

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: P599008

Luminaire Tested: **IFLD-M-SA4A-750-U-SLL**

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: P599008
 Test Lab: INNOVATION CENTER(G1)
 Issue Date: 05/03/2022
 Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
 Product Line: STREETWORKS
 Catalog Number: IFLD-M-SA4A-750-U-SLL
 Description: Infrastructure Flood – Middle Tier Light Square Luminaire w/ SLL distribution lens
 Light Source: (64) 5000K CCT, 70 CRI LEDs
 Ballast/Driver: ELECTRONIC DRIVER

Summary

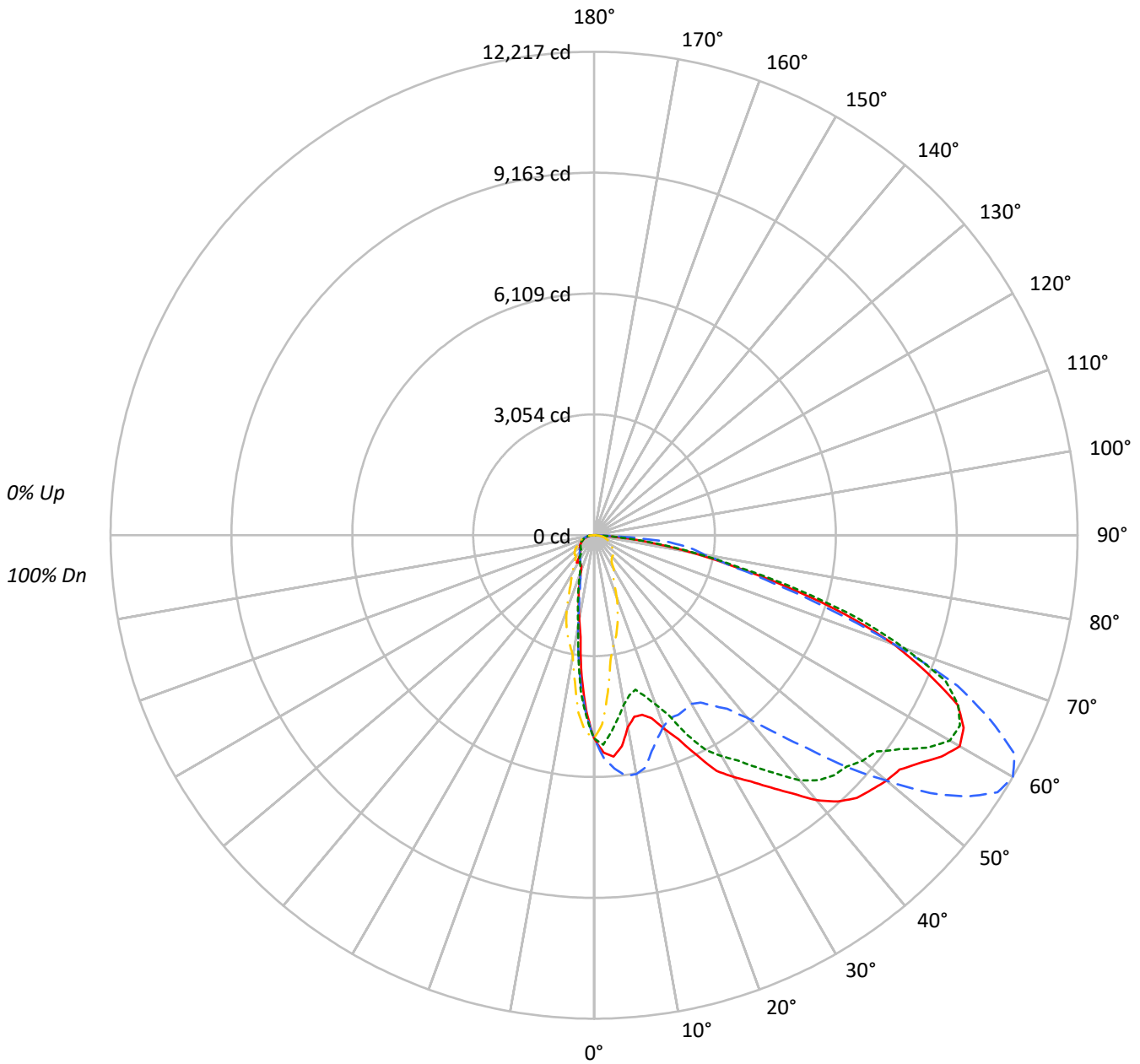
Lumens per Lamp: N/A
 Luminaire Lumens: 16068.1 lumens
 Efficiency: N/A
 Efficacy: 124.9 lumens/watt
 Spacing Criteria (0/90/45): 1.12 / 0.52 / 0.8
 Luminous Opening: Rectangular (W 2' x L: 0.5' x H: 0')
 CIE Type: Direct

