

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: P333462-930

Luminaire Tested: **S125DIW-S1270D470U930-4F0-1E-UDD-D**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P333462-930
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-S1270D470U930-4F0-1E-UDD-D
Description: DEFINE 5 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE
DOWNLIGHT 1270 LUMENS PER FOOT, DROP SATIN WHITE DIFFUSER
UPLIGHT 470 LUMENS PER FOOT, NO LENS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5544.9 lumens
Efficiency: N/A
Efficacy: 105.8 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-Direct

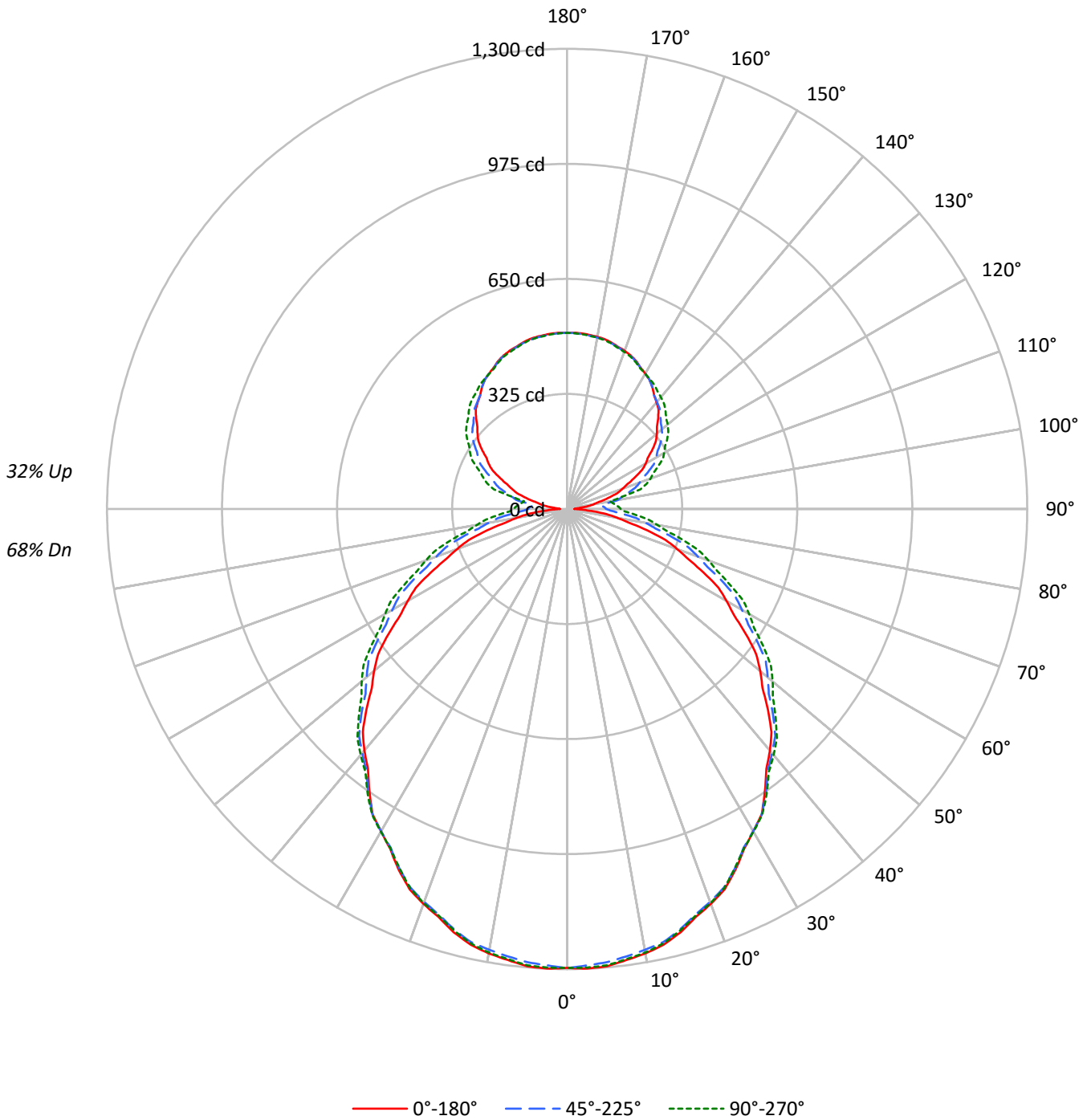
Input Watts (W): 52.4
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





