

Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: METALUX

Report Number: P1213819

Luminaire Tested: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

Issue Date: 3/29/2018

Test Information

Test Method: LM-79-2019
Report Number: P1213819
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33518)
Test Lab: INNOVATIONS CENTER-P3
Issue Date: 3/29/2018
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U
Description: 4FT LINEAR SNLED LED FIXTURE
CLEAR LENSED
Light Source: -
Ballast/Driver: -

Summary

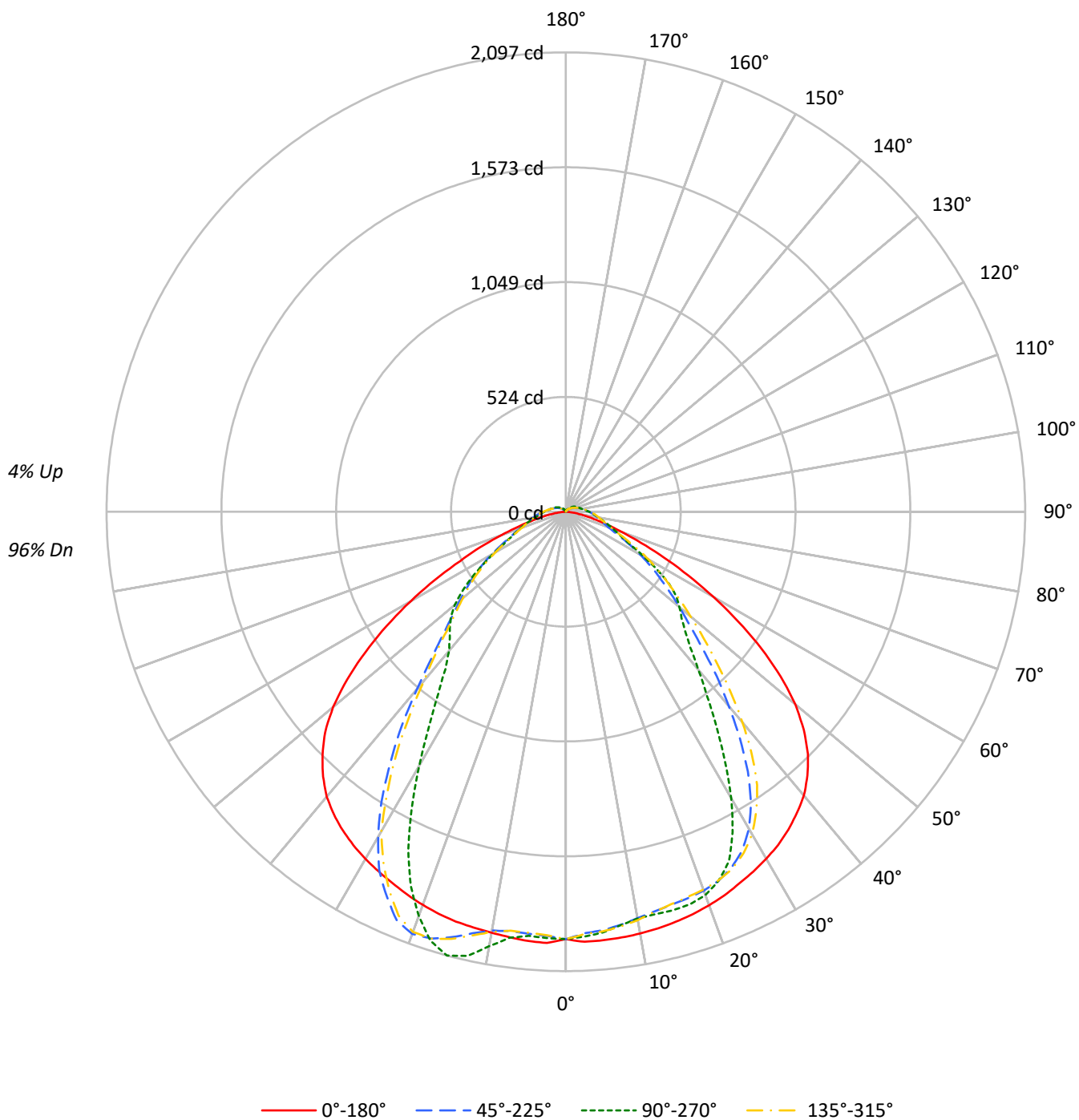
Lumens per Lamp: N/A
Luminaire Lumens: 4651.0 lumens
Efficiency: N/A
Efficacy: 119.3 lumens/watt
Spacing Criteria (0/90/45): 1.4 / 1.12 / 1.19
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.12')
CIE Type: Direct

Input Watts (W): 39
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: 24 FT

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	118	118	118	118	115	115	115	115	109	109	109	103	103	103	98	98	98
1	109	104	100	97	106	102	98	95	97	94	91	92	90	88	88	86	84
2	100	93	86	81	97	90	85	80	86	82	77	82	79	75	79	76	73
3	92	83	75	69	89	81	74	68	77	71	67	74	69	65	71	67	63
4	85	74	66	60	83	73	65	59	70	63	58	67	61	57	64	60	56
5	79	67	59	52	76	66	58	52	63	56	51	61	55	50	59	53	49
6	73	61	52	46	71	60	52	46	57	51	45	55	49	45	54	48	44
7	68	55	47	42	66	54	47	41	53	46	41	51	45	40	49	44	40
8	64	51	43	37	62	50	42	37	48	42	37	47	41	36	45	40	36
9	60	47	39	34	58	46	39	34	45	38	33	43	37	33	42	37	33
10	56	43	36	31	54	43	36	31	42	35	30	40	34	30	39	34	30

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	15766	15766	15766	15766
5°	15881	15141	15913	15259
10°	15954	14511	15922	15496
15°	16078	14317	16070	15941
20°	16255	14090	16238	14853
25°	16455	13367	16447	12916
30°	16764	11585	16773	10264
35°	17093	9368	17141	7927
40°	17383	7542	17455	6646
45°	17321	6389	17411	6221
50°	16575	5882	16806	5751
55°	14706	5287	15073	4806
60°	11928	4047	12562	3711
65°	8867	3095	9553	2935
70°	6029	2673	6798	2555
75°	3945	2411	4594	2280
80°	2550	2249	2989	2069
85°	1305	2243	1722	2049

