

LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for
Cooper Lighting Solutions
(formerly Eaton)

Brand: STREETWORKS

Report Number: P598803

Luminaire Tested: **IFLD-S-SA6D-827-U-SLR**

Issue Date: 05/03/2022

Tested By:

Approved By:



Cooper Lighting Solutions laboratories have been accredited by National Voluntary Laboratory Accreditation Program (NVLAP) that it adheres to the requirements of ISO/IEC 17025:2005 and appropriate IESNA test methods. This report must not be used to claim product certification, approval or endorsement by NVLAP, NIST or any agency of the Federal Government. Results contained in this report are valid for luminaire sample tested, as supplied by requestor. Information related to the luminaire tested has been supplied by requestor and can affect the validity of the test results. Report shall not be reproduced except in full without approval of Cooper Lighting Solutions Lighting Laboratory. Test performed at address noted above.

Test Information

Test Method: LM-79-08
 Report Number: P598803
 Test Lab: INNOVATION CENTER(G1)
 Issue Date: 05/03/2022
 Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
 Product Line: STREETWORKS
 Catalog Number: IFLD-S-SA6D-827-U-SLR
 Description: Infrastructure Flood – Middle Tier Light Square Luminaire w/ SLR distribution lens
 Light Source: (96) 2700K CCT, 80 CRI LEDs
 Ballast/Driver: ELECTRONIC DRIVER

Summary

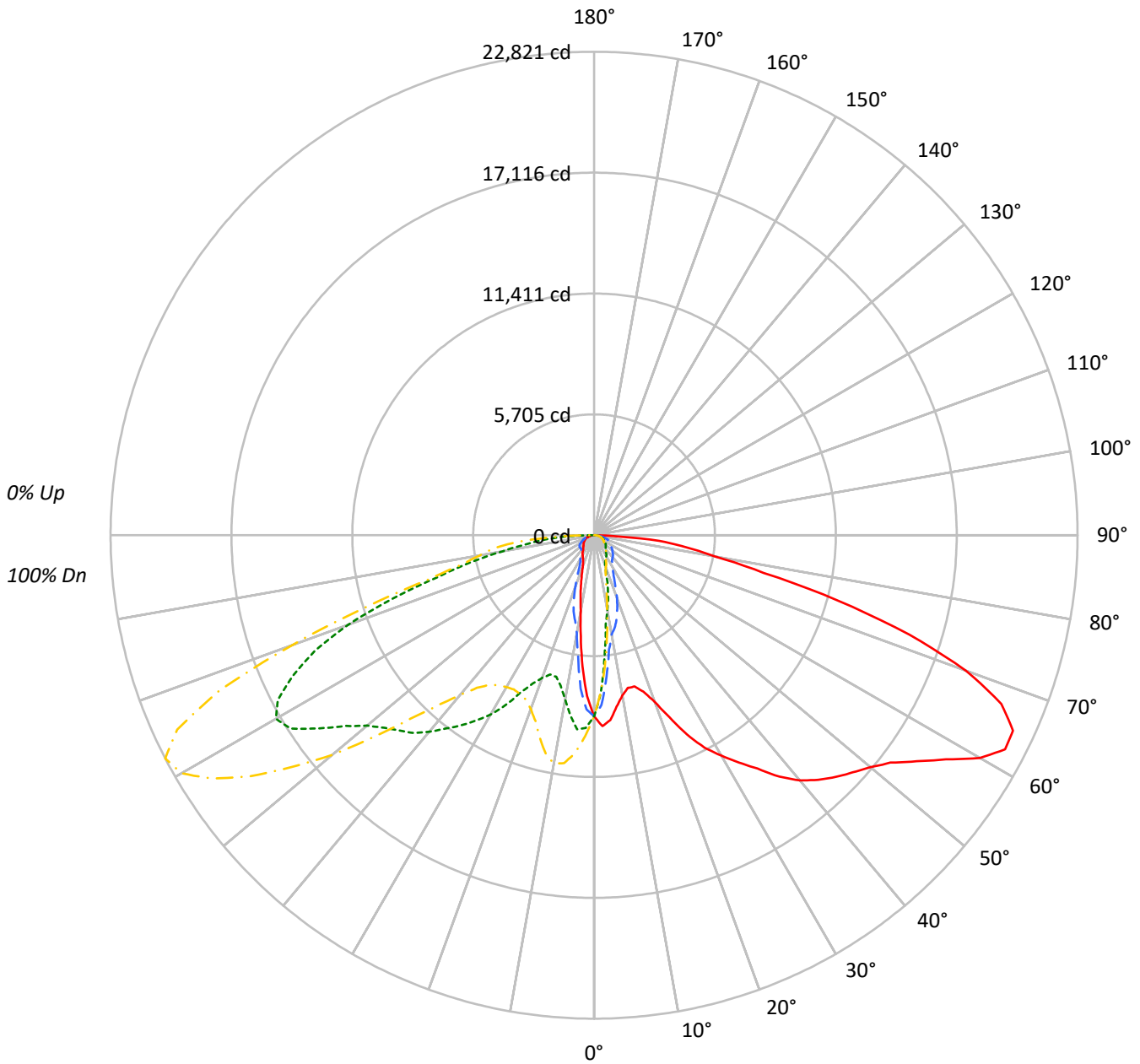
Lumens per Lamp: N/A
 Luminaire Lumens: 28588.0 lumens
 Efficiency: N/A
 Efficacy: 77.6 lumens/watt
 Spacing Criteria (0/90/45): 1.13 / 0.53 / 0.8
 Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')
 CIE Type: Direct

