.4
160°-170°	363.7	4.2
170°-180°	125.3	1.4
0°-30°	1368.8	15.6
0°-40°	2202.7	25.2
0°-60°	3777.6	43.2
0°-90°	4729.7	54.1
90°-120°	822.3	9.4
90°-150°	2967.7	33.9
90°-180°	4020.0	45.9
0°-180°	8750.0	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	11	24	27	29	9
95°	60	20	30	37	37	71
105°	292	303	215	41	43	310
115°	548	554	562	572	576	541
125°	772	780	784	786	788	690
135°	961	967	971	974	971	740
145°	1109	1116	1118	1120	1120	694
155°	1222	1220	1221	1226	1220	563
165°	1288	1286	1284	1292	1286	364
175°	1319	1314	1315	1322	1314	126
180°	1319	1319	1319	1319	1319	

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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°	1.0	10.8	23.5	27.4	29.4
92.5°	22.5	16.7	25.5	32.3	33.3
95°	59.8	19.6	30.4	37.2	37.2
97.5°	108.8	81.3	31.4	39.2	40.2
100°	165.6	185.2	32.3	40.2	41.2
102.5°	230.2	243.0	72.5	40.2	42.1
105°	292.0	302.7	214.6	41.2	43.1
107.5°	357.6	366.4	381.1	230.2	101.9
110°	423.3	431.1	441.9	409.5	269.4

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	486.0	492.8	503.6	512.4	510.5
115°	547.7	553.6	562.4	572.2	576.1
117.5°	608.4	615.3	620.2	628.0	629.0
120°	664.3	673.1	676.0	683.9	683.9
122.5°	721.1	728.0	731.9	736.8	737.8
125°	772.1	779.9	783.8	785.8	787.7
127.5°	823.0	830.8	835.7	838.7	836.7
130°	870.0	877.9	881.8	885.7	883.7
132.5°	915.1	922.9	925.9	929.8	926.9
135°	961.2	967.0	970.9	973.9	970.9
137.5°	1000.3	1008.2	1010.1	1015.0	1013.1
140°	1039.5	1045.4	1048.3	1052.3	1050.3
142.5°	1075.8	1081.7	1084.6	1087.5	1084.6
145°	1109.1	1116.0	1117.9	1119.9	1119.9
147.5°	1141.4	1146.3	1148.3	1150.2	1145.3
150°	1170.8	1173.8	1175.7	1177.7	1174.7
152.5°	1197.3	1198.3	1199.2	1203.2	1198.3
155°	1221.8	1219.8	1220.8	1225.7	1219.8
157.5°	1241.4	1241.4	1240.4	1246.3	1238.4
160°	1259.0	1258.0	1257.0	1262.9	1256.1
162.5°	1275.7	1272.7	1271.7	1278.6	1272.7
165°	1288.4	1285.5	1284.5	1292.3	1285.5
167.5°	1299.2	1295.3	1295.3	1303.1	1295.3
170°	1308.0	1304.1	1304.1	1311.9	1304.1
172.5°	1313.9	1309.0	1309.9	1317.8	1309.0
175°	1318.8	1313.9	1314.8	1321.7	1313.9
177.5°	1320.7	1315.8	1316.8	1324.6	1314.8
180°	1318.8	1318.8	1318.8	1318.8	1318.8

(END OF REPORT)