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 180°

Vertical Angle: 45°

Luminance: 17411 cd/sqm

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	185.3	4.0
10°-20°	551.4	11.9
20°-30°	838.3	18.0
30°-40°	899.3	19.3
40°-50°	780.5	16.8
50°-60°	578.4	12.4
60°-70°	331.4	7.1
70°-80°	183.5	3.9
80°-90°	111.8	2.4
90°-100°	72.7	1.6
100°-110°	48.7	1.0
110°-120°	32.9	0.7
120°-130°	20.2	0.4
130°-140°	10.6	0.2
140°-150°	4.8	0.1
150°-160°	1.4	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	1575.0	33.9
0°-40°	2474.2	53.2
0°-60°	3833.1	82.4
0°-90°	4459.8	95.9
90°-120°	154.2	3.3
90°-150°	189.8	4.1
90°-180°	191.0	4.1
0°-180°	4651.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1951	1951	1951	1951	1951	
5°	1963	1928	1967	1943	1963	187
15°	1938	1884	1937	2097	1938	548
25°	1872	1762	1871	1702	1872	866
35°	1771	1199	1776	1015	1771	1108
45°	1563	769	1571	749	1563	1197
55°	1090	576	1118	524	1090	967
65°	495	292	533	277	495	499
75°	141	185	164	175	141	161
85°	19	128	25	117	19	25
90°	0	107	2	99	0	1
95°	1	88	0	84	1	1
105°	1	66	1	62	1	1
115°	1	53	1	48	1	1
125°	1	40	1	33	1	1
135°	1	25	1	21	1	1
145°	1	15	2	12	1	1
155°	2	7	2	6	2	1
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1965.1	1960.0	1958.0	1954.0	1957.0	1969.1	1961.1	1948.0	1949.0	1925.8	1937.9
5°	1963.1	1957.0	1954.0	1950.0	1952.0	1963.1	1955.0	1941.9	1940.9	1917.7	1928.8
7.5°	1960.0	1954.0	1949.0	1945.9	1946.9	1956.0	1945.9	1930.8	1927.8	1902.6	1912.7
10°	1955.0	1951.0	1943.9	1938.9	1937.9	1948.0	1931.8	1916.7	1909.7	1883.5	1893.5
12.5°	1948.0	1941.9	1934.9	1925.8	1924.8	1930.8	1917.7	1896.6	1889.5	1868.3	1879.4
15°	1937.9	1930.8	1922.8	1912.7	1907.6	1911.7	1895.6	1876.4	1875.4	1857.3	1872.4
17.5°	1926.8	1916.7	1907.6	1893.5	1886.5	1889.5	1876.4	1859.3	1861.3	1850.2	1867.3
20°	1911.7	1900.6	1886.5	1872.4	1862.3	1867.3	1858.3	1845.2	1848.2	1840.1	1855.2
22.5°	1894.5	1879.4	1862.3	1846.2	1838.1	1845.2	1838.1	1827.0	1828.0	1823.0	1832.1
25°	1872.4	1855.2	1835.1	1814.9	1810.9	1815.9	1811.9	1802.8	1798.8	1790.7	1794.8
27.5°	1852.2	1833.1	1807.9	1786.7	1779.7	1789.7	1780.7	1765.6	1754.5	1743.4	1735.3
30°	1829.0	1805.9	1777.6	1753.5	1747.4	1751.4	1738.3	1715.2	1685.9	1671.8	1649.7
32.5°	1803.8	1773.6	1738.3	1711.1	1707.1	1704.1	1679.9	1646.6	1601.3	1573.1	1538.8
35°	1770.6	1737.3	1695.0	1661.8	1655.7	1638.6	1599.3	1554.9	1496.5	1448.1	1389.7
37.5°	1733.3	1694.0	1649.7	1605.3	1588.2	1553.9	1498.5	1452.1	1363.5	1305.0	1234.5
40°	1691.0	1643.6	1589.2	1535.8	1507.6	1452.1	1388.7	1320.1	1234.5	1155.9	1096.4
42.5°	1632.5	1582.1	1517.7	1458.2	1409.8	1336.3	1261.7	1164.9	1086.3	1019.8	959.4
45°	1563.0	1502.5	1428.0	1356.4	1294.9	1207.3	1119.6	1022.9	957.3	879.8	838.4
47.5°	1473.3	1407.8	1328.2	1248.6	1168.0	1071.2	979.5	886.8	821.3	765.9	735.6
50°	1367.5	1307.0	1219.4	1124.6	1036.0	935.2	843.5	773.9	710.5	676.2	653.0
52.5°	1236.5	1180.1	1090.4	987.6	901.9	803.2	719.5	663.1	617.7	592.5	584.5
55°	1090.4	1041.0	952.3	856.6	768.9	678.2	614.7	565.3	536.1	521.0	522.0
57.5°	934.2	895.9	812.2	726.6	643.9	575.4	518.0	478.7	456.5	455.5	458.5
60°	778.0	749.8	677.2	603.6	531.1	475.7	433.3	406.1	392.0	393.0	392.0
62.5°	628.8	602.6	550.2	489.8	432.3	395.0	356.7	345.7	333.6	332.6	332.6
65°	494.8	474.6	432.3	389.0	345.7	321.5	302.3	289.2	280.2	278.1	279.1
67.5°	371.9	363.8	334.6	305.3	278.1	263.0	246.9	243.9	236.8	236.8	238.8
70°	277.1	271.1	255.0	237.8	226.7	216.7	208.6	208.6	207.6	206.6	211.6
72.5°	200.5	201.5	196.5	183.4	182.4	180.4	178.4	181.4	182.4	185.4	191.5
75°	141.1	144.1	144.1	142.1	146.1	151.2	154.2	159.2	165.3	169.3	176.4
77.5°	99.8	99.8	104.8	110.9	118.9	128.0	136.0	143.1	151.2	156.2	162.2
80°	64.5	67.5	75.6	86.7	97.8	109.8	120.9	130.0	138.1	146.1	150.2
82.5°	38.3	43.3	53.4	67.5	81.6	96.7	107.8	118.9	128.0	136.0	139.1
85°	19.1	26.2	38.3	53.4	68.5	84.6	98.8	108.8	118.9	126.0	130.0
87.5°	6.0	14.1	27.2	41.3	57.4	73.6	88.7	99.8	108.8	114.9	118.9
90°	0.0	7.1	19.1	34.3	49.4	65.5	79.6	91.7	100.8	105.8	108.8
92.5°	0.0	4.0	15.1	28.2	42.3	58.4	72.6	83.6	91.7	96.7	98.8
95°	1.0	3.0	11.1	23.2	37.3	52.4	65.5	75.6	83.6	88.7	89.7
97.5°	1.0	2.0	9.1	19.1	32.2	46.4	59.5	69.5	75.6	80.6	81.6
100°	1.0	2.0	7.1	17.1	28.2	41.3	53.4	62.5	69.5	73.6	74.6
102.5°	1.0	1.0	6.0	14.1	25.2	36.3	47.4	56.4	62.5	66.5	68.5
105°	1.0	1.0	5.0	12.1	22.2	32.2	42.3	51.4	56.4	60.5	62.5
107.5°	1.0	1.0	4.0	10.1	19.1	28.2	38.3	45.3	51.4	55.4	57.4
110°	1.0	1.0	3.0	9.1	16.1	25.2	33.3	40.3	46.4	50.4	52.4

