

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: P249291

Luminaire Tested: **LSR8B80D010 EC8B80930 8LBDW0WMH**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P249291  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13957)  
Test Lab: INNOVATION CENTER-P1  
Issue Date: 03/03/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: PORTFOLIO  
Catalog Number: LSR8B80D010 EC8B80930 8LBDW0WMH  
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF  
RECESSED DOWNLIGHT- CYLINDEC  
97 CRI 3000 CCT WITH WARM HAZE TRIM  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 6972.6 lumens  
Efficiency: N/A  
Efficacy: 93.7 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.26 / 1.18  
Luminous Opening: Point Source (0' x 0' x 0')  
CIE Type: Direct

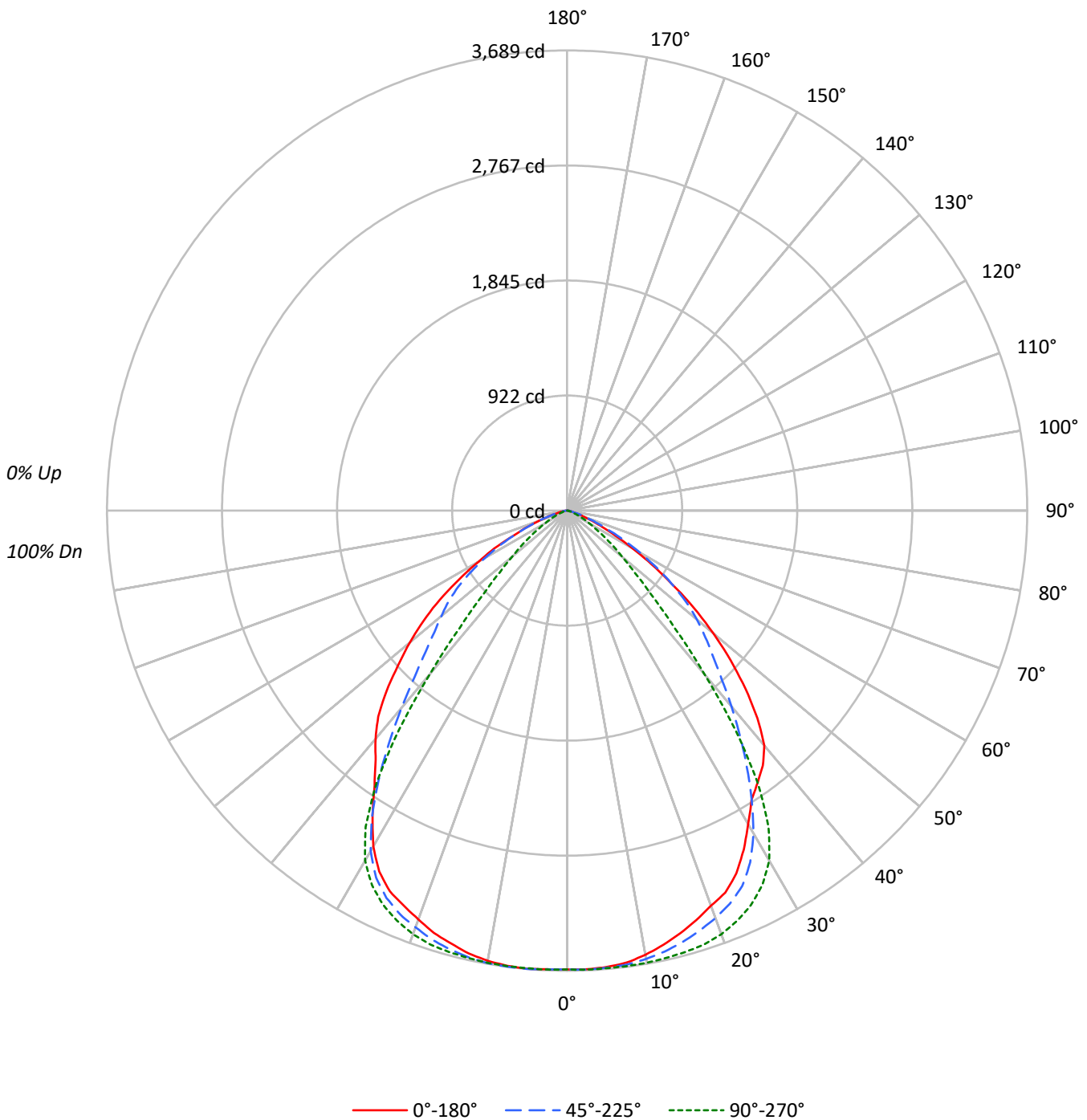
Input Watts (W): 74.4  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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						
1	112	108	105	102	109	106	103	100	102	99	97	98	96	94	94	93	91	90						
2	104	97	92	88	101	96	91	87	92	88	85	89	86	83	86	83	81	79						
3	96	88	81	76	94	86	80	75	84	78	74	81	77	73	79	75	72	70						
4	89	80	72	67	87	78	72	66	76	70	66	74	69	65	72	67	64	62						
5	83	72	65	59	81	71	64	59	69	63	58	68	62	58	66	61	57	55						
6	78	66	58	53	76	65	58	53	64	57	52	62	56	52	61	55	51	50						
7	72	61	53	48	71	60	53	48	59	52	47	57	51	47	56	51	47	45						
8	68	56	48	43	66	55	48	43	54	48	43	53	47	43	52	46	42	41						
9	64	52	44	39	62	51	44	39	50	44	39	49	43	39	48	43	39	37						
10	60	48	41	36	59	48	41	36	47	40	36	46	40	36	45	40	36	34						

**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°	351.1	5.0
10°-20°	1019.6	14.6
20°-30°	1547.6	22.2
30°-40°	1625.5	23.3
40°-50°	1218.7	17.5
50°-60°	781.9	11.2
60°-70°	334.5	4.8
70°-80°	79.0	1.1
80°-90°	14.7	0.2
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°	2918.4	41.9
0°-40°	4543.8	65.2
0°-60°	6544.4	93.9