Input Watts (W): 368.2
 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

Measurement and Test Equipment			
Instrument	Identification Number	Calibration Date	Calibration Due Date
Photometer	GONIO 1 IN0055	4/22/2021	10/22/2021
Power Meter	XITRON 2801 IN0197	12/1/2020	12/1/2021
AC Power Source	CHROMA 61505 IN0196	12/1/2020	12/1/2021
DC Power Supply	AGILENT E3634A IN0198	11/30/2020	11/30/2021
Room Thermometer	ONSET IN0143	12/1/2020	12/1/2021

TEST NUMBER: P598803
CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

Luminous Intensity Polar Plot



— 0°-180° - - 45°-225° - · - · 90°-270° - · - · 135°-315°

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	102	102	102	100
1	105	99	94	89	102	97	92	87	92	88	84	88	85	82	85	82	79	85	82	79	77
2	93	83	74	67	90	81	73	66	77	70	64	73	68	63	70	65	61	70	65	61	59
3	83	70	60	52	80	68	59	51	65	57	50	62	55	49	59	53	48	59	53	48	46
4	74	60	49	41	72	59	49	41	56	47	40	53	46	40	51	44	39	51	44	39	36
5	68	52	42	34	65	51	41	34	49	40	33	47	39	33	45	38	32	45	38	32	30
6	62	46	36	28	60	45	35	28	43	34	28	41	34	28	40	33	27	40	33	27	25
7	57	41	31	24	55	40	31	24	39	30	24	37	29	24	36	29	23	36	29	23	21
8	53	37	28	21	51	36	27	21	35	27	21	34	26	21	32	26	20	32	26	20	18
9	49	34	25	19	47	33	24	18	32	24	18	31	23	18	30	23	18	30	23	18	16
10	46	31	22	17	44	31	22	17	29	22	16	28	21	16	28	21	16	28	21	16	14

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	61281	61281	61281	61281
5°	63066	41010	44801	66254
10°	55951	26058	26320	57258
15°	54913	18482	17504	51358
20°	63844	11691	11782	54710
25°	82105	10038	9754	64680
30°	99502	9514	8919	80969
35°	117769	8382	8068	95975
40°	141507	7955	7395	113385
45°	163740	7889	7162	132181
50°	190138	8011	7211	156090
55°	232684	8230	7333	198867
60°	301770	8239	7724	248728
65°	370428	8327	7921	266246
70°	391972	8783	8281	259225
75°	329955	9285	8290	211569
80°	239716	10873	8401	182878
85°	254068	15759	6891	190061