TEST NUMBER: P333462-930

CATALOG NUMBER: S125DIW-S1270D470U930-4F0-1E-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	50	30	10	0	
RCR																						
0	111	111	111	111	105	105	105	105	93	93	93	83	83	83	73	73	73	68				
1	101	96	92	88	95	91	87	83	80	77	75	71	69	67	63	61	59	55				
2	91	83	76	71	86	79	73	67	70	65	61	62	58	55	55	52	49	45				
3	83	73	65	59	78	69	62	56	61	56	51	54	50	46	48	45	42	38				
4	76	64	56	49	71	61	53	47	54	48	43	48	43	39	43	39	36	32				
5	70	57	49	42	65	54	46	41	49	42	37	43	38	34	38	34	31	28				
6	64	51	43	37	60	49	41	35	44	37	32	39	34	30	35	30	27	24				
7	59	46	38	32	56	44	36	31	40	33	29	36	30	26	32	27	24	22				
8	55	42	34	28	52	40	33	27	36	30	25	33	27	23	29	25	21	19				
9	52	39	31	25	48	37	30	25	33	27	23	30	25	21	27	23	19	17				
10	48	36	28	23	45	34	27	22	31	25	21	28	23	19	25	21	18	16				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	8374	8374	8374
5°	8391	8220	8245
10°	8331	8072	8060
15°	8232	7896	7825
20°	8098	7680	7590
25°	7939	7447	7300
30°	7746	7191	7036
35°	7566	6956	6795
40°	7383	6709	6552
45°	7176	6497	6337
50°	6978	6267	6147
55°	6741	6051	5923
60°	6482	5802	5695
65°	6210	5544	5437
70°	5903	5190	5173
75°	5415	4849	4849
80°	4780	4438	4496
85°	4189	4162	4384



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	122.6	2.2
10°-20°	348.0	6.3
20°-30°	517.6	9.3
30°-40°	613.1	11.1
40°-50°	633.9	11.4
50°-60°	583.9	10.5
60°-70°	472.0	8.5
70°-80°	316.1	5.7
80°-90°	165.0	3.0
90°-100°	110.1	2.0
100°-110°	179.3	3.2
110°-120°	247.6	4.5
120°-130°	285.2	5.1
130°-140°	290.3	5.2
140°-150°	264.2	4.8
150°-160°	211.8	3.8
160°-170°	137.0	2.5
170°-180°	47.3	0.9
0°-30°	988.2	17.8
0°-40°	1601.3	28.9
0°-60°	2819.2	50.8
0°-90°	3772.3	68.0
90°-120°	536.9	9.7
90°-150°	1376.5	24.8
90°-180°	1773.0	32.0
0°-180°	5544.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1297	1297	1297	1297	1297	
5°	1297	1294	1285	1295	1294	123
15°	1238	1239	1230	1237	1233	349
25°	1125	1128	1121	1126	1120	518
35°	974	982	979	982	983	609
45°	802	816	822	831	833	619
55°	616	637	657	671	676	551
65°	424	454	484	503	508	421
75°	234	267	308	332	339	248
85°	70	112	156	183	194	74
90°	21	64	110	140	151	14
95°	38	69	99	127	137	40
105°	120	143	180	204	214	127
115°	211	223	255	276	282	209
125°	295	297	321	339	345	263
135°	364	365	373	388	393	280
145°	420	419	419	426	429	262
155°	461	459	460	460	458	212
165°	486	484	485	487	484	137
175°	498	496	496	498	495	47
180°	498	498	498	498	498	



