

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: NEO-RAY

Report Number: P333390-935

Luminaire Tested: **S125DIW-S610D1340U935-4F0-1E-UDD-D**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P333390-935
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-7,
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S125DIW-S610D1340U935-4F0-1E-UDD-D
Description: DEFINE 5 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE
DOWNLIGHT 610 LUMENS PER FOOT, DROP SATIN WHITE DIFFUSER
UPLIGHT 1340 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6687.9 lumens
Efficiency: N/A
Efficacy: 124.3 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.21 / 1.34
Luminous Opening: Rectangular w/ Sides (W: 0.42' x L: 4' x H: 0.08')
CIE Type: Semi-Indirect

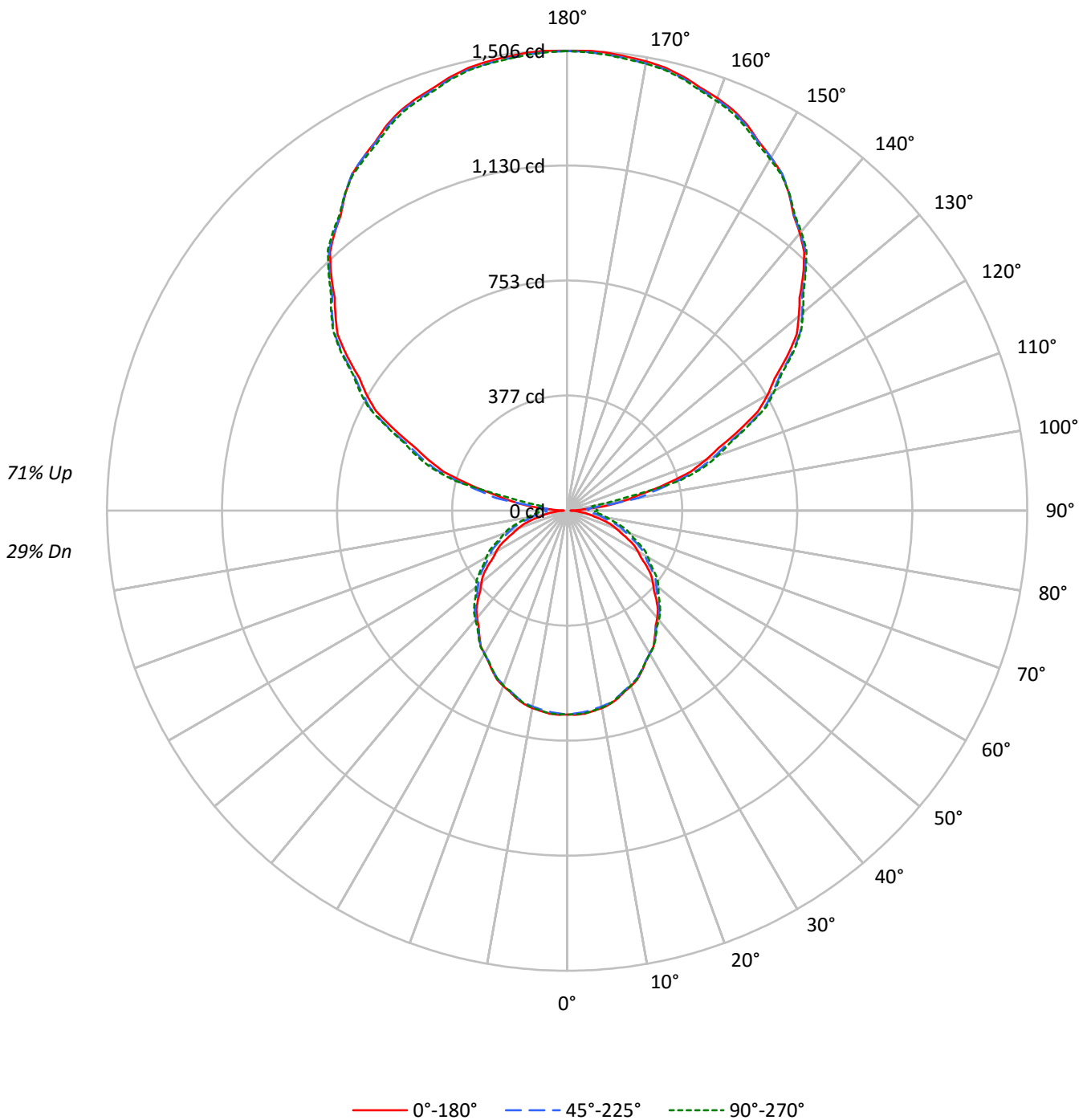
Input Watts (W): 53.8
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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CATALOG NUMBER: S125DIW-S610D1340U935-4F0-1E-UDD-D