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	660.9	2.3
10°-20°	1383.2	4.8
20°-30°	1993.3	7.0
30°-40°	2869.6	10.0
40°-50°	4076.0	14.3
50°-60°	5860.2	20.5
60°-70°	6770.4	23.7
70°-80°	3833.5	13.4
80°-90°	1140.9	4.0
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	4037.4	14.1
0°-40°	6907.0	24.2
0°-60°	16843.2	58.9
0°-90°	28588.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	28588.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	8540	8540	8540	8540	8540	
5°	8755	5693	6219	9198	8755	794
15°	7392	2488	2356	6913	7392	2174
25°	10370	1268	1232	8169	10370	4813
35°	13444	957	921	10956	13444	8532
45°	16135	777	706	13025	16135	12493
55°	18598	658	586	15896	18598	16844
65°	21816	490	466	15680	21816	20920
75°	11901	335	299	7631	11901	12627
85°	3086	191	84	2308	3086	3073
90°	0	0	0	0	0	

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

CANDELA DISTRIBUTION (FULL):

	0°	1°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8
2.5°	9018.2	9006.2	8934.5	8707.2	8468.0	8240.8	8025.5	7798.2	7678.6	7535.1	7475.3
5°	8755.1	8731.1	8527.8	8025.5	7582.9	7104.5	6697.9	6374.9	6111.8	5848.7	5753.0
7.5°	8157.0	8121.2	7881.9	7188.2	6542.4	5920.4	5430.1	5011.4	4664.6	4509.1	4329.7
10°	7678.6	7618.8	7307.8	6542.4	5705.1	5083.2	4760.3	4473.2	4174.2	3923.0	3659.9
12.5°	7379.6	7307.8	6984.9	6087.9	5274.6	4808.1	4473.2	4150.3	3779.5	3468.5	3181.5
15°	7391.6	7307.8	6913.1	5968.3	5166.9	4568.9	4102.4	3659.9	3229.3	2882.5	2559.5
17.5°	7738.4	7630.8	7212.2	6135.7	5083.2	4257.9	3636.0	3061.9	2571.5	2200.7	1937.6
20°	8360.4	8288.6	7810.2	6386.9	4999.5	3923.0	3157.6	2463.9	1949.6	1662.5	1554.9
22.5°	9293.3	9209.6	8695.3	6769.6	4975.6	3624.0	2643.3	1937.6	1566.8	1447.2	1387.4
25°	10369.7	10214.2	9735.8	7415.5	5023.4	3348.9	2224.6	1602.7	1399.4	1315.7	1279.8
27.5°	11302.6	11207.0	10668.7	8025.5	5047.3	3133.6	1937.6	1459.2	1303.7	1231.9	1208.0
30°	12008.3	11972.4	11446.2	8695.3	4987.5	2870.5	1758.2	1399.4	1303.7	1231.9	1160.2
32.5°	12714.0	12725.9	12163.8	9209.6	4903.8	2643.3	1590.7	1243.9	1148.2	1100.4	1112.3
35°	13443.6	13503.4	13024.9	9711.9	4724.4	2559.5	1471.1	1160.2	1076.4	1004.7	968.8
37.5°	14364.5	14520.0	14053.5	10274.0	4545.0	2487.8	1411.3	1100.4	1016.6	956.8	909.0
