

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: PORTFOLIO

Report Number: P249781

Luminaire Tested: **LSR8B150D010 EC8B1509730 8LBSW0LI**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P249781
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13955)
Test Lab: INNOVATION CENTER-P1
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LSR8B150D010 EC8B1509730 8LBSW0LI
Description: PORTFOLIO 8 INCH SINGLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF
RECESSED DOWNLIGHT- CYLINDEC
97 CRI 3000 CCT WITH SPECULAR CLEAR TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 12655.0 lumens
Efficiency: N/A
Efficacy: 79.8 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.28 / 1.15
Luminous Opening: Point Source (0' x 0' x 0')
CIE Type: Direct

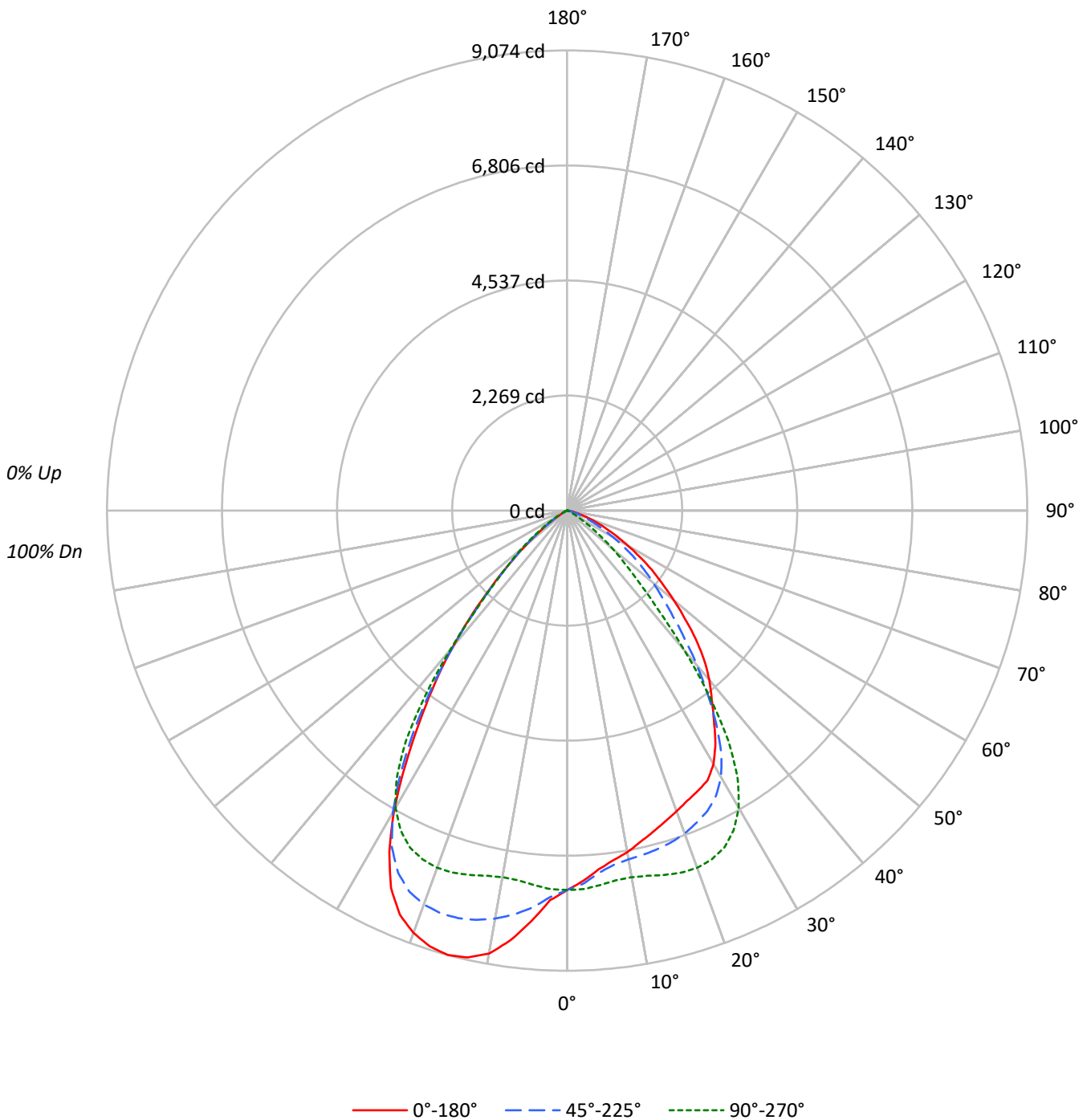
Input Watts (W): 158.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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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	100	100	100	100			
1	112	109	106	103	110	107	104	102	103	100	98	99	97	96	95	94	93	91	91	91	91			
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82	82	82	82			
3	98	90	84	80	96	89	83	79	86	82	78	84	80	76	81	78	75	73	73	73	73			
4	92	83	76	71	90	81	75	70	79	74	70	77	72	69	75	71	68	66	66	66	66			
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	69	65	61	60	60	60	60			
6	80	70	63	57	79	69	62	57	67	61	57	66	60	56	64	60	56	54	54	54	54			
7	75	64	57	52	74	64	57	52	62	56	52	61	55	51	60	55	51	49	49	49	49			
8	71	60	53	48	70	59	52	48	58	52	47	57	51	47	56	51	47	45	45	45	45			
9	67	55	48	44	66	55	48	44	54	48	43	53	47	43	52	47	43	42	42	42	42			
10	63	52	45	40	62	51	45	40	50	44	40	49	44	40	49	43	40	38	38	38	38			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	Luminaire represents a point source (luminous area is zero).		
5°	No luminance values can be calculated.		
10°			
15°			
20°			
25°			
30°			
35°			
40°			
45°			
50°			
55°			
60°			
65°			
70°			
75°			
80°			
85°			