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	102	102	102	102	92	92	92	92	72	72	72	54	54	54	37	37	37	29
1	93	88	84	81	83	79	76	73	62	60	58	46	45	44	32	31	30	24
2	84	77	71	66	75	69	64	59	54	51	47	40	38	36	28	26	25	19
3	77	67	60	54	68	60	54	49	48	43	40	36	33	30	24	23	21	16
4	70	59	52	46	62	53	47	42	42	37	34	32	28	26	22	20	18	14
5	64	53	45	39	57	47	41	35	37	32	29	28	25	22	20	17	16	12
6	59	47	39	33	52	42	36	31	34	29	25	25	22	19	18	15	14	10
7	54	42	35	29	48	38	31	27	30	25	22	23	19	17	16	14	12	9
8	50	38	31	26	45	35	28	23	28	23	19	21	17	15	15	12	11	8
9	47	35	27	23	42	31	25	21	25	20	17	19	16	13	14	11	10	7
10	43	32	25	20	39	29	23	18	23	18	15	18	14	12	13	10	9	7

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4310	4310	4310
5°	4318	4229	4243
10°	4288	4154	4148
15°	4236	4064	4027
20°	4168	3952	3906
25°	4086	3833	3757
30°	3987	3701	3622
35°	3894	3580	3497
40°	3800	3452	3372
45°	3693	3344	3261
50°	3592	3225	3163
55°	3469	3114	3048
60°	3336	2986	2931
65°	3196	2854	2799
70°	3036	2672	2663
75°	2788	2496	2496
80°	2461	2284	2314
85°	2155	2142	2255



