

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: P245518

Luminaire Tested: **LD8B40D010 ER8B40927 8LBDW0WH**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P245518  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13956)  
Test Lab: INNOVATION CENTER-P1  
Issue Date: 03/03/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: PORTFOLIO  
Catalog Number: LD8B40D010 ER8B40927 8LBDW0WH  
Description: PORTFOLIO 8 INCH DOUBLE WALL WASH DISTRIBUTION 60 DEGREE CUTOFF  
RECESSED DOWNLIGHT  
97 CRI 2700 CCT WITH WHEAT TRIM  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3521.2 lumens  
Efficiency: N/A  
Efficacy: 86.1 lumens/watt  
Spacing Criteria (0/90/45): 1.16 / 1.33 / 1.2  
Luminous Opening: Point Source (0' x 0' x 0')  
CIE Type: Direct

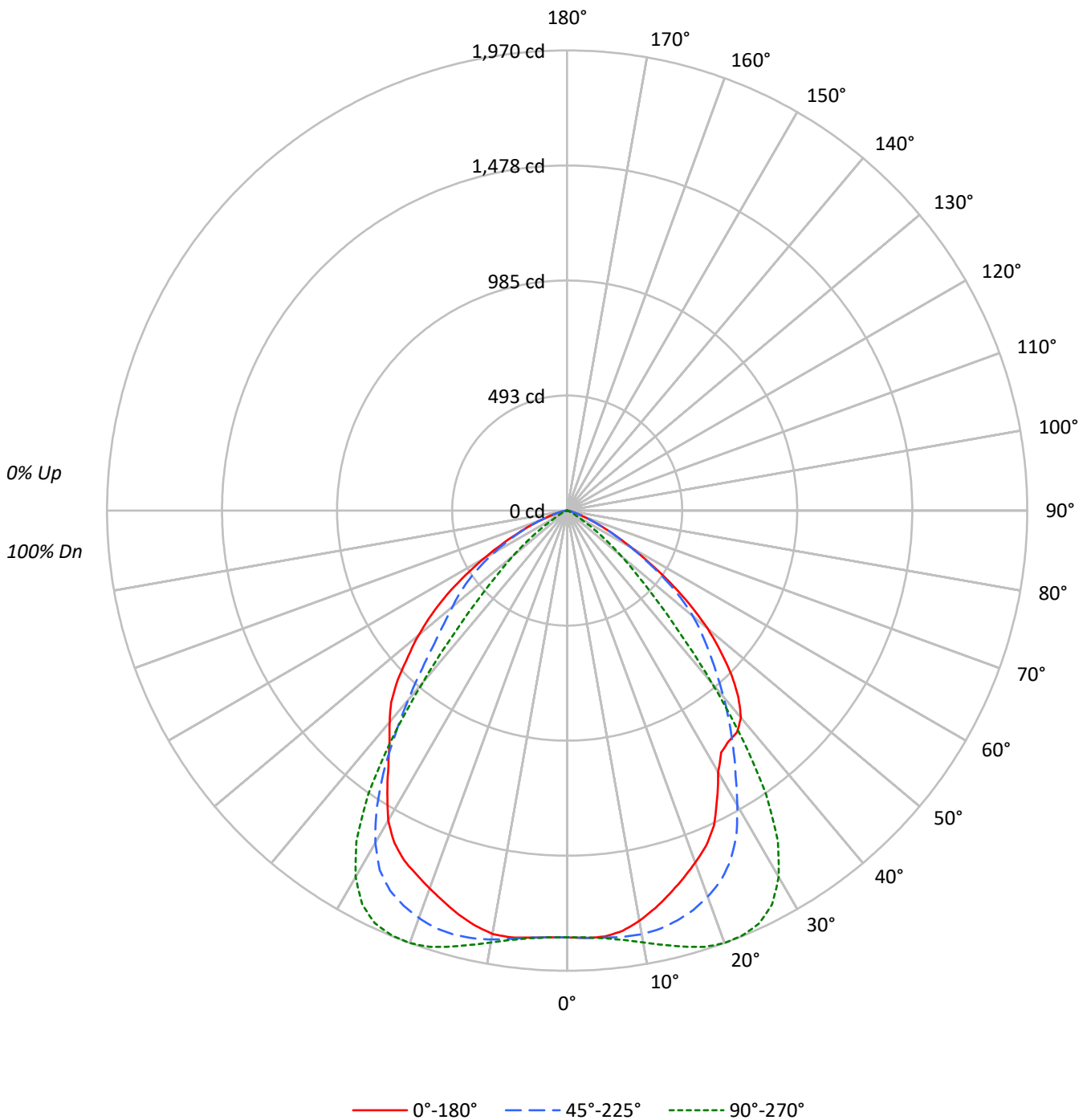
Input Watts (W): 40.9  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

