

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: P1013210

Luminaire Tested: S124RDIP-B1020D1035UB2750-4F0-XX-W2A-F_3000K

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1013210
REPORT IS A COMBINATION OF REPORTS P998831 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIP-B1020D1035UB2750-4F0-XX-W2A-F_3000K
Description: Define 4 Regressed Direct/Indirect Pendant with 3000K BioUP LEDs {m-DER=0.589}
{m-EER=0.647}
Light Source: -
Ballast/Driver: -

Summary

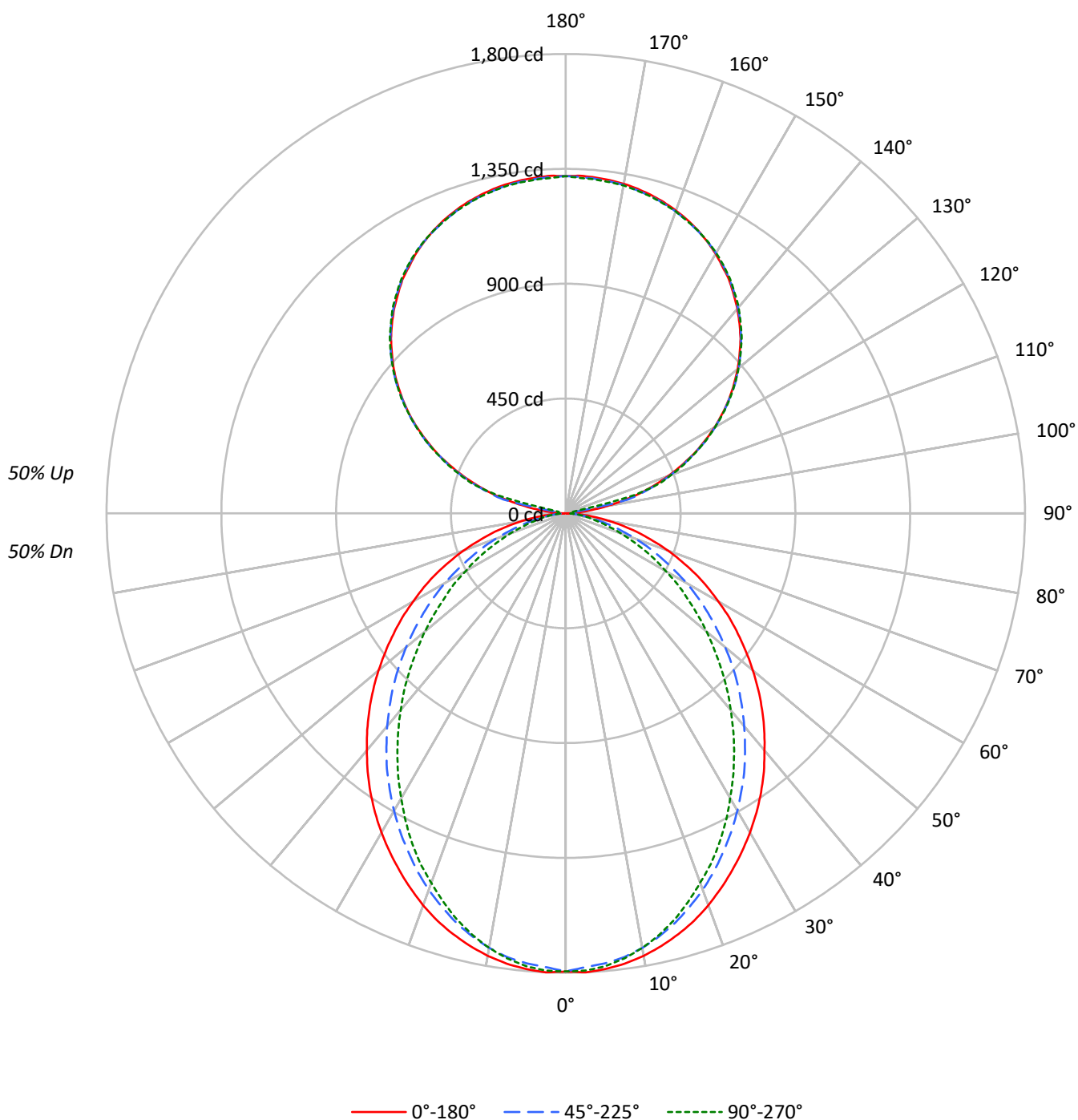
Lumens per Lamp: N/A
Luminaire Lumens: 8238.0 lumens
Efficiency: N/A
Efficacy: 109.4 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 75.3
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	50	30	10
RCR																				
0	107	107	107	107	99	99	99	99	84	84	84	69	69	69	56	56	56	56	56	56
1	98	94	90	87	90	87	84	81	74	71	69	62	60	58	50	49	48	48	48	43
2	90	82	76	71	82	76	71	67	65	61	58	54	52	49	45	43	41	41	41	36
3	82	73	65	60	75	67	61	56	57	53	49	48	45	42	40	37	35	35	35	31
4	75	64	57	51	69	60	53	48	51	46	42	43	39	36	36	33	31	31	31	27
5	69	57	49	44	63	53	46	41	46	40	36	39	35	31	32	29	27	27	27	24
6	64	52	44	38	59	48	41	36	41	36	32	35	31	28	29	26	24	24	24	21
7	59	47	39	33	54	44	37	32	38	32	28	32	28	25	27	24	21	21	21	19
8	55	42	35	30	50	40	33	28	34	29	25	29	25	22	25	21	19	19	19	17
9	51	39	31	26	47	36	30	25	32	26	22	27	23	20	23	20	17	17	17	15
10	48	36	28	24	44	33	27	23	29	24	20	25	21	18	21	18	16	16	16	14

