

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: HALO COMMERCIAL

Report Number: P776225

Luminaire Tested: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

Issue Date: 2/13/2024

Test Information

Test Method: LM-79-2019
Report Number: P776225
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (A2312156A001)
Test Lab:
Issue Date: 2/13/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO COMMERCIAL
Catalog Number: HCDJBS3040CSD-HCD42TRMW-3000lm-2700K
Description: 4 INCH ROUND NARROW MATTE WHITE TRIM
Light Source: SELECTABLE LUMENS AND CCT ARRAY 90CRI / 2700K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2862.0 lumens
Efficiency: N/A
Efficacy: 100.4 lumens/watt
Spacing Criteria (0/90/45): 0.96 / 0.97 / 0.95
Luminous Opening: Circular (Dia: 0.33' x H: 0')
CIE Type: Direct

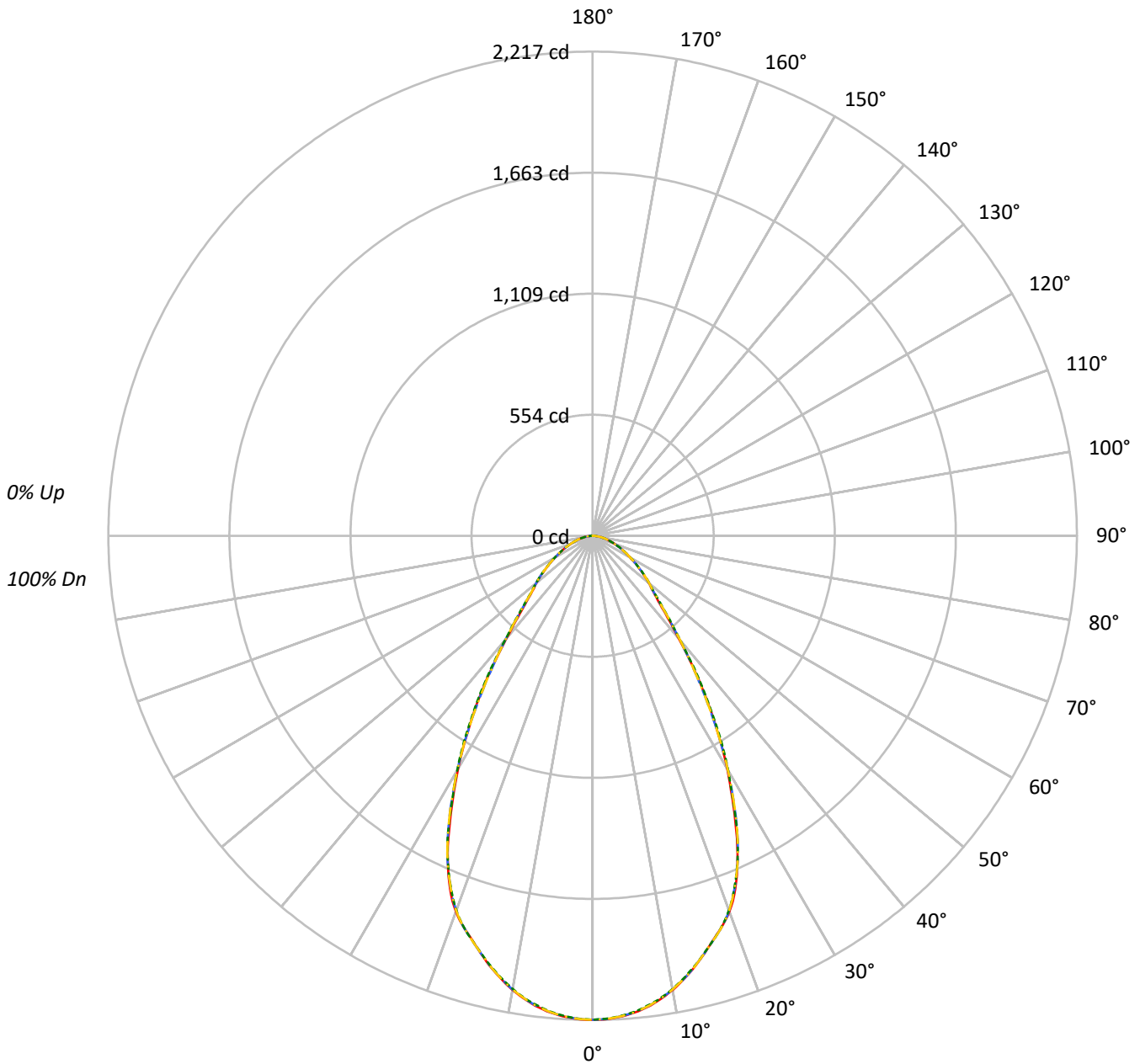
Input Watts (W): 28.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	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	89								
2	104	98	93	88	102	96	91	87	93	89	85	90	86	83	87	84	82	80								
3	97	89	83	78	95	88	82	77	85	80	76	82	78	74	80	76	73	71								
4	91	81	74	69	89	80	74	69	78	72	68	76	71	67	74	70	66	64								
5	85	75	68	62	83	74	67	62	72	66	61	70	65	61	68	64	60	58								
6	80	69	62	57	78	68	61	56	67	60	56	65	60	55	64	59	55	53								
7	75	64	57	52	74	63	56	52	62	56	51	61	55	51	59	54	51	49								
8	71	60	52	48	70	59	52	47	58	52	47	57	51	47	56	51	47	45								
9	67	56	49	44	66	55	48	44	54	48	44	53	48	44	52	47	43	42								
10	63	52	45	41	62	52	45	41	51	45	41	50	44	41	49	44	40	39								

