

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: P245030

Luminaire Tested: **LD8B20D010 ER8B20830 8LBDW0WMH**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P245030  
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: LD8B20D010 ER8B20830 8LBDW0WMH  
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF  
RECESSED DOWNLIGHT  
80 CRI 3000 CCT WITH WARM HAZE TRIM  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 2128.0 lumens  
Efficiency: N/A  
Efficacy: 99.9 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.26 / 1.18  
Luminous Opening: Circular (Dia: 0.67' x H: 0')  
CIE Type: Direct

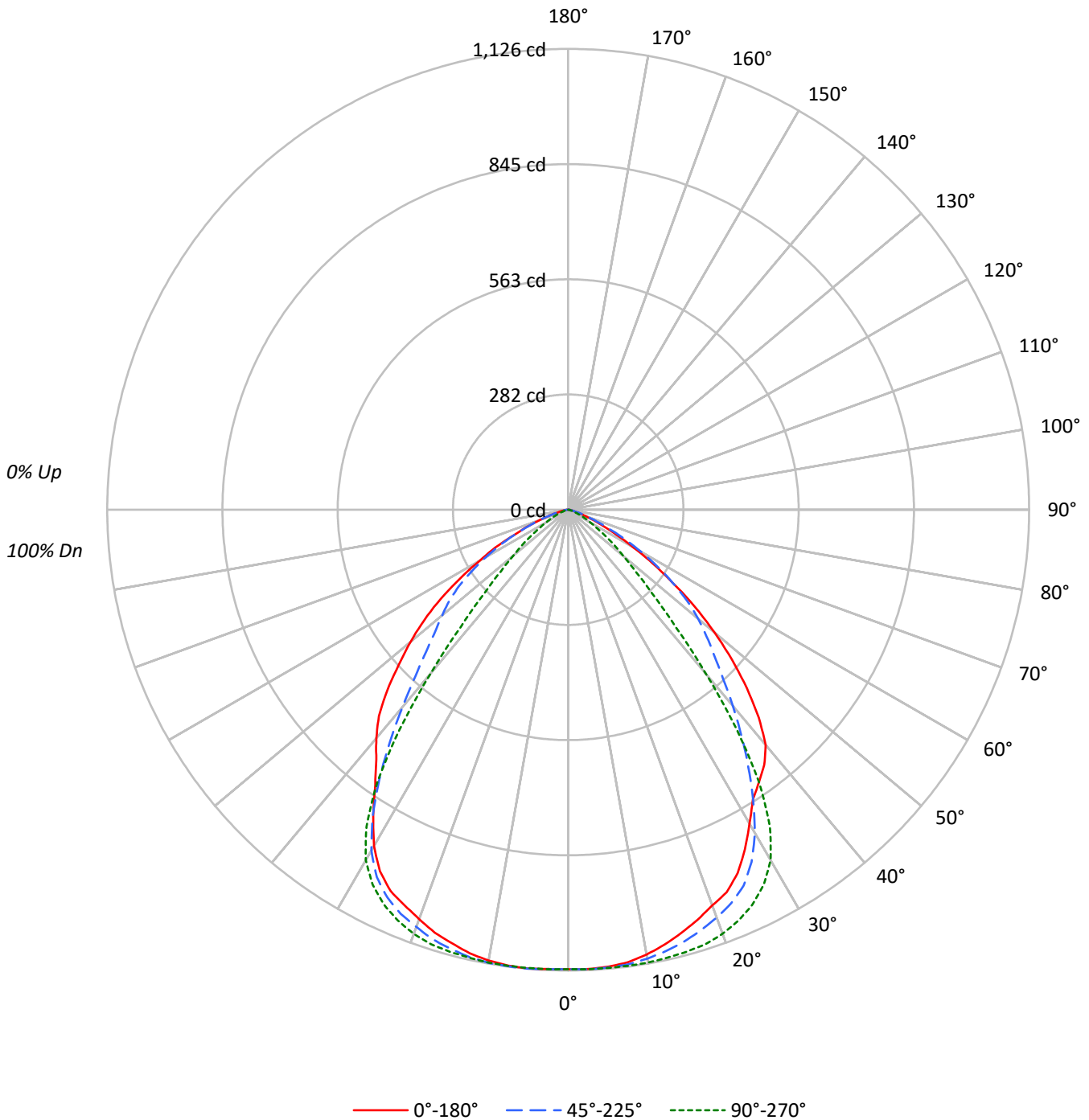
Input Watts (W): 21.3  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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