0°-90°	6972.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6972.6	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	3679	3679	3679	3679	3679	
5°	3673	3679	3683	3689	3687	349
15°	3507	3580	3663	3639	3594	989
25°	3209	3322	3489	3426	3367	1466
35°	2662	2514	2664	2632	2692	1671
45°	2022	1653	950	1606	2050	1549
55°	1023	1023	354	1066	1246	928
65°	308	363	112	468	476	329
75°	47	55	16	95	93	69
85°	16	10	8	16	22	17
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°	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9
2.5°	3680.9	3684.8	3682.8	3682.8	3680.9	3682.8	3682.8	3686.9	3686.9	3682.8	3680.9
5°	3673.0	3676.9	3676.9	3673.0	3673.0	3682.8	3676.9	3680.9	3680.9	3678.9	3678.9
7.5°	3655.2	3655.2	3663.1	3657.2	3657.2	3663.1	3661.1	3665.1	3669.0	3671.1	3671.1
10°	3615.7	3619.7	3621.6	3621.6	3623.6	3629.5	3633.5	3641.3	3645.3	3649.3	3651.2
12.5°	3566.3	3572.3	3574.2	3572.3	3578.2	3586.1	3595.9	3605.8	3611.7	3619.7	3625.7
15°	3507.0	3507.0	3511.1	3517.0	3520.9	3532.8	3542.6	3554.5	3570.3	3580.1	3590.0
17.5°	3441.9	3446.0	3451.8	3451.8	3459.7	3479.5	3485.4	3503.1	3520.9	3530.8	3550.5
20°	3370.8	3374.8	3380.7	3384.6	3394.5	3410.3	3422.2	3438.0	3457.7	3475.5	3495.3
22.5°	3315.6	3307.6	3311.5	3315.6	3325.4	3339.2	3353.1	3372.8	3392.6	3410.3	3430.1
25°	3208.9	3210.9	3216.8	3220.7	3232.6	3244.5	3260.3	3284.0	3301.7	3321.5	3343.2
27.5°	3064.8	3066.7	3076.6	3076.6	3086.4	3106.2	3116.0	3135.9	3159.5	3179.3	3204.9
30°	2900.9	2904.7	2904.7	2912.7	2918.6	2928.5	2938.4	2958.1	2970.0	2987.8	3023.3
32.5°	2750.8	2754.7	2752.7	2750.8	2744.9	2742.9	2740.8	2744.9	2748.8	2754.7	2768.5
35°	2661.9	2652.1	2644.1	2630.3	2614.5	2594.8	2577.0	2553.3	2531.6	2513.8	2494.1
37.5°	2577.0	2575.0	2563.2	2543.4	2511.8	2476.3	2434.8	2383.5	2332.1	2276.9	2223.5
40°	2458.6	2452.5	2442.8	2415.1	2379.5	2336.1	2280.8	2217.6	2134.6	2049.7	1962.9
42.5°	2257.1	2259.0	2247.3	2225.5	2192.0	2150.4	2093.2	2024.1	1935.2	1834.5	1722.0
45°	2022.1	2022.1	2018.1	2000.4	1976.7	1943.1	1899.6	1842.4	1755.5	1652.8	1532.4