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	278933	278933	278933	278933
5°	276967	276361	276967	276361
10°	269818	269205	269818	269205
15°	257882	257569	257882	257569
20°	245206	244322	245206	244322
25°	217635	218329	217635	218329
30°	179047	180006	179047	180006
35°	138901	140406	138901	140406
40°	100888	102645	100888	102645
45°	76388	78293	76388	78293
50°	65785	66313	65785	66313
55°	57179	57837	57179	57837
60°	49988	50441	49988	50441
65°	43923	44281	43923	44281
70°	38783	39004	38783	39004
75°	34086	34086	34086	34086
80°	29497	29279	29497	29279
85°	23537	23537	23537	23537

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 78293 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	206.5	7.2
10°-20°	556.0	19.4
20°-30°	712.0	24.9
30°-40°	564.2	19.7
40°-50°	345.5	12.1
50°-60°	236.2	8.3
60°-70°	147.8	5.2
70°-80°	74.9	2.6
80°-90°	18.9	0.7
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°	1474.5	51.5
0°-40°	2038.7	71.2
0°-60°	2620.3	91.6
0°-90°	2862.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2862.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	2216	2216	2216	2216	2216	
5°	2192	2188	2192	2188	2192	207
15°	1979	1977	1979	1977	1979	556
25°	1567	1572	1567	1572	1567	710
35°	904	914	904	914	904	563
45°	429	440	429	440	429	341
55°	261	264	261	264	261	235
65°	148	149	148	149	148	147
75°	70	70	70	70	70	75
85°	16	16	16	16	16	19
90°	0	1	0	1	0	