Input Watts (W): 128.6
 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: P599008
CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

Luminous Intensity Polar Plot



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

TEST NUMBER: P599008

CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	106	100	94	89	103	97	92	88	93	89	85	89	85	82	85	82	80	77
2	94	83	75	68	91	81	74	67	78	71	65	74	69	64	71	66	62	60
3	84	71	61	53	81	69	60	53	66	58	52	63	56	51	60	55	50	47
4	75	61	51	43	73	60	50	42	57	48	42	54	47	41	52	46	40	38
5	68	53	43	35	66	52	42	35	50	41	34	48	40	34	46	39	34	31
6	63	47	37	30	60	46	37	29	44	36	29	42	35	29	41	34	29	26
7	58	42	32	25	56	41	32	25	40	31	25	38	31	25	37	30	25	22
8	53	38	29	22	52	37	28	22	36	28	22	35	27	22	33	27	22	19
9	50	35	26	20	48	34	26	20	33	25	19	32	25	19	31	24	19	17
10	46	32	23	18	45	31	23	18	30	23	17	29	22	17	28	22	17	15

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	55241	55241	55241	55241
5°	60690	53912	38663	42206
10°	53756	47446	23450	25164
15°	52345	45037	16601	17236
20°	59685	52091	10859	12002
25°	72718	66031	9481	9820
30°	87619	80088	9834	9125
35°	102186	94037	8148	7681
40°	122791	113577	7612	7211
45°	142899	130530	7704	7161
50°	161495	148367	7877	7400
55°	188341	176837	8160	7758
60°	229711	223420	8133	8133
65°	258155	258519	8351	8713
70°	253711	262684	8749	8973
75°	209286	223218	9191	9782
80°	151106	158618	10160	10606
85°	83623	89786	11449	14079

TEST NUMBER: P599008
 CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	398.7	2.5
10°-20°	841.8	5.2
20°-30°	1231.6	7.7
30°-40°	1735.3	10.8
40°-50°	2384.8	14.8
50°-60°	3250.2	20.2
60°-70°	3557.2	22.1
70°-80°	2053.7	12.8
80°-90°	615.0	3.8
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°	2472.1	15.4
0°-40°	4207.3	26.2
0°-60°	9842.3	61.3
0°-90°	16068.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	16068.1	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	5132	5132	5132	5132	5132	
5°	5617	4990	3578	3906	5617	510
15°	4697	4042	1490	1547	4697	1372
25°	6123	5560	798	827	6123	2867
35°	7776	7156	620	584	7776	4931
45°	9387	8575	506	470	9387	7215
55°	10036	9423	435	413	10036	9055
65°	10136	10150	328	342	10136	9701
75°	5032	5367	221	235	5032	5406
85°	677	727	93	114	677	940
90°	0	0	0	0	0	

TEST NUMBER: P599008
 CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

CANDELA DISTRIBUTION (FULL):