40°	15106.1	15393.1	15118.0	10800.3	4425.4	2404.1	1363.5	1040.6	980.8	909.0	873.1
42.5°	15656.3	15991.1	15895.5	11207.0	4425.4	2320.3	1315.7	1004.7	956.8	873.1	825.3
45°	16134.7	16481.5	16469.6	11625.6	4521.1	2272.5	1255.8	1004.7	932.9	849.2	801.4
47.5°	16565.2	16912.1	17031.7	12151.8	4676.5	2248.6	1184.1	980.8	932.9	837.2	765.5
50°	17031.7	17414.4	17773.3	12989.1	4867.9	2188.8	1136.2	944.9	944.9	825.3	741.5
52.5°	17629.7	18060.3	18718.1	14029.6	5059.3	2081.1	1064.5	921.0	944.9	813.3	717.6
55°	18598.5	18957.3	19818.5	15273.5	5298.5	1949.6	1004.7	861.2	897.0	777.4	681.7
57.5°	19686.9	19997.9	20715.5	16230.4	5370.2	1782.1	921.0	801.4	861.2	741.5	633.9
60°	21026.5	21182.0	21182.0	16505.4	5131.0	1626.6	861.2	753.5	777.4	705.7	598.0
62.5°	21875.7	21875.7	21182.0	16003.1	4676.5	1495.1	813.3	705.7	681.7	657.8	562.1
65°	21815.9	21720.2	20691.6	14543.9	4150.3	1411.3	765.5	645.9	610.0	598.0	526.3
67.5°	20811.2	20643.8	19244.4	12486.7	3600.1	1375.5	717.6	586.1	562.1	538.2	478.4
70°	18682.2	18251.7	16529.4	10046.8	3061.9	1351.5	705.7	538.2	514.3	490.4	442.5
72.5°	15596.4	15046.3	12905.3	7726.5	2571.5	1267.8	669.8	478.4	466.5	442.5	394.7
75°	11900.7	10884.0	9006.2	5908.5	1997.4	1100.4	574.1	418.6	418.6	406.7	358.8
77.5°	8204.9	7678.6	6279.2	4365.6	1459.2	849.2	466.5	370.8	370.8	382.7	334.9
80°	5800.8	5310.4	4473.2	3133.6	921.0	574.1	358.8	311.0	346.9	370.8	311.0
82.5°	4437.3	4078.5	3325.0	2284.4	538.2	394.7	275.1	251.2	299.0	322.9	263.1
85°	3085.8	2655.2	1686.4	1530.9	311.0	239.2	203.3	203.3	263.1	322.9	239.2
87.5°	873.1	370.8	107.6	454.5	131.6	95.7	71.8	47.8	71.8	71.8	47.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8
2.5°	7415.5	7343.7	7343.7	7319.8	7331.8	7343.7	7331.8	7415.5	7451.4	7499.2	7594.9
5°	5693.2	5788.9	5717.1	5788.9	5884.5	6028.1	6064.0	6171.6	6183.6	6267.3	6219.4
7.5°	4222.0	4210.1	4150.3	4234.0	4497.1	4700.5	4796.1	4855.9	4867.9	4867.9	4808.1
10°	3576.2	3468.5	3360.9	3301.1	3325.0	3540.3	3612.1	3647.9	3624.0	3659.9	3612.1
12.5°	3061.9	2966.2	2810.7	2703.1	2631.3	2691.1	2762.9	2798.7	2822.7	2882.5	2930.3
15°	2487.8	2392.1	2296.4	2236.6	2176.8	2129.0	2188.8	2224.6	2284.4	2332.3	2356.2