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	719.4	5.7
10°-20°	2153.0	17.0
20°-30°	3297.1	26.1
30°-40°	3232.2	25.5
40°-50°	1946.4	15.4
50°-60°	895.9	7.1
60°-70°	314.7	2.5
70°-80°	82.3	0.7
80°-90°	14.0	0.1
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°	6169.4	48.8
0°-40°	9401.6	74.3
0°-60°	12243.9	96.8
0°-90°	12655.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	12655.0	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	7483	7483	7483	7483	7483	
5°	7102	7168	7413	7857	8126	671
15°	6556	6910	7437	8319	9074	1852
25°	6098	6539	7333	7885	8214	2809
35°	5046	5116	5539	5220	5053	3160
45°	3584	2951	2000	2014	2066	2748
55°	2035	1612	573	451	434	1816
65°	864	598	91	46	49	880
75°	224	129	7	0	0	271
85°	35	17	4	0	0	48
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9
2.5°	7308.1	7315.1	7315.1	7315.1	7329.1	7332.7	7329.1	7332.7	7339.6	7364.0	7374.6
5°	7101.8	7091.3	7098.4	7094.8	7112.3	7122.8	7115.8	7126.3	7150.7	7168.3	7185.7
7.5°	6955.0	6955.0	6955.0	6961.9	6972.4	6993.4	6990.0	6996.9	7021.4	7045.8	7070.3
10°	6839.6	6836.1	6836.1	6853.5	6867.5	6892.0	6899.0	6920.0	6951.4	6982.9	7010.8
12.5°	6689.2	6692.8	6710.2	6727.7	6759.1	6797.5	6818.6	6846.6	6895.6	6948.0	6979.5
15°	6556.3	6559.8	6573.9	6608.7	6647.3	6692.8	6738.1	6783.6	6843.0	6909.5	6965.5
17.5°	6426.9	6430.4	6440.9	6479.5	6528.4	6587.8	6640.2	6699.7	6776.7	6853.5	6923.5
20°	6308.0	6304.6	6322.0	6357.0	6420.0	6475.9	6528.4	6598.4	6682.3	6776.7	6857.0
22.5°	6192.6	6192.6	6210.2	6245.2	6301.1	6357.0	6413.0	6486.4	6570.3	6661.2	6755.7
25°	6098.2	6094.7	6119.2	6136.8	6178.7	6234.6	6294.1	6353.5	6437.4	6538.9	6629.7
27.5°	5996.9	5993.4	5996.9	6017.9	6056.3	6098.2	6143.7	6196.2	6266.2	6350.1	6437.4
30°	5773.1	5776.5	5776.5	5794.1	5815.1	5860.4	5884.9	5937.4	6000.3	6070.3	6147.3
32.5°	5440.9	5444.3	5444.3	5451.4	5468.8	5489.8	5510.8	5549.3	5598.2	5657.6	5727.6
35°	5045.8	5045.8	5042.2	5045.8	5056.3	5056.3	5073.7	5056.3	5080.8	5115.8	5168.1
37.5°	4682.1	4675.0	4668.1	4661.1	4650.6	4633.2	4608.7	4566.7	4556.2	4542.2	4545.7