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CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4
0.5°	2216.7	2216.4	2215.8	2215.5	2214.7	2215.5	2215.8	2216.4	2216.7	2216.4	2215.8
1°	2215.8	2215.5	2215.3	2215.0	2213.8	2215.0	2215.3	2215.5	2215.8	2215.5	2215.3
1.5°	2214.7	2214.1	2214.1	2213.5	2212.6	2213.5	2214.1	2214.1	2214.7	2214.1	2214.1
2°	2212.9	2212.6	2212.0	2211.7	2210.5	2211.7	2212.0	2212.6	2212.9	2212.6	2212.0
2.5°	2210.8	2210.2	2209.6	2209.3	2207.8	2209.3	2209.6	2210.2	2210.8	2210.2	2209.6
3°	2207.8	2207.2	2206.6	2206.1	2204.6	2206.1	2206.6	2207.2	2207.8	2207.2	2206.6
3.5°	2204.6	2204.0	2203.1	2202.5	2201.6	2202.5	2203.1	2204.0	2204.6	2204.0	2203.1
4°	2200.7	2200.4	2199.2	2198.6	2197.1	2198.6	2199.2	2200.4	2200.7	2200.4	2199.2
4.5°	2196.6	2196.0	2194.8	2194.2	2192.4	2194.2	2194.8	2196.0	2196.6	2196.0	2194.8
5°	2192.4	2191.5	2190.3	2189.7	2187.6	2189.7	2190.3	2191.5	2192.4	2191.5	2190.3
5.5°	2187.9	2185.9	2184.4	2183.8	2182.0	2183.8	2184.4	2185.9	2187.9	2185.9	2184.4
6°	2181.1	2179.9	2178.4	2177.6	2175.2	2177.6	2178.4	2179.9	2181.1	2179.9	2178.4
6.5°	2174.3	2173.4	2171.6	2170.7	2168.4	2170.7	2171.6	2173.4	2174.3	2173.4	2171.6
7°	2167.2	2166.0	2165.1	2163.6	2161.5	2163.6	2165.1	2166.0	2167.2	2166.0	2165.1
7.5°	2159.2	2158.0	2156.8	2156.2	2154.1	2156.2	2156.8	2158.0	2159.2	2158.0	2156.8
8°	2150.5	2149.7	2148.5	2147.6	2146.4	2147.6	2148.5	2149.7	2150.5	2149.7	2148.5
8.5°	2141.6	2140.5	2139.3	2138.4	2137.2	2138.4	2139.3	2140.5	2141.6	2140.5	2139.3
9°	2132.1	2131.2	2129.8	2128.9	2127.7	2128.9	2129.8	2131.2	2132.1	2131.2	2129.8
9.5°	2121.8	2121.2	2119.7	2118.8	2117.6	2118.8	2119.7	2121.2	2121.8	2121.2	2119.7
10°	2111.4	2110.5	2109.3	2108.1	2106.6	2108.1	2109.3	2110.5	2111.4	2110.5	2109.3
10.5°	2099.8	2099.2	2097.7	2096.8	2095.6	2096.8	2097.7	2099.2	2099.8	2099.2	2097.7
11°	2088.2	2087.6	2086.4	2085.2	2083.8	2085.2	2086.4	2087.6	2088.2	2087.6	2086.4
11.5°	2076.0	2075.4	2074.3	2073.1	2071.9	2073.1	2074.3	2075.4	2076.0	2075.4	2074.3
12°	2063.6	2063.0	2062.1	2060.6	2059.4	2060.6	2062.1	2063.0	2063.6	2063.0	2062.1
12.5°	2050.5	2049.9	2049.0	2047.5	2046.1	2047.5	2049.0	2049.9	2050.5	2049.9	2049.0
13°	2037.2	2036.6	2035.7	2034.5	2033.0	2034.5	2035.7	2036.6	2037.2	2036.6	2035.7
13.5°	2023.2	2022.6	2022.0	2020.8	2019.6	2020.8	2022.0	2022.6	2023.2	2022.6	2022.0
14°	2009.0	2008.7	2008.1	2006.9	2005.7	2006.9	2008.1	2008.7	2009.0	2008.7	2008.1
14.5°	1994.1	1993.8	1993.5	1992.3	1991.1	1992.3	1993.5	1993.8	1994.1	1993.8	1993.5
15°	1979.3	1979.3	1978.7	1978.1	1976.9	1978.1	1978.7	1979.3	1979.3	1979.3	1978.7
15.5°	1963.8	1963.8	1964.4	1963.8	1963.2	1963.8	1964.4	1963.8	1963.8	1963.8	1964.4
16°	1949.0	1949.3	1950.2	1949.9	1949.3	1949.9	1950.2	1949.3	1949.0	1949.3	1950.2
16.5°	1934.2	1934.7	1935.9	1935.9	1935.6	1935.9	1935.9	1934.7	1934.2	1934.7	1935.9
17°	1920.2	1920.8	1922.0	1921.7	1922.0	1921.7	1922.0	1920.8	1920.2	1920.8	1922.0
17.5°	1906.5	1907.1	1908.0	1907.7	1907.4	1907.7	1908.0	1907.1	1906.5	1907.1	1908.0
18°	1893.2	1893.5	1894.1	1893.5	1892.9	1893.5	1894.1	1893.5	1893.2	1893.5	1894.1
18.5°	1878.9	1878.9	1878.9	1878.3	1877.5	1878.3	1878.9	1878.9	1878.9	1878.9	1878.9
19°	1864.4	1863.5	1862.9	1862.0	1861.1	1862.0	1862.9	1863.5	1864.4	1863.5	1862.9
19.5°	1848.4	1847.2	1845.4	1844.8	1843.9	1844.8	1845.4	1847.2	1848.4	1847.2	1845.4
20°	1830.9	1829.4	1826.1	1826.4	1824.3	1826.4	1826.1	1829.4	1830.9	1829.4	1826.1
20.5°	1811.6	1809.2	1805.3	1806.5	1804.1	1806.5	1805.3	1809.2	1811.6	1809.2	1805.3
21°	1791.4	1787.8	1783.4	1784.8	1781.9	1784.8	1783.4	1787.8	1791.4	1787.8	1783.4