	0°	1°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1
2.5°	5495.6	5474.2	5495.6	5574.0	5595.4	5631.0	5631.0	5581.1	5488.5	5445.7	5374.4
5°	5616.8	5581.1	5759.3	5923.3	6051.6	6037.3	5916.1	5816.3	5631.0	5353.0	5089.3
7.5°	5374.4	5410.1	5538.4	5966.0	6265.4	6322.4	6130.0	5930.4	5531.2	5146.3	4789.9
10°	4918.2	4968.1	5246.1	5688.0	6158.5	6251.1	6130.0	5887.6	5410.1	4932.5	4519.1
12.5°	4697.3	4811.3	4975.3	5509.8	5844.9	6065.8	6008.8	5852.0	5317.4	4754.3	4355.1
15°	4697.3	4725.8	4968.1	5417.2	5609.6	5616.8	5638.2	5666.7	5345.9	4832.7	4298.1
17.5°	4847.0	4925.4	5132.1	5410.1	5445.7	5360.2	5360.2	5481.3	5402.9	5053.7	4504.8
20°	5210.5	5182.0	5452.8	5566.9	5374.4	5160.6	5139.2	5345.9	5467.1	5288.9	4882.6
22.5°	5574.0	5702.3	5923.3	5666.7	5310.3	5025.2	4996.6	5253.2	5659.5	5695.2	5317.4
25°	6122.8	6251.1	6365.2	6051.6	5303.1	4989.5	5010.9	5210.5	5894.8	6272.5	6044.4
27.5°	6714.5	6792.9	6956.8	6472.1	5474.2	4946.7	4968.1	5267.5	6115.7	6650.3	6614.7
30°	7049.5	7135.0	7099.4	6550.5	5588.3	4975.3	4918.2	5345.9	5994.5	6650.3	6985.3
32.5°	7377.4	7327.5	7306.1	6678.8	5730.8	5153.5	5010.9	5509.8	6065.8	6757.2	7462.9
35°	7776.5	7705.2	7648.2	6928.3	5966.0	5324.5	5260.4	5723.7	6222.6	6978.2	7847.8
37.5°	8218.4	8218.4	7940.5	7113.6	6244.0	5602.5	5531.2	6030.2	6472.1	7113.6	8375.3
40°	8738.8	8760.2	8268.3	7363.1	6557.6	6044.4	6023.1	6429.3	6714.5	7313.2	8881.3
42.5°	9123.7	9137.9	8553.5	7455.8	6921.2	6657.4	6750.1	7070.9	6992.4	7491.4	8917.0
45°	9387.4	9316.1	8753.0	7719.5	7320.3	7576.9	7605.4	7698.1	7356.0	7598.3	9059.5
47.5°	9515.7	9501.5	8838.6	8026.0	8161.4	8510.7	8674.6	8546.3	7691.0	7484.3	9059.5
50°	9644.0	9522.8	8917.0	8446.5	8981.1	9686.8	9651.1	9415.9	8154.3	7626.8	8924.1
52.5°	9729.6	9622.6	9073.8	8824.3	9765.2	10563.5	10706.1	10271.3	8696.0	7890.6	8988.3
55°	10036.1	9950.5	9544.2	9337.5	10670.4	11490.1	11511.5	10905.7	9266.2	8325.4	9408.8
57.5°	10406.7	10456.6	10192.9	10064.6	11361.8	12167.3	12088.9	11376.1	9750.9	8852.8	9893.5
60°	10670.4	10748.8	10684.7	10698.9	11704.0	12395.4	12217.2	11668.3	10107.3	9252.0	10485.1
62.5°	10527.9	10684.7	10948.4	10891.4	11718.2	12231.4	11982.0	11283.4	10150.1	9772.3	10934.2
65°	10135.8	10150.1	10663.3	10976.9	11076.7	11383.2	11055.3	10478.0	9708.2	10093.1	10870.0
67.5°	9130.8	9244.9	9708.2	10321.2	9900.6	9971.9	9943.4	9109.4	9038.1	9872.1	10378.2
70°	8061.6	8140.0	8646.1	9366.0	8361.0	8026.0	8090.1	7470.0	7762.3	9187.8	9387.4
72.5°	6664.6	6714.5	7291.8	7926.2	6707.3	6108.6	6258.3	5752.2	6165.6	8040.2	7919.1
75°	5032.3	5124.9	5574.0	6322.4	4939.6	4554.7	4704.4	4497.7	4882.6	6621.8	6144.2
77.5°	3578.2	3506.9	4062.9	4946.7	3713.6	3485.5	3499.8	3535.4	3948.8	5581.1	4412.2
80°	2437.7	2459.1	2958.1	3628.1	2915.3	2879.7	2844.0	3129.1	3314.5	4419.3	3207.5
82.5°	1447.0	1447.0	1995.8	2580.3	2302.3	2594.5	2430.6	2687.2	2594.5	3250.3	2102.7
85°	677.1	677.1	1026.4	1860.4	1782.0	2138.4	1817.6	2031.4	1917.4	2266.7	948.0
87.5°	114.0	99.8	206.7	912.4	734.2	834.0	327.9	1083.4	1204.6	1582.4	235.2