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	14636	14636	14636
5°	14637	14200	14202
10°	14513	13752	13589
15°	14313	13195	12865
20°	14052	12559	12040
25°	13726	11872	11235
30°	13406	11172	10330
35°	13055	10462	9446
40°	12638	9698	8537
45°	12245	8941	7638
50°	11800	8113	6725
55°	11318	7265	5782
60°	10785	6364	4850
65°	10268	5329	3954
70°	9535	4242	3021
75°	8593	3087	2113
80°	7177	1894	1520
85°	5399	1092	836

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 12245 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	168.8	2.0
10°-20°	470.6	5.7
20°-30°	679.4	8.2
30°-40°	769.9	9.3
40°-50°	743.4	9.0
50°-60°	618.1	7.5
60°-70°	426.6	5.2
70°-80°	215.6	2.6
80°-90°	57.5	0.7
90°-100°	43.9	0.5
100°-110°	288.8	3.5
110°-120°	551.5	6.7
120°-130°	700.1	8.5
130°-140°	749.0	9.1
140°-150°	700.4	8.5
150°-160°	564.8	6.9
160°-170°	364.2	4.4
170°-180°	125.5	1.5
0°-30°	1318.7	16.0
0°-40°	2088.6	25.4
0°-60°	3450.1	41.9
0°-90°	4149.7	50.4
90°-120°	884.2	10.7
90°-150°	3033.7	36.8
90°-180°	4088.0	49.6
0°-180°	8238.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1795	1795	1795	1795	1795	
5°	1792	1786	1770	1784	1781	170
15°	1707	1694	1660	1657	1648	481
25°	1543	1518	1462	1439	1425	711
35°	1334	1290	1222	1175	1150	834
45°	1088	1038	955	888	863	839
55°	824	770	680	609	583	738
65°	561	502	414	355	338	554
75°	298	247	183	151	143	315
85°	74	47	43	40	40	81
90°	3	14	22	28	30	7
95°	54	21	22	28	29	67
105°	297	303	308	317	282	311
115°	555	558	557	559	559	547
125°	781	785	783	786	787	697
135°	968	967	971	973	975	746
145°	1117	1120	1120	1121	1123	698
155°	1224	1225	1222	1226	1223	565
165°	1292	1287	1287	1294	1286	365
175°	1321	1315	1316	1325	1313	126
180°	1321	1321	1321	1321	1321	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1794.8	1794.8	1794.8	1794.8	1794.8
2.5°	1800.3	1794.8	1779.7	1794.8	1793.4
5°	1792.0	1786.5	1770.0	1783.8	1781.0
7.5°	1779.7	1774.2	1753.5	1763.2	1759.0
10°	1760.4	1753.5	1728.8	1734.3	1728.8
12.5°	1735.7	1727.4	1697.2	1699.9	1691.7
15°	1706.8	1694.4	1660.1	1657.3	1647.7
17.5°	1673.8	1656.0	1616.1	1609.2	1595.5
20°	1634.0	1616.1	1569.4	1558.4	1540.5
22.5°	1590.0	1569.4	1518.5	1500.7	1486.9
25°	1543.3	1518.5	1462.2	1438.8	1425.1
27.5°	1495.2	1464.9	1405.9	1378.4	1359.1
30°	1444.3	1410.0	1345.4	1311.0	1289.0