47.5°	1777.2	1779.3	1773.3	1769.4	1759.4	1737.8	1706.2	1662.7	1601.5	1502.7	1382.3
50°	1528.5	1528.5	1538.3	1536.3	1536.3	1528.5	1514.6	1488.9	1435.7	1356.6	1244.1
52.5°	1279.6	1283.5	1289.5	1297.3	1307.2	1323.0	1307.2	1295.4	1261.8	1200.6	1103.8
55°	1022.9	1026.8	1036.7	1050.5	1062.4	1078.2	1082.1	1082.1	1064.4	1022.9	949.8
57.5°	803.8	797.8	805.7	817.5	833.4	849.2	860.9	874.8	872.8	845.2	785.9
60°	604.2	606.2	612.2	624.1	635.8	649.7	665.5	677.3	683.2	669.5	631.9
62.5°	440.3	440.3	448.3	460.1	466.0	485.8	495.6	501.5	507.5	505.5	481.8
65°	308.1	312.0	315.9	321.8	327.8	339.7	345.6	357.4	361.4	363.3	345.6
67.5°	217.2	211.3	215.2	219.2	225.1	233.1	244.8	244.8	250.8	250.8	238.9
70°	138.2	138.2	140.2	146.1	150.1	152.0	156.0	160.0	165.9	163.9	163.9
72.5°	92.8	90.8	92.8	94.8	96.7	102.7	102.7	104.7	108.6	110.6	102.7
75°	47.4	49.4	53.2	51.3	57.3	53.2	55.3	61.2	59.2	55.3	55.3
77.5°	39.5	39.5	39.5	37.6	41.5	41.5	39.5	43.4	41.5	41.5	39.5
80°	27.7	29.6	27.7	25.7	27.7	25.7	25.7	25.7	25.7	25.7	23.7
82.5°	21.7	17.8	19.7	17.8	19.7	19.7	17.8	15.8	15.8	17.8	15.8
85°	15.8	11.9	13.8	13.8	11.9	11.9	11.9	11.9	11.9	9.9	9.9
87.5°	9.9	5.9	5.9	5.9	7.8	7.8	7.8	5.9	7.8	7.8	3.9
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°	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9
2.5°	3684.8	3682.8	3686.9	3684.8	3684.8	3682.8	3684.8	3682.8	3686.9	3678.9	3680.9
5°	3684.8	3680.9	3682.8	3684.8	3686.9	3682.8	3682.8	3682.8	3686.9	3682.8	3684.8
7.5°	3676.9	3675.0	3680.9	3684.8	3682.8	3680.9	3684.8	3682.8	3686.9	3684.8	3688.8
10°	3661.1	3663.1	3667.0	3673.0	3675.0	3676.9	3680.9	3680.9	3686.9	3678.9	3682.8
12.5°	3637.4	3645.3	3655.2	3659.2	3667.0	3667.0	3671.1	3673.0	3676.9	3675.0	3680.9
15°	3607.8	3617.7	3629.5	3639.4	3649.3	3655.2	3661.1	3663.1	3669.0	3663.1	3665.1
17.5°	3572.3	3584.1	3601.9	3613.7	3629.5	3635.4	3643.4	3647.3	3653.2	3649.3	3651.2
20°	3522.9	3536.8	3556.5	3574.2	3584.1	3598.0	3607.8	3613.7	3617.7	3613.7	3615.7
22.5°	3453.8	3473.5	3499.2	3513.0	3532.8	3544.6	3546.6	3560.4	3570.3	3560.4	3564.3
