

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: P1031022

Luminaire Tested: S123RDIW-B1000D1030UB2750-4F0-XX-W2A-F_3500K

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1031022
REPORT IS A COMBINATION OF REPORTS P993736 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123RDIW-B1000D1030UB2750-4F0-XX-W2A-F_3500K
Description: Define 3 Regressed Direct/Indirect Wall Mount with 3500K BioUP LEDs {m-DER=0.721}
{m-EER=0.792}
Light Source: -
Ballast/Driver: -

Summary

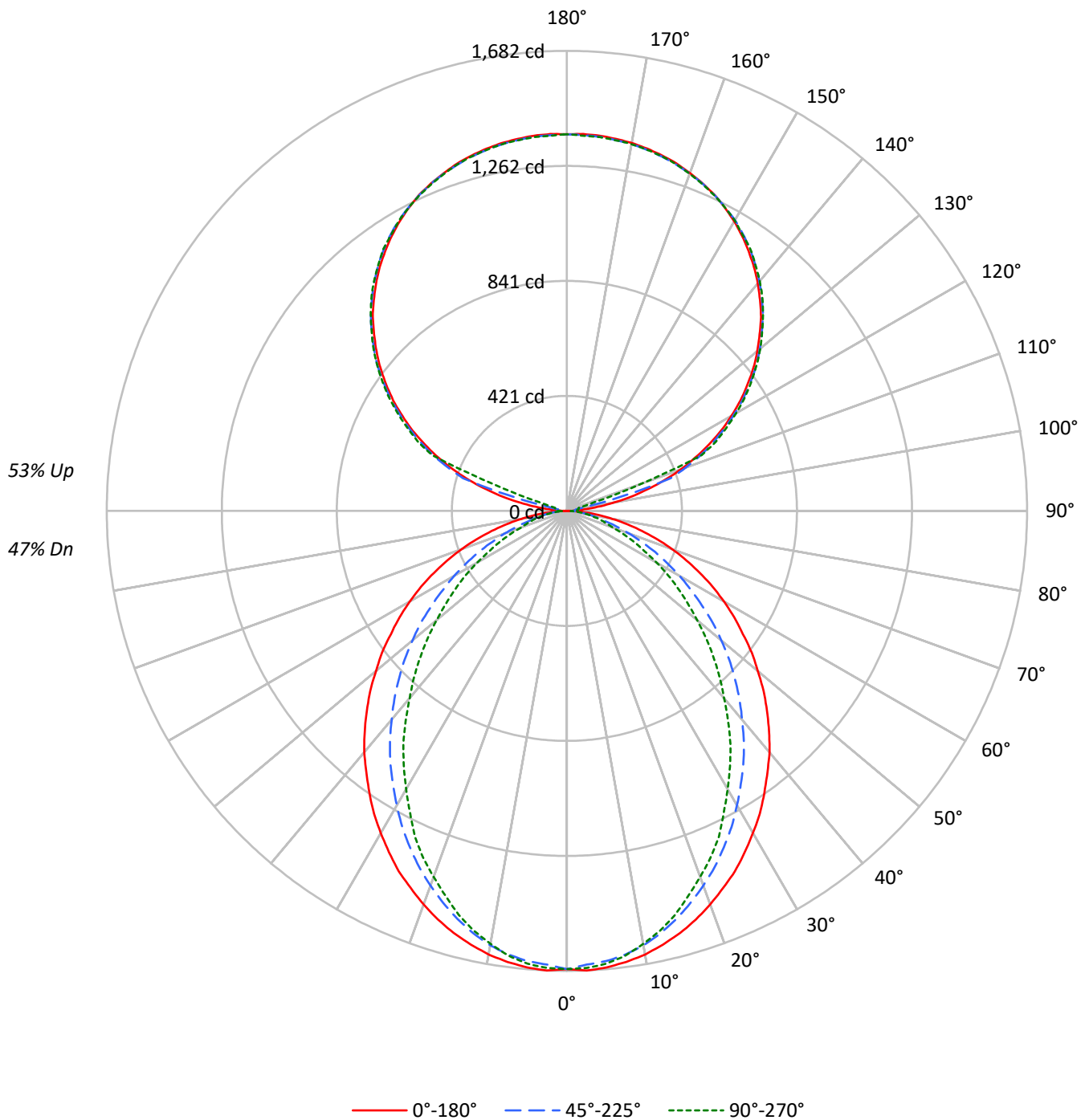
Lumens per Lamp: N/A
Luminaire Lumens: 7986.0 lumens
Efficiency: N/A
Efficacy: 102.0 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.07 / 1.22
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 78.3
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
RCR																	
0	107	107	107	107	98	98	98	98	82	82	82		67	67	67		54
1	98	93	90	86	90	86	83	80	72	70	68		60	58	57		48
2	89	82	76	71	82	76	70	66	64	60	57		53	50	48		43
3	81	72	65	59	75	67	61	56	56	52	48		47	44	41		38
4	75	64	56	50	68	59	53	47	50	45	41		42	38	35		34
5	69	57	49	43	63	53	46	41	45	40	36		38	34	31		31
6	63	51	43	38	58	48	41	36	41	35	31		34	30	27		28
7	58	46	39	33	54	43	36	31	37	32	28		31	27	24		26
8	54	42	35	29	50	39	32	28	34	28	25		29	24	21		24
9	51	39	31	26	47	36	29	25	31	26	22		26	22	19		22
10	47	35	28	24	44	33	27	22	29	23	20		24	20	17		20

