

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: P1024862

Luminaire Tested: S124DIP-B1020D1205UB30-4F0-XX-W2A-D1

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1024862
REPORT IS A COMBINATION OF REPORTS P995207 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124DIP-B1020D1205UB30-4F0-XX-W2A-D1
Description: Define 4 Direct/Indirect Pendant with 3000K BioUP LEDs {m-DER=0.589} {m-EER=0.647}
Light Source: -
Ballast/Driver: -

Summary

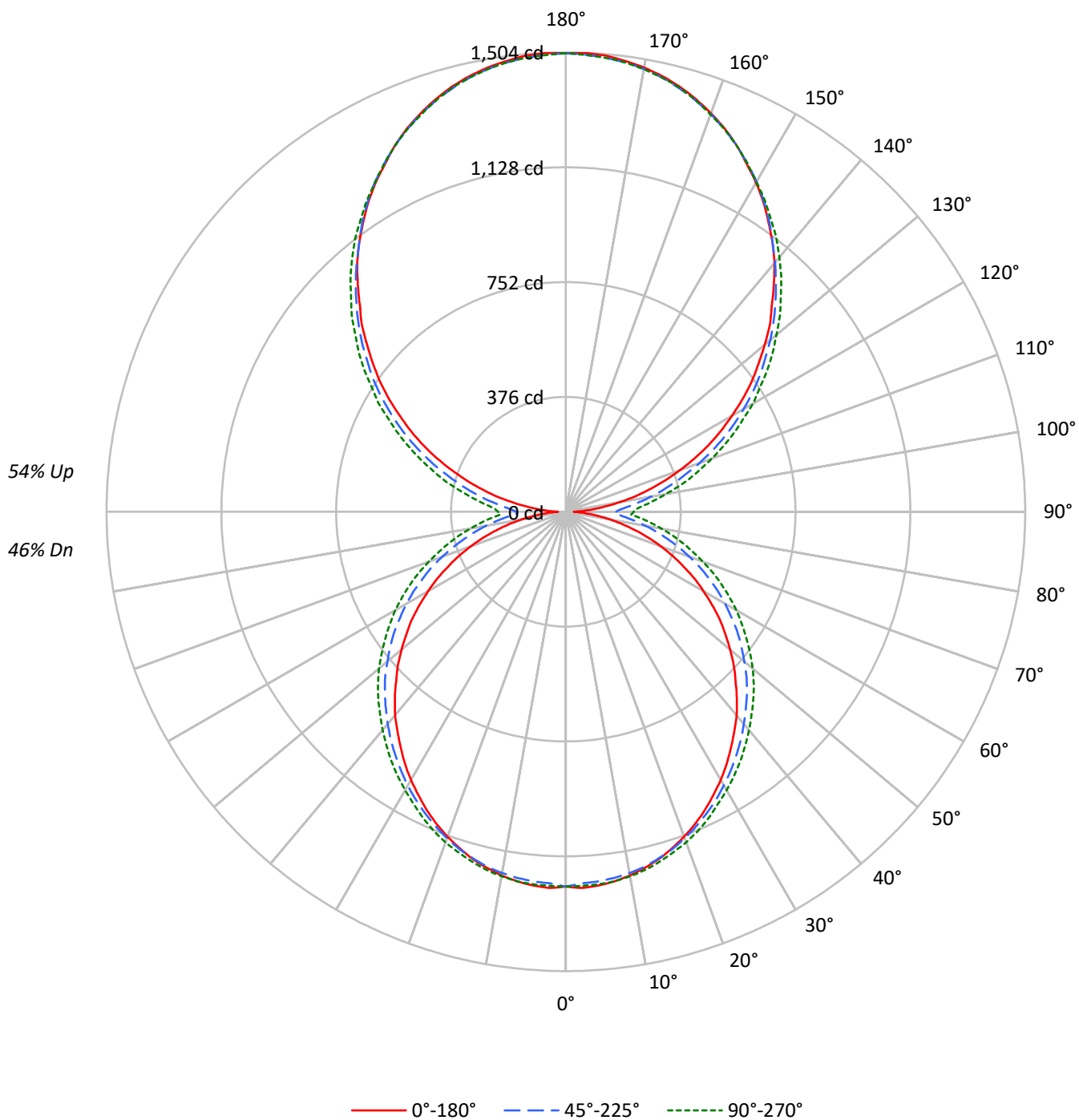
Lumens per Lamp: N/A
Luminaire Lumens: 8353.0 lumens
Efficiency: N/A
Efficacy: 102.1 lumens/watt
Spacing Criteria (0/90/45): 1.23 / 1.28 / 1.39
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 81.8
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	30	10
RCR																	
0	106	106	106	106	98	98	98	98	81	81	81	66	66	66	53	53	53
1	96	91	87	83	88	84	80	77	70	67	65	57	55	53	45	44	43
2	87	79	73	67	79	73	67	62	61	56	53	49	46	44	39	37	35
3	79	69	62	55	72	64	57	52	53	48	44	43	40	37	34	32	30
4	72	61	53	47	66	56	49	43	47	41	37	38	34	31	31	28	25
5	66	54	46	40	60	50	43	37	42	36	32	34	30	27	27	24	22
6	61	48	40	34	56	45	37	32	38	32	28	31	27	23	25	21	19
7	56	44	36	30	51	40	33	28	34	28	24	28	24	20	23	19	17
8	52	40	32	26	48	37	30	25	31	25	21	26	21	18	21	17	15
9	48	36	28	23	44	33	27	22	28	23	19	24	19	16	19	16	13
10	45	33	26	21	41	31	24	20	26	21	17	22	18	15	18	14	12

