

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: P1033687

Luminaire Tested: S124DIW-B795D1050UB30-4F0-XX-W2A-F

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1033687
REPORT IS A COMBINATION OF REPORTS P997975 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124DIW-B795D1050UB30-4F0-XX-W2A-F
Description: Define 4 Direct/Indirect Wall Mount with 3000K BioUP LEDs {m-DER=0.589} {m-EER=0.647}
Light Source: -
Ballast/Driver: -

Summary

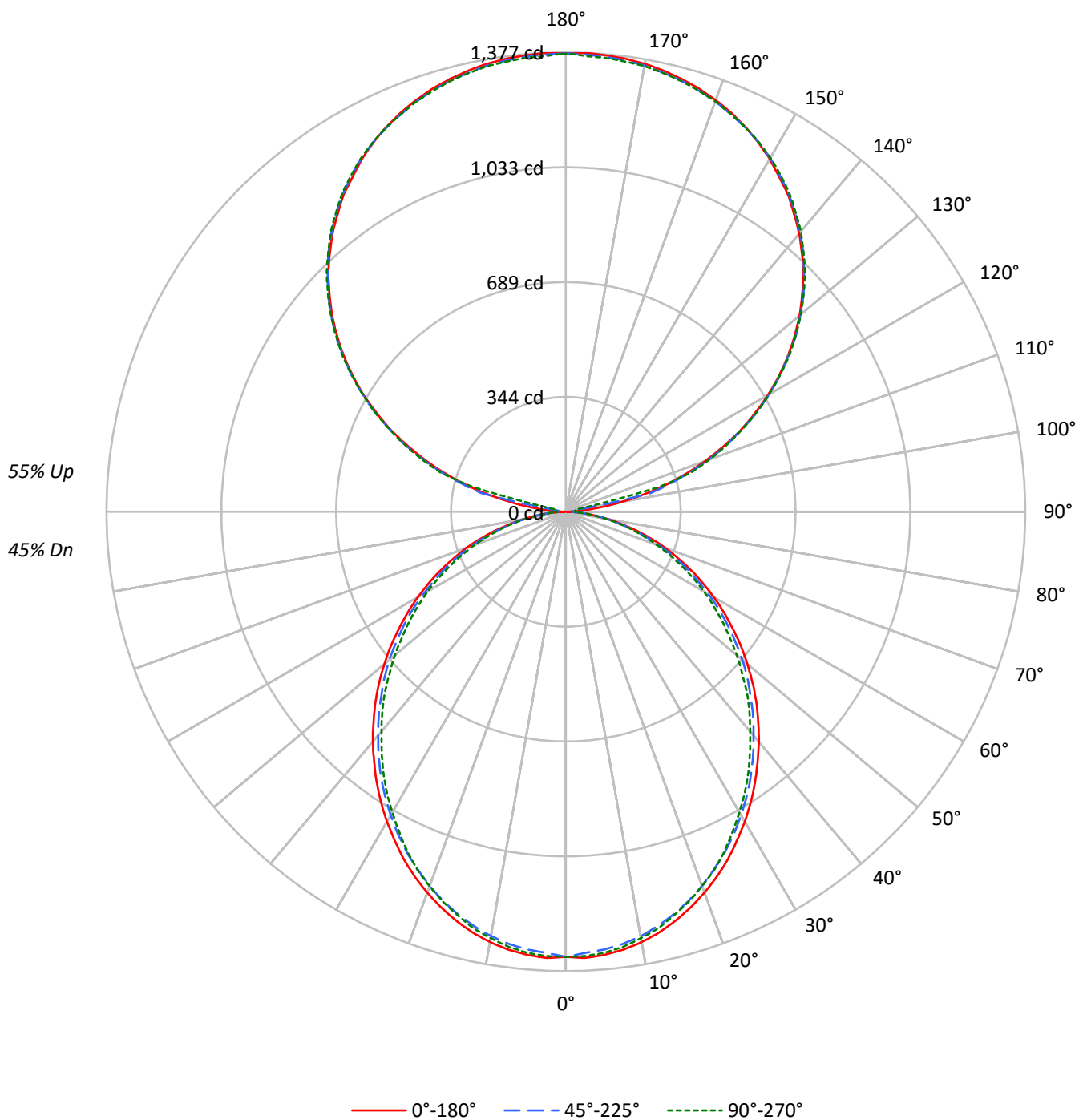
Lumens per Lamp: N/A
Luminaire Lumens: 7679.0 lumens
Efficiency: N/A
Efficacy: 113.9 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.17 / 1.29
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 67.4
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					0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10
RCR																				
0	106	106	106	106	97	97	97	97	80	80	80	65	65	65	51	51	51			45
1	97	92	88	85	88	85	81	78	70	68	66	57	56	54	45	44	43			38
2	88	81	74	69	80	74	69	64	62	58	54	50	48	45	40	38	36			31
3	80	71	63	58	73	65	59	54	54	50	46	44	41	38	35	33	31			27
4	73	63	55	49	67	58	51	45	48	43	39	40	36	33	31	29	27			23
5	67	56	48	42	61	51	44	39	43	38	34	35	31	28	28	25	23			20
6	62	50	42	36	57	46	39	34	39	33	29	32	28	25	26	23	20			17
7	57	45	37	32	52	42	35	30	35	30	26	29	25	22	23	20	18			15
8	53	41	33	28	49	38	31	26	32	27	23	27	23	20	22	19	16			14
9	49	37	30	25	45	35	28	23	29	24	20	25	20	18	20	17	15			12
10	46	34	27	22	42	32	25	21	27	22	18	23	19	16	18	15	13			11