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: P599008
 CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1
2.5°	5296.0	5246.1	5146.3	5018.0	4911.1	4775.7	4732.9	4640.2	4511.9	4497.7	4440.7
5°	4989.5	4818.4	4604.6	4340.9	4162.7	3977.4	3820.5	3727.9	3621.0	3606.7	3578.2
7.5°	4654.5	4440.7	4084.3	3770.6	3464.1	3171.9	3029.3	2851.2	2730.0	2637.3	2594.5
10°	4340.9	4141.3	3699.4	3271.7	3000.8	2808.4	2637.3	2452.0	2302.3	2188.3	2145.5
12.5°	4134.2	3898.9	3421.4	3015.1	2815.5	2594.5	2402.1	2202.5	2010.1	1860.4	1782.0
15°	4041.5	3820.5	3335.8	2886.8	2594.5	2288.0	2067.1	1867.5	1632.3	1525.4	1489.7
17.5°	4262.5	3934.6	3307.3	2737.1	2323.7	1974.4	1703.6	1489.7	1318.7	1211.7	1169.0
20°	4547.6	4141.3	3357.2	2558.9	2067.1	1675.1	1375.7	1147.6	1033.5	955.1	948.0
22.5°	4911.1	4447.8	3435.6	2430.6	1782.0	1347.2	1076.3	940.9	862.5	855.3	841.1
25°	5559.7	5003.8	3563.9	2259.5	1553.9	1111.9	919.5	841.1	805.5	784.1	798.3
27.5°	6115.7	5367.3	3656.6	2152.6	1461.2	1047.8	891.0	805.5	769.8	762.7	769.8
30°	6443.6	5702.3	3628.1	1953.0	1275.9	997.9	948.0	919.5	848.2	791.2	791.2
32.5°	6743.0	5916.1	3621.0	1774.8	1090.6	834.0	791.2	769.8	812.6	841.1	819.7
35°	7156.4	6251.1	3599.6	1675.1	1012.2	769.8	698.5	641.5	613.0	598.7	620.1
37.5°	7598.3	6479.2	3542.6	1660.8	969.4	734.2	677.1	620.1	591.6	577.4	570.2
40°	8083.0	6721.6	3478.4	1589.5	948.0	712.8	655.8	605.9	570.2	548.8	541.7
42.5°	8396.6	6914.0	3414.3	1553.9	905.2	698.5	634.4	591.6	556.0	527.5	527.5
45°	8574.8	7142.1	3350.1	1518.2	855.3	705.7	634.4	577.4	534.6	520.3	506.1
47.5°	8653.2	7313.2	3328.7	1461.2	812.6	677.1	620.1	563.1	520.3	491.8	484.7
50°	8860.0	7676.7	3407.1	1418.4	762.7	648.6	655.8	556.0	513.2	477.6	470.4
52.5°	8981.1	7969.0	3578.2	1354.3	727.0	613.0	641.5	541.7	491.8	456.2	456.2
55°	9423.1	8453.7	3763.5	1304.4	684.3	563.1	591.6	513.2	456.2	434.8	434.8
57.5°	9986.2	8966.9	3920.3	1283.0	655.8	527.5	527.5	499.0	434.8	406.3	399.2
60°	10378.2	9387.4	4013.0	1268.8	627.3	491.8	470.4	499.0	413.4	384.9	377.8
62.5°	10421.0	9145.1	3920.3	1261.6	620.1	456.2	427.7	477.6	392.0	363.5	349.3
65°	10150.1	8653.2	3663.7	1233.1	613.0	420.5	399.2	413.4	363.5	342.1	327.9
67.5°	9608.4	7854.9	3293.1	1218.9	605.9	392.0	363.5	356.4	335.0	313.6	299.4
70°	8346.7	6814.3	2858.3	1154.7	591.6	370.6	327.9	320.8	299.4	285.1	278.0
72.5°	7006.7	5574.0	2359.3	1069.2	563.1	335.0	299.4	285.1	278.0	256.6	249.5
75°	5367.3	4291.0	1888.9	948.0	491.8	299.4	263.7	249.5	242.3	228.1	221.0
77.5°	3770.6	3193.3	1397.1	769.8	413.4	270.9	235.2	221.0	213.8	192.5	192.5
80°	2558.9	2238.2	948.0	534.6	320.8	221.0	206.7	192.5	178.2	163.9	163.9
82.5°	1589.5	1568.1	684.3	349.3	235.2	178.2	163.9	163.9	142.6	128.3	128.3
85°	727.0	962.3	477.6	242.3	178.2	135.4	135.4	128.3	114.0	92.7	92.7
87.5°	228.1	320.8	249.5	106.9	99.8	78.4	78.4	71.3	71.3	57.0	57.0
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: P599008
 CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