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
22.5°	1717.5	1713.9	1710.9	1710.6	1709.2	1710.6	1710.9	1713.9	1717.5	1713.9	1710.9
23°	1689.3	1686.3	1685.7	1683.6	1683.0	1683.6	1685.7	1686.3	1689.3	1686.3	1685.7
23.5°	1660.5	1657.8	1659.3	1655.7	1657.2	1655.7	1659.3	1657.8	1660.5	1657.8	1659.3
24°	1630.5	1628.4	1632.0	1627.2	1629.9	1627.2	1632.0	1628.4	1630.5	1628.4	1632.0
24.5°	1599.6	1598.7	1603.2	1598.4	1602.0	1598.4	1603.2	1598.7	1599.6	1598.7	1603.2
25°	1567.3	1567.9	1573.2	1569.6	1572.3	1569.6	1573.2	1567.9	1567.3	1567.9	1573.2
25.5°	1533.7	1537.6	1542.3	1540.9	1541.4	1540.9	1542.3	1537.6	1533.7	1537.6	1542.3
26°	1499.3	1506.1	1510.6	1510.9	1508.5	1510.9	1510.6	1506.1	1499.3	1506.1	1510.6
26.5°	1464.0	1474.1	1477.6	1479.7	1474.4	1479.7	1477.6	1474.1	1464.0	1474.1	1477.6
27°	1429.5	1440.8	1444.4	1447.6	1439.6	1447.6	1444.4	1440.8	1429.5	1440.8	1444.4
27.5°	1395.7	1406.4	1410.5	1414.7	1404.3	1414.7	1410.5	1406.4	1395.7	1406.4	1410.5
28°	1361.9	1372.0	1376.1	1380.3	1369.0	1380.3	1376.1	1372.0	1361.9	1372.0	1376.1
28.5°	1328.9	1336.9	1341.7	1345.2	1334.9	1345.2	1341.7	1336.9	1328.9	1336.9	1341.7
29°	1296.3	1301.6	1307.2	1309.6	1302.5	1309.6	1307.2	1301.6	1296.3	1301.6	1307.2
29.5°	1264.2	1266.9	1273.1	1274.0	1270.7	1274.0	1273.1	1266.9	1264.2	1266.9	1273.1
30°	1232.1	1231.3	1238.1	1238.4	1238.7	1238.4	1238.1	1231.3	1232.1	1231.3	1238.1
30.5°	1198.9	1196.8	1203.4	1203.9	1208.4	1203.9	1203.4	1196.8	1198.9	1196.8	1203.4
31°	1166.0	1161.5	1168.3	1169.5	1176.3	1169.5	1168.3	1161.5	1166.0	1161.5	1168.3
31.5°	1132.1	1127.7	1133.3	1135.4	1144.0	1135.4	1133.3	1127.7	1132.1	1127.7	1133.3
32°	1097.7	1093.5	1098.6	1101.8	1110.7	1101.8	1098.6	1093.5	1097.7	1093.5	1098.6
32.5°	1064.4	1060.9	1064.4	1068.6	1077.5	1068.6	1064.4	1060.9	1064.4	1060.9	1064.4
33°	1030.9	1028.2	1029.4	1035.3	1043.7	1035.3	1029.4	1028.2	1030.9	1028.2	1029.4
33.5°	1000.9	995.6	994.7	1002.1	1009.5	1002.1	994.7	995.6	1000.9	995.6	994.7
34°	968.6	962.9	960.2	969.5	977.2	969.5	960.2	962.9	968.6	962.9	960.2
34.5°	936.5	930.6	926.7	936.5	945.1	936.5	926.7	930.6	936.5	930.6	926.7
35°	904.1	899.1	894.9	904.7	913.9	904.7	894.9	899.1	904.1	899.1	894.9
35.5°	872.7	867.9	863.5	873.3	883.4	873.3	863.5	867.9	872.7	867.9	863.5
36°	841.8	836.8	832.9	843.0	853.4	843.0	832.9	836.8	841.8	836.8	832.9
36.5°	811.2	806.8	803.2	813.0	822.8	813.0	803.2	806.8	811.2	806.8	803.2
37°	780.4	777.1	774.1	783.9	792.5	783.9	774.1	777.1	780.4	777.1	774.1
37.5°	750.4	748.3	746.2	756.0	762.3	756.0	746.2	748.3	750.4	748.3	746.2
38°	720.7	720.4	719.5	728.7	732.3	728.7	719.5	720.4	720.7	720.4	719.5
38.5°	692.8	693.4	694.0	702.0	703.5	702.0	694.0	693.4	692.8	693.4	694.0
39°	665.8	667.3	668.5	676.2	675.9	676.2	668.5	667.3	665.8	667.3	668.5
39.5°	639.4	642.0	644.1	650.7	649.8	650.7	644.1	642.0	639.4	642.0	644.1
40°	614.1	617.1	620.7	626.0	624.8	626.0	620.7	617.1	614.1	617.1	620.7
40.5°	590.4	593.4	598.1	602.0	601.7	602.0	598.1	593.4	590.4	593.4	598.1
41°	567.5	570.5	576.7	579.4	580.3	579.4	576.7	570.5	567.5	570.5	576.7
41.5°	545.9	549.1	556.3	557.7	560.4	557.7	556.3	549.1	545.9	549.1	556.3
42°	525.7	529.0	536.7	537.6	541.1	537.6	536.7	529.0	525.7	529.0	536.7
42.5°	506.7	510.0	518.3	518.6	522.4	518.6	518.3	510.0	506.7	510.0	518.3
43°	488.6	492.1	500.2	500.8	504.3	500.8	500.2	492.1	488.6	492.1	500.2
43.5°	472.0	475.5	483.2	483.5	486.8	483.5	483.2	475.5	472.0	475.5	483.2