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
112.5°	1.0	1.0	3.0	8.1	14.1	22.2	29.2	36.3	41.3	45.3	48.4
115°	1.0	1.0	3.0	7.1	13.1	19.1	26.2	32.2	37.3	41.3	44.3
117.5°	1.0	1.0	3.0	6.0	11.1	17.1	23.2	29.2	33.3	37.3	40.3
120°	1.0	1.0	2.0	5.0	10.1	15.1	20.2	25.2	30.2	34.3	37.3
122.5°	1.0	1.0	2.0	5.0	8.1	13.1	18.1	22.2	27.2	30.2	33.3
125°	1.0	1.0	2.0	4.0	7.1	12.1	16.1	20.2	23.2	27.2	30.2
127.5°	1.0	1.0	2.0	4.0	6.0	10.1	14.1	18.1	21.2	24.2	26.2
130°	1.0	1.0	2.0	3.0	5.0	8.1	12.1	15.1	19.1	21.2	23.2
132.5°	1.0	1.0	1.0	3.0	4.0	6.0	9.1	13.1	16.1	19.1	20.2
135°	1.0	1.0	1.0	2.0	4.0	5.0	7.1	10.1	13.1	16.1	18.1
137.5°	1.0	1.0	1.0	2.0	3.0	5.0	6.0	8.1	11.1	13.1	16.1
140°	1.0	1.0	1.0	2.0	3.0	4.0	5.0	7.1	9.1	11.1	13.1
142.5°	1.0	1.0	1.0	2.0	2.0	3.0	4.0	6.0	7.1	9.1	11.1
145°	1.0	1.0	1.0	2.0	2.0	3.0	4.0	5.0	6.0	7.1	9.1
147.5°	1.0	1.0	1.0	2.0	2.0	2.0	3.0	4.0	5.0	6.0	7.1
150°	2.0	2.0	2.0	2.0	2.0	2.0	3.0	3.0	4.0	5.0	6.0
152.5°	2.0	2.0	2.0	2.0	2.0	2.0	3.0	3.0	3.0	4.0	5.0
155°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	3.0	3.0	4.0	4.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1933.8	1935.9	1948.0	1946.9	1944.9	1942.9	1942.9	1940.9	1942.9	1948.0	1945.9
5°	1923.8	1926.8	1935.9	1934.9	1932.8	1931.8	1930.8	1927.8	1929.8	1936.9	1934.9
7.5°	1905.6	1908.7	1916.7	1912.7	1909.7	1911.7	1906.6	1903.6	1907.6	1914.7	1913.7
10°	1886.5	1888.5	1898.6	1896.6	1891.5	1892.5	1887.5	1885.5	1890.5	1894.5	1895.6
12.5°	1873.4	1880.4	1889.5	1888.5	1887.5	1888.5	1883.5	1881.4	1884.5	1888.5	1887.5
15°	1870.4	1879.4	1889.5	1889.5	1890.5	1891.5	1886.5	1883.5	1886.5	1889.5	1888.5
17.5°	1867.3	1878.4	1887.5	1886.5	1887.5	1889.5	1881.4	1879.4	1883.5	1887.5	1885.5
20°	1857.3	1867.3	1873.4	1871.4	1871.4	1872.4	1862.3	1862.3	1868.3	1871.4	1872.4
22.5°	1829.0	1841.1	1841.1	1836.1	1836.1	1832.1	1829.0	1823.0	1830.0	1835.1	1839.1
25°	1786.7	1791.8	1785.7	1774.6	1768.6	1763.5	1749.4	1761.5	1761.5	1776.6	1781.7
27.5°	1727.3	1716.2	1699.0	1675.9	1670.8	1654.7	1645.6	1648.7	1653.7	1674.9	1691.0
30°	1629.5	1596.3	1567.0	1557.0	1534.8	1518.7	1502.5	1510.6	1519.7	1531.8	1565.0
32.5°	1500.5	1468.3	1420.9	1403.8	1380.6	1360.4	1341.3	1353.4	1369.5	1377.6	1413.9
35°	1352.4	1314.1	1270.8	1241.5	1217.3	1206.3	1182.1	1199.2	1216.3	1222.4	1253.6
37.5°	1195.2	1155.9	1117.6	1092.4	1069.2	1062.2	1046.0	1058.1	1071.2	1080.3	1106.5
40°	1046.0	1009.8	980.5	963.4	947.3	941.2	935.2	940.2	950.3	957.3	977.5
42.5°	918.0	888.8	868.7	858.6	847.5	839.4	840.5	842.5	847.5	862.6	871.7
45°	806.2	789.1	776.0	773.9	766.9	765.9	764.9	768.9	771.9	781.0	788.0
47.5°	716.5	709.4	706.4	710.5	713.5	709.4	711.5	716.5	722.5	722.5	721.5
50°	646.0	648.0	652.0	661.1	667.1	669.1	671.2	677.2	678.2	680.2	677.2
52.5°	588.5	590.5	601.6	615.7	622.8	625.8	629.8	635.9	635.9	637.9	633.9
55°	530.1	533.1	544.2	558.3	564.3	568.4	572.4	576.4	579.4	583.5	580.5
57.5°	465.6	474.6	481.7	485.7	489.8	492.8	495.8	496.8	502.9	503.9	508.9
60°	397.0	399.1	406.1	405.1	402.1	410.1	406.1	413.2	420.2	429.3	430.3
62.5°	331.5	332.6	337.6	335.6	339.6	338.6	341.6	341.6	346.7	350.7	355.7
65°	280.2	281.2	285.2	285.2	284.2	287.2	290.2	292.2	292.2	295.3	299.3
67.5°	241.9	244.9	248.9	250.9	252.9	252.9	256.0	257.0	259.0	260.0	262.0
70°	215.7	219.7	223.7	225.7	226.7	228.8	229.8	229.8	231.8	232.8	234.8
72.5°	196.5	200.5	203.6	203.6	205.6	206.6	206.6	207.6	208.6	210.6	212.6
75°	180.4	183.4	185.4	184.4	184.4	184.4	185.4	185.4	187.4	189.5	191.5
77.5°	165.3	168.3	168.3	166.3	166.3	166.3	166.3	167.3	168.3	170.3	172.3
80°	154.2	154.2	153.2	153.2	151.2	150.2	150.2	151.2	151.2	153.2	156.2
82.5°	142.1	142.1	141.1	140.1	139.1	138.1	138.1	139.1	140.1	141.1	143.1
85°	131.0	131.0	129.0	129.0	128.0	128.0	128.0	128.0	129.0	130.0	132.0
87.5°	119.9	118.9	117.9	116.9	116.9	116.9	116.9	116.9	117.9	119.9	120.9
90°	108.8	107.8	106.8	106.8	105.8	105.8	106.8	106.8	107.8	108.8	109.8
92.5°	98.8	97.8	96.7	96.7	95.7	95.7	96.7	95.7	97.8	97.8	98.8
95°	89.7	88.7	87.7	87.7	87.7	87.7	87.7	87.7	88.7	88.7	89.7
97.5°	81.6	80.6	79.6	79.6	80.6	79.6	80.6	80.6	80.6	81.6	82.6
100°	74.6	73.6	73.6	74.6	73.6	73.6	74.6	74.6	74.6	74.6	75.6
102.5°	68.5	68.5	68.5	68.5	68.5	68.5	69.5	69.5	69.5	69.5	70.5
105°	62.5	63.5	63.5	63.5	64.5	64.5	64.5	65.5	65.5	65.5	65.5
107.5°	58.4	59.5	59.5	60.5	60.5	61.5	61.5	61.5	61.5	62.5	62.5
110°	54.4	55.4	56.4	57.4	57.4	58.4	58.4	58.4	58.4	58.4	58.4