### Luminous Intensity Polar Plot





TEST NUMBER: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**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	112	108	105	102	109	106	103	100	102	99	97	98	96	94	94	93	92	90
2	104	98	92	88	102	96	91	87	92	88	85	89	86	83	86	84	81	79
3	97	88	82	76	94	87	81	76	84	79	74	81	77	73	79	75	72	70
4	90	80	73	67	88	79	72	67	76	70	66	74	69	65	72	68	64	62
5	84	73	65	60	82	72	65	59	70	63	59	68	62	58	66	61	58	56
6	78	66	59	53	76	66	58	53	64	57	53	62	57	52	61	56	52	50
7	73	61	53	48	71	60	53	48	59	52	48	57	52	47	56	51	47	45
8	68	56	49	44	67	56	48	43	54	48	43	53	47	43	52	47	43	41
9	64	52	45	40	63	51	44	40	50	44	39	49	44	39	48	43	39	38
10	60	48	41	36	59	48	41	36	47	41	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°			



TEST NUMBER: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	175.7	5.0
10°-20°	520.4	14.8
20°-30°	793.9	22.5
30°-40°	828.5	23.5
40°-50°	622.3	17.7
50°-60°	382.9	10.9
60°-70°	155.8	4.4
70°-80°	36.7	1.0
80°-90°	5.1	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°	1490.0	42.3
0°-40°	2318.5	65.8
0°-60°	3323.7	94.4
0°-90°	3521.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3521.2	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	1827	1827	1827	1827	1827	
5°	1831	1835	1837	1835	1835	173
15°	1698	1817	1932	1879	1791	478
25°	1487	1654	1949	1795	1652	676
35°	1205	1239	1484	1372	1333	761
45°	995	861	537	802	1026	759
55°	537	510	141	510	629	483
65°	168	170	21	228	241	175
75°	29	29	4	51	53	35
85°	3	3	1	7	9	4
90°	0	0	0	0	0	