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
45°	429.2	432.2	436.9	438.4	439.9	438.4	436.9	432.2	429.2	432.2	436.9
45.5°	416.8	419.1	423.6	425.1	426.2	425.1	423.6	419.1	416.8	419.1	423.6
46°	404.9	407.0	410.8	412.9	413.5	412.9	410.8	407.0	404.9	407.0	410.8
46.5°	393.9	395.7	398.6	401.0	401.6	401.0	398.6	395.7	393.9	395.7	398.6
47°	383.5	384.7	387.7	390.0	390.9	390.0	387.7	384.7	383.5	384.7	387.7
47.5°	373.7	374.6	377.3	379.9	381.1	379.9	377.3	374.6	373.7	374.6	377.3
48°	364.5	365.7	368.4	370.7	371.9	370.7	368.4	365.7	364.5	365.7	368.4
48.5°	357.1	357.7	359.8	362.1	363.0	362.1	359.8	357.7	357.1	357.7	359.8
49°	350.0	350.3	352.0	353.8	354.7	353.8	352.0	350.3	350.0	350.3	352.0
49.5°	343.1	343.4	344.6	346.1	346.4	346.1	344.6	343.4	343.1	343.4	344.6
50°	336.0	336.3	337.2	338.4	338.7	338.4	337.2	336.3	336.0	336.3	337.2
50.5°	328.9	329.2	329.8	331.0	331.0	331.0	329.8	329.2	328.9	329.2	329.8
51°	320.9	321.5	322.4	323.5	323.5	323.5	322.4	321.5	320.9	321.5	322.4
51.5°	313.2	313.5	314.6	316.1	316.4	316.1	314.6	313.5	313.2	313.5	314.6
52°	305.1	305.7	306.9	308.4	308.7	308.4	306.9	305.7	305.1	305.7	306.9
52.5°	297.1	297.7	299.2	300.4	301.0	300.4	299.2	297.7	297.1	297.7	299.2
53°	289.7	290.3	291.5	292.7	293.3	292.7	291.5	290.3	289.7	290.3	291.5
53.5°	282.0	282.6	283.8	285.3	285.8	285.3	283.8	282.6	282.0	282.6	283.8
54°	274.9	275.2	276.4	277.5	278.1	277.5	276.4	275.2	274.9	275.2	276.4
54.5°	267.7	268.0	269.2	270.4	271.0	270.4	269.2	268.0	267.7	268.0	269.2
55°	260.6	261.2	262.4	263.3	263.6	263.3	262.4	261.2	260.6	261.2	262.4
55.5°	253.8	254.4	255.6	256.5	256.8	256.5	255.6	254.4	253.8	254.4	255.6
56°	247.3	247.9	248.7	249.6	249.9	249.6	248.7	247.9	247.3	247.9	248.7
56.5°	240.7	241.3	242.2	243.1	243.4	243.1	242.2	241.3	240.7	241.3	242.2
57°	234.2	234.8	235.7	236.6	236.9	236.6	235.7	234.8	234.2	234.8	235.7
57.5°	227.7	228.6	229.5	230.0	230.6	230.0	229.5	228.6	227.7	228.6	229.5
58°	222.0	222.3	223.2	224.1	224.4	224.1	223.2	222.3	222.0	222.3	223.2
58.5°	216.1	216.4	217.3	217.9	218.2	217.9	217.3	216.4	216.1	216.4	217.3
59°	210.2	210.5	211.0	211.6	212.2	211.6	211.0	210.5	210.2	210.5	211.0
59.5°	204.2	204.5	205.1	206.0	206.3	206.0	205.1	204.5	204.2	204.5	205.1
60°	198.6	198.9	199.5	200.1	200.4	200.1	199.5	198.9	198.6	198.9	199.5
60.5°	192.9	193.2	193.8	194.4	194.7	194.4	193.8	193.2	192.9	193.2	193.8
61°	187.6	187.9	188.5	189.1	189.4	189.1	188.5	187.9	187.6	187.9	188.5
61.5°	182.3	182.6	183.1	183.7	184.0	183.7	183.1	182.6	182.3	182.6	183.1
62°	177.2	177.2	177.8	178.4	178.4	178.4	177.8	177.2	177.2	177.2	177.8
62.5°	171.9	172.2	172.5	173.1	173.3	173.1	172.5	172.2	171.9	172.2	172.5
63°	166.8	167.1	167.4	168.0	168.0	168.0	167.4	167.1	166.8	167.1	167.4
63.5°	161.8	162.1	162.4	163.0	163.3	163.0	162.4	162.1	161.8	162.1	162.4
64°	157.0	157.3	157.6	157.9	158.2	157.9	157.6	157.3	157.0	157.3	157.6
64.5°	152.3	152.6	152.9	153.2	153.5	153.2	152.9	152.6	152.3	152.6	152.9
65°	147.5	147.8	148.1	148.4	148.7	148.4	148.1	147.8	147.5	147.8	148.1
65.5°	143.1	143.1	143.4	144.0	144.0	144.0	143.4	143.1	143.1	143.1	143.4
66°	138.3	138.6	138.9	139.2	139.5	139.2	138.9	138.6	138.3	138.6	138.9