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CATALOG NUMBER: S125DIW-S1270D470U930-4F0-1E-UDD-D

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6
2.5°	1299.6	1299.2	1298.7	1298.3	1297.8	1296.8	1295.2	1293.6	1292.1	1290.5	1292.1
5°	1296.6	1296.0	1295.4	1294.9	1294.3	1293.1	1291.0	1289.1	1287.1	1285.2	1287.4
7.5°	1285.2	1284.9	1284.7	1284.4	1284.3	1283.1	1281.1	1279.0	1277.0	1275.0	1276.9
10°	1275.0	1275.0	1275.0	1275.0	1275.0	1273.8	1271.5	1269.3	1267.1	1264.8	1266.7
12.5°	1260.7	1260.9	1261.2	1261.4	1261.6	1260.9	1259.1	1257.2	1255.4	1253.6	1255.2
15°	1238.1	1238.4	1238.7	1238.9	1239.3	1238.4	1236.4	1234.4	1232.5	1230.4	1232.2
17.5°	1208.6	1209.2	1209.7	1210.3	1210.9	1210.1	1208.2	1206.2	1204.2	1202.2	1203.5
20°	1187.2	1187.8	1188.4	1189.0	1189.5	1188.8	1186.8	1184.9	1182.8	1180.9	1181.8
22.5°	1162.9	1163.8	1164.9	1165.9	1166.9	1166.3	1164.1	1161.9	1159.7	1157.5	1158.5
25°	1124.9	1125.8	1126.7	1127.5	1128.4	1128.0	1126.3	1124.5	1122.8	1121.1	1122.3
27.5°	1082.8	1084.0	1085.2	1086.5	1087.8	1087.4	1085.5	1083.5	1081.7	1079.7	1080.5
30°	1051.2	1053.0	1054.6	1056.3	1058.0	1058.0	1056.3	1054.6	1053.0	1051.2	1051.8
32.5°	1022.8	1024.3	1025.7	1027.2	1028.7	1028.7	1027.5	1026.3	1025.0	1023.8	1024.3
35°	973.7	975.7	977.6	979.7	981.6	982.2	981.3	980.5	979.7	978.8	979.7
37.5°	924.6	926.4	928.2	930.1	931.9	932.6	932.4	932.1	931.8	931.5	932.6
40°	891.0	893.3	895.6	897.9	900.1	901.1	900.8	900.5	900.3	900.0	901.1
42.5°	854.4	857.4	860.3	863.2	866.3	868.0	868.6	869.3	869.8	870.5	871.8
45°	802.1	805.2	808.3	811.4	814.5	816.8	818.2	819.6	821.0	822.4	824.4
47.5°	748.4	751.3	754.2	757.1	759.9	762.6	765.1	767.5	769.9	772.3	775.3
50°	711.8	714.9	718.0	721.1	724.3	727.4	730.5	733.6	736.7	739.8	742.9
52.5°	673.2	677.0	680.8	684.5	688.4	692.1	695.9	699.7	703.4	707.3	710.6
55°	616.5	621.0	625.6	630.1	634.5	639.1	643.6	648.2	652.6	657.2	660.3
57.5°	558.6	563.9	569.4	574.8	580.2	585.5	590.8	595.9	601.1	606.3	609.9
60°	519.9	525.5	531.2	536.9	542.5	548.1	553.8	559.5	565.1	570.7	574.9
62.5°	482.2	488.0	493.6	499.2	504.8	510.8	516.8	522.9	529.0	535.2	539.8
65°	424.5	431.0	437.6	444.1	450.5	457.2	464.0	470.8	477.5	484.3	488.5
67.5°	370.1	376.4	382.7	389.0	395.3	401.9	408.7	415.6	422.5	429.4	434.6
70°	330.5	337.0	343.5	350.0	356.4	363.4	370.7	378.1	385.5	392.8	398.2
72.5°	291.9	298.6	305.3	312.0	318.8	326.1	334.1	342.2	350.2	358.2	364.0
75°	233.9	241.2	248.6	255.9	263.3	271.5	280.5	289.5	298.6	307.6	313.2
77.5°	178.2	186.7	195.2	203.7	212.1	220.7	229.4	238.1	246.8	255.5	261.7
80°	143.7	152.1	160.6	169.1	177.6	186.5	196.2	205.8	215.4	225.0	231.2
82.5°	112.1	121.1	130.0	138.9	147.8	157.2	167.1	176.8	186.7	196.5	202.5
85°	70.0	79.2	88.5	97.9	107.2	116.8	126.7	136.6	146.4	156.4	162.6
87.5°	39.7	48.9	58.0	67.3	76.4	85.9	95.6	105.3	115.0	124.7	131.3
90°	20.7	30.4	40.1	49.8	59.5	69.5	79.6	89.8	100.0	110.1	117.1
92.5°	24.0	31.9	39.8	47.7	55.6	64.7	75.1	85.4	95.7	106.1	112.8
95°	37.6	44.7	51.8	58.9	66.0	72.7	79.2	85.7	92.2	98.7	105.3
97.5°	58.9	66.0	73.0	80.1	87.1	92.2	95.3	98.4	101.5	104.6	108.2
100°	75.6	81.8	88.0	94.1	100.3	108.0	117.4	126.8	136.2	145.5	139.3
102.5°	92.5	98.3	104.1	109.9	115.7	123.1	132.2	141.1	150.2	159.1	162.6
105°	119.8	124.7	129.6	134.4	139.3	145.9	154.4	162.9	171.4	179.9	185.5
107.5°	148.3	152.1	156.0	159.8	163.6	169.7	178.1	186.4	194.6	202.9	208.6
110°	166.7	170.2	173.6	176.9	180.3	186.1	194.1	202.2	210.3	218.3	223.5