**AVERAGE LUMINANCE (cd/sqm):**

	0°	90°	180°
0°	34623	34623	34623
5°	34700	34792	34830
10°	34553	35176	35026
15°	34168	35691	35018
20°	33760	36192	34925
25°	33320	36232	34963
30°	31523	35215	33777
35°	30582	30605	30921
40°	30203	21057	29353
45°	26911	12642	27282
50°	22379	8414	24111
55°	16784	5801	20445
60°	11372	3867	15424
65°	6859	2510	10595
70°	3805	1361	6519
75°	1728	572	3372
80°	1492	639	2362
85°	1698	849	2335



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	107.2	5.0
10°-20°	311.2	14.6
20°-30°	472.3	22.2
30°-40°	496.1	23.3
40°-50°	371.9	17.5
50°-60°	238.6	11.2
60°-70°	102.1	4.8
70°-80°	24.1	1.1
80°-90°	4.5	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°	890.7	41.9
0°-40°	1386.7	65.2
0°-60°	1997.3	93.9
0°-90°	2128.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2128.0	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	1123	1123	1123	1123	1123	
5°	1121	1123	1124	1126	1125	106
15°	1070	1093	1118	1111	1097	302
25°	979	1014	1065	1046	1028	447
35°	812	767	813	803	821	510
45°	617	504	290	490	626	473
55°	312	312	108	325	380	283
65°	94	111	34	143	145	100
75°	14	17	5	29	28	21
85°	5	3	2	5	7	5
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°	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8
2.5°	1123.4	1124.6	1124.0	1124.0	1123.4	1124.0	1124.0	1125.2	1125.2	1124.0	1123.4
5°	1121.0	1122.2	1122.2	1121.0	1121.0	1124.0	1122.2	1123.4	1123.4	1122.8	1122.8
7.5°	1115.5	1115.5	1118.0	1116.2	1116.2	1118.0	1117.3	1118.6	1119.8	1120.4	1120.4
10°	1103.5	1104.7	1105.3	1105.3	1105.9	1107.7	1108.9	1111.3	1112.5	1113.7	1114.3
12.5°	1088.4	1090.2	1090.8	1090.2	1092.0	1094.4	1097.5	1100.5	1102.3	1104.7	1106.5
15°	1070.3	1070.3	1071.5	1073.4	1074.6	1078.2	1081.2	1084.8	1089.6	1092.6	1095.7
17.5°	1050.5	1051.7	1053.5	1053.5	1055.9	1061.9	1063.7	1069.1	1074.6	1077.6	1083.6
20°	1028.8	1030.0	1031.8	1033.0	1036.0	1040.8	1044.4	1049.2	1055.3	1060.7	1066.7
22.5°	1011.9	1009.5	1010.7	1011.9	1014.9	1019.1	1023.3	1029.4	1035.4	1040.8	1046.8
25°	979.3	979.9	981.8	982.9	986.6	990.2	995.0	1002.2	1007.7	1013.7	1020.3
27.5°	935.3	936.0	939.0	939.0	942.0	948.0	951.0	957.0	964.3	970.3	978.1
30°	885.3	886.5	886.5	888.9	890.7	893.8	896.8	902.8	906.4	911.8	922.7
32.5°	839.5	840.7	840.1	839.5	837.7	837.1	836.5	837.7	838.9	840.7	844.9
35°	812.4	809.4	807.0	802.8	797.9	791.9	786.5	779.3	772.6	767.2	761.2
37.5°	786.5	785.9	782.3	776.2	766.6	755.8	743.1	727.4	711.7	694.9	678.6
40°	750.3	748.5	745.5	737.1	726.2	713.0	696.1	676.8	651.5	625.6	599.1
42.5°	688.8	689.5	685.8	679.2	669.0	656.3	638.8	617.7	590.6	559.9	525.5
45°	617.1	617.1	615.9	610.5	603.3	593.0	579.8	562.3	535.8	504.4	467.7
47.5°	542.4	543.0	541.2	540.0	537.0	530.4	520.7	507.5	488.8	458.6	421.9
50°	466.5	466.5	469.5	468.9	468.9	466.5	462.3	454.4	438.1	414.0	379.7
52.5°	390.5	391.7	393.6	396.0	399.0	403.8	399.0	395.4	385.1	366.4	336.9
55°	312.2	313.4	316.4	320.6	324.2	329.1	330.3	330.3	324.8	312.2	289.9
57.5°	245.3	243.5	245.9	249.5	254.3	259.2	262.8	267.0	266.4	257.9	239.9