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10881	10881	10881
5°	10890	10568	10581
10°	10798	10275	10203
15°	10643	9926	9777
20°	10445	9549	9334
25°	10223	9150	8859
30°	9954	8719	8338
35°	9676	8278	7833
40°	9387	7803	7296
45°	9083	7327	6794
50°	8747	6865	6238
55°	8380	6326	5687
60°	8007	5735	5111
65°	7578	5126	4464
70°	7086	4390	3770
75°	6349	3540	3019
80°	5408	2559	2125
85°	4199	1425	1142

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 9083 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	125.8	1.6
10°-20°	354.3	4.6
20°-30°	521.5	6.8
30°-40°	606.2	7.9
40°-50°	606.2	7.9
50°-60°	530.2	6.9
60°-70°	393.6	5.1
70°-80°	223.3	2.9
80°-90°	66.8	0.9
90°-100°	45.6	0.6
100°-110°	300.3	3.9
110°-120°	573.5	7.5
120°-130°	728.0	9.5
130°-140°	778.8	10.1
140°-150°	728.3	9.5
150°-160°	587.3	7.6
160°-170°	378.8	4.9
170°-180°	130.5	1.7
0°-30°	1001.6	13.0
0°-40°	1607.8	20.9
0°-60°	2744.1	35.7
0°-90°	3427.9	44.6
90°-120°	919.4	12.0
90°-150°	3154.6	41.1
90°-180°	4251.0	55.4
0°-180°	7679.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1334	1334	1334	1334	1334	
5°	1333	1329	1317	1329	1327	127
15°	1269	1265	1249	1255	1252	358
25°	1149	1142	1127	1128	1124	529
35°	989	982	967	959	954	618
45°	807	800	783	771	768	622
55°	610	607	592	580	573	547
65°	414	408	398	387	382	410
75°	220	215	210	205	204	234
85°	58	58	56	56	54	62
90°	3	14	23	29	31	7
95°	56	22	23	29	30	70
105°	309	316	321	330	293	324
115°	578	581	580	582	582	568
125°	812	816	814	817	818	725
135°	1007	1006	1010	1012	1014	776
145°	1161	1164	1164	1165	1167	726
155°	1273	1274	1271	1275	1272	587
165°	1343	1338	1338	1346	1337	380
175°	1374	1368	1369	1378	1366	131
180°	1374	1374	1374	1374	1374	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1334.4	1334.4	1334.4	1334.4	1334.4
2.5°	1338.7	1335.5	1323.7	1334.4	1333.3
5°	1333.3	1329.1	1317.3	1329.1	1326.9
7.5°	1323.7	1319.4	1306.6	1316.2	1315.2
10°	1309.8	1305.5	1291.6	1300.2	1298.0
12.5°	1291.6	1287.4	1272.4	1282.0	1278.8
15°	1269.2	1264.9	1248.9	1255.3	1252.1
17.5°	1243.5	1238.2	1223.2	1227.5	1225.3
20°	1214.6	1209.3	1193.3	1196.5	1194.3
22.5°	1183.6	1176.2	1160.1	1166.5	1162.3
25°	1149.4	1141.9	1127.0	1128.0	1123.8
27.5°	1110.9	1103.4	1089.5	1087.4	1082.1
30°	1072.4	1063.9	1050.0	1045.7	1040.4
32.5°	1031.8	1024.3	1009.4	1004.0	998.7
35°	989.0	981.6	966.6	959.1	953.8
37.5°	944.1	937.7	921.7	914.2	906.7
40°	900.3	891.7	875.7	865.0	859.7
42.5°	853.2	849.0	830.8	818.0	814.8
45°	807.3	799.8	782.7	770.9	767.7
47.5°	759.2	753.8	737.8	724.9	716.4
50°	710.0	705.7	690.7	675.8	669.3
52.5°	661.9	656.5	640.5	627.6	619.1
55°	610.5	607.3	592.4	579.5	573.1
57.5°	562.4	559.2	544.2	531.4	525.0
60°	512.2	506.8	492.9	483.3	477.9
62.5°	463.0	458.7	443.7	435.2	429.8
65°	413.8	408.4	397.8	387.1	381.7
67.5°	363.5	359.3	348.6	337.9	336.8
70°	317.6	310.1	301.5	293.0	289.8
72.5°	268.4	260.9	254.5	248.1	244.9
75°	220.3	214.9	209.6	205.3	204.2
77.5°	173.2	171.1	165.7	164.7	161.5
80°	131.5	128.3	126.2	124.0	123.0
82.5°	90.9	89.8	89.8	88.7	87.7
85°	57.7	57.7	55.6	55.6	54.5
87.5°	27.8	26.7	25.7	25.7	25.7
90°	3.1	14.4	22.6	28.8	30.8
92.5°	15.4	13.4	21.6	27.7	27.7
95°	56.5	21.6	22.6	28.8	29.8
97.5°	107.9	130.5	22.6	27.7	28.8
100°	168.5	187.0	45.2	27.7	28.8
102.5°	236.3	248.7	261.0	29.8	29.8
105°	309.3	315.5	320.6	329.8	292.9
107.5°	376.1	379.2	386.4	391.5	395.6
110°	443.9	447.0	453.2	455.2	458.3