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10007	10007	10007
5°	10035	9746	9764
10°	9969	9555	9527
15°	9876	9339	9260
20°	9738	9106	9001
25°	9582	8848	8722
30°	9414	8593	8436
35°	9223	8333	8182
40°	9070	8082	7919
45°	8844	7847	7686
50°	8650	7580	7441
55°	8452	7323	7159
60°	8141	7003	6893
65°	7801	6658	6574
70°	7389	6263	6205
75°	6813	5825	5852
80°	6161	5378	5483
85°	5298	4930	5186

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 8844 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	116.3	1.4
10°-20°	333.2	4.0
20°-30°	503.7	6.0
30°-40°	609.4	7.3
40°-50°	644.3	7.7
50°-60°	606.3	7.3
60°-70°	503.1	6.0
70°-80°	353.1	4.2
80°-90°	202.3	2.4
90°-100°	216.4	2.6
100°-110°	380.9	4.6
110°-120°	556.8	6.7
120°-130°	689.9	8.3
130°-140°	752.0	9.0
140°-150°	727.8	8.7
150°-160°	609.8	7.3
160°-170°	405.7	4.9
170°-180°	142.1	1.7
0°-30°	953.2	11.4
0°-40°	1562.6	18.7
0°-60°	2813.2	33.7
0°-90°	3871.7	46.4
90°-120°	1154.1	13.8
90°-150°	3323.8	39.8
90°-180°	4481.0	53.6
0°-180°	8353.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1227	1227	1227	1227	1227	
5°	1229	1224	1215	1226	1224	117
15°	1178	1179	1175	1187	1186	332
25°	1077	1086	1090	1105	1106	496
35°	943	959	973	992	996	590
45°	786	812	838	862	868	608
55°	616	644	686	713	722	549
65°	426	470	517	551	562	422
75°	236	287	345	383	396	251
85°	73	131	192	234	247	76
90°	26	93	162	208	222	20
95°	88	143	208	248	261	90
105°	283	312	367	405	419	301
115°	514	527	568	598	606	508
125°	743	741	775	798	804	663
135°	954	961	970	990	995	738
145°	1157	1160	1161	1168	1170	724
155°	1324	1324	1323	1327	1323	609
165°	1441	1438	1435	1442	1438	406
175°	1499	1493	1492	1500	1492	142
180°	1501	1501	1501	1501	1501	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1227.2	1227.2	1227.2	1227.2	1227.2
2.5°	1232.7	1228.6	1217.6	1227.2	1225.8
5°	1228.6	1224.4	1214.8	1225.8	1224.4
7.5°	1220.3	1217.6	1209.3	1221.7	1220.3
10°	1209.3	1208.0	1201.1	1213.4	1212.1
12.5°	1194.2	1194.2	1190.1	1201.1	1201.1
15°	1177.7	1179.1	1175.0	1187.3	1186.0
17.5°	1155.7	1159.9	1158.5	1170.8	1169.5
20°	1132.4	1136.5	1137.9	1151.6	1151.6
22.5°	1106.3	1111.8	1114.5	1128.2	1131.0
25°	1077.4	1085.6	1089.8	1104.9	1106.3
27.5°	1045.8	1058.2	1063.7	1077.4	1078.8
30°	1014.2	1025.2	1034.8	1049.9	1052.7
32.5°	979.8	993.6	1004.6	1022.4	1025.2
35°	942.7	959.2	973.0	992.2	996.3
37.5°	905.6	924.9	941.4	960.6	964.7
40°	869.9	887.8	907.0	927.6	933.1
42.5°	828.7	849.3	872.6	896.0	900.1
45°	786.1	812.2	838.3	861.6	868.5
47.5°	746.2	772.3	802.6	825.9	834.2
50°	702.2	732.5	762.7	790.2	798.4
52.5°	658.3	688.5	724.2	751.7	760.0
55°	615.7	644.5	685.7	713.2	721.5
57.5°	567.6	603.3	643.1	676.1	683.0
60°	520.8	556.6	601.9	633.5	644.5
62.5°	475.5	515.3	560.7	592.3	603.3
65°	426.0	470.0	516.7	551.1	562.1
67.5°	379.3	426.0	475.5	509.8	520.8
70°	331.2	377.9	430.1	467.2	476.9
72.5°	284.5	332.6	388.9	424.6	435.6
75°	236.4	287.2	344.9	383.4	395.8
77.5°	191.0	244.6	305.1	343.6	357.3
80°	149.8	204.8	265.2	306.5	317.4
82.5°	108.6	166.3	226.7	269.4	281.7
85°	72.8	130.6	192.4	233.6	247.4
87.5°	45.3	101.7	162.2	202.0	214.4
90°	25.5	93.3	161.5	208.4	221.7
92.5°	50.8	114.0	178.9	220.9	233.0
95°	87.6	143.3	207.8	248.4	260.7
97.5°	128.0	177.1	242.8	283.1	295.5
100°	177.7	218.0	282.1	321.5	331.2
102.5°	231.1	262.4	324.0	363.2	375.4
105°	283.0	311.6	367.1	404.9	419.3
107.5°	339.8	364.3	413.6	452.6	461.1
110°	396.5	418.0	465.0	494.2	508.7