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
112.5°	50.4	51.4	52.4	54.4	55.4	55.4	55.4	55.4	56.4	56.4	55.4
115°	46.4	48.4	49.4	51.4	52.4	52.4	53.4	53.4	53.4	53.4	52.4
117.5°	42.3	45.3	46.4	48.4	49.4	49.4	50.4	50.4	50.4	50.4	49.4
120°	39.3	41.3	43.3	44.3	45.3	46.4	46.4	47.4	47.4	47.4	46.4
122.5°	36.3	38.3	40.3	41.3	42.3	43.3	43.3	43.3	43.3	43.3	43.3
125°	32.2	34.3	36.3	37.3	38.3	39.3	39.3	40.3	40.3	40.3	39.3
127.5°	29.2	31.2	32.2	34.3	35.3	35.3	36.3	36.3	36.3	36.3	35.3
130°	25.2	27.2	29.2	30.2	31.2	31.2	32.2	32.2	32.2	32.2	32.2
132.5°	22.2	24.2	25.2	27.2	27.2	28.2	28.2	29.2	29.2	29.2	28.2
135°	20.2	21.2	22.2	24.2	24.2	25.2	25.2	25.2	25.2	25.2	25.2
137.5°	18.1	19.1	20.2	21.2	21.2	22.2	22.2	22.2	22.2	23.2	22.2
140°	15.1	17.1	18.1	18.1	19.1	19.1	19.1	20.2	20.2	20.2	19.1
142.5°	13.1	14.1	15.1	16.1	17.1	17.1	17.1	17.1	18.1	17.1	17.1
145°	10.1	12.1	13.1	14.1	15.1	15.1	15.1	15.1	15.1	15.1	15.1
147.5°	8.1	9.1	11.1	12.1	12.1	13.1	13.1	13.1	13.1	13.1	13.1
150°	7.1	7.1	9.1	10.1	11.1	11.1	11.1	11.1	11.1	11.1	11.1
152.5°	5.0	6.0	7.1	8.1	9.1	9.1	9.1	9.1	9.1	9.1	9.1
155°	5.0	5.0	6.0	6.0	7.1	7.1	7.1	7.1	8.1	7.1	7.1
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1942.9	1941.9	1945.9	1941.9	1921.8	1929.8	1926.8	1937.9	1938.9	1941.9	1952.0
5°	1932.8	1932.8	1937.9	1933.8	1914.7	1922.8	1921.8	1932.8	1934.9	1936.9	1948.0
7.5°	1912.7	1913.7	1920.7	1917.7	1897.6	1909.7	1908.7	1921.8	1925.8	1929.8	1939.9
10°	1893.5	1892.5	1900.6	1897.6	1878.4	1892.5	1891.5	1904.6	1910.7	1917.7	1929.8
12.5°	1883.5	1880.4	1883.5	1880.4	1859.3	1870.4	1871.4	1886.5	1893.5	1902.6	1916.7
15°	1883.5	1878.4	1878.4	1872.4	1848.2	1855.2	1856.2	1866.3	1875.4	1884.5	1901.6
17.5°	1881.4	1876.4	1875.4	1870.4	1844.2	1844.2	1843.1	1850.2	1855.2	1864.3	1882.5
20°	1870.4	1868.3	1867.3	1864.3	1840.1	1836.1	1834.1	1834.1	1837.1	1840.1	1858.3
22.5°	1841.1	1843.1	1845.2	1847.2	1828.0	1821.0	1822.0	1820.0	1816.9	1816.9	1832.1
25°	1786.7	1796.8	1804.9	1813.9	1802.8	1797.8	1803.8	1800.8	1795.8	1791.8	1804.9
27.5°	1700.1	1721.2	1738.3	1760.5	1761.5	1757.5	1773.6	1771.6	1770.6	1764.5	1774.6
30°	1580.1	1613.4	1636.6	1668.8	1696.0	1700.1	1727.3	1731.3	1735.3	1732.3	1742.4
32.5°	1435.0	1480.4	1519.7	1570.1	1596.3	1619.4	1657.7	1673.8	1690.0	1695.0	1706.1
35°	1276.8	1328.2	1374.6	1430.0	1471.3	1521.7	1568.0	1592.2	1628.5	1642.6	1658.7
37.5°	1126.6	1175.0	1220.4	1275.8	1342.3	1394.7	1452.1	1506.6	1555.9	1576.1	1600.3
40°	993.6	1032.9	1076.3	1124.6	1185.1	1253.6	1316.1	1391.7	1450.1	1490.4	1525.7
42.5°	892.9	912.0	949.3	992.6	1041.0	1110.5	1174.0	1258.7	1329.2	1386.6	1445.1
45°	803.2	812.2	839.4	862.6	912.0	973.5	1041.0	1123.6	1197.2	1270.8	1341.3
47.5°	726.6	737.7	750.8	764.9	800.1	851.5	910.0	984.6	1058.1	1143.8	1224.4
50°	675.2	678.2	680.2	686.3	707.4	742.7	790.1	853.6	924.1	1015.8	1101.5
52.5°	629.8	629.8	623.8	620.8	628.8	651.0	678.2	723.6	796.1	880.8	971.5
55°	581.5	572.4	570.4	560.3	562.3	572.4	585.5	620.8	680.2	752.8	840.5
57.5°	513.9	509.9	509.9	505.9	497.8	502.9	505.9	531.1	573.4	635.9	712.5
60°	436.3	434.3	439.4	440.4	433.3	436.3	435.3	450.5	480.7	531.1	594.6
62.5°	358.8	367.8	368.8	372.9	368.8	367.8	372.9	386.0	401.1	439.4	488.8
65°	301.3	306.4	307.4	312.4	310.4	310.4	314.4	324.5	333.6	359.8	398.1
67.5°	264.0	262.0	263.0	266.0	263.0	262.0	265.0	271.1	278.1	294.3	321.5
70°	234.8	232.8	232.8	232.8	228.8	225.7	226.7	228.8	231.8	240.8	258.0
72.5°	212.6	212.6	209.6	206.6	203.6	201.5	199.5	197.5	196.5	199.5	208.6
75°	192.5	193.5	192.5	189.5	185.4	181.4	177.4	173.3	168.3	166.3	167.3
77.5°	174.3	175.3	176.4	175.3	171.3	166.3	160.2	154.2	147.1	140.1	136.0
80°	158.2	160.2	161.2	160.2	157.2	153.2	146.1	139.1	129.0	119.9	109.8
82.5°	144.1	147.1	148.1	148.1	146.1	142.1	134.0	126.0	114.9	102.8	89.7
85°	133.0	135.0	137.1	137.1	136.0	132.0	124.0	114.9	103.8	89.7	75.6
87.5°	121.9	122.9	125.0	127.0	125.0	120.9	113.9	103.8	92.7	78.6	62.5
90°	110.9	111.9	113.9	115.9	114.9	110.9	104.8	95.7	83.6	68.5	52.4
92.5°	99.8	101.8	102.8	103.8	104.8	101.8	96.7	87.7	75.6	60.5	45.3
95°	91.7	91.7	93.7	94.7	95.7	92.7	88.7	79.6	68.5	54.4	39.3
97.5°	83.6	83.6	85.7	85.7	86.7	84.6	80.6	72.6	61.5	48.4	33.3
100°	75.6	76.6	77.6	78.6	78.6	77.6	73.6	65.5	55.4	43.3	29.2
102.5°	70.5	70.5	71.5	71.5	72.6	70.5	66.5	59.5	49.4	38.3	25.2
105°	65.5	65.5	66.5	66.5	65.5	63.5	59.5	53.4	44.3	33.3	22.2
107.5°	61.5	61.5	61.5	61.5	60.5	58.4	54.4	47.4	39.3	30.2	20.2
110°	58.4	57.4	57.4	56.4	55.4	52.4	48.4	42.3	35.3	26.2	17.1