17.5°	1889.8	1841.9	1794.1	1830.0	1830.0	1806.0	1830.0	1841.9	1865.8	1901.7	1889.8
20°	1530.9	1519.0	1507.0	1566.8	1614.7	1614.7	1638.6	1602.7	1590.7	1554.9	1542.9
22.5°	1363.5	1363.5	1375.5	1423.3	1471.1	1495.1	1495.1	1435.3	1375.5	1351.5	1363.5
25°	1267.8	1267.8	1303.7	1315.7	1339.6	1339.6	1351.5	1291.7	1255.8	1220.0	1231.9
27.5°	1196.0	1196.0	1208.0	1208.0	1220.0	1220.0	1231.9	1208.0	1160.2	1148.2	1148.2
30°	1148.2	1148.2	1136.2	1136.2	1136.2	1136.2	1148.2	1112.3	1088.4	1076.4	1076.4
32.5°	1100.4	1088.4	1076.4	1076.4	1064.5	1064.5	1076.4	1040.6	1028.6	1028.6	1028.6
35°	956.8	944.9	956.8	980.8	980.8	992.7	992.7	980.8	956.8	932.9	921.0
37.5°	897.0	885.1	885.1	885.1	909.0	921.0	932.9	909.0	873.1	837.2	837.2
40°	849.2	849.2	837.2	837.2	837.2	861.2	885.1	849.2	801.4	789.4	789.4
42.5°	813.3	801.4	789.4	777.4	765.5	801.4	825.3	777.4	753.5	753.5	753.5
45°	777.4	765.5	753.5	741.5	729.6	741.5	765.5	717.6	705.7	705.7	705.7
47.5°	741.5	729.6	705.7	693.7	681.7	681.7	705.7	669.8	657.8	669.8	669.8
50°	717.6	693.7	669.8	657.8	645.9	645.9	645.9	633.9	633.9	633.9	645.9
52.5°	693.7	669.8	633.9	621.9	610.0	610.0	610.0	610.0	598.0	610.0	621.9
55°	657.8	633.9	610.0	598.0	586.1	574.1	586.1	574.1	574.1	586.1	586.1
57.5°	610.0	586.1	562.1	562.1	550.2	550.2	562.1	550.2	550.2	562.1	562.1
60°	574.1	550.2	526.3	526.3	514.3	526.3	538.2	526.3	526.3	526.3	538.2
62.5°	526.3	514.3	490.4	490.4	490.4	490.4	502.3	490.4	502.3	502.3	502.3
65°	490.4	466.5	454.5	454.5	454.5	454.5	478.4	454.5	466.5	466.5	466.5
67.5°	454.5	430.6	418.6	418.6	418.6	418.6	442.5	418.6	430.6	442.5	430.6
70°	418.6	394.7	382.7	382.7	382.7	382.7	394.7	382.7	382.7	394.7	394.7
72.5°	370.8	358.8	346.9	346.9	334.9	346.9	358.8	346.9	346.9	346.9	346.9
75°	334.9	322.9	322.9	311.0	311.0	311.0	322.9	299.0	299.0	299.0	299.0
77.5°	311.0	287.1	287.1	287.1	275.1	287.1	275.1	251.2	251.2	251.2	251.2
80°	263.1	239.2	251.2	251.2	239.2	239.2	227.2	203.3	203.3	203.3	203.3
82.5°	215.3	191.4	203.3	203.3	203.3	203.3	179.4	167.4	155.5	143.5	143.5
85°	191.4	155.5	179.4	179.4	167.4	167.4	119.6	119.6	95.7	95.7	83.7
87.5°	35.9	23.9	47.8	59.8	59.8	71.8	47.8	59.8	35.9	23.9	23.9
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