40°	4360.4	4357.0	4336.0	4318.4	4283.4	4241.5	4182.1	4108.7	4049.3	3979.3	3919.9
42.5°	4003.8	4000.2	3982.8	3951.2	3912.8	3849.9	3755.5	3657.6	3538.7	3433.8	3325.4
45°	3584.1	3594.6	3570.1	3535.1	3489.7	3430.2	3325.4	3206.4	3087.5	2951.2	2814.8
47.5°	3147.0	3143.5	3126.1	3105.1	3066.7	3007.2	2937.3	2807.9	2681.9	2556.2	2416.3
50°	2741.4	2727.4	2720.4	2699.5	2675.0	2626.1	2552.6	2447.6	2335.8	2216.9	2087.5
52.5°	2356.8	2356.8	2339.3	2325.3	2304.3	2265.8	2203.0	2119.0	2024.6	1912.7	1776.4
55°	2035.1	2028.1	2010.7	1993.1	1972.1	1947.6	1891.8	1821.8	1720.4	1612.0	1493.1
57.5°	1692.4	1688.8	1681.9	1660.9	1650.4	1625.9	1563.1	1493.1	1405.7	1311.3	1213.3
60°	1384.7	1370.8	1356.7	1342.7	1325.3	1300.8	1258.8	1199.3	1125.9	1042.0	944.2
62.5°	1108.5	1129.4	1087.5	1087.5	1052.5	1031.5	993.1	958.1	881.1	804.3	720.4
65°	863.7	863.7	846.1	832.2	811.2	786.7	748.3	713.3	657.3	597.9	538.4
67.5°	660.9	657.3	639.9	625.9	608.4	594.4	566.5	524.5	482.6	433.7	384.6
70°	486.0	482.6	479.0	454.5	440.6	423.1	402.1	374.2	342.7	307.7	262.2
72.5°	349.6	349.6	339.2	328.7	314.8	300.7	279.8	262.2	234.3	209.8	178.3
75°	223.8	220.4	220.4	202.8	202.8	181.8	167.8	157.3	143.4	129.4	101.5
77.5°	160.9	157.3	153.9	146.8	139.9	132.8	122.3	108.4	97.9	83.9	73.4
80°	108.4	101.5	97.9	97.9	87.4	83.9	87.4	66.5	62.9	52.4	45.5
82.5°	66.5	66.5	62.9	62.9	59.4	56.0	45.5	45.5	42.0	38.4	31.5
85°	35.0	45.5	31.5	35.0	31.5	35.0	31.5	24.5	21.0	17.4	17.4
87.5°	21.0	14.0	14.0	21.0	17.4	14.0	14.0	14.0	10.5	7.1	7.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9
2.5°	7367.6	7392.1	7388.5	7420.0	7430.5	7455.0	7455.0	7472.4	7482.9	7507.4	7528.4
5°	7192.8	7231.2	7241.7	7280.1	7311.7	7350.1	7374.6	7413.0	7448.0	7500.5	7549.4
7.5°	7084.4	7115.8	7136.8	7182.3	7217.2	7259.1	7301.1	7353.5	7402.5	7465.5	7535.5
10°	7031.9	7073.9	7105.3	7150.7	7192.8	7238.3	7280.1	7339.6	7395.6	7476.0	7552.9
12.5°	7017.9	7066.8	7105.3	7168.3	7210.2	7259.1	7308.1	7374.6	7434.0	7517.9	7605.4