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
67.5°	125.3	125.6	125.9	126.2	126.2	126.2	125.9	125.6	125.3	125.6	125.9
68°	121.1	121.4	121.7	122.0	122.0	122.0	121.7	121.4	121.1	121.4	121.7
68.5°	117.0	117.2	117.5	117.5	117.8	117.5	117.5	117.2	117.0	117.2	117.5
69°	113.1	113.1	113.1	113.7	113.7	113.7	113.1	113.1	113.1	113.1	113.1
69.5°	108.9	109.2	109.2	109.5	109.8	109.5	109.2	109.2	108.9	109.2	109.2
70°	105.4	105.7	105.4	105.7	106.0	105.7	105.4	105.7	105.4	105.7	105.4
70.5°	101.5	101.8	101.8	101.8	102.1	101.8	101.8	101.8	101.5	101.8	101.8
71°	98.0	98.0	98.0	98.0	98.3	98.0	98.0	98.0	98.0	98.0	98.0
71.5°	94.1	94.1	94.4	94.4	94.4	94.4	94.4	94.1	94.1	94.1	94.4
72°	90.5	90.5	90.5	90.8	90.8	90.8	90.5	90.5	90.5	90.5	90.5
72.5°	87.0	87.0	87.0	87.3	87.3	87.3	87.0	87.0	87.0	87.0	87.0
73°	83.4	83.4	83.4	83.7	83.7	83.7	83.4	83.4	83.4	83.4	83.4
73.5°	79.8	79.8	80.1	80.1	80.1	80.1	80.1	79.8	79.8	79.8	80.1
74°	76.6	76.6	76.6	76.9	76.9	76.9	76.6	76.6	76.6	76.6	76.6
74.5°	73.3	73.3	73.3	73.3	73.3	73.3	73.3	73.3	73.3	73.3	73.3
75°	70.1	70.1	70.1	70.1	70.1	70.1	70.1	70.1	70.1	70.1	70.1
75.5°	66.8	66.8	66.8	66.8	67.1	66.8	66.8	66.8	66.8	66.8	66.8
76°	63.8	63.5	63.5	63.8	63.8	63.8	63.5	63.5	63.8	63.5	63.5
76.5°	60.6	60.6	60.6	60.6	60.6	60.6	60.6	60.6	60.6	60.6	60.6
77°	57.6	57.6	57.6	57.6	57.6	57.6	57.6	57.6	57.6	57.6	57.6
77.5°	54.6	54.6	54.6	54.6	54.6	54.6	54.6	54.6	54.6	54.6	54.6
78°	51.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6	51.6
78.5°	49.0	49.0	48.7	48.7	49.0	48.7	48.7	49.0	49.0	49.0	48.7
79°	46.0	46.0	46.0	46.0	46.0	46.0	46.0	46.0	46.0	46.0	46.0
79.5°	43.3	43.3	43.0	43.3	43.3	43.3	43.0	43.3	43.3	43.3	43.0
80°	40.7	40.7	40.4	40.4	40.4	40.4	40.4	40.7	40.7	40.7	40.4
80.5°	38.0	38.0	38.0	38.0	38.0	38.0	38.0	38.0	38.0	38.0	38.0
81°	35.3	35.3	35.3	35.3	35.3	35.3	35.3	35.3	35.3	35.3	35.3
81.5°	32.7	32.7	32.7	32.7	32.7	32.7	32.7	32.7	32.7	32.7	32.7
82°	30.3	30.3	30.3	30.3	30.3	30.3	30.3	30.3	30.3	30.3	30.3
82.5°	27.9	27.9	27.9	27.9	27.6	27.9	27.9	27.9	27.9	27.9	27.9
83°	25.5	25.5	25.5	25.2	25.2	25.2	25.5	25.5	25.5	25.5	25.5
83.5°	23.2	23.2	23.2	22.9	22.9	22.9	23.2	23.2	23.2	23.2	23.2
84°	20.8	20.8	20.8	20.8	20.8	20.8	20.8	20.8	20.8	20.8	20.8
84.5°	18.7	18.4	18.4	18.4	18.4	18.4	18.4	18.4	18.7	18.4	18.4
85°	16.3	16.3	16.3	16.3	16.3	16.3	16.3	16.3	16.3	16.3	16.3
85.5°	14.2	14.0	14.2	14.0	14.2	14.0	14.2	14.0	14.2	14.0	14.2
86°	11.9	11.9	11.9	11.9	11.9	11.9	11.9	11.9	11.9	11.9	11.9
86.5°	10.1	9.8	9.8	9.8	10.1	9.8	9.8	9.8	10.1	9.8	9.8
87°	8.0	8.0	8.0	7.7	8.0	7.7	8.0	8.0	8.0	8.0	8.0
87.5°	5.9	5.9	5.9	5.9	6.2	5.9	5.9	5.9	5.9	5.9	5.9
88°	3.9	4.2	4.2	4.5	4.5	4.5	4.2	4.2	3.9	4.2	4.2
88.5°	2.4	2.4	2.7	3.0	3.6	3.0	2.7	2.4	2.4	2.4	2.7