60°	184.4	185.0	186.8	190.4	194.1	198.3	203.1	206.7	208.5	204.3	192.9
62.5°	134.4	134.4	136.8	140.4	142.2	148.3	151.3	153.1	154.9	154.3	147.1
65°	94.0	95.2	96.4	98.2	100.0	103.7	105.5	109.1	110.3	110.9	105.5
67.5°	66.3	64.5	65.7	66.9	68.7	71.1	74.7	74.7	76.5	76.5	72.9
70°	42.2	42.2	42.8	44.6	45.8	46.4	47.6	48.8	50.6	50.0	50.0
72.5°	28.3	27.7	28.3	28.9	29.5	31.3	31.3	31.9	33.1	33.8	31.3
75°	14.5	15.1	16.3	15.7	17.5	16.3	16.9	18.7	18.1	16.9	16.9
77.5°	12.0	12.0	12.0	11.5	12.7	12.7	12.0	13.3	12.7	12.7	12.0
80°	8.4	9.0	8.4	7.8	8.4	7.8	7.8	7.8	7.8	7.8	7.2
82.5°	6.6	5.4	6.0	5.4	6.0	6.0	5.4	4.8	4.8	5.4	4.8
85°	4.8	3.6	4.2	4.2	3.6	3.6	3.6	3.6	3.6	3.0	3.0
87.5°	3.0	1.8	1.8	1.8	2.4	2.4	2.4	1.8	2.4	2.4	1.2
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°	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8
2.5°	1124.6	1124.0	1125.2	1124.6	1124.6	1124.0	1124.6	1124.0	1125.2	1122.8	1123.4
5°	1124.6	1123.4	1124.0	1124.6	1125.2	1124.0	1124.0	1124.0	1125.2	1124.0	1124.6
7.5°	1122.2	1121.6	1123.4	1124.6	1124.0	1123.4	1124.6	1124.0	1125.2	1124.6	1125.8
10°	1117.3	1118.0	1119.2	1121.0	1121.6	1122.2	1123.4	1123.4	1125.2	1122.8	1124.0
12.5°	1110.1	1112.5	1115.5	1116.7	1119.2	1119.2	1120.4	1121.0	1122.2	1121.6	1123.4
15°	1101.1	1104.1	1107.7	1110.7	1113.7	1115.5	1117.3	1118.0	1119.8	1118.0	1118.6
17.5°	1090.2	1093.8	1099.3	1102.9	1107.7	1109.5	1111.9	1113.1	1114.9	1113.7	1114.3
20°	1075.2	1079.4	1085.4	1090.8	1093.8	1098.1	1101.1	1102.9	1104.1	1102.9	1103.5
22.5°	1054.1	1060.1	1067.9	1072.2	1078.2	1081.8	1082.4	1086.6	1089.6	1086.6	1087.8
25°	1029.4	1035.4	1041.4	1050.5	1055.9	1060.1	1064.3	1064.9	1067.9	1067.3	1066.7
27.5°	988.4	996.2	1006.5	1013.7	1020.9	1027.6	1032.4	1033.6	1036.6	1035.4	1036.0
30°	932.3	940.8	950.4	961.9	972.1	978.7	984.8	989.0	992.0	990.2	989.6
32.5°	852.8	861.2	871.5	882.9	895.0	904.6	911.8	917.3	920.9	919.7	916.7
35°	761.8	764.2	770.8	779.9	790.1	800.3	807.0	813.0	817.2	818.4	818.4
37.5°	668.4	660.5	655.7	655.7	661.7	665.9	672.0	675.6	682.2	684.6	686.4
40°	578.0	559.9	543.0	530.4	521.9	521.3	521.3	523.1	529.1	537.0	544.2
42.5°	497.2	468.3	442.4	418.9	402.0	392.3	388.1	388.7	393.6	400.8	412.8
45°	432.7	396.6	364.0	335.7	312.8	297.7	290.5	289.9	293.5	301.9	315.2
47.5°	382.7	344.1	307.4	274.8	250.1	233.8	225.4	223.0	225.4	233.2	248.9
50°	341.1	301.3	263.4	229.6	203.1	186.2	178.4	175.4	178.4	185.0	200.7
52.5°	302.5	261.6	226.0	193.5	165.1	150.7	142.2	140.4	142.2	150.1	162.7
55°	257.9	223.0	188.0	155.5	130.8	116.3	109.7	107.9	109.7	116.9	130.2
57.5°	214.0	183.8	153.1	123.5	102.5	89.8	83.8	81.4	85.6	90.4	106.1
60°	173.0	148.9	122.9	97.0	79.6	68.1	63.3	62.7	63.9	69.9	80.8
62.5°	135.6	115.7	95.2	74.1	59.7	54.8	48.8	48.2	49.4	53.0	61.5
65°	97.6	85.0	69.3	54.2	42.8	36.2	33.8	34.4	35.6	38.0	45.8
67.5°	68.1	59.1	48.2	38.0	29.5	26.5	24.1	23.5	24.1	28.3	32.5
70°	45.8	40.4	32.5	28.9	20.5	16.3	16.9	15.1	17.5	17.5	21.1
72.5°	30.1	26.5	21.7	16.9	14.5	11.5	11.5	10.9	12.0	12.7	15.7