CANDELA DISTRIBUTION (continued):

	185°	195°	205°	215°	225°	235°	245°	255°	265°	270°	275°
0°	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8
2.5°	7582.9	7714.5	7893.9	8025.5	8228.8	8384.3	8623.5	8826.8	9018.2	9101.9	9185.6
5°	6363.0	6446.7	6721.8	6937.1	7260.0	7606.9	8037.4	8503.9	8982.3	9197.6	9448.8
7.5°	4760.3	4915.8	5071.2	5382.2	5776.9	6339.0	6889.2	7582.9	8252.7	8575.7	9006.2
10°	3695.8	3815.4	3994.8	4317.7	4688.5	5155.0	5812.8	6638.1	7439.4	7858.0	8300.6
12.5°	2966.2	3133.6	3372.9	3707.7	4138.3	4616.7	5095.2	5860.6	6793.5	7272.0	7774.3
15°	2404.1	2535.6	2798.7	3217.4	3719.7	4210.1	4712.4	5346.3	6363.0	6913.1	7511.2
17.5°	1913.7	2009.4	2248.6	2667.2	3169.5	3719.7	4293.8	5095.2	6219.4	6889.2	7594.9
20°	1554.9	1626.6	1782.1	2093.1	2571.5	3169.5	3887.2	4855.9	6303.2	7164.3	8025.5
22.5°	1363.5	1387.4	1459.2	1626.6	2021.3	2655.2	3516.4	4652.6	6458.7	7571.0	8731.1
25°	1231.9	1255.8	1279.8	1387.4	1614.7	2212.7	3193.4	4533.0	6793.5	8169.0	9544.5
27.5°	1148.2	1172.1	1184.1	1231.9	1387.4	1889.8	2918.4	4461.3	7248.0	9042.1	10549.1
30°	1076.4	1076.4	1112.3	1184.1	1291.7	1662.5	2679.1	4293.8	7726.5	9771.7	11338.5
32.5°	1016.6	1028.6	1076.4	1112.3	1184.1	1471.1	2439.9	4078.5	8157.0	10369.7	12116.0
35°	909.0	909.0	921.0	980.8	1076.4	1315.7	2224.6	3863.2	8396.2	10955.8	12809.7
37.5°	837.2	849.2	873.1	921.0	1004.7	1208.0	2045.2	3624.0	8647.4	11506.0	13623.0
40°	789.4	801.4	825.3	873.1	956.8	1112.3	1889.8	3432.7	8910.5	12104.0	14496.1
42.5°	753.5	765.5	789.4	837.2	909.0	1088.4	1722.3	3277.2	9066.0	12654.2	15321.4
45°	717.6	729.6	765.5	813.3	873.1	1064.5	1626.6	3169.5	9125.8	13024.9	15979.2
47.5°	681.7	693.7	729.6	801.4	873.1	1028.6	1590.7	3109.7	9173.7	13443.6	16505.4
50°	645.9	669.8	717.6	789.4	885.1	980.8	1566.8	3097.8	9448.8	13981.8	17007.8
52.5°	621.9	657.8	705.7	789.4	873.1	909.0	1554.9	3133.6	9999.0	14783.1	17725.4
55°	598.0	633.9	681.7	789.4	837.2	849.2	1495.1	3193.4	10836.2	15895.5	18742.1
57.5°	574.1	598.0	657.8	765.5	789.4	801.4	1375.5	3277.2	11673.4	16983.9	19782.6
60°	538.2	562.1	621.9	765.5	717.6	753.5	1220.0	3301.1	12271.4	17330.7	19878.3
62.5°	502.3	526.3	586.1	789.4	657.8	705.7	1088.4	3217.4	12391.0	16828.4	19340.1
65°	466.5	490.4	538.2	657.8	610.0	657.8	1004.7	2990.1	11996.3	15680.2	18359.3
67.5°	430.6	454.5	490.4	538.2	550.2	598.0	968.8	2631.3	11003.6	14256.9	17019.7
70°	382.7	406.7	442.5	478.4	490.4	562.1	909.0	2284.4	9400.9	12355.2	15381.2
72.5°	346.9	358.8	394.7	418.6	442.5	514.3	873.1	1997.4	7188.2	9999.0	12546.5
75°	299.0	299.0	334.9	358.8	382.7	454.5	801.4	1662.5	5071.2	7630.8	9221.5
77.5°	251.2	251.2	275.1	299.0	322.9	394.7	681.7	1351.5	3516.4	6052.0	6685.9
80°	191.4	191.4	215.3	239.2	263.1	334.9	550.2	992.7	2176.8	4425.4	4867.9
82.5°	131.6	131.6	167.4	179.4	191.4	263.1	418.6	681.7	1279.8	3193.4	3480.5
85°	71.8	71.8	95.7	107.6	131.6	191.4	311.0	478.4	765.5	2308.4	2320.3
87.5°	12.0	12.0	35.9	35.9	59.8	95.7	179.4	263.1	430.6	1279.8	813.3
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P598803
 CATALOG NUMBER: IFLD-S-SA6D-827-U-SLR

CANDELA DISTRIBUTION (continued):