TEST NUMBER: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7
2.5°	1831.6	1828.7	1831.6	1831.6	1832.5	1830.6	1831.6	1832.5	1830.6	1830.6	1830.6
5°	1830.6	1828.7	1830.6	1829.6	1831.6	1831.6	1833.5	1833.5	1835.4	1835.4	1838.4
7.5°	1815.1	1811.2	1815.1	1818.0	1819.9	1823.8	1828.7	1832.5	1836.4	1840.3	1845.1
10°	1783.1	1783.1	1785.9	1791.8	1797.6	1804.4	1813.2	1822.8	1832.5	1841.3	1850.0
12.5°	1743.3	1740.4	1746.2	1754.0	1762.8	1773.3	1787.0	1801.5	1817.0	1834.4	1848.0
15°	1697.7	1694.8	1701.7	1709.4	1720.0	1735.5	1752.1	1771.4	1793.7	1817.0	1839.4
17.5°	1651.2	1650.3	1657.0	1667.7	1676.5	1692.9	1714.3	1737.4	1762.8	1793.7	1822.8
20°	1603.7	1602.8	1609.5	1618.3	1629.9	1645.4	1666.7	1693.9	1724.0	1758.8	1792.8
22.5°	1554.3	1555.2	1561.0	1570.7	1580.4	1596.9	1619.2	1646.3	1679.3	1717.1	1755.0
25°	1487.4	1482.5	1490.3	1500.0	1516.4	1530.0	1551.4	1580.4	1614.4	1654.1	1698.8
27.5°	1390.4	1389.4	1396.2	1404.9	1419.5	1436.0	1459.2	1489.3	1525.2	1568.8	1612.5
30°	1293.4	1295.3	1298.2	1307.0	1316.7	1333.2	1356.4	1381.7	1415.6	1457.3	1503.8
32.5°	1227.5	1227.5	1231.4	1237.2	1244.0	1252.7	1269.2	1287.6	1313.8	1342.9	1376.8
35°	1205.2	1201.3	1205.2	1206.1	1207.1	1209.0	1212.0	1217.8	1226.5	1239.2	1251.8
37.5°	1195.5	1192.6	1192.6	1188.7	1183.8	1178.1	1170.3	1161.6	1151.9	1139.3	1129.6
40°	1157.7	1155.7	1153.8	1150.0	1139.3	1127.6	1115.0	1094.6	1072.4	1041.3	1010.4
42.5°	1085.0	1083.0	1082.0	1074.3	1064.6	1051.1	1036.5	1015.2	987.1	947.2	902.7
45°	994.8	990.9	988.0	981.2	974.5	962.8	949.3	929.8	901.7	861.0	807.6
47.5°	890.1	888.2	887.2	884.2	877.5	870.6	862.0	846.4	821.2	782.4	727.2
50°	784.4	780.5	782.4	781.5	778.6	773.8	767.9	757.2	737.9	702.9	652.5
52.5°	663.2	663.2	662.3	665.1	666.1	665.1	666.1	654.5	638.0	611.8	569.1
55°	537.2	537.2	540.1	543.9	547.8	548.8	547.8	542.9	531.3	510.0	472.2
57.5°	418.8	416.9	422.8	428.5	432.4	436.3	433.4	429.5	422.8	405.3	376.2
60°	319.0	319.0	322.9	326.7	330.6	334.5	333.6	332.6	326.7	315.1	291.8
62.5°	234.7	235.6	235.6	238.5	242.4	246.3	249.2	246.3	243.3	235.6	220.0
65°	167.7	166.7	167.7	170.7	173.6	177.4	179.3	178.4	175.5	169.6	158.1
67.5°	112.5	111.5	115.4	116.3	118.2	122.2	121.2	122.2	121.2	116.3	106.6
70°	73.7	71.8	73.7	72.7	75.6	76.6	78.5	79.5	78.5	75.6	72.7
72.5°	45.6	44.6	45.6	46.6	47.5	48.5	50.4	50.4	49.4	47.5	43.6
75°	29.1	26.2	27.1	25.2	27.1	27.1	29.1	30.0	29.1	29.1	27.1
77.5°	17.4	17.4	17.4	17.4	17.4	17.4	17.4	18.4	19.3	17.4	16.5
80°	8.8	8.8	9.7	9.7	9.7	10.7	9.7	9.7	9.7	10.7	7.8
82.5°	6.8	5.9	5.9	5.9	6.8	5.9	5.9	5.9	5.9	5.9	5.9
85°	2.9	3.8	2.9	1.9	2.9	2.9	3.8	2.9	2.9	2.9	3.8
87.5°	1.0	1.0	0.0	0.0	0.0	1.0	0.0	1.0	1.0	1.9	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: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7
2.5°	1831.6	1829.6	1829.6	1828.7	1830.6	1828.7	1829.6	1828.7	1828.7	1830.6	1828.7
5°	1838.4	1839.4	1837.4	1836.4	1839.4	1839.4	1839.4	1837.4	1837.4	1838.4	1837.4
7.5°	1848.0	1850.0	1851.0	1852.0	1853.9	1854.8	1854.8	1853.9	1852.9	1855.8	1852.0
10°	1858.7	1861.6	1867.4	1870.3	1875.2	1875.2	1877.2	1877.2	1875.2	1877.2	1876.2
12.5°	1854.8	1872.2	1882.0	1888.8	1895.5	1901.4	1903.3	1904.3	1903.3	1907.2	1903.3
15°	1861.6	1876.2	1891.7	1903.3	1915.9	1922.7	1924.6	1932.4	1934.3	1935.3	1929.5
17.5°	1851.0	1877.2	1893.6	1911.0	1929.5	1942.1	1953.7	1958.6	1959.5	1961.4	1953.7
20°	1826.7	1855.8	1881.0	1906.2	1927.6	1946.9	1956.6	1970.2	1966.4	1974.2	1963.5
22.5°	1793.7	1826.7	1858.7	1891.7	1914.0	1937.2	1957.6	1967.3	1972.1	1972.1	1960.5
25°	1741.4	1780.2	1815.1	1849.0	1882.9	1911.0	1934.3	1948.8	1951.8	1950.9	1937.2
27.5°	1659.9	1701.7	1742.4	1781.1	1822.8	1855.8	1882.9	1900.4	1905.3	1905.3	1890.7
30°	1547.4	1592.1	1631.8	1678.4	1721.0	1757.9	1795.7	1811.2	1819.9	1819.9	1803.5
32.5°	1413.7	1451.5	1488.4	1533.9	1580.4	1622.1	1658.0	1679.3	1690.0	1689.1	1674.4
35°	1268.2	1286.7	1314.8	1348.6	1390.4	1429.2	1464.1	1484.4	1502.9	1501.9	1488.4
37.5°	1122.8	1117.9	1120.8	1133.4	1159.6	1186.8	1213.9	1233.3	1248.9	1255.6	1252.7
40°	980.2	955.0	930.8	922.0	924.0	933.8	948.3	962.8	980.2	989.0	992.8
42.5°	852.3	809.7	766.9	735.0	716.5	710.7	717.5	722.4	733.1	745.6	758.2
45°	749.5	692.3	636.1	586.6	555.5	537.2	533.2	537.2	542.9	555.5	572.1
47.5°	665.1	598.3	535.3	479.9	434.4	410.2	403.3	401.4	407.2	418.8	441.1
50°	590.5	523.6	453.8	389.8	342.2	315.1	305.4	301.5	308.4	317.0	337.4
52.5°	509.1	443.1	371.4	309.3	259.9	231.8	221.1	215.2	219.2	230.7	251.1
55°	420.8	359.7	294.8	230.7	183.3	157.0	144.5	140.6	144.5	157.0	177.4
57.5°	332.6	281.1	226.9	166.7	124.1	98.0	85.3	81.4	92.1	97.0	118.2
60°	259.9	218.1	171.7	122.2	85.3	64.9	52.3	49.4	54.3	63.0	80.4
62.5°	194.8	168.8	131.8	87.3	63.0	41.7	34.9	32.0	34.9	41.7	55.2
65°	141.5	121.2	92.1	64.0	42.6	31.0	23.3	21.4	24.3	29.1	40.7
67.5°	97.0	81.4	64.0	44.6	29.1	19.3	16.5	16.5	17.4	21.4	30.0
70°	63.0	53.3	40.7	29.1	19.3	14.5	12.6	10.7	12.6	15.5	20.4
72.5°	39.7	34.0	26.2	20.4	14.5	10.7	8.8	7.8	9.7	11.6	15.5
75°	24.3	18.4	13.6	10.7	7.8	7.8	7.8	3.8	4.8	7.8	9.7
77.5°	14.5	12.6	10.7	8.8	6.8	3.8	3.8	3.8	4.8	5.9	8.8
80°	7.8	6.8	4.8	4.8	3.8	2.9	3.8	2.9	1.9	4.8	5.9
82.5°	4.8	3.8	3.8	3.8	4.8	1.9	2.9	1.9	2.9	3.8	2.9
85°	2.9	2.9	2.9	1.9	4.8	1.9	1.9	1.0	1.0	1.9	1.9
87.5°	0.0	1.0	1.0	0.0	1.0	0.0	1.0	1.0	1.0	1.0	1.0
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: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**CANDELA DISTRIBUTION (continued):**