75°	15.7	12.0	12.0	8.4	6.0	3.0	5.4	4.8	4.2	4.8	6.0
77.5°	10.9	9.0	8.4	6.6	6.0	4.8	4.8	4.8	4.8	5.4	6.0
80°	6.6	6.6	4.8	4.2	3.6	3.0	3.6	3.6	3.6	3.6	4.2
82.5°	4.2	3.6	3.6	3.0	3.0	2.4	2.4	2.4	2.4	2.4	3.6
85°	3.6	2.4	2.4	1.8	2.4	4.2	1.8	2.4	2.4	2.4	1.8
87.5°	1.2	1.8	1.8	1.8	1.2	0.6	1.2	1.8	1.8	3.0	2.4
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°	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8	1122.8
2.5°	1124.6	1125.2	1125.2	1124.6	1124.6	1123.4	1125.8	1124.0	1124.6	1127.0	1125.2
5°	1125.8	1126.4	1126.4	1125.8	1125.8	1125.8	1126.4	1126.4	1125.8	1125.2	1126.4
7.5°	1128.2	1127.6	1127.6	1126.4	1126.4	1125.2	1126.4	1124.6	1125.8	1124.6	1126.4
10°	1125.2	1125.8	1125.2	1124.6	1124.6	1124.0	1124.0	1122.2	1122.8	1121.0	1122.2
12.5°	1123.4	1122.8	1122.8	1121.6	1120.4	1119.2	1118.6	1116.7	1116.7	1112.5	1114.3
15°	1118.6	1119.2	1117.3	1114.9	1113.7	1110.7	1109.5	1107.1	1104.7	1101.7	1102.3
17.5°	1114.3	1112.5	1110.1	1107.7	1102.9	1100.5	1098.1	1094.4	1093.2	1089.6	1088.4
20°	1101.7	1100.5	1097.5	1093.2	1090.2	1084.8	1082.4	1078.8	1075.8	1072.2	1070.3
22.5°	1085.4	1084.2	1080.6	1076.4	1071.5	1069.1	1066.7	1060.1	1057.1	1053.5	1052.9
25°	1064.9	1063.1	1059.5	1054.7	1052.3	1045.6	1043.2	1038.4	1037.2	1033.6	1033.0
27.5°	1033.6	1031.2	1027.0	1020.9	1016.7	1012.5	1010.1	1006.5	1005.3	1001.6	1001.0
30°	986.6	983.6	975.1	972.7	965.5	961.3	961.3	956.4	957.0	954.6	954.6
32.5°	912.4	907.6	901.0	896.2	891.3	888.9	888.9	887.1	888.3	888.3	889.5
35°	814.2	807.6	804.0	800.9	800.9	803.4	810.6	812.4	816.0	819.0	821.4
37.5°	688.2	687.7	691.9	695.5	704.5	714.8	727.4	738.3	748.5	755.8	763.0
40°	552.0	567.1	579.2	596.0	609.9	629.8	652.7	671.4	688.8	701.5	714.8
42.5°	430.9	450.2	475.5	500.2	524.9	552.0	582.2	608.1	631.0	648.5	662.3
45°	335.7	362.2	392.9	424.3	456.2	490.0	521.3	547.8	571.9	590.0	603.9
47.5°	270.6	299.5	334.5	368.8	405.0	440.5	475.5	498.4	518.3	532.8	545.4
50°	223.6	254.3	291.1	330.3	366.4	402.0	432.1	454.4	470.7	483.3	491.2
52.5°	186.8	219.4	258.5	297.7	333.9	366.4	393.6	410.4	423.7	432.7	439.9
55°	154.3	185.6	222.4	259.2	294.7	325.4	347.7	360.4	370.6	376.1	380.3
57.5°	126.0	154.9	188.6	222.4	253.1	278.4	295.9	308.6	313.4	317.6	317.0
60°	98.8	126.0	156.7	185.6	212.1	232.6	245.3	252.5	256.1	257.9	256.7
62.5°	77.7	102.5	126.0	151.3	170.6	188.0	200.1	200.1	201.9	202.5	204.3
65°	57.9	76.5	97.0	115.7	131.4	142.8	149.5	151.3	153.7	153.1	151.9
67.5°	42.8	56.7	71.7	85.6	96.4	103.7	108.5	112.7	112.1	110.9	110.3
70°	29.5	38.6	51.8	60.3	68.1	75.3	76.5	77.1	77.7	78.3	77.1
72.5°	20.5	27.1	34.4	41.6	46.4	49.4	52.4	53.0	53.0	53.0	52.4
75°	10.2	13.9	20.5	23.5	27.7	28.9	31.3	31.3	33.1	30.7	30.1
77.5°	9.0	10.9	14.5	16.9	18.7	20.5	21.1	22.9	22.3	21.1	21.7
80°	5.4	6.6	9.0	10.2	12.7	13.3	13.9	14.5	13.9	14.5	14.5
82.5°	4.2	4.8	6.0	6.0	7.8	7.8	8.4	8.4	9.0	9.0	9.0
85°	2.4	4.2	3.6	7.2	4.8	4.8	6.0	7.2	6.0	6.0	7.2
87.5°	2.4	2.4	1.8	2.4	2.4	2.4	3.0	3.6	3.6	4.2	3.6
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: P245030