	285°	295°	305°	315°	325°	335°	345°	355°	359°	360°
0°	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8	8539.8
2.5°	9341.1	9472.7	9484.7	9484.7	9424.8	9436.8	9269.4	9090.0	9030.2	9018.2
5°	9831.5	10178.4	10274.0	10321.9	10166.4	9927.2	9496.6	9030.2	8790.9	8755.1
7.5°	9735.8	10429.5	10800.3	10848.1	10537.2	9975.0	9221.5	8503.9	8228.8	8157.0
10°	9173.7	10106.6	10776.4	10943.8	10608.9	9891.3	8910.5	8073.3	7738.4	7678.6
12.5°	8779.0	9676.0	10333.8	10561.1	10405.6	9783.7	8755.1	7798.2	7463.3	7379.6
15°	8563.7	9389.0	9819.5	9891.3	9879.3	9616.2	8755.1	7858.0	7487.3	7391.6
17.5°	8743.1	9305.2	9365.0	9197.6	9293.3	9424.8	8946.4	8181.0	7822.1	7738.4
20°	9101.9	9269.4	8982.3	8731.1	8779.0	9197.6	9245.4	8790.9	8503.9	8360.4
22.5°	9855.4	9400.9	8743.1	8396.2	8432.1	9018.2	9640.1	9616.2	9365.0	9293.3
25°	10620.9	9771.7	8671.3	8264.7	8312.5	8982.3	10106.6	10537.2	10405.6	10369.7
27.5°	11470.1	10393.6	8719.2	8204.9	8264.7	9030.2	10429.5	11314.6	11338.5	11302.6
30°	12044.2	10692.7	8862.7	8276.6	8360.4	9149.8	10501.3	11781.1	11996.3	12008.3
32.5°	12522.6	10991.7	9161.7	8396.2	8539.8	9365.0	10692.7	12223.6	12702.0	12714.0
35°	12905.3	11326.6	9532.5	8611.5	8826.8	9723.9	10943.8	12642.2	13359.8	13443.6
37.5°	13395.7	11697.3	9963.1	9078.0	9317.2	10238.2	11386.4	13132.6	14137.3	14364.5
40°	13922.0	12068.1	10585.0	9831.5	10178.4	11003.6	11888.7	13682.8	14795.1	15106.1
42.5°	14508.0	12462.8	11290.7	10848.1	11374.4	11972.4	12462.8	14185.1	15297.4	15656.3
45°	15082.1	12941.2	12319.3	12235.6	12821.6	13120.6	13024.9	14543.9	15775.9	16134.7
47.5°	15488.8	13634.9	13563.2	14065.5	14615.7	14460.2	13682.8	14807.1	16170.6	16565.2
50°	15859.6	14496.1	15130.0	16110.7	16445.6	15919.4	14388.4	15165.9	16589.2	17031.7
52.5°	16409.8	15417.0	16744.7	17964.6	18287.6	17450.3	15153.9	15751.9	17235.0	17629.7
55°	17534.0	16457.6	18431.1	19830.5	19890.3	18849.7	16182.5	16744.7	18144.0	18598.5
57.5°	18789.9	17737.4	19770.7	21373.4	21349.4	20249.1	17342.7	18084.2	19376.0	19686.9
60°	19926.1	19029.1	21229.8	22473.7	22413.9	21265.7	18694.2	19603.2	20787.3	21026.5
62.5°	20595.9	20201.2	21875.7	22820.6	22593.3	21600.6	19842.4	20954.7	21792.0	21875.7
65°	20488.3	20871.0	21122.2	21708.2	21385.3	20667.7	20404.6	21815.9	21899.6	21815.9
67.5°	19675.0	20488.3	19053.0	19112.8	18945.4	18335.4	19531.4	21588.6	21014.5	20811.2
70°	18443.0	18502.8	15931.3	15177.8	15441.0	14603.7	16756.6	19818.5	18933.4	18682.2
72.5°	16397.8	15656.3	12044.2	11278.7	11673.4	11075.4	13443.6	17270.9	16409.8	15596.4
75°	13754.5	12403.0	9173.7	8085.3	8288.6	8264.7	10417.6	14268.8	12714.0	11900.7
77.5°	10656.8	9664.1	6769.6	6351.0	6135.7	6183.6	7272.0	10608.9	9221.5	8204.9
80°	7786.3	6757.7	5238.7	5477.9	5358.3	5071.2	5095.2	7104.5	6410.8	5800.8
82.5°	5382.2	4808.1	4246.0	4796.1	4509.1	4066.6	3970.9	5119.1	4808.1	4437.3
85°	3612.1	3958.9	3372.9	3671.9	3181.5	2930.3	3731.7	4281.8	3456.6	3085.8
87.5°	2356.2	3624.0	2428.0	1841.9	1052.5	1411.3	2284.4	2810.7	1614.7	873.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)