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	455.5	472.0	515.1	545.3	556.3
115°	514.5	526.9	568.5	597.6	606.0
117.5°	571.4	579.7	619.7	645.1	652.6
120°	627.0	635.7	672.0	693.7	707.0
122.5°	686.2	687.3	723.3	747.3	751.1
125°	742.8	741.4	774.7	798.5	804.3
127.5°	795.1	797.2	822.4	844.7	853.3
130°	849.4	851.5	873.5	896.0	899.5
132.5°	906.3	907.2	922.6	943.7	950.7
135°	953.7	960.7	970.4	990.0	994.8
137.5°	1008.3	1010.5	1018.3	1035.4	1043.5
140°	1062.8	1063.9	1065.2	1081.9	1087.6
142.5°	1111.5	1113.8	1111.2	1126.3	1131.8
145°	1156.8	1160.0	1161.2	1168.2	1170.2
147.5°	1203.2	1207.6	1206.4	1206.7	1211.0
150°	1245.0	1248.3	1248.3	1248.3	1247.1
152.5°	1283.1	1285.4	1286.6	1290.1	1286.6
155°	1323.7	1323.7	1322.6	1327.2	1322.6
157.5°	1358.6	1356.2	1356.2	1359.7	1356.2
160°	1388.8	1387.6	1386.4	1389.9	1384.1
162.5°	1416.6	1413.1	1412.0	1418.9	1413.1
165°	1441.0	1437.5	1435.2	1442.2	1437.5
167.5°	1460.7	1456.1	1456.1	1463.1	1456.1
170°	1477.0	1471.2	1472.4	1479.3	1471.2
172.5°	1488.6	1484.0	1484.0	1492.1	1484.0
175°	1499.1	1493.3	1492.1	1500.2	1492.1
177.5°	1503.7	1497.9	1497.9	1506.0	1496.7
180°	1501.4	1501.4	1501.4	1501.4	1501.4

(END OF REPORT)