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7	1826.7
2.5°	1829.6	1828.7	1829.6	1828.7	1828.7	1828.7	1829.6	1829.6	1828.7	1828.7	1830.6
5°	1837.4	1837.4	1837.4	1836.4	1835.4	1835.4	1837.4	1837.4	1834.4	1837.4	1837.4
7.5°	1853.9	1851.0	1853.9	1850.0	1848.0	1849.0	1850.0	1848.0	1846.1	1847.0	1847.0
10°	1875.2	1872.2	1872.2	1869.4	1866.5	1864.5	1862.6	1857.7	1852.9	1852.0	1848.0
12.5°	1900.4	1895.5	1892.7	1886.8	1882.0	1875.2	1869.4	1861.6	1852.0	1845.1	1838.4
15°	1925.7	1917.9	1911.0	1901.4	1890.7	1879.1	1866.5	1853.9	1838.4	1824.8	1813.2
17.5°	1945.9	1935.3	1922.7	1907.2	1891.7	1874.2	1855.8	1837.4	1815.1	1797.6	1784.0
20°	1952.8	1937.2	1920.7	1900.4	1880.0	1855.8	1832.5	1808.3	1783.1	1764.7	1749.2
22.5°	1944.0	1925.7	1905.3	1883.9	1856.8	1830.6	1803.5	1775.4	1753.0	1727.8	1713.3
25°	1919.8	1897.5	1875.2	1850.0	1823.8	1794.7	1765.7	1736.6	1709.4	1695.8	1677.4
27.5°	1870.3	1846.1	1821.8	1795.7	1765.7	1736.6	1706.5	1678.4	1655.1	1636.6	1626.0
30°	1783.1	1755.0	1726.9	1698.8	1672.5	1642.5	1614.4	1591.1	1567.8	1553.3	1542.6
32.5°	1649.2	1624.0	1595.9	1568.8	1544.6	1519.3	1496.0	1475.8	1459.2	1449.6	1441.8
35°	1468.9	1443.7	1422.3	1403.0	1382.6	1371.9	1357.4	1345.8	1339.0	1335.1	1334.1
37.5°	1242.0	1227.5	1220.7	1216.8	1213.0	1210.0	1212.0	1216.8	1220.7	1227.5	1235.2
40°	999.7	1012.3	1016.1	1029.7	1042.3	1058.7	1077.2	1098.6	1116.0	1138.3	1153.8
42.5°	778.6	801.9	829.0	858.0	889.1	919.1	956.0	990.0	1020.9	1049.1	1073.4
45°	598.3	634.1	674.9	716.5	758.2	801.9	846.4	888.2	925.0	955.0	980.2
47.5°	466.4	506.1	558.4	609.9	660.3	711.7	761.2	804.7	835.8	864.9	887.2
50°	369.4	415.0	472.2	531.3	586.6	640.9	693.2	733.9	765.0	788.3	804.7
52.5°	286.0	340.3	398.5	460.6	519.8	578.8	627.3	665.1	690.3	710.7	723.3
55°	213.3	266.6	328.7	392.7	452.8	510.0	555.5	588.6	610.9	622.5	629.2
57.5°	154.1	202.6	264.7	328.7	383.0	437.3	474.1	504.2	516.8	523.6	526.5
60°	112.5	157.0	212.3	267.6	319.0	362.6	394.7	415.0	424.7	428.5	427.6
62.5°	82.5	121.2	168.8	215.2	257.0	292.8	318.0	331.7	336.5	338.4	335.5
65°	63.0	93.0	133.8	169.6	201.7	227.8	246.3	255.0	258.0	257.0	255.0
67.5°	46.6	69.9	99.9	127.0	150.3	170.7	180.3	188.1	190.0	187.1	184.3
70°	33.0	51.4	72.7	91.1	108.6	120.3	130.8	131.8	131.8	130.8	128.9
72.5°	23.3	35.9	49.4	62.1	72.7	81.4	85.3	88.2	87.3	86.3	84.4
75°	15.5	22.3	35.9	38.8	48.5	51.4	55.2	55.2	56.2	53.3	53.3
77.5°	9.7	15.5	21.4	25.2	29.1	33.0	34.9	34.9	35.9	34.9	34.9
80°	5.9	9.7	11.6	17.4	17.4	20.4	21.4	22.3	20.4	23.3	20.4
82.5°	3.8	5.9	8.8	8.8	10.7	12.6	12.6	13.6	13.6	12.6	12.6
85°	2.9	3.8	4.8	5.9	5.9	6.8	5.9	5.9	6.8	7.8	6.8
87.5°	1.0	1.9	1.0	1.9	1.9	3.8	2.9	2.9	2.9	3.8	3.8
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: P245518