32.5°	1390.7	1350.9	1283.5	1242.3	1221.7
35°	1334.4	1290.4	1221.7	1175.0	1150.2
37.5°	1275.3	1230.0	1154.4	1103.5	1078.8
40°	1212.1	1166.7	1088.4	1030.7	1005.9
42.5°	1151.6	1103.5	1021.1	962.0	935.9
45°	1088.4	1037.6	955.1	887.8	863.0
47.5°	1023.8	971.6	886.4	816.3	788.8
50°	957.9	904.3	816.3	747.6	721.5
52.5°	890.5	838.3	747.6	677.5	650.0
55°	824.5	769.6	680.3	608.8	582.7
57.5°	760.0	702.2	614.3	541.5	522.2
60°	689.9	634.9	547.0	475.5	453.5
62.5°	626.7	568.9	478.2	413.6	397.2
65°	560.7	501.6	413.6	354.6	338.1
67.5°	492.0	435.6	353.2	301.0	281.7
70°	427.4	369.7	291.3	246.0	232.2
72.5°	358.7	307.8	235.0	197.9	185.5
75°	298.2	247.4	182.8	151.2	142.9
77.5°	235.0	191.0	136.1	114.1	111.3
80°	174.5	134.7	93.4	89.3	88.0
82.5°	122.3	86.6	67.3	64.6	63.2
85°	74.2	46.7	42.6	39.9	39.9
87.5°	31.6	20.6	19.2	17.9	19.2
90°	3.0	13.8	21.7	27.7	29.6
92.5°	14.8	12.8	20.8	26.7	26.7
95°	54.4	20.8	21.7	27.7	28.7
97.5°	103.8	125.5	21.7	26.7	27.7
100°	162.1	179.8	43.5	26.7	27.7
102.5°	227.3	239.1	251.0	28.7	28.7
105°	297.4	303.4	308.3	317.2	281.6
107.5°	361.7	364.6	371.6	376.5	380.5
110°	426.9	429.9	435.8	437.8	440.7

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	490.1	496.1	498.0	497.1	501.0
115°	555.4	558.3	557.3	559.3	559.3
117.5°	613.7	617.6	620.6	619.6	619.6
120°	673.0	676.9	675.9	677.9	675.9
122.5°	728.3	730.3	732.2	733.2	731.3
125°	780.7	784.6	782.6	785.6	786.6
127.5°	831.1	832.1	837.0	836.0	835.0
130°	879.5	880.5	883.4	884.4	884.4
132.5°	924.0	925.9	929.9	930.9	929.9
135°	968.4	967.4	971.4	973.4	975.3
137.5°	1007.9	1007.9	1012.9	1014.9	1013.9
140°	1046.5	1048.5	1050.4	1053.4	1054.4
142.5°	1081.1	1085.0	1086.0	1088.0	1088.0
145°	1116.6	1119.6	1119.6	1120.6	1122.6
147.5°	1144.3	1150.2	1149.3	1150.2	1151.2
150°	1175.0	1178.9	1177.9	1177.9	1178.9
152.5°	1200.6	1203.6	1201.6	1203.6	1202.6
155°	1224.4	1225.4	1222.4	1226.3	1223.4
157.5°	1245.1	1245.1	1241.2	1246.1	1241.2
160°	1262.9	1259.9	1258.9	1264.9	1258.9
162.5°	1278.7	1274.8	1273.8	1279.7	1272.8
165°	1291.6	1286.6	1286.6	1294.5	1285.6
167.5°	1302.4	1297.5	1296.5	1305.4	1295.5
170°	1311.3	1305.4	1306.4	1314.3	1304.4
172.5°	1317.3	1311.3	1312.3	1320.2	1309.3
175°	1321.2	1315.3	1316.3	1325.2	1313.3
177.5°	1324.2	1317.3	1319.2	1327.1	1315.3
180°	1321.2	1321.2	1321.2	1321.2	1321.2

(END OF REPORT)