15°	7017.9	7084.4	7136.8	7206.7	7255.7	7318.6	7371.1	7437.4	7503.9	7591.3	7675.2
17.5°	7003.9	7084.4	7150.7	7231.2	7294.1	7357.1	7423.5	7486.5	7556.3	7640.4	7734.7
20°	6948.0	7049.4	7129.7	7224.1	7290.6	7360.6	7427.1	7496.9	7570.4	7657.8	7738.3
22.5°	6850.1	6969.0	7059.9	7161.3	7238.3	7308.1	7374.6	7444.5	7525.0	7608.9	7692.8
25°	6720.7	6832.5	6930.5	7035.3	7112.3	7189.2	7252.2	7332.7	7406.1	7486.5	7552.9
27.5°	6524.8	6643.7	6738.1	6846.6	6916.4	6990.0	7042.4	7108.9	7178.8	7245.2	7297.7
30°	6231.2	6339.6	6437.4	6535.3	6605.3	6657.8	6713.6	6766.2	6811.7	6857.0	6902.5
32.5°	5801.0	5899.0	5993.4	6084.2	6140.2	6185.7	6227.6	6259.1	6283.6	6308.0	6311.5
35°	5210.2	5290.5	5349.9	5430.4	5482.9	5524.8	5524.8	5538.8	5535.3	5524.8	5514.3
37.5°	4549.3	4580.6	4605.1	4636.6	4640.1	4640.1	4619.2	4601.6	4573.7	4566.7	4545.7
40°	3860.4	3818.4	3786.9	3745.0	3720.5	3668.0	3622.7	3591.1	3545.7	3538.7	3531.7
42.5°	3206.4	3108.5	3021.2	2947.8	2863.9	2790.3	2724.0	2675.0	2640.1	2636.5	2640.1
45°	2675.0	2563.1	2433.7	2332.3	2237.9	2147.0	2059.6	2000.2	1968.6	1961.6	1968.6
47.5°	2272.9	2143.5	2017.6	1902.1	1800.8	1699.4	1612.0	1531.5	1493.1	1482.6	1479.1
50°	1954.7	1821.8	1688.8	1570.0	1458.1	1356.7	1248.3	1171.4	1122.5	1104.9	1091.0
52.5°	1643.5	1524.6	1388.2	1265.8	1153.9	1035.0	923.2	835.6	786.7	765.8	751.7
55°	1370.8	1251.9	1125.9	1007.1	888.2	769.3	657.3	573.4	521.0	496.5	479.0
57.5°	1094.4	982.6	874.2	755.3	657.3	542.0	430.1	356.7	311.2	283.2	269.3
60°	846.1	758.8	664.4	566.5	472.1	377.7	286.7	216.8	181.8	160.9	143.4
62.5°	639.9	566.5	503.5	419.5	346.1	265.7	195.9	139.9	108.4	91.0	83.9
65°	461.6	405.6	349.6	297.2	244.8	185.4	132.8	91.0	62.9	52.4	48.9
67.5°	328.7	283.2	241.2	206.2	167.8	132.8	94.4	62.9	48.9	42.0	38.4
70°	230.7	195.9	167.8	136.4	111.8	87.4	73.4	45.5	27.9	31.5	24.5
72.5°	153.9	129.4	115.4	94.4	76.9	62.9	45.5	31.5	31.5	24.5	21.0
75°	83.9	76.9	59.4	45.5	38.4	35.0	14.0	7.1	3.5	10.5	3.5
77.5°	59.4	52.4	45.5	38.4	31.5	24.5	14.0	14.0	10.5	14.0	7.1
80°	38.4	31.5	27.9	27.9	17.4	10.5	7.1	7.1	10.5	3.5	3.5