25°	3372.8	3392.6	3412.3	3441.9	3459.7	3473.5	3487.3	3489.3	3499.2	3497.2	3495.3
27.5°	3238.6	3264.2	3297.8	3321.5	3345.2	3366.9	3382.7	3386.7	3396.5	3392.6	3394.5
30°	3054.8	3082.5	3114.1	3151.7	3185.2	3207.0	3226.7	3240.5	3250.3	3244.5	3242.5
32.5°	2794.2	2821.9	2855.4	2893.0	2932.4	2964.0	2987.8	3005.5	3017.4	3013.4	3003.5
35°	2496.0	2504.0	2525.7	2555.3	2588.8	2622.5	2644.1	2663.8	2677.7	2681.7	2681.7
37.5°	2190.0	2164.3	2148.5	2148.5	2168.2	2182.0	2201.8	2213.6	2235.4	2243.2	2249.2
40°	1893.7	1834.5	1779.3	1737.8	1710.1	1708.2	1708.2	1714.0	1733.9	1759.4	1783.2
42.5°	1629.1	1534.3	1449.5	1372.4	1317.2	1285.6	1271.8	1273.7	1289.5	1313.1	1352.7
45°	1417.8	1299.4	1192.7	1099.9	1024.9	975.5	951.8	949.8	961.7	989.3	1032.8
47.5°	1254.0	1127.5	1007.1	900.5	819.6	766.2	738.5	730.7	738.5	764.2	815.5
50°	1117.7	987.4	862.9	752.4	665.5	610.2	584.5	574.6	584.5	606.2	657.6
52.5°	991.3	857.0	740.5	633.9	541.1	493.7	466.0	460.1	466.0	491.7	533.1
55°	845.2	730.7	616.1	509.5	428.6	381.1	359.4	353.5	359.4	383.2	426.5
57.5°	701.1	602.3	501.5	404.8	335.7	294.3	274.5	266.6	280.4	296.2	347.5
60°	566.8	487.7	402.8	317.9	260.6	223.1	207.4	205.4	209.3	229.0	264.6
62.5°	444.4	379.1	312.0	242.9	195.5	179.7	160.0	157.9	161.9	173.8	201.4
65°	319.9	278.5	227.1	177.7	140.2	118.5	110.6	112.5	116.5	124.4	150.1
67.5°	223.1	193.5	157.9	124.4	96.7	86.9	79.0	77.0	79.0	92.8	106.6
70°	150.1	132.3	106.6	94.8	67.1	53.2	55.3	49.4	57.3	57.3	69.1
72.5°	98.8	86.9	71.1	55.3	47.4	37.6	37.6	35.5	39.5	41.5	51.3
75°	51.3	39.5	39.5	27.7	19.7	9.9	17.8	15.8	13.8	15.8	19.7
77.5°	35.5	29.6	27.7	21.7	19.7	15.8	15.8	15.8	15.8	17.8	19.7
80°	21.7	21.7	15.8	13.8	11.9	9.9	11.9	11.9	11.9	11.9	13.8
82.5°	13.8	11.9	11.9	9.9	9.9	7.8	7.8	7.8	7.8	7.8	11.9
85°	11.9	7.8	7.8	5.9	7.8	13.8	5.9	7.8	7.8	7.8	5.9
87.5°	3.9	5.9	5.9	5.9	3.9	2.0	3.9	5.9	5.9	9.9	7.8
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°	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9	3678.9