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
90°	0.0	0.0	0.3	0.6	0.9	0.6	0.3	0.0	0.0	0.0	0.3



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
0°	2216.4	2216.4	2216.4	2216.4	2216.4	2216.4
0.5°	2215.5	2214.7	2215.5	2215.8	2216.4	2216.7
1°	2215.0	2213.8	2215.0	2215.3	2215.5	2215.8
1.5°	2213.5	2212.6	2213.5	2214.1	2214.1	2214.7
2°	2211.7	2210.5	2211.7	2212.0	2212.6	2212.9
2.5°	2209.3	2207.8	2209.3	2209.6	2210.2	2210.8
3°	2206.1	2204.6	2206.1	2206.6	2207.2	2207.8
3.5°	2202.5	2201.6	2202.5	2203.1	2204.0	2204.6
4°	2198.6	2197.1	2198.6	2199.2	2200.4	2200.7
4.5°	2194.2	2192.4	2194.2	2194.8	2196.0	2196.6
5°	2189.7	2187.6	2189.7	2190.3	2191.5	2192.4
5.5°	2183.8	2182.0	2183.8	2184.4	2185.9	2187.9
6°	2177.6	2175.2	2177.6	2178.4	2179.9	2181.1
6.5°	2170.7	2168.4	2170.7	2171.6	2173.4	2174.3
7°	2163.6	2161.5	2163.6	2165.1	2166.0	2167.2
7.5°	2156.2	2154.1	2156.2	2156.8	2158.0	2159.2
8°	2147.6	2146.4	2147.6	2148.5	2149.7	2150.5
8.5°	2138.4	2137.2	2138.4	2139.3	2140.5	2141.6
9°	2128.9	2127.7	2128.9	2129.8	2131.2	2132.1
9.5°	2118.8	2117.6	2118.8	2119.7	2121.2	2121.8
10°	2108.1	2106.6	2108.1	2109.3	2110.5	2111.4
10.5°	2096.8	2095.6	2096.8	2097.7	2099.2	2099.8
11°	2085.2	2083.8	2085.2	2086.4	2087.6	2088.2
11.5°	2073.1	2071.9	2073.1	2074.3	2075.4	2076.0
12°	2060.6	2059.4	2060.6	2062.1	2063.0	2063.6
12.5°	2047.5	2046.1	2047.5	2049.0	2049.9	2050.5
13°	2034.5	2033.0	2034.5	2035.7	2036.6	2037.2
13.5°	2020.8	2019.6	2020.8	2022.0	2022.6	2023.2
14°	2006.9	2005.7	2006.9	2008.1	2008.7	2009.0
14.5°	1992.3	1991.1	1992.3	1993.5	1993.8	1994.1
15°	1978.1	1976.9	1978.1	1978.7	1979.3	1979.3
15.5°	1963.8	1963.2	1963.8	1964.4	1963.8	1963.8
16°	1949.9	1949.3	1949.9	1950.2	1949.3	1949.0
16.5°	1935.9	1935.6	1935.9	1935.9	1934.7	1934.2
17°	1921.7	1922.0	1921.7	1922.0	1920.8	1920.2
17.5°	1907.7	1907.4	1907.7	1908.0	1907.1	1906.5