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	185.1	187.9	190.9	193.8	196.7	202.0	209.8	217.6	225.3	233.2	238.0
115°	211.2	213.6	216.0	218.4	220.8	225.7	233.1	240.5	247.9	255.4	260.2
117.5°	238.4	239.6	240.9	242.2	243.4	247.8	255.0	262.3	269.5	276.8	281.2
120°	256.1	256.8	257.6	258.4	259.1	262.9	269.6	276.4	283.1	289.8	294.5
122.5°	270.7	271.4	272.1	272.8	273.5	277.0	283.5	289.8	296.2	302.6	307.0
125°	294.6	294.9	295.2	295.5	295.8	298.7	304.4	310.1	315.7	321.4	325.5
127.5°	316.4	316.6	316.7	316.8	317.0	319.3	323.9	328.5	333.0	337.6	341.6
130°	330.6	330.8	330.8	331.0	331.1	333.2	337.2	341.3	345.3	349.4	353.0
132.5°	343.7	344.1	344.6	345.0	345.4	347.1	349.9	352.8	355.7	358.6	362.5
135°	363.6	363.9	364.0	364.3	364.4	365.5	367.3	369.1	371.0	372.8	376.3
137.5°	381.9	382.1	382.3	382.5	382.7	383.2	384.0	384.8	385.6	386.5	389.8
140°	393.0	393.1	393.3	393.5	393.6	393.8	394.0	394.2	394.4	394.6	397.9
142.5°	403.9	403.7	403.7	403.5	403.4	403.4	403.6	403.7	403.9	404.1	406.8
145°	419.9	419.8	419.6	419.6	419.4	419.4	419.4	419.4	419.4	419.4	420.9
147.5°	432.7	432.6	432.6	432.5	432.5	432.5	432.7	432.8	432.8	432.9	433.5
150°	441.5	441.3	441.2	441.0	440.8	440.8	441.0	441.2	441.3	441.5	441.6
152.5°	450.0	449.7	449.3	449.0	448.6	448.5	448.7	448.8	449.0	449.1	449.3
155°	461.1	460.6	460.1	459.6	459.1	458.9	459.1	459.3	459.4	459.6	459.8
157.5°	469.5	469.2	469.0	468.6	468.3	468.2	468.2	468.2	468.2	468.3	468.6
160°	475.4	474.9	474.4	473.9	473.4	473.3	473.4	473.4	473.5	473.6	473.9
162.5°	480.1	479.6	479.2	478.7	478.2	478.0	478.1	478.2	478.3	478.3	478.7
165°	486.5	486.0	485.5	485.0	484.5	484.3	484.4	484.5	484.5	484.6	485.1
167.5°	491.2	490.7	490.2	489.7	489.2	488.9	489.0	489.1	489.2	489.3	489.9
170°	493.9	493.3	492.7	492.1	491.5	491.3	491.4	491.5	491.5	491.6	492.3
172.5°	495.6	495.0	494.5	493.9	493.3	493.2	493.3	493.4	493.6	493.7	494.3
175°	497.6	497.1	496.6	496.1	495.6	495.4	495.5	495.5	495.6	495.7	496.4
177.5°	498.5	498.1	497.7	497.3	496.8	496.7	496.8	496.8	496.9	497.0	497.4
180°	497.6	497.6	497.6	497.6	497.6	497.6	497.6	497.6	497.6	497.6	497.6