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	63.1	0.9
10°-20°	179.1	2.7
20°-30°	266.4	4.0
30°-40°	315.5	4.7
40°-50°	326.2	4.9
50°-60°	300.5	4.5
60°-70°	242.9	3.6
70°-80°	162.7	2.4
80°-90°	87.5	1.3
90°-100°	102.0	1.5
100°-110°	371.7	5.6
110°-120°	634.2	9.5
120°-130°	797.2	11.9
130°-140°	849.0	12.7
140°-150°	792.6	11.9
150°-160°	640.2	9.6
160°-170°	414.1	6.2
170°-180°	142.8	2.1
0°-30°	508.6	7.6
0°-40°	824.1	12.3
0°-60°	1450.8	21.7
0°-90°	1943.9	29.1
90°-120°	1107.9	16.6
90°-150°	3546.8	53.0
90°-180°	4744.0	70.9
0°-180°	6687.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	667	667	667	667	667	
5°	667	666	661	666	666	63
15°	637	638	633	637	635	179
25°	579	581	577	579	576	266
35°	501	505	504	506	506	313
45°	413	420	423	428	428	318
55°	317	328	338	345	348	284
65°	218	234	249	259	262	217
75°	120	138	158	171	175	128
85°	36	58	80	94	100	38
90°	12	41	72	91	100	10
95°	72	84	66	85	90	88
105°	334	349	368	381	385	354
115°	619	630	648	654	652	614
125°	878	885	898	904	904	784
135°	1093	1098	1101	1107	1104	842
145°	1266	1267	1268	1271	1268	791
155°	1393	1387	1389	1392	1384	642
165°	1470	1464	1465	1471	1463	415
175°	1504	1498	1498	1506	1497	143
180°	1504	1504	1504	1504	1504	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	667.3	667.3	667.3	667.3	667.3	667.3	667.3	667.3	667.3	667.3	667.3
2.5°	668.8	668.6	668.4	668.1	667.9	667.4	666.6	665.7	665.0	664.1	665.0
5°	667.3	666.9	666.7	666.4	666.1	665.5	664.4	663.4	662.4	661.3	662.5
7.5°	661.3	661.2	661.2	661.0	660.9	660.3	659.3	658.2	657.2	656.2	657.1
10°	656.2	656.2	656.2	656.2	656.2	655.6	654.4	653.2	652.0	650.9	651.9
12.5°	648.8	648.9	649.0	649.2	649.3	648.8	647.9	647.0	646.1	645.1	645.9
15°	637.1	637.3	637.5	637.6	637.7	637.3	636.3	635.2	634.3	633.3	634.1
17.5°	622.0	622.2	622.6	622.8	623.2	622.8	621.8	620.8	619.7	618.7	619.4
20°	611.0	611.3	611.6	611.9	612.2	611.8	610.8	609.8	608.7	607.7	608.1
22.5°	598.5	599.0	599.5	600.0	600.5	600.2	599.1	598.0	596.8	595.7	596.2
25°	578.9	579.4	579.8	580.2	580.7	580.5	579.6	578.8	577.8	577.0	577.6
27.5°	557.2	557.8	558.5	559.1	559.8	559.6	558.6	557.7	556.6	555.7	556.0
30°	541.0	541.9	542.8	543.6	544.5	544.5	543.6	542.8	541.9	541.0	541.3
32.5°	526.3	527.1	527.9	528.7	529.3	529.4	528.8	528.1	527.5	526.8	527.2
35°	501.1	502.1	503.2	504.1	505.1	505.5	505.1	504.5	504.1	503.7	504.1
37.5°	475.9	476.8	477.7	478.6	479.6	479.9	479.8	479.7	479.5	479.4	479.9
40°	458.6	459.8	460.9	462.1	463.2	463.7	463.6	463.5	463.3	463.1	463.7
42.5°	439.7	441.3	442.7	444.3	445.8	446.7	447.0	447.4	447.6	448.0	448.7
45°	412.8	414.4	415.9	417.6	419.2	420.3	421.1	421.8	422.5	423.3	424.3
47.5°	385.2	386.7	388.1	389.6	391.2	392.4	393.7	394.9	396.2	397.4	399.0
50°	366.4	367.9	369.5	371.2	372.7	374.4	375.9	377.5	379.1	380.7	382.4
52.5°	346.5	348.4	350.3	352.3	354.2	356.2	358.2	360.1	362.1	363.9	365.7
55°	317.3	319.6	321.9	324.3	326.6	328.9	331.2	333.6	335.9	338.2	339.8
57.5°	287.5	290.2	293.0	295.8	298.6	301.4	304.0	306.7	309.4	312.0	313.8
60°	267.6	270.4	273.4	276.3	279.2	282.1	285.0	287.9	290.8	293.7	295.9
62.5°	248.2	251.1	254.0	256.9	259.8	262.9	266.0	269.1	272.2	275.4	277.8
65°	218.5	221.9	225.2	228.5	231.9	235.3	238.8	242.3	245.7	249.3	251.4
67.5°	190.5	193.7	196.9	200.2	203.4	206.8	210.3	213.9	217.4	221.0	223.6
70°	170.0	173.4	176.8	180.1	183.5	187.0	190.8	194.6	198.4	202.2	204.9
72.5°	150.2	153.7	157.1	160.6	164.0	167.8	171.9	176.1	180.2	184.3	187.4
75°	120.4	124.2	127.9	131.7	135.5	139.7	144.4	149.0	153.7	158.3	161.2
77.5°	91.7	96.1	100.5	104.8	109.2	113.6	118.0	122.5	127.0	131.5	134.7
80°	74.0	78.3	82.7	87.0	91.4	96.0	101.0	105.9	110.8	115.8	119.0
82.5°	57.7	62.3	66.9	71.5	76.1	80.9	85.9	91.0	96.1	101.2	104.2
85°	36.0	40.8	45.5	50.4	55.2	60.1	65.2	70.3	75.3	80.5	83.7
87.5°	20.7	25.7	30.7	35.8	40.8	46.0	51.3	56.6	61.9	67.2	70.8
90°	11.6	18.3	24.9	31.5	38.1	44.8	51.5	58.1	64.8	71.5	76.0
92.5°	26.6	29.5	32.5	35.3	38.2	43.0	49.6	56.2	62.8	69.4	73.9
95°	72.1	75.1	78.1	81.2	84.2	83.5	79.0	74.6	70.1	65.6	70.0
97.5°	140.3	145.1	149.8	154.6	159.4	154.8	140.9	127.1	113.2	99.4	95.4
100°	193.4	197.2	201.0	204.7	208.5	213.3	219.0	224.5	230.2	235.8	202.0
102.5°	247.3	251.0	254.8	258.6	262.3	266.7	271.9	277.0	282.1	287.2	283.2
105°	333.6	336.9	340.3	343.6	346.9	350.8	355.1	359.5	363.9	368.2	371.1
107.5°	423.4	425.3	427.3	429.3	431.3	434.6	439.3	443.9	448.7	453.3	456.2
110°	481.7	483.5	485.2	486.9	488.7	491.8	496.4	500.9	505.5	510.1	512.1