CATALOG NUMBER: LD8B40D010 ER8B40927 8LBDW0WH

**CANDELA DISTRIBUTION (continued):**

	165°	170°	175°	180°
0°	1826.7	1826.7	1826.7	1826.7
2.5°	1828.7	1829.6	1828.7	1828.7
5°	1837.4	1836.4	1837.4	1835.4
7.5°	1844.2	1844.2	1843.2	1843.2
10°	1844.2	1840.3	1840.3	1840.3
12.5°	1829.6	1824.8	1821.8	1819.9
15°	1804.4	1795.7	1791.8	1790.8
17.5°	1771.4	1763.7	1758.8	1755.9
20°	1733.6	1725.9	1720.0	1721.0
22.5°	1700.7	1692.0	1688.1	1686.2
25°	1667.7	1657.0	1654.1	1652.2
27.5°	1614.4	1608.5	1605.6	1602.8
30°	1532.9	1530.0	1525.2	1531.9
32.5°	1438.9	1434.0	1430.1	1433.0
35°	1335.1	1332.2	1335.1	1333.2
37.5°	1240.1	1243.0	1247.0	1248.9
40°	1165.5	1176.1	1180.0	1181.9
42.5°	1090.8	1103.4	1111.2	1116.0
45°	998.7	1011.3	1020.0	1025.9
47.5°	903.7	914.3	923.1	922.0
50°	817.4	823.2	827.1	830.9
52.5°	730.1	730.1	731.0	731.0
55°	631.2	629.2	628.3	629.2
57.5°	522.6	520.6	519.8	516.8
60°	423.7	417.9	414.0	414.0
62.5°	331.7	324.8	321.9	321.0
65°	249.2	248.2	242.4	241.4
67.5°	180.3	176.5	172.6	173.6
70°	127.0	121.2	121.2	119.2
72.5°	82.5	79.5	78.5	78.5
75°	51.4	51.4	49.4	53.3
77.5°	34.0	34.0	33.0	34.0
80°	20.4	20.4	20.4	19.3
82.5°	12.6	13.6	12.6	12.6
85°	6.8	7.8	5.9	8.8
87.5°	3.8	4.8	3.8	4.8
90°	0.0	0.0	0.0	0.0

(END OF REPORT)