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6	1296.6
2.5°	1293.6	1295.2	1296.8	1297.5	1297.2	1297.1	1296.8	1296.6
5°	1289.6	1291.9	1294.2	1295.2	1294.9	1294.6	1294.3	1294.0
7.5°	1278.9	1280.9	1282.9	1283.7	1283.4	1283.1	1282.9	1282.5
10°	1268.8	1270.7	1272.7	1273.6	1273.3	1273.0	1272.7	1272.4
12.5°	1256.6	1258.2	1259.7	1260.1	1259.4	1258.7	1257.9	1257.2
15°	1233.9	1235.6	1237.2	1237.5	1236.4	1235.3	1234.1	1233.0
17.5°	1204.8	1206.2	1207.5	1207.8	1207.1	1206.4	1205.7	1205.0
20°	1182.6	1183.4	1184.3	1184.7	1184.7	1184.7	1184.7	1184.7
22.5°	1159.7	1160.7	1161.8	1162.0	1161.3	1160.7	1159.9	1159.3
25°	1123.4	1124.5	1125.7	1125.5	1124.1	1122.7	1121.3	1119.9
27.5°	1081.3	1082.1	1082.9	1083.0	1082.5	1082.0	1081.5	1081.0
30°	1052.4	1053.0	1053.5	1053.6	1053.4	1053.0	1052.8	1052.5
32.5°	1024.9	1025.5	1026.1	1026.2	1025.9	1025.6	1025.3	1025.1
35°	980.5	981.3	982.2	982.6	982.6	982.6	982.6	982.6
37.5°	933.8	934.9	936.0	936.5	936.4	936.3	936.2	936.0
40°	902.2	903.4	904.5	905.3	905.9	906.4	907.0	907.6
42.5°	873.2	874.6	875.9	876.6	876.8	876.9	877.0	877.1
45°	826.4	828.3	830.3	831.4	831.8	832.0	832.3	832.6
47.5°	778.1	781.0	783.9	785.6	786.3	786.8	787.5	788.1
50°	746.0	749.1	752.3	754.2	755.0	755.9	756.8	757.6
52.5°	714.0	717.3	720.6	722.6	723.2	723.8	724.5	725.0
55°	663.4	666.5	669.6	671.7	672.9	674.0	675.1	676.3
57.5°	613.4	617.0	620.6	622.8	623.6	624.4	625.3	626.1
60°	579.2	583.4	587.7	590.2	591.1	591.9	592.8	593.6
62.5°	544.5	549.2	553.9	556.8	557.8	559.0	560.0	561.1
65°	492.8	497.0	501.2	503.9	505.1	506.2	507.4	508.4
67.5°	439.7	444.8	450.0	453.2	454.7	456.2	457.7	459.2
70°	403.5	408.9	414.3	417.8	419.5	421.2	422.9	424.5
72.5°	369.8	375.7	381.5	385.0	386.3	387.5	388.7	390.0
75°	318.9	324.6	330.2	333.8	335.2	336.6	338.0	339.4
77.5°	267.9	274.1	280.4	284.1	285.2	286.3	287.4	288.5
80°	237.4	243.6	249.9	253.6	254.6	255.8	256.9	258.0
82.5°	208.5	214.5	220.5	224.5	226.5	228.5	230.6	232.6
85°	168.8	175.0	181.2	185.5	187.7	190.0	192.2	194.4
87.5°	137.9	144.5	151.1	155.3	157.4	159.4	161.4	163.5
90°	123.9	130.9	137.8	142.4	144.6	146.8	149.0	151.2
92.5°	119.4	126.1	132.8	137.2	139.3	141.4	143.5	145.5
95°	111.9	118.5	125.2	129.5	131.5	133.5	135.4	137.4
97.5°	111.9	115.4	119.0	121.8	123.8	125.7	127.6	129.6
100°	133.0	126.7	120.4	118.0	119.3	120.7	122.1	123.4
102.5°	166.0	169.3	172.8	172.5	168.6	164.8	160.9	157.0
105°	191.1	196.8	202.4	206.2	208.1	210.0	211.9	213.8
107.5°	214.2	219.8	225.3	228.9	230.4	232.0	233.4	235.0
110°	228.6	233.7	238.8	242.4	244.5	246.5	248.6	250.6