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	537.0	539.0	541.0	542.9	544.9	548.1	552.3	556.6	560.9	565.1	566.8
115°	619.3	621.6	623.8	626.0	628.3	631.5	635.5	639.5	643.5	647.6	649.2
117.5°	704.5	705.1	705.7	706.4	707.0	709.6	714.0	718.5	723.1	727.5	728.8
120°	757.9	758.2	758.4	758.5	758.7	760.9	764.9	769.0	773.1	777.2	779.2
122.5°	804.7	805.9	807.0	808.1	809.3	811.7	815.2	818.8	822.3	826.0	827.9
125°	877.7	879.3	880.9	882.5	884.1	886.3	889.2	892.2	895.0	897.9	899.3
127.5°	946.8	948.0	949.0	950.1	951.2	952.9	955.1	957.3	959.6	961.8	963.5
130°	989.6	990.8	991.9	992.9	994.0	995.7	998.0	1000.3	1002.5	1004.9	1006.2
132.5°	1031.9	1033.4	1034.7	1036.1	1037.6	1038.8	1039.8	1040.9	1041.9	1042.8	1044.7
135°	1092.7	1094.0	1095.4	1096.7	1098.0	1099.0	1099.5	1100.0	1100.5	1101.0	1102.4
137.5°	1148.5	1149.7	1150.8	1152.0	1153.2	1153.8	1153.8	1153.9	1153.9	1154.0	1155.8
140°	1184.6	1185.1	1185.5	1186.0	1186.5	1186.7	1186.6	1186.5	1186.5	1186.3	1188.4
142.5°	1217.5	1217.7	1217.9	1218.1	1218.2	1218.6	1218.9	1219.3	1219.7	1220.0	1221.5
145°	1265.9	1266.3	1266.6	1267.0	1267.3	1267.5	1267.5	1267.5	1267.5	1267.5	1268.5
147.5°	1307.6	1307.5	1307.4	1307.3	1307.3	1307.3	1307.6	1307.9	1308.2	1308.5	1309.1
150°	1334.4	1333.9	1333.4	1332.9	1332.4	1332.4	1332.9	1333.4	1333.9	1334.4	1334.9
152.5°	1360.2	1359.2	1358.1	1357.0	1355.9	1355.6	1356.1	1356.6	1357.1	1357.5	1358.1
155°	1393.4	1392.0	1390.5	1389.1	1387.5	1387.1	1387.5	1388.0	1388.5	1389.1	1389.7
157.5°	1419.1	1418.2	1417.3	1416.4	1415.6	1415.1	1415.1	1415.2	1415.3	1415.3	1416.1
160°	1436.9	1435.5	1434.0	1432.4	1431.0	1430.4	1430.6	1430.9	1431.2	1431.4	1432.4
162.5°	1451.2	1449.8	1448.2	1446.7	1445.3	1444.7	1444.9	1445.2	1445.4	1445.6	1447.0
165°	1470.4	1468.9	1467.4	1465.9	1464.5	1463.8	1464.0	1464.3	1464.6	1464.8	1466.3
167.5°	1484.6	1483.2	1481.6	1480.1	1478.5	1477.9	1478.1	1478.3	1478.6	1478.9	1480.7
170°	1492.7	1491.0	1489.2	1487.5	1485.7	1485.0	1485.2	1485.5	1485.7	1486.0	1488.0
172.5°	1498.1	1496.3	1494.6	1492.8	1491.1	1490.5	1490.9	1491.3	1491.8	1492.2	1494.0
175°	1503.8	1502.4	1500.9	1499.3	1497.9	1497.3	1497.5	1497.8	1498.1	1498.2	1500.2
177.5°	1506.5	1505.3	1504.2	1503.0	1501.8	1501.2	1501.5	1501.7	1501.8	1502.0	1503.5
180°	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	667.3	667.3	667.3	667.3	667.3	667.3	667.3	667.3