CANDELA DISTRIBUTION (continued):

	185°	195°	205°	215°	225°	235°	245°	255°	265°	270°	275°
0°	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1
2.5°	4497.7	4490.6	4490.6	4462.1	4533.3	4533.3	4576.1	4540.5	4561.8	4569.0	4626.0
5°	3571.1	3628.1	3670.9	3756.4	3806.3	3827.7	3827.7	3884.7	3863.3	3906.1	3991.6
7.5°	2615.9	2687.2	2815.5	2922.4	3008.0	3036.5	3029.3	3043.6	3065.0	3015.1	3029.3
10°	2117.0	2067.1	2109.9	2209.6	2288.0	2380.7	2309.4	2302.3	2323.7	2302.3	2345.1
12.5°	1767.7	1710.7	1675.1	1675.1	1732.1	1774.8	1753.5	1789.1	1867.5	1888.9	1938.8
15°	1432.7	1382.8	1354.3	1318.7	1375.7	1389.9	1411.3	1461.2	1518.2	1546.7	1603.8
17.5°	1147.6	1147.6	1147.6	1119.1	1140.5	1161.8	1169.0	1233.1	1240.3	1268.8	1290.1
20°	940.9	962.3	997.9	1012.2	1033.5	1033.5	1019.3	1054.9	1026.4	1047.8	1062.1
22.5°	848.2	876.7	891.0	898.1	926.6	933.8	898.1	905.2	912.4	891.0	898.1
25°	798.3	812.6	798.3	805.5	812.6	798.3	805.5	819.7	812.6	826.8	819.7
27.5°	776.9	762.7	755.6	748.4	748.4	734.2	741.3	741.3	755.6	762.7	762.7
30°	776.9	755.6	727.0	705.7	705.7	684.3	698.5	712.8	719.9	734.2	734.2
32.5°	798.3	755.6	705.7	684.3	662.9	648.6	662.9	684.3	712.8	719.9	727.0
35°	634.4	655.8	648.6	620.1	613.0	613.0	605.9	605.9	584.5	584.5	577.4
37.5°	570.2	563.1	577.4	584.5	591.6	570.2	570.2	541.7	534.6	541.7	541.7
40°	534.6	534.6	534.6	556.0	563.1	548.8	527.5	513.2	513.2	513.2	520.3
42.5°	520.3	506.1	499.0	513.2	534.6	520.3	499.0	491.8	491.8	499.0	499.0
45°	499.0	491.8	484.7	477.6	506.1	484.7	477.6	470.4	470.4	470.4	477.6
47.5°	477.6	470.4	456.2	456.2	463.3	456.2	449.1	449.1	449.1	463.3	463.3
50°	463.3	456.2	441.9	441.9	441.9	441.9	434.8	434.8	434.8	441.9	449.1
52.5°	441.9	434.8	427.7	420.5	420.5	420.5	420.5	420.5	420.5	427.7	434.8
55°	420.5	413.4	406.3	406.3	413.4	413.4	406.3	413.4	406.3	413.4	420.5
57.5°	399.2	392.0	384.9	392.0	399.2	392.0	392.0	392.0	392.0	392.0	399.2
60°	370.6	370.6	370.6	370.6	384.9	384.9	384.9	384.9	370.6	377.8	384.9
62.5°	356.4	349.3	349.3	356.4	363.5	363.5	370.6	363.5	356.4	363.5	363.5
65°	327.9	327.9	327.9	335.0	335.0	342.1	342.1	342.1	335.0	342.1	342.1
67.5°	306.5	306.5	306.5	306.5	320.8	320.8	320.8	320.8	313.6	313.6	320.8
70°	270.9	278.0	270.9	285.1	299.4	292.2	299.4	299.4	292.2	285.1	299.4
72.5°	249.5	249.5	249.5	249.5	270.9	270.9	270.9	278.0	270.9	263.7	270.9
75°	221.0	221.0	221.0	228.1	242.3	242.3	242.3	242.3	242.3	235.2	235.2
77.5°	192.5	199.6	192.5	199.6	213.8	206.7	213.8	221.0	213.8	206.7	206.7
80°	163.9	163.9	163.9	171.1	178.2	178.2	178.2	185.3	178.2	171.1	171.1
82.5°	128.3	128.3	135.4	135.4	142.6	142.6	142.6	149.7	142.6	135.4	135.4
85°	99.8	99.8	99.8	106.9	106.9	114.0	114.0	121.2	121.2	114.0	114.0
87.5°	64.2	57.0	64.2	64.2	71.3	71.3	64.2	57.0	64.2	57.0	49.9
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: P599008
 CATALOG NUMBER: IFLD-M-SA4A-750-U-SLL

CANDELA DISTRIBUTION (continued):