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	18034	18034	18034
5°	18063	17396	17349
10°	17922	16742	16411
15°	17688	15933	15385
20°	17384	15054	14239
25°	17069	14140	13153
30°	16664	13168	11868
35°	16249	12214	10698
40°	15859	11177	9406
45°	15356	10163	8244
50°	14804	9081	7042
55°	14231	7922	5939
60°	13683	6734	4821
65°	12974	5514	3763
70°	12086	4170	2690
75°	10803	2823	2130
80°	9218	1962	1494
85°	6916	1058	782

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 15356 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	157.5	2.0
10°-20°	438.1	5.5
20°-30°	630.8	7.9
30°-40°	710.4	8.9
40°-50°	679.5	8.5
50°-60°	556.3	7.0
60°-70°	375.0	4.7
70°-80°	188.1	2.4
80°-90°	51.9	0.7
90°-100°	48.6	0.6
100°-110°	234.8	2.9
110°-120°	575.4	7.2
120°-130°	730.4	9.1
130°-140°	780.3	9.8
140°-150°	729.6	9.1
150°-160°	588.5	7.4
160°-170°	379.8	4.8
170°-180°	130.9	1.6
0°-30°	1226.5	15.4
0°-40°	1936.9	24.3
0°-60°	3172.7	39.7
0°-90°	3787.8	47.4
90°-120°	858.7	10.8
90°-150°	3099.0	38.8
90°-180°	4198.0	52.6
0°-180°	7986.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1675	1675	1675	1675	1675	
5°	1675	1669	1652	1664	1662	159
15°	1598	1583	1545	1538	1529	450
25°	1454	1420	1357	1329	1314	669
35°	1258	1209	1125	1067	1042	788
45°	1034	973	868	791	758	798
55°	785	719	603	524	497	704
65°	537	462	356	289	274	531
75°	284	219	144	130	128	303
85°	72	42	38	35	35	79
90°	1	11	25	29	31	8
95°	62	20	32	39	39	75
105°	305	316	224	43	45	323
115°	572	578	587	598	602	565
125°	806	814	818	820	823	720
135°	1004	1010	1014	1017	1014	773
145°	1158	1165	1167	1169	1169	725
155°	1276	1274	1275	1280	1274	588
165°	1345	1342	1341	1350	1342	380
175°	1377	1372	1373	1380	1372	131
180°	1377	1377	1377	1377	1377	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1675.4	1675.4	1675.4	1675.4	1675.4
2.5°	1682.2	1676.7	1660.4	1675.4	1672.7
5°	1675.4	1668.6	1652.3	1664.5	1661.8
7.5°	1663.2	1656.4	1636.0	1644.1	1640.1
10°	1646.9	1637.3	1612.9	1614.2	1607.4
12.5°	1623.8	1612.9	1581.6	1580.3	1572.1
15°	1597.9	1583.0	1544.9	1538.2	1528.6
17.5°	1566.7	1550.4	1502.8	1489.2	1475.6
20°	1531.4	1509.6	1458.0	1440.3	1424.0
22.5°	1492.0	1466.1	1410.4	1387.3	1372.4
25°	1453.9	1419.9	1357.4	1328.9	1314.0
27.5°	1407.7	1371.0	1303.1	1265.0	1241.9
30°	1360.1	1319.4	1243.3	1197.1	1175.4
32.5°	1312.6	1265.0	1183.5	1131.9	1108.8
35°	1258.2	1209.3	1125.1	1066.7	1042.2
37.5°	1203.9	1150.9	1062.6	997.4	967.5
40°	1152.3	1092.5	996.0	925.3	894.1
42.5°	1093.8	1034.0	933.5	854.7	827.5
45°	1034.0	972.9	868.3	790.8	758.2
47.5°	975.6	907.7	804.4	720.2	691.6
50°	910.4	846.5	736.5	652.2	621.0
52.5°	852.0	781.3	672.6	584.3	557.1
55°	785.4	718.8	603.3	524.5	497.3
57.5°	725.6	653.6	536.7	462.0	438.9
60°	663.1	588.4	475.6	402.2	379.1
62.5°	600.6	525.9	413.1	345.1	320.7
65°	536.7	462.0	356.0	289.4	274.5
67.5°	472.9	396.8	293.5	243.2	226.9
70°	410.4	337.0	241.9	194.3	179.4
72.5°	347.9	275.8	191.6	154.9	150.8
75°	284.0	218.8	144.0	130.4	127.7
77.5°	225.6	165.8	112.8	104.6	101.9
80°	169.8	114.1	85.6	81.5	78.8
82.5°	116.9	70.7	61.1	57.1	57.1
85°	72.0	42.1	38.0	35.3	35.3
87.5°	32.6	17.7	17.7	16.3	14.9
90°	1.0	11.3	24.6	28.6	30.7
92.5°	23.5	17.4	26.6	33.8	34.8
95°	62.4	20.5	31.7	38.9	38.9
97.5°	113.6	84.9	32.7	40.9	41.9
100°	172.9	193.4	33.8	41.9	43.0
102.5°	240.4	253.7	75.7	41.9	44.0
105°	304.9	316.1	224.1	43.0	45.0
107.5°	373.4	382.6	398.0	240.4	106.4
110°	442.0	450.2	461.4	427.7	281.4