2.5°	665.7	666.6	667.4	667.7	667.6	667.5	667.4	667.3
5°	663.7	664.9	666.0	666.5	666.4	666.2	666.1	666.0
7.5°	658.1	659.2	660.2	660.6	660.5	660.4	660.2	660.0
10°	653.0	653.9	655.0	655.4	655.3	655.1	655.0	654.8
12.5°	646.7	647.5	648.3	648.5	648.1	647.7	647.4	647.0
15°	635.0	635.8	636.7	636.9	636.3	635.7	635.2	634.6
17.5°	620.1	620.7	621.4	621.6	621.2	620.9	620.5	620.2
20°	608.6	609.1	609.5	609.7	609.7	609.7	609.7	609.7
22.5°	596.8	597.4	597.9	598.0	597.6	597.3	596.9	596.6
25°	578.2	578.8	579.3	579.3	578.5	577.8	577.0	576.4
27.5°	556.5	556.9	557.3	557.3	557.1	556.8	556.6	556.3
30°	541.6	541.9	542.2	542.3	542.1	541.9	541.8	541.7
32.5°	527.4	527.7	528.1	528.1	528.0	527.8	527.7	527.5
35°	504.5	505.1	505.5	505.7	505.7	505.7	505.7	505.7
37.5°	480.5	481.1	481.7	482.0	481.9	481.8	481.8	481.7
40°	464.3	464.9	465.5	465.9	466.2	466.5	466.8	467.1
42.5°	449.4	450.0	450.7	451.2	451.3	451.3	451.3	451.4
45°	425.2	426.3	427.3	427.9	428.1	428.2	428.3	428.5
47.5°	400.5	401.9	403.4	404.3	404.7	404.9	405.3	405.6
50°	383.9	385.6	387.1	388.1	388.6	389.0	389.4	389.9
52.5°	367.4	369.1	370.8	371.9	372.2	372.5	372.8	373.2
55°	341.4	343.0	344.6	345.7	346.3	346.9	347.4	348.0
57.5°	315.7	317.5	319.3	320.5	321.0	321.4	321.8	322.3
60°	298.1	300.2	302.5	303.8	304.2	304.6	305.1	305.5
62.5°	280.3	282.7	285.1	286.5	287.1	287.7	288.2	288.8
65°	253.6	255.8	258.0	259.3	259.9	260.5	261.1	261.7
67.5°	226.3	228.9	231.5	233.2	234.0	234.8	235.6	236.3
70°	207.7	210.4	213.2	215.0	215.9	216.7	217.7	218.5
72.5°	190.4	193.3	196.3	198.1	198.8	199.4	200.1	200.7
75°	164.1	167.0	170.0	171.8	172.5	173.2	173.9	174.7
77.5°	137.8	141.1	144.3	146.2	146.7	147.3	147.9	148.5
80°	122.2	125.4	128.5	130.4	131.0	131.6	132.2	132.8
82.5°	107.3	110.4	113.5	115.5	116.6	117.6	118.6	119.7
85°	86.9	90.1	93.2	95.4	96.6	97.7	98.9	100.0
87.5°	74.3	77.9	81.5	83.9	85.1	86.3	87.4	88.6
90°	80.7	85.2	89.8	93.0	94.7	96.5	98.2	100.0
92.5°	78.4	82.7	87.2	90.1	91.5	92.9	94.3	95.7
95°	74.5	78.9	83.3	86.1	87.0	88.1	89.1	90.1
97.5°	91.4	87.6	83.6	82.1	83.1	84.1	85.1	86.1
100°	168.2	134.2	100.4	83.4	83.3	83.2	83.1	82.9
102.5°	279.1	275.1	271.0	261.1	245.0	229.1	213.1	197.2
105°	374.0	376.9	379.8	381.7	382.5	383.2	383.9	384.7
107.5°	459.2	462.1	465.0	466.6	466.7	466.9	467.1	467.2
110°	514.1	516.2	518.1	519.8	521.1	522.4	523.6	524.9