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
112.5°	55.4	54.4	53.4	52.4	50.4	47.4	43.3	38.3	31.2	23.2	15.1
115°	52.4	51.4	50.4	48.4	46.4	43.3	39.3	34.3	27.2	20.2	13.1
117.5°	49.4	48.4	46.4	44.3	42.3	39.3	35.3	30.2	24.2	18.1	12.1
120°	45.3	44.3	43.3	41.3	39.3	35.3	31.2	27.2	21.2	16.1	10.1
122.5°	42.3	41.3	39.3	38.3	35.3	32.2	28.2	24.2	19.1	14.1	9.1
125°	38.3	37.3	36.3	34.3	32.2	28.2	25.2	21.2	17.1	12.1	7.1
127.5°	35.3	34.3	32.2	30.2	28.2	25.2	22.2	19.1	15.1	10.1	7.1
130°	31.2	30.2	29.2	27.2	25.2	22.2	20.2	16.1	13.1	9.1	6.0
132.5°	27.2	27.2	26.2	24.2	22.2	20.2	17.1	14.1	11.1	8.1	5.0
135°	25.2	24.2	23.2	21.2	20.2	17.1	15.1	12.1	9.1	7.1	4.0
137.5°	22.2	21.2	20.2	19.1	17.1	15.1	13.1	10.1	8.1	6.0	4.0
140°	19.1	18.1	18.1	16.1	15.1	13.1	11.1	9.1	7.1	5.0	3.0
142.5°	17.1	16.1	15.1	14.1	13.1	11.1	9.1	7.1	6.0	4.0	3.0
145°	15.1	14.1	13.1	12.1	11.1	9.1	8.1	6.0	5.0	4.0	3.0
147.5°	12.1	12.1	11.1	10.1	9.1	8.1	7.1	6.0	4.0	3.0	2.0
150°	10.1	10.1	9.1	8.1	8.1	7.1	6.0	5.0	4.0	3.0	2.0
152.5°	9.1	8.1	8.1	7.1	7.1	6.0	5.0	4.0	3.0	3.0	2.0
155°	7.1	7.1	7.1	6.0	6.0	5.0	4.0	4.0	3.0	2.0	2.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1954.0	1941.9	1952.0	1970.1	1968.1	1966.1	1964.1	1968.1	1981.2	1974.2	1963.1
5°	1951.0	1938.9	1950.0	1967.1	1966.1	1963.1	1961.1	1965.1	1978.2	1971.1	1959.0
7.5°	1944.9	1933.8	1941.9	1959.0	1959.0	1957.0	1955.0	1959.0	1971.1	1965.1	1953.0
10°	1934.9	1926.8	1934.9	1951.0	1952.0	1948.0	1945.9	1951.0	1963.1	1960.0	1950.0
12.5°	1926.8	1918.7	1927.8	1943.9	1944.9	1940.9	1937.9	1943.9	1960.0	1962.1	1959.0
15°	1915.7	1908.7	1919.7	1936.9	1936.9	1933.8	1933.8	1941.9	1964.1	1973.1	1978.2
17.5°	1899.6	1894.5	1907.6	1924.8	1925.8	1923.8	1924.8	1940.9	1970.1	1992.3	2006.4
20°	1879.4	1877.4	1891.5	1909.7	1912.7	1913.7	1918.7	1942.9	1983.2	2013.5	2027.6
22.5°	1855.2	1856.2	1872.4	1891.5	1895.6	1898.6	1908.7	1942.9	1993.3	2025.5	2031.6
25°	1828.0	1831.1	1848.2	1871.4	1876.4	1882.5	1899.6	1943.9	1996.3	2017.5	2007.4
27.5°	1798.8	1804.9	1827.0	1851.2	1857.3	1867.3	1889.5	1937.9	1982.2	1983.2	1945.9
30°	1768.6	1775.6	1801.8	1830.0	1840.1	1850.2	1877.4	1923.8	1948.0	1915.7	1850.2
32.5°	1734.3	1744.4	1770.6	1804.9	1816.9	1830.0	1857.3	1896.6	1887.5	1818.0	1724.2
35°	1691.0	1705.1	1735.3	1775.6	1786.7	1803.8	1823.0	1832.1	1791.8	1693.0	1587.2
37.5°	1637.6	1658.7	1694.0	1740.4	1752.5	1763.5	1768.6	1743.4	1662.8	1555.9	1446.1
40°	1576.1	1608.3	1646.6	1698.0	1710.1	1710.1	1692.0	1638.6	1536.8	1396.7	1274.8
42.5°	1501.5	1540.8	1589.2	1640.6	1652.7	1638.6	1595.2	1501.5	1385.6	1229.4	1100.4
45°	1410.8	1463.2	1517.7	1571.1	1577.1	1545.9	1468.3	1349.4	1206.3	1061.1	938.2
47.5°	1303.0	1371.5	1431.0	1491.4	1483.4	1431.0	1327.2	1192.2	1041.0	903.9	805.2
50°	1182.1	1262.7	1329.2	1386.6	1369.5	1297.0	1175.0	1033.9	883.8	766.9	685.3
52.5°	1053.1	1145.8	1212.3	1258.7	1235.5	1148.8	1014.8	879.8	756.8	650.0	595.6
55°	919.1	1012.8	1081.3	1117.6	1087.3	993.6	861.6	738.7	622.8	553.2	521.0
57.5°	789.1	876.7	941.2	970.4	932.2	838.4	716.5	612.7	529.1	470.6	454.5
60°	664.1	735.6	797.1	819.3	778.0	691.3	586.5	503.9	442.4	402.1	394.0
62.5°	548.2	606.7	655.0	672.2	631.9	564.3	473.6	412.2	368.8	348.7	338.6
65°	452.5	486.7	536.1	533.1	508.9	446.4	379.9	336.6	308.4	295.3	289.2
67.5°	355.7	387.0	418.2	422.2	392.0	348.7	305.3	274.1	259.0	251.9	248.9
70°	275.1	298.3	317.4	312.4	296.3	269.1	241.9	224.7	218.7	215.7	215.7
72.5°	213.6	225.7	234.8	228.8	218.7	204.6	191.5	184.4	185.4	187.4	189.5
75°	165.3	168.3	170.3	164.3	162.2	153.2	152.2	153.2	159.2	165.3	168.3
77.5°	127.0	122.9	119.9	113.9	114.9	113.9	118.9	127.0	136.0	145.1	153.2
80°	97.8	88.7	81.6	75.6	78.6	83.6	93.7	105.8	117.9	128.0	138.1
82.5°	75.6	62.5	52.4	46.4	52.4	60.5	73.6	88.7	102.8	113.9	125.0
85°	58.4	43.3	31.2	25.2	31.2	43.3	57.4	74.6	89.7	101.8	112.9
87.5°	45.3	31.2	17.1	10.1	17.1	30.2	46.4	62.5	77.6	91.7	102.8
90°	36.3	21.2	8.1	2.0	9.1	21.2	36.3	52.4	67.5	82.6	93.7
92.5°	29.2	15.1	4.0	0.0	5.0	16.1	30.2	45.3	60.5	74.6	85.7
95°	24.2	12.1	3.0	0.0	4.0	12.1	24.2	39.3	53.4	67.5	76.6
97.5°	20.2	9.1	2.0	0.0	2.0	10.1	20.2	33.3	47.4	60.5	69.5
100°	17.1	8.1	2.0	0.0	2.0	8.1	17.1	29.2	41.3	53.4	62.5
102.5°	14.1	6.0	1.0	1.0	1.0	6.0	15.1	25.2	36.3	47.4	56.4
105°	13.1	5.0	1.0	1.0	1.0	5.0	13.1	22.2	32.2	42.3	50.4
107.5°	11.1	4.0	1.0	1.0	1.0	4.0	11.1	19.1	29.2	38.3	45.3
110°	9.1	4.0	1.0	1.0	1.0	4.0	9.1	17.1	25.2	33.3	40.3