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	509.7	515.8	517.9	516.9	521.0
115°	577.5	580.6	579.5	581.6	581.6
117.5°	638.1	642.2	645.3	644.3	644.3
120°	699.8	703.9	702.8	704.9	702.8
122.5°	757.3	759.4	761.4	762.4	760.4
125°	811.8	815.9	813.8	816.9	817.9
127.5°	864.2	865.2	870.3	869.3	868.3
130°	914.5	915.6	918.6	919.7	919.7
132.5°	960.8	962.8	966.9	968.0	966.9
135°	1007.0	1006.0	1010.1	1012.1	1014.2
137.5°	1048.1	1048.1	1053.2	1055.3	1054.3
140°	1088.2	1090.2	1092.3	1095.4	1096.4
142.5°	1124.1	1128.3	1129.3	1131.3	1131.3
145°	1161.1	1164.2	1164.2	1165.3	1167.3
147.5°	1189.9	1196.1	1195.1	1196.1	1197.1
150°	1221.8	1225.9	1224.8	1224.8	1225.9
152.5°	1248.5	1251.6	1249.5	1251.6	1250.5
155°	1273.1	1274.2	1271.1	1275.2	1272.1
157.5°	1294.7	1294.7	1290.6	1295.8	1290.6
160°	1313.2	1310.1	1309.1	1315.3	1309.1
162.5°	1329.7	1325.6	1324.5	1330.7	1323.5
165°	1343.0	1337.9	1337.9	1346.1	1336.9
167.5°	1354.3	1349.2	1348.2	1357.4	1347.1
170°	1363.6	1357.4	1358.4	1366.7	1356.4
172.5°	1369.7	1363.6	1364.6	1372.8	1361.5
175°	1373.8	1367.7	1368.7	1378.0	1365.6
177.5°	1376.9	1369.7	1371.8	1380.0	1367.7
180°	1373.8	1373.8	1373.8	1373.8	1373.8

(END OF REPORT)