TEST NUMBER: P333390-935

CATALOG NUMBER: S125DIW-S610D1340U935-4F0-1E-UDD-D

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
112.5°	568.5	570.2	571.9	573.1	573.8	574.5	575.1	575.8
115°	650.8	652.5	654.1	654.5	653.9	653.3	652.7	652.1
117.5°	730.0	731.2	732.3	733.1	733.4	733.7	734.1	734.4
120°	781.2	783.2	785.1	785.9	785.6	785.1	784.8	784.5
122.5°	829.7	831.6	833.4	834.1	833.4	832.9	832.3	831.8
125°	900.6	902.0	903.3	904.0	904.0	903.9	903.9	903.9
127.5°	965.0	966.6	968.3	968.5	967.6	966.6	965.6	964.6
130°	1007.5	1008.7	1010.0	1010.4	1009.9	1009.4	1008.8	1008.3
132.5°	1046.6	1048.5	1050.4	1051.0	1050.4	1049.8	1049.2	1048.5
135°	1103.9	1105.3	1106.6	1107.0	1106.2	1105.4	1104.7	1103.9
137.5°	1157.6	1159.4	1161.2	1161.8	1161.1	1160.4	1159.7	1159.0
140°	1190.5	1192.6	1194.7	1195.3	1194.4	1193.5	1192.6	1191.7
142.5°	1223.0	1224.4	1225.9	1226.2	1225.3	1224.3	1223.5	1222.5
145°	1269.5	1270.4	1271.4	1271.4	1270.5	1269.6	1268.7	1267.8
147.5°	1309.6	1310.1	1310.6	1310.2	1308.6	1307.1	1305.6	1304.1
150°	1335.4	1335.8	1336.4	1335.7	1333.9	1332.1	1330.2	1328.4
152.5°	1358.6	1359.1	1359.5	1358.9	1357.2	1355.4	1353.7	1351.9
155°	1390.5	1391.2	1392.0	1391.4	1389.4	1387.4	1385.4	1383.5
157.5°	1416.9	1417.7	1418.5	1417.9	1415.9	1413.9	1412.0	1410.0
160°	1433.4	1434.3	1435.4	1434.9	1432.9	1430.9	1428.9	1426.9
162.5°	1448.4	1449.8	1451.2	1450.8	1448.6	1446.4	1444.2	1442.1
165°	1467.7	1469.3	1470.8	1470.5	1468.5	1466.5	1464.6	1462.6
167.5°	1482.5	1484.2	1486.0	1485.7	1483.5	1481.4	1479.1	1476.9
170°	1490.0	1491.9	1493.9	1493.8	1491.6	1489.4	1487.1	1484.9
172.5°	1495.8	1497.6	1499.3	1499.2	1496.9	1494.7	1492.5	1490.2
175°	1502.2	1504.2	1506.1	1506.1	1503.8	1501.6	1499.3	1497.1
177.5°	1504.9	1506.2	1507.6	1507.5	1505.9	1504.3	1502.7	1501.2
180°	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8	1503.8

(END OF REPORT)