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°	185°	190°	195°	200°	205°	210°	215°
112.5°	8.1	3.0	1.0	1.0	1.0	3.0	8.1	15.1	22.2	30.2	36.3
115°	7.1	3.0	1.0	1.0	1.0	3.0	7.1	13.1	19.1	26.2	32.2
117.5°	6.0	3.0	1.0	1.0	1.0	2.0	6.0	11.1	17.1	23.2	29.2
120°	5.0	2.0	1.0	1.0	1.0	2.0	5.0	10.1	15.1	20.2	25.2
122.5°	5.0	2.0	1.0	1.0	1.0	2.0	4.0	8.1	13.1	17.1	22.2
125°	4.0	2.0	1.0	1.0	1.0	1.0	4.0	7.1	11.1	15.1	19.1
127.5°	4.0	2.0	1.0	1.0	1.0	1.0	3.0	6.0	9.1	13.1	17.1
130°	3.0	2.0	1.0	1.0	1.0	1.0	2.0	5.0	8.1	11.1	14.1
132.5°	3.0	2.0	1.0	1.0	1.0	1.0	2.0	4.0	6.0	9.1	12.1
135°	3.0	1.0	1.0	1.0	1.0	1.0	1.0	3.0	5.0	7.1	9.1
137.5°	2.0	1.0	1.0	1.0	1.0	1.0	1.0	2.0	4.0	5.0	8.1
140°	2.0	1.0	1.0	1.0	1.0	1.0	1.0	2.0	3.0	4.0	6.0
142.5°	2.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	2.0	3.0	5.0
145°	2.0	1.0	1.0	2.0	2.0	1.0	1.0	2.0	2.0	3.0	4.0
147.5°	2.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	2.0	2.0	3.0
150°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	3.0
152.5°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
155°	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0	2.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1961.1	1937.9	1950.0	1945.9	1950.0	1960.0	1959.0	1956.0	1958.0	1953.0	1948.0
5°	1957.0	1933.8	1945.9	1940.9	1945.9	1956.0	1954.0	1951.0	1954.0	1948.0	1942.9
7.5°	1952.0	1930.8	1944.9	1943.9	1953.0	1966.1	1967.1	1967.1	1974.2	1965.1	1961.1
10°	1952.0	1940.9	1960.0	1967.1	1990.3	2007.4	2009.4	2013.5	2025.5	2023.5	2013.5
12.5°	1973.1	1971.1	1999.3	2016.5	2037.6	2061.8	2074.9	2079.0	2087.0	2081.0	2076.9
15°	2000.4	2010.4	2041.7	2060.8	2084.0	2102.1	2105.2	2107.2	2113.2	2104.2	2097.1
17.5°	2036.6	2042.7	2067.9	2075.9	2091.1	2094.1	2090.0	2080.0	2080.0	2059.8	2053.8
20°	2053.8	2050.7	2060.8	2047.7	2041.7	2023.5	2006.4	1987.3	1986.2	1965.1	1963.1
22.5°	2038.6	2018.5	1997.3	1965.1	1951.0	1924.8	1901.6	1890.5	1883.5	1856.2	1849.2
25°	1985.2	1935.9	1904.6	1866.3	1832.1	1801.8	1779.7	1756.5	1734.3	1712.1	1702.1
27.5°	1892.5	1846.2	1795.8	1742.4	1695.0	1648.7	1611.4	1588.2	1567.0	1537.8	1522.7
30°	1778.7	1714.2	1658.7	1607.3	1529.7	1473.3	1442.1	1395.7	1379.6	1366.5	1338.3
32.5°	1644.6	1567.0	1491.4	1421.9	1342.3	1289.9	1248.6	1214.3	1204.2	1170.0	1161.9
35°	1496.5	1394.7	1309.0	1240.5	1183.1	1119.6	1085.3	1062.2	1042.0	1018.8	1014.8
37.5°	1322.1	1230.4	1133.7	1073.2	1027.9	973.5	947.3	931.1	922.1	904.9	901.9
40°	1146.8	1055.1	988.6	928.1	899.9	870.7	851.5	844.5	840.5	834.4	828.4
42.5°	987.6	907.0	859.6	819.3	807.2	793.1	788.0	792.1	788.0	786.0	785.0
45°	852.5	791.1	757.8	745.7	742.7	738.7	742.7	749.8	750.8	748.7	748.7
47.5°	729.6	700.4	686.3	688.3	693.3	696.3	703.4	712.5	714.5	709.4	711.5
50°	649.0	631.9	628.8	636.9	648.0	652.0	660.1	667.1	666.1	664.1	662.1
52.5°	573.4	568.4	576.4	584.5	596.6	598.6	601.6	604.6	603.6	599.6	597.6
55°	509.9	513.9	521.0	524.0	533.1	532.1	533.1	533.1	529.1	527.0	524.0
57.5°	452.5	453.5	457.5	458.5	463.6	461.5	460.5	458.5	452.5	451.5	448.4
60°	394.0	392.0	401.1	394.0	398.1	394.0	393.0	388.0	381.9	380.9	378.9
62.5°	338.6	334.6	340.6	337.6	339.6	335.6	333.6	327.5	322.5	321.5	320.5
65°	289.2	287.2	293.3	292.2	294.3	289.2	287.2	283.2	279.1	278.1	277.1
67.5°	247.9	252.9	256.0	256.0	258.0	257.0	251.9	250.9	249.9	245.9	245.9
70°	217.7	220.7	226.7	227.7	226.7	228.8	224.7	223.7	222.7	220.7	219.7
72.5°	193.5	197.5	203.6	204.6	203.6	203.6	201.5	200.5	200.5	197.5	197.5
75°	174.3	179.4	184.4	184.4	184.4	182.4	180.4	180.4	178.4	177.4	175.3
77.5°	158.2	164.3	168.3	167.3	166.3	164.3	164.3	161.2	158.2	158.2	156.2
80°	146.1	150.2	153.2	152.2	151.2	148.1	147.1	144.1	142.1	139.1	139.1
82.5°	133.0	138.1	140.1	139.1	137.1	134.0	133.0	131.0	129.0	128.0	126.0
85°	121.9	127.0	128.0	126.0	124.0	121.9	120.9	119.9	118.9	116.9	116.9
87.5°	110.9	115.9	115.9	114.9	112.9	111.9	110.9	109.8	108.8	107.8	106.8
90°	101.8	105.8	105.8	104.8	103.8	102.8	101.8	100.8	99.8	98.8	98.8
92.5°	92.7	96.7	96.7	95.7	94.7	93.7	93.7	92.7	91.7	90.7	89.7
95°	84.6	88.7	88.7	88.7	87.7	86.7	86.7	85.7	84.6	84.6	83.6
97.5°	76.6	80.6	80.6	80.6	79.6	78.6	78.6	77.6	77.6	77.6	76.6
100°	69.5	72.6	73.6	73.6	72.6	72.6	72.6	71.5	71.5	71.5	70.5
102.5°	62.5	65.5	67.5	67.5	67.5	66.5	66.5	66.5	66.5	66.5	65.5
105°	56.4	59.5	61.5	62.5	62.5	62.5	62.5	62.5	62.5	62.5	62.5
107.5°	51.4	54.4	56.4	57.4	58.4	58.4	59.5	59.5	59.5	59.5	59.5
110°	46.4	49.4	52.4	53.4	54.4	55.4	55.4	56.4	55.4	55.4	55.4