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	507.5	514.6	525.9	535.1	533.0
115°	571.9	578.1	587.3	597.5	601.6
117.5°	635.4	642.5	647.6	655.8	656.8
120°	693.7	702.9	706.0	714.1	714.1
122.5°	753.0	760.2	764.3	769.4	770.4
125°	806.2	814.4	818.5	820.5	822.6
127.5°	859.4	867.6	872.7	875.8	873.7
130°	908.5	916.7	920.8	924.9	922.9
132.5°	955.6	963.8	966.8	970.9	967.9
135°	1003.7	1009.8	1013.9	1017.0	1013.9
137.5°	1044.6	1052.8	1054.8	1059.9	1057.9
140°	1085.5	1091.7	1094.7	1098.8	1096.8
142.5°	1123.4	1129.5	1132.6	1135.7	1132.6
145°	1158.2	1165.3	1167.4	1169.4	1169.4
147.5°	1191.9	1197.0	1199.1	1201.1	1196.0
150°	1222.6	1225.7	1227.7	1229.8	1226.7
152.5°	1250.2	1251.3	1252.3	1256.4	1251.3
155°	1275.8	1273.8	1274.8	1279.9	1273.8
157.5°	1296.3	1296.3	1295.3	1301.4	1293.2
160°	1314.7	1313.7	1312.7	1318.8	1311.6
162.5°	1332.1	1329.0	1328.0	1335.2	1329.0
165°	1345.4	1342.3	1341.3	1349.5	1342.3
167.5°	1356.7	1352.6	1352.6	1360.7	1352.6
170°	1365.9	1361.8	1361.8	1370.0	1361.8
172.5°	1372.0	1366.9	1367.9	1376.1	1366.9
175°	1377.1	1372.0	1373.0	1380.2	1372.0
177.5°	1379.2	1374.0	1375.1	1383.3	1373.0
180°	1377.1	1377.1	1377.1	1377.1	1377.1

(END OF REPORT)