	285°	295°	305°	315°	325°	335°	345°	355°	359°	360°
0°	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1	5132.1
2.5°	4683.0	4811.3	4904.0	4968.1	5060.8	5239.0	5310.3	5438.6	5474.2	5495.6
5°	4027.3	4162.7	4362.3	4504.8	4668.8	5003.8	5260.4	5452.8	5538.4	5616.8
7.5°	3157.6	3335.8	3542.6	3727.9	3998.7	4412.2	4747.2	5146.3	5296.0	5374.4
10°	2466.2	2630.2	2858.3	3086.4	3464.1	3813.4	4291.0	4654.5	4861.2	4918.2
12.5°	2081.3	2273.8	2544.7	2822.6	3057.9	3457.0	3941.7	4469.2	4661.6	4697.3
15°	1767.7	2031.4	2309.4	2594.5	2865.4	3214.7	3735.0	4376.5	4661.6	4697.3
17.5°	1461.2	1696.4	2024.3	2330.8	2644.4	3122.0	3770.6	4454.9	4740.0	4847.0
20°	1161.8	1389.9	1646.5	2031.4	2459.1	2965.2	3849.1	4718.7	5096.4	5210.5
22.5°	962.3	1062.1	1311.5	1682.2	2188.3	2858.3	3927.5	5132.1	5531.2	5574.0
25°	841.1	912.4	1069.2	1418.4	1974.4	2787.0	4112.8	5609.6	6122.8	6122.8
27.5°	784.1	812.6	919.5	1233.1	1824.7	2722.8	4298.1	6137.1	6614.7	6714.5
30°	769.8	841.1	898.1	1097.7	1660.8	2544.7	4469.2	6550.5	7042.3	7049.5
32.5°	755.6	741.3	784.1	955.1	1461.2	2359.3	4611.7	6971.1	7356.0	7377.4
35°	591.6	620.1	691.4	841.1	1311.5	2223.9	4683.0	7199.2	7755.1	7776.5
37.5°	556.0	591.6	648.6	776.9	1211.7	2109.9	4704.4	7641.1	8175.7	8218.4
40°	541.7	570.2	613.0	719.9	1133.3	1967.3	4747.2	8097.3	8795.8	8738.8
42.5°	513.2	548.8	591.6	691.4	1069.2	1860.4	4754.3	8346.7	9123.7	9123.7
45°	506.1	527.5	577.4	691.4	997.9	1767.7	4640.2	8596.2	9501.5	9387.4
47.5°	477.6	520.3	563.1	670.0	912.4	1675.1	4504.8	8724.5	9551.4	9515.7
50°	470.4	513.2	584.5	634.4	862.5	1632.3	4476.3	9045.3	9651.1	9644.0
52.5°	456.2	499.0	605.9	605.9	798.3	1575.3	4611.7	9187.8	9672.5	9729.6
55°	434.8	499.0	563.1	556.0	741.3	1504.0	4761.4	9558.5	10050.3	10036.1
57.5°	420.5	484.7	534.6	506.1	677.1	1454.1	4982.4	9914.9	10506.5	10406.7
60°	399.2	484.7	477.6	470.4	627.3	1411.3	5167.7	9986.2	10606.3	10670.4
62.5°	384.9	506.1	420.5	434.8	584.5	1389.9	5089.3	9451.6	10470.9	10527.9
65°	370.6	434.8	384.9	399.2	570.2	1347.2	4782.8	8810.1	9886.4	10135.8
67.5°	342.1	356.4	356.4	370.6	556.0	1247.4	4155.6	7655.3	8995.4	9130.8
70°	313.6	320.8	320.8	342.1	541.7	1133.3	3428.5	6621.8	7805.0	8061.6
72.5°	285.1	285.1	285.1	313.6	499.0	1040.7	2822.6	5089.3	6486.4	6664.6
75°	249.5	249.5	249.5	278.0	449.1	948.0	2223.9	3784.9	4775.7	5032.3
77.5°	221.0	221.0	213.8	249.5	392.0	769.8	1603.8	2673.0	3364.4	3578.2
80°	185.3	178.2	178.2	199.6	306.5	556.0	1033.5	1888.9	2345.1	2437.7
82.5°	149.7	142.6	135.4	149.7	221.0	349.3	641.5	1318.7	1504.0	1447.0
85°	142.6	149.7	121.2	114.0	156.8	228.1	406.3	812.6	677.1	677.1
87.5°	57.0	49.9	49.9	42.8	78.4	85.5	178.2	149.7	114.0	114.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)