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	220°	225°	230°	235°	240°	245°	250°	255°	260°	265°	270°
112.5°	41.3	45.3	47.4	49.4	50.4	51.4	52.4	52.4	52.4	52.4	52.4
115°	37.3	41.3	43.3	45.3	47.4	48.4	48.4	49.4	49.4	49.4	48.4
117.5°	33.3	37.3	39.3	41.3	42.3	44.3	45.3	45.3	45.3	45.3	44.3
120°	30.2	33.3	35.3	37.3	39.3	40.3	41.3	41.3	41.3	41.3	41.3
122.5°	26.2	29.2	32.2	34.3	35.3	36.3	37.3	37.3	37.3	37.3	37.3
125°	23.2	26.2	28.2	30.2	31.2	33.3	33.3	33.3	33.3	33.3	33.3
127.5°	20.2	23.2	25.2	27.2	28.2	29.2	30.2	30.2	30.2	30.2	30.2
130°	17.1	20.2	22.2	24.2	25.2	26.2	26.2	27.2	27.2	27.2	27.2
132.5°	15.1	17.1	19.1	21.2	22.2	23.2	23.2	24.2	24.2	24.2	24.2
135°	12.1	15.1	16.1	18.1	19.1	20.2	20.2	21.2	21.2	21.2	21.2
137.5°	10.1	12.1	14.1	16.1	17.1	17.1	18.1	18.1	19.1	19.1	19.1
140°	8.1	9.1	12.1	13.1	14.1	15.1	16.1	16.1	16.1	16.1	16.1
142.5°	6.0	8.1	9.1	11.1	12.1	13.1	14.1	14.1	14.1	14.1	14.1
145°	5.0	6.0	7.1	9.1	10.1	11.1	12.1	12.1	12.1	12.1	12.1
147.5°	4.0	5.0	6.0	7.1	8.1	9.1	10.1	10.1	10.1	10.1	10.1
150°	3.0	4.0	5.0	5.0	6.0	7.1	8.1	9.1	9.1	9.1	9.1
152.5°	3.0	3.0	4.0	4.0	5.0	6.0	7.1	7.1	7.1	7.1	7.1
155°	2.0	3.0	3.0	3.0	4.0	4.0	5.0	6.0	6.0	6.0	6.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1951.0	1955.0	1953.0	1950.0	1949.0	1954.0	1949.0	1925.8	1934.9	1935.9	1942.9
5°	1948.0	1951.0	1949.0	1946.9	1943.9	1950.0	1943.9	1919.7	1928.8	1929.8	1936.9
7.5°	1968.1	1969.1	1969.1	1964.1	1956.0	1959.0	1951.0	1923.8	1928.8	1928.8	1933.8
10°	2018.5	2020.5	2023.5	2010.4	2000.4	1992.3	1981.2	1948.0	1946.9	1938.9	1938.9
12.5°	2084.0	2079.0	2073.9	2067.9	2059.8	2049.7	2033.6	1994.3	1981.2	1968.1	1955.0
15°	2103.1	2101.1	2100.1	2097.1	2092.1	2089.0	2076.9	2037.6	2018.5	2002.4	1979.2
17.5°	2052.8	2056.8	2069.9	2070.9	2076.9	2089.0	2087.0	2059.8	2042.7	2035.6	2007.4
20°	1962.1	1963.1	1979.2	1986.2	2012.4	2032.6	2047.7	2044.7	2040.7	2048.7	2027.6
22.5°	1853.2	1860.3	1877.4	1888.5	1913.7	1936.9	1961.1	1974.2	1995.3	2028.6	2024.5
25°	1705.1	1714.2	1738.3	1756.5	1791.8	1827.0	1859.3	1882.5	1907.6	1971.1	1992.3
27.5°	1527.7	1541.8	1573.1	1591.2	1640.6	1676.9	1723.2	1768.6	1803.8	1876.4	1919.7
30°	1341.3	1353.4	1386.6	1411.8	1454.2	1503.5	1562.0	1626.5	1684.9	1758.5	1812.9
32.5°	1167.0	1180.1	1207.3	1229.4	1276.8	1318.1	1382.6	1462.2	1516.6	1618.4	1691.0
35°	1014.8	1026.9	1046.0	1065.2	1104.5	1146.8	1202.2	1279.8	1349.4	1455.2	1546.9
37.5°	908.0	910.0	921.1	932.2	961.4	993.6	1037.0	1105.5	1170.0	1283.9	1384.6
40°	831.4	831.4	837.4	840.5	853.6	872.7	899.9	953.3	1006.7	1093.4	1216.3
42.5°	784.0	782.0	782.0	783.0	782.0	791.1	807.2	832.4	879.8	951.3	1047.0
45°	748.7	744.7	741.7	734.6	730.6	730.6	731.6	740.7	767.9	814.3	891.8
47.5°	709.4	708.4	703.4	695.3	688.3	683.2	675.2	672.2	680.2	706.4	758.8
50°	664.1	659.1	654.0	648.0	639.9	634.9	619.8	620.8	613.7	625.8	653.0
52.5°	597.6	593.6	591.5	586.5	583.5	581.5	569.4	557.3	554.3	556.3	566.3
55°	524.0	526.0	518.0	522.0	521.0	511.9	506.9	497.8	494.8	493.8	498.8
57.5°	447.4	449.5	444.4	448.4	448.4	443.4	440.4	440.4	433.3	427.3	434.3
60°	377.9	373.9	376.9	381.9	381.9	378.9	376.9	376.9	371.9	369.8	374.9
62.5°	321.5	317.4	320.5	325.5	326.5	324.5	322.5	322.5	316.4	316.4	320.5
65°	278.1	279.1	278.1	282.2	282.2	283.2	281.2	279.1	272.1	275.1	274.1
67.5°	246.9	245.9	245.9	249.9	248.9	250.9	248.9	245.9	240.8	236.8	235.8
70°	220.7	219.7	219.7	221.7	222.7	222.7	221.7	219.7	212.6	208.6	205.6
72.5°	197.5	196.5	197.5	198.5	199.5	200.5	199.5	197.5	191.5	186.4	181.4
75°	176.4	175.3	178.4	178.4	179.4	179.4	180.4	179.4	174.3	168.3	162.2
77.5°	155.2	156.2	159.2	160.2	162.2	163.3	164.3	164.3	159.2	154.2	146.1
80°	138.1	140.1	142.1	143.1	145.1	148.1	149.1	150.2	146.1	141.1	132.0
82.5°	126.0	127.0	129.0	130.0	133.0	134.0	135.0	137.1	135.0	130.0	119.9
85°	115.9	116.9	118.9	118.9	120.9	122.9	124.0	125.0	124.0	118.9	108.8
87.5°	106.8	107.8	108.8	109.8	110.9	111.9	112.9	113.9	112.9	107.8	98.8
90°	98.8	98.8	99.8	99.8	100.8	101.8	103.8	103.8	102.8	98.8	89.7
92.5°	89.7	90.7	90.7	91.7	92.7	93.7	94.7	94.7	93.7	89.7	81.6
95°	83.6	83.6	84.6	84.6	85.7	85.7	86.7	86.7	85.7	81.6	73.6
97.5°	76.6	76.6	76.6	76.6	77.6	77.6	78.6	78.6	77.6	73.6	66.5
100°	70.5	70.5	70.5	70.5	70.5	71.5	71.5	71.5	70.5	66.5	59.5
102.5°	65.5	65.5	65.5	65.5	65.5	65.5	65.5	65.5	63.5	60.5	53.4
105°	62.5	62.5	62.5	61.5	61.5	61.5	60.5	60.5	57.4	54.4	48.4
107.5°	58.4	58.4	58.4	57.4	57.4	56.4	55.4	55.4	52.4	49.4	43.3
110°	55.4	55.4	55.4	54.4	53.4	52.4	51.4	50.4	47.4	43.3	38.3