TEST NUMBER: P333462-930

CATALOG NUMBER: S125DIW-S1270D470U930-4F0-1E-UDD-D

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
112.5°	242.8	247.7	252.5	255.8	257.7	259.5	261.4	263.3
115°	264.9	269.6	274.4	277.4	278.6	279.8	281.0	282.2
117.5°	285.5	289.9	294.3	297.3	299.1	300.8	302.5	304.2
120°	299.1	303.8	308.4	311.4	312.7	313.9	315.2	316.5
122.5°	311.4	315.8	320.2	323.0	324.2	325.5	326.7	327.9
125°	329.7	333.9	338.1	340.8	341.9	343.2	344.3	345.4
127.5°	345.6	349.6	353.7	356.1	357.2	358.2	359.2	360.3
130°	356.8	360.4	364.2	366.6	367.5	368.5	369.6	370.6
132.5°	366.4	370.2	374.1	376.5	377.3	378.1	378.9	379.6
135°	379.8	383.3	386.8	389.0	389.9	390.9	391.8	392.6
137.5°	393.2	396.6	399.9	401.9	402.7	403.3	404.1	404.8
140°	401.1	404.4	407.7	409.7	410.3	410.9	411.6	412.2
142.5°	409.4	412.1	414.8	416.5	417.1	417.8	418.4	419.1
145°	422.3	423.9	425.3	426.4	427.1	427.7	428.4	428.9
147.5°	434.1	434.6	435.1	435.4	435.3	435.2	435.1	435.0
150°	441.8	442.0	442.1	442.1	441.6	441.3	440.9	440.6
152.5°	449.5	449.6	449.8	449.6	449.1	448.6	448.0	447.5
155°	460.1	460.3	460.6	460.3	459.7	459.0	458.4	457.7
157.5°	468.8	469.0	469.3	469.1	468.5	467.8	467.2	466.5
160°	474.3	474.6	474.9	474.7	474.1	473.4	472.8	472.1
162.5°	479.2	479.7	480.1	480.0	479.3	478.6	477.8	477.1
165°	485.7	486.2	486.7	486.6	485.9	485.2	484.5	483.9
167.5°	490.5	491.1	491.6	491.6	490.8	490.1	489.3	488.6
170°	492.9	493.7	494.3	494.2	493.5	492.8	492.0	491.3
172.5°	494.9	495.5	496.1	496.0	495.3	494.6	493.8	493.1
175°	497.0	497.7	498.3	498.3	497.6	496.8	496.1	495.4
177.5°	497.9	498.3	498.8	498.8	498.2	497.7	497.2	496.7
180°	497.6	497.6	497.6	497.6	497.6	497.6	497.6	497.6

(END OF REPORT)