2.5°	3684.8	3686.9	3686.9	3684.8	3684.8	3680.9	3688.8	3682.8	3684.8	3692.7	3686.9
5°	3688.8	3690.8	3690.8	3688.8	3688.8	3688.8	3690.8	3690.8	3688.8	3686.9	3690.8
7.5°	3696.7	3694.7	3694.7	3690.8	3690.8	3686.9	3690.8	3684.8	3688.8	3684.8	3690.8
10°	3686.9	3688.8	3686.9	3684.8	3684.8	3682.8	3682.8	3676.9	3678.9	3673.0	3676.9
12.5°	3680.9	3678.9	3678.9	3675.0	3671.1	3667.0	3665.1	3659.2	3659.2	3645.3	3651.2
15°	3665.1	3667.0	3661.1	3653.2	3649.3	3639.4	3635.4	3627.6	3619.7	3609.8	3611.7
17.5°	3651.2	3645.3	3637.4	3629.5	3613.7	3605.8	3598.0	3586.1	3582.2	3570.3	3566.3
20°	3609.8	3605.8	3595.9	3582.2	3572.3	3554.5	3546.6	3534.7	3524.9	3513.0	3507.0
22.5°	3556.5	3552.4	3540.7	3526.9	3511.1	3503.1	3495.3	3473.5	3463.7	3451.8	3449.8
25°	3489.3	3483.4	3471.5	3455.7	3447.9	3426.1	3418.3	3402.5	3398.5	3386.7	3384.6
27.5°	3386.7	3378.7	3364.9	3345.2	3331.4	3317.5	3309.6	3297.8	3293.8	3282.0	3280.0
30°	3232.6	3222.8	3195.1	3187.2	3163.5	3149.7	3149.7	3133.9	3135.9	3127.9	3127.9
32.5°	2989.7	2973.9	2952.2	2936.3	2920.5	2912.7	2912.7	2906.8	2910.7	2910.7	2914.7
35°	2667.9	2646.1	2634.2	2624.4	2624.4	2632.2	2656.0	2661.9	2673.8	2683.7	2691.5
37.5°	2255.1	2253.2	2267.0	2278.9	2308.5	2342.0	2383.5	2419.0	2452.5	2476.3	2499.9
40°	1808.8	1858.2	1897.7	1953.0	1998.4	2063.5	2138.6	2199.9	2257.1	2298.6	2342.0
42.5°	1411.9	1475.1	1558.1	1639.0	1720.0	1808.8	1907.6	1992.5	2067.6	2124.7	2170.3
45°	1099.9	1186.8	1287.6	1390.2	1494.9	1605.5	1708.2	1795.1	1874.0	1933.3	1978.7
47.5°	886.6	981.4	1096.0	1208.6	1327.0	1443.5	1558.1	1633.1	1698.2	1745.6	1787.1
50°	732.6	833.4	953.7	1082.1	1200.6	1317.2	1415.8	1488.9	1542.3	1583.7	1609.4
52.5°	612.2	718.8	847.1	975.5	1094.0	1200.6	1289.5	1344.8	1388.2	1417.8	1441.5
55°	505.5	608.3	728.6	849.2	965.6	1066.3	1139.4	1180.9	1214.4	1232.2	1246.0
57.5°	412.8	507.5	618.1	728.6	829.4	912.4	969.6	1011.0	1026.8	1040.6	1038.7
60°	323.9	412.8	513.4	608.3	695.1	762.2	803.8	827.4	839.3	845.2	841.2
62.5°	254.7	335.7	412.8	495.6	558.8	616.1	655.7	655.7	661.5	663.5	669.5