82.5°	24.5	21.0	17.4	17.4	17.4	10.5	10.5	10.5	10.5	7.1	7.1
85°	14.0	10.5	7.1	7.1	3.5	7.1	0.0	3.5	3.5	0.0	0.0
87.5°	7.1	3.5	3.5	3.5	3.5	0.0	0.0	3.5	0.0	3.5	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9	7482.9
2.5°	7542.4	7556.3	7573.9	7587.9	7619.4	7626.3	7640.4	7654.3	7664.9	7675.2	7678.8
5°	7591.3	7643.8	7692.8	7745.2	7811.7	7857.1	7909.5	7955.0	8000.5	8038.9	8066.8
7.5°	7605.4	7685.7	7759.3	7850.1	7948.0	8032.0	8119.4	8206.7	8297.7	8367.6	8427.1
10°	7633.3	7731.2	7825.6	7934.0	8059.9	8171.8	8280.1	8395.6	8511.0	8608.9	8696.4
12.5°	7682.3	7790.6	7892.1	8011.0	8140.4	8266.2	8385.1	8514.5	8636.9	8745.3	8843.2
15°	7762.7	7864.0	7962.1	8073.9	8203.3	8318.7	8437.6	8563.4	8685.9	8797.7	8888.7
17.5°	7815.1	7909.5	8007.4	8108.9	8217.2	8322.2	8434.0	8546.0	8657.8	8759.3	8843.2
20°	7815.1	7906.1	7979.5	8070.4	8171.8	8262.7	8353.7	8451.6	8549.4	8633.3	8713.8
22.5°	7752.2	7839.6	7895.6	7965.5	8052.9	8129.9	8178.8	8287.2	8360.6	8434.0	8493.4
25°	7605.4	7668.3	7713.8	7762.7	7832.7	7885.1	7927.1	7990.0	8063.4	8091.5	8133.3
27.5°	7339.6	7385.1	7409.5	7420.0	7455.0	7482.9	7490.0	7517.9	7549.4	7556.3	7573.9
30°	6920.0	6923.5	6913.0	6909.5	6892.0	6871.1	6867.5	6864.0	6850.1	6836.1	6839.6
32.5°	6287.0	6269.6	6227.6	6182.3	6136.8	6087.8	6059.8	6024.8	6003.8	5982.9	5958.4
35°	5468.8	5426.9	5367.5	5311.5	5259.1	5220.5	5157.6	5136.6	5115.8	5087.7	5080.8
37.5°	4507.2	4482.8	4426.8	4384.9	4357.0	4339.4	4307.9	4287.0	4287.0	4276.5	4269.5
40°	3514.1	3507.2	3486.2	3496.7	3482.8	3489.7	3486.2	3479.2	3496.7	3496.7	3503.8
42.5°	2636.5	2640.1	2650.6	2657.5	2678.5	2681.9	2699.5	2699.5	2710.0	2720.4	2727.4
45°	1961.6	1975.7	1975.7	1989.7	2010.7	2014.1	2021.0	2024.6	2031.5	2049.1	2056.0
47.5°	1472.1	1475.5	1475.5	1479.1	1486.1	1493.1	1489.6	1493.1	1503.6	1496.6	1503.6
50°	1087.5	1091.0	1080.5	1070.0	1080.5	1080.5	1077.0	1066.5	1077.0	1063.0	1070.0
52.5°	741.4	737.8	727.3	730.9	723.8	720.4	720.4	713.3	713.3	713.3	699.3
55°	468.6	468.6	461.6	461.6	458.1	451.1	447.6	444.0	440.6	437.1	437.1