CATALOG NUMBER: LD8B20D010 ER8B20830 8LBDW0WMH

**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°
0°	1122.8	1122.8	1122.8	1122.8
2.5°	1124.6	1125.8	1124.0	1123.4
5°	1126.4	1126.4	1125.2	1125.2
7.5°	1126.4	1126.4	1124.6	1123.4
10°	1121.6	1121.6	1119.8	1118.6
12.5°	1112.5	1112.5	1111.9	1110.1
15°	1101.1	1101.1	1098.7	1096.9
17.5°	1085.4	1086.6	1083.6	1083.6
20°	1068.5	1067.9	1065.5	1064.3
22.5°	1051.1	1049.9	1049.2	1045.6
25°	1032.4	1031.2	1029.4	1027.6
27.5°	1000.4	999.8	998.0	995.6
30°	951.6	951.0	948.6	948.6
32.5°	888.3	887.7	885.3	885.9
35°	822.6	825.1	823.9	821.4
37.5°	767.8	769.6	770.8	769.6
40°	722.0	727.4	728.0	729.2
42.5°	673.2	680.4	682.8	684.0
45°	614.7	621.4	626.8	625.6
47.5°	555.1	559.9	564.7	561.1
50°	497.8	500.8	502.6	502.6
52.5°	443.6	443.6	443.0	443.6
55°	381.5	381.5	379.1	380.3
57.5°	316.4	317.6	315.8	312.8
60°	256.1	253.1	251.9	250.1
62.5°	199.5	199.5	195.3	200.7
65°	149.5	147.7	145.8	145.2
67.5°	108.5	107.9	106.1	105.5
70°	76.5	74.1	73.5	72.3
72.5°	51.2	51.2	50.0	50.0
75°	31.3	28.3	27.7	28.3
77.5°	21.7	21.1	21.1	20.5
80°	14.5	13.9	15.1	13.3
82.5°	9.0	9.6	9.0	9.6
85°	6.0	7.2	6.6	6.6
87.5°	3.6	3.6	3.6	3.6
90°	0.0	0.0	0.0	0.0

(END OF REPORT)