65°	189.6	250.8	317.9	379.1	430.5	468.0	489.8	495.6	503.6	501.5	497.6
67.5°	140.2	185.6	235.0	280.4	315.9	339.7	355.5	369.3	367.4	363.3	361.4
70°	96.7	126.4	169.8	197.5	223.1	246.8	250.8	252.8	254.7	256.7	252.8
72.5°	67.1	88.9	112.5	136.2	152.0	161.9	171.8	173.8	173.8	173.8	171.8
75°	33.6	45.4	67.1	77.0	90.8	94.8	102.7	102.7	108.6	100.7	98.8
77.5°	29.6	35.5	47.4	55.3	61.2	67.1	69.1	75.0	73.1	69.1	71.1
80°	17.8	21.7	29.6	33.6	41.5	43.4	45.4	47.4	45.4	47.4	47.4
82.5°	13.8	15.8	19.7	19.7	25.7	25.7	27.7	27.7	29.6	29.6	29.6
85°	7.8	13.8	11.9	23.7	15.8	15.8	19.7	23.7	19.7	19.7	23.7
87.5°	7.8	7.8	5.9	7.8	7.8	7.8	9.9	11.9	11.9	13.8	11.9
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: P249291

CATALOG NUMBER: LSR8B80D010 EC8B80930 8LBDW0WMH

**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°
0°	3678.9	3678.9	3678.9	3678.9
2.5°	3684.8	3688.8	3682.8	3680.9
5°	3690.8	3690.8	3686.9	3686.9
7.5°	3690.8	3690.8	3684.8	3680.9
10°	3675.0	3675.0	3669.0	3665.1
12.5°	3645.3	3645.3	3643.4	3637.4
15°	3607.8	3607.8	3599.9	3594.0
17.5°	3556.5	3560.4	3550.5	3550.5
20°	3501.2	3499.2	3491.4	3487.3
22.5°	3443.9	3440.0	3438.0	3426.1
25°	3382.7	3378.7	3372.8	3366.9
27.5°	3278.0	3276.0	3270.1	3262.2
30°	3118.1	3116.0	3108.2	3108.2
32.5°	2910.7	2908.8	2900.9	2902.8
35°	2695.4	2703.4	2699.5	2691.5
37.5°	2515.7	2521.7	2525.7	2521.7
40°	2365.8	2383.5	2385.5	2389.4
42.5°	2205.8	2229.4	2237.4	2241.3
45°	2014.2	2036.0	2053.7	2049.7
47.5°	1818.7	1834.5	1850.3	1838.4
50°	1631.2	1641.0	1647.0	1647.0
52.5°	1453.4	1453.4	1451.5	1453.4
55°	1250.0	1250.0	1242.1	1246.0
57.5°	1036.7	1040.6	1034.7	1024.9
60°	839.3	829.4	825.4	819.6
62.5°	653.7	653.7	639.9	657.6
65°	489.8	483.8	477.9	475.9
67.5°	355.5	353.5	347.5	345.6
70°	250.8	242.9	240.9	237.0
72.5°	167.8	167.8	163.9	163.9
75°	102.7	92.8	90.8	92.8
77.5°	71.1	69.1	69.1	67.1
80°	47.4	45.4	49.4	43.4
82.5°	29.6	31.6	29.6	31.6
85°	19.7	23.7	21.7	21.7
87.5°	11.9	11.9	11.9	11.9
90°	0.0	0.0	0.0	0.0

(END OF REPORT)