57.5°	262.2	265.7	255.3	251.7	255.3	251.7	244.8	244.8	244.8	234.3	241.2
60°	143.4	139.9	136.4	132.8	129.4	132.8	132.8	125.9	125.9	125.9	129.4
62.5°	76.9	76.9	73.4	73.4	69.9	69.9	76.9	66.5	69.9	66.5	69.9
65°	42.0	52.4	38.4	38.4	48.9	45.5	42.0	42.0	45.5	38.4	42.0
67.5°	45.5	31.5	27.9	31.5	27.9	27.9	27.9	35.0	31.5	24.5	31.5
70°	21.0	24.5	24.5	17.4	27.9	14.0	24.5	14.0	21.0	17.4	21.0
72.5°	21.0	21.0	21.0	14.0	21.0	14.0	17.4	17.4	14.0	14.0	21.0
75°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	7.1	7.1	3.5	3.5	3.5	3.5	7.1	7.1	7.1	0.0	3.5
80°	7.1	7.1	0.0	3.5	0.0	0.0	3.5	0.0	3.5	0.0	7.1
82.5°	3.5	7.1	3.5	3.5	7.1	7.1	7.1	3.5	3.5	3.5	3.5
85°	0.0	3.5	0.0	0.0	0.0	0.0	7.1	0.0	0.0	0.0	3.5
87.5°	0.0	3.5	0.0	0.0	0.0	0.0	3.5	3.5	0.0	0.0	0.0
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: P249781

CATALOG NUMBER: LSR8B150D010 EC8B1509730 8LBSW0LI

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	7482.9	7482.9	7482.9	7482.9
2.5°	7682.3	7685.7	7692.8	7689.3
5°	8087.9	8115.9	8129.9	8126.4
7.5°	8469.0	8518.1	8546.0	8546.0
10°	8762.7	8818.7	8860.6	8867.7
12.5°	8920.0	8983.1	9039.1	9025.0
15°	8965.5	9028.6	9084.4	9073.9
17.5°	8913.1	8976.0	9018.1	9011.0
20°	8769.8	8822.2	8864.2	8860.6
22.5°	8546.0	8591.5	8626.4	8622.8
25°	8168.3	8199.8	8227.8	8213.8
27.5°	7587.9	7598.4	7615.8	7594.9
30°	6815.1	6822.0	6829.1	6825.6
32.5°	5947.9	5944.3	5937.4	5930.4
35°	5070.3	5070.3	5073.7	5052.7
37.5°	4272.9	4269.5	4280.0	4269.5
40°	3510.7	3507.2	3521.2	3503.8
42.5°	2737.9	2748.4	2751.9	2751.9
45°	2059.6	2063.1	2066.5	2066.5
47.5°	1503.6	1507.1	1524.6	1503.6
50°	1063.0	1066.5	1070.0	1063.0
52.5°	702.8	706.4	702.8	692.3
55°	430.1	433.7	433.7	433.7
57.5°	230.7	234.3	234.3	230.7
60°	125.9	122.3	125.9	118.9
62.5°	66.5	73.4	69.9	62.9
65°	42.0	42.0	42.0	48.9
67.5°	35.0	27.9	31.5	24.5
70°	21.0	24.5	24.5	17.4
72.5°	17.4	17.4	17.4	21.0
75°	0.0	0.0	0.0	0.0
77.5°	7.1	7.1	7.1	3.5
80°	3.5	0.0	3.5	0.0
82.5°	3.5	3.5	7.1	3.5
85°	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0

(END OF REPORT)