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	275°	280°	285°	290°	295°	300°	305°	310°	315°	320°	325°
112.5°	52.4	52.4	51.4	51.4	50.4	49.4	47.4	46.4	43.3	39.3	34.3
115°	48.4	48.4	48.4	47.4	46.4	45.3	44.3	42.3	39.3	35.3	30.2
117.5°	44.3	44.3	44.3	43.3	42.3	41.3	40.3	38.3	35.3	31.2	27.2
120°	40.3	40.3	40.3	39.3	38.3	37.3	36.3	34.3	31.2	28.2	23.2
122.5°	37.3	37.3	36.3	35.3	34.3	33.3	32.2	30.2	28.2	24.2	20.2
125°	33.3	33.3	32.2	32.2	31.2	30.2	29.2	27.2	24.2	21.2	18.1
127.5°	30.2	29.2	29.2	29.2	28.2	27.2	25.2	24.2	21.2	18.1	15.1
130°	26.2	26.2	26.2	25.2	25.2	24.2	22.2	20.2	18.1	16.1	13.1
132.5°	23.2	23.2	23.2	23.2	22.2	21.2	19.1	18.1	16.1	13.1	11.1
135°	21.2	21.2	20.2	20.2	19.1	18.1	17.1	15.1	13.1	11.1	9.1
137.5°	18.1	18.1	18.1	17.1	17.1	16.1	14.1	13.1	12.1	10.1	8.1
140°	16.1	16.1	15.1	15.1	14.1	14.1	13.1	11.1	10.1	8.1	7.1
142.5°	14.1	14.1	13.1	13.1	12.1	12.1	11.1	10.1	8.1	7.1	5.0
145°	12.1	12.1	11.1	11.1	11.1	10.1	9.1	8.1	7.1	6.0	5.0
147.5°	10.1	10.1	10.1	9.1	9.1	8.1	8.1	7.1	6.0	5.0	4.0
150°	9.1	9.1	8.1	8.1	8.1	7.1	6.0	6.0	5.0	4.0	3.0
152.5°	7.1	7.1	7.1	7.1	6.0	6.0	5.0	5.0	4.0	3.0	3.0
155°	6.0	6.0	6.0	5.0	5.0	5.0	4.0	4.0	3.0	3.0	2.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
0°	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0	1951.0
2.5°	1939.9	1938.9	1948.0	1946.9	1934.9	1953.0	1965.1
5°	1934.9	1933.8	1941.9	1943.9	1930.8	1950.0	1963.1
7.5°	1930.8	1929.8	1938.9	1941.9	1928.8	1945.9	1960.0
10°	1931.8	1926.8	1934.9	1936.9	1924.8	1942.9	1955.0
12.5°	1938.9	1926.8	1929.8	1929.8	1918.7	1934.9	1948.0
15°	1956.0	1930.8	1926.8	1923.8	1909.7	1924.8	1937.9
17.5°	1975.2	1940.9	1926.8	1916.7	1899.6	1912.7	1926.8
20°	1994.3	1952.0	1928.8	1912.7	1889.5	1901.6	1911.7
22.5°	2003.4	1962.1	1930.8	1906.6	1877.4	1883.5	1894.5
25°	1991.3	1958.0	1926.8	1897.6	1862.3	1863.3	1872.4
27.5°	1946.9	1937.9	1917.7	1888.5	1850.2	1845.2	1852.2
30°	1871.4	1896.6	1897.6	1876.4	1836.1	1826.0	1829.0
32.5°	1765.6	1822.0	1855.2	1851.2	1815.9	1801.8	1803.8
35°	1643.6	1714.2	1786.7	1810.9	1785.7	1774.6	1770.6
37.5°	1497.5	1592.2	1689.0	1748.4	1744.4	1737.3	1733.3
40°	1336.3	1450.1	1565.0	1659.7	1689.0	1689.0	1691.0
42.5°	1163.9	1297.0	1422.9	1542.8	1611.4	1626.5	1632.5
45°	997.7	1131.7	1268.7	1406.8	1498.5	1545.9	1563.0
47.5°	846.5	981.5	1111.5	1262.7	1384.6	1446.1	1473.3
50°	717.5	818.3	955.3	1105.5	1238.5	1314.1	1367.5
52.5°	610.7	689.3	809.2	949.3	1083.3	1187.1	1236.5
55°	521.0	574.4	676.2	797.1	925.1	1032.9	1090.4
57.5°	445.4	487.7	557.3	658.1	765.9	872.7	934.2
60°	378.9	408.1	455.5	535.1	626.8	718.5	778.0
62.5°	321.5	340.6	371.9	430.3	501.9	573.4	628.8
65°	277.1	285.2	302.3	338.6	393.0	447.4	494.8
67.5°	233.8	238.8	251.9	274.1	301.3	340.6	371.9
70°	201.5	201.5	202.6	215.7	229.8	255.0	277.1
72.5°	175.3	172.3	166.3	169.3	172.3	186.4	200.5
75°	154.2	147.1	137.1	133.0	131.0	133.0	141.1
77.5°	136.0	126.0	113.9	103.8	95.7	92.7	99.8
80°	120.9	108.8	94.7	81.6	68.5	61.5	64.5
82.5°	108.8	93.7	78.6	63.5	48.4	38.3	38.3
85°	95.7	81.6	65.5	49.4	34.3	21.2	19.1
87.5°	86.7	71.5	54.4	39.3	24.2	11.1	6.0
90°	77.6	62.5	46.4	31.2	17.1	5.0	0.0
92.5°	69.5	55.4	40.3	25.2	12.1	3.0	0.0
95°	62.5	49.4	34.3	21.2	10.1	2.0	1.0
97.5°	55.4	43.3	30.2	17.1	7.1	2.0	1.0
100°	50.4	38.3	26.2	14.1	6.0	1.0	1.0
102.5°	44.3	34.3	22.2	12.1	5.0	1.0	1.0
105°	39.3	30.2	19.1	10.1	4.0	1.0	1.0
107.5°	35.3	26.2	17.1	9.1	4.0	1.0	1.0
110°	31.2	23.2	15.1	8.1	3.0	1.0	1.0



TEST NUMBER: P1213819

CATALOG NUMBER: 4SNLED-LD5-55HL-LC-UNV-L940-CD1-U

CANDELA DISTRIBUTION (continued):

	330°	335°	340°	345°	350°	355°	360°
112.5°	28.2	20.2	13.1	7.1	2.0	1.0	1.0
115°	24.2	18.1	11.1	6.0	2.0	1.0	1.0
117.5°	21.2	15.1	10.1	5.0	2.0	1.0	1.0
120°	18.1	13.1	8.1	4.0	1.0	1.0	1.0
122.5°	16.1	11.1	7.1	4.0	1.0	1.0	1.0
125°	14.1	10.1	6.0	3.0	1.0	1.0	1.0
127.5°	12.1	8.1	5.0	2.0	1.0	1.0	1.0
130°	10.1	7.1	4.0	2.0	1.0	1.0	1.0
132.5°	8.1	6.0	4.0	2.0	1.0	1.0	1.0
135°	7.1	5.0	3.0	2.0	1.0	1.0	1.0
137.5°	6.0	4.0	2.0	2.0	2.0	1.0	1.0
140°	5.0	3.0	2.0	2.0	2.0	2.0	1.0
142.5°	4.0	3.0	2.0	2.0	2.0	2.0	1.0
145°	3.0	2.0	2.0	2.0	2.0	2.0	1.0
147.5°	3.0	2.0	2.0	2.0	2.0	2.0	1.0
150°	2.0	2.0	2.0	2.0	2.0	2.0	2.0
152.5°	2.0	2.0	2.0	2.0	2.0	2.0	2.0
155°	2.0	2.0	2.0	2.0	2.0	2.0	2.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)