18°	1893.5	1892.9	1893.5	1894.1	1893.5	1893.2
18.5°	1878.3	1877.5	1878.3	1878.9	1878.9	1878.9
19°	1862.0	1861.1	1862.0	1862.9	1863.5	1864.4
19.5°	1844.8	1843.9	1844.8	1845.4	1847.2	1848.4
20°	1826.4	1824.3	1826.4	1826.1	1829.4	1830.9
20.5°	1806.5	1804.1	1806.5	1805.3	1809.2	1811.6
21°	1784.8	1781.9	1784.8	1783.4	1787.8	1791.4



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
22.5°	1710.6	1709.2	1710.6	1710.9	1713.9	1717.5
23°	1683.6	1683.0	1683.6	1685.7	1686.3	1689.3
23.5°	1655.7	1657.2	1655.7	1659.3	1657.8	1660.5
24°	1627.2	1629.9	1627.2	1632.0	1628.4	1630.5
24.5°	1598.4	1602.0	1598.4	1603.2	1598.7	1599.6
25°	1569.6	1572.3	1569.6	1573.2	1567.9	1567.3
25.5°	1540.9	1541.4	1540.9	1542.3	1537.6	1533.7
26°	1510.9	1508.5	1510.9	1510.6	1506.1	1499.3
26.5°	1479.7	1474.4	1479.7	1477.6	1474.1	1464.0
27°	1447.6	1439.6	1447.6	1444.4	1440.8	1429.5
27.5°	1414.7	1404.3	1414.7	1410.5	1406.4	1395.7
28°	1380.3	1369.0	1380.3	1376.1	1372.0	1361.9
28.5°	1345.2	1334.9	1345.2	1341.7	1336.9	1328.9
29°	1309.6	1302.5	1309.6	1307.2	1301.6	1296.3
29.5°	1274.0	1270.7	1274.0	1273.1	1266.9	1264.2
30°	1238.4	1238.7	1238.4	1238.1	1231.3	1232.1
30.5°	1203.9	1208.4	1203.9	1203.4	1196.8	1198.9
31°	1169.5	1176.3	1169.5	1168.3	1161.5	1166.0
31.5°	1135.4	1144.0	1135.4	1133.3	1127.7	1132.1
32°	1101.8	1110.7	1101.8	1098.6	1093.5	1097.7
32.5°	1068.6	1077.5	1068.6	1064.4	1060.9	1064.4
33°	1035.3	1043.7	1035.3	1029.4	1028.2	1030.9
33.5°	1002.1	1009.5	1002.1	994.7	995.6	1000.9
34°	969.5	977.2	969.5	960.2	962.9	968.6
34.5°	936.5	945.1	936.5	926.7	930.6	936.5
35°	904.7	913.9	904.7	894.9	899.1	904.1
35.5°	873.3	883.4	873.3	863.5	867.9	872.7
36°	843.0	853.4	843.0	832.9	836.8	841.8
36.5°	813.0	822.8	813.0	803.2	806.8	811.2
37°	783.9	792.5	783.9	774.1	777.1	780.4
37.5°	756.0	762.3	756.0	746.2	748.3	750.4
38°	728.7	732.3	728.7	719.5	720.4	720.7
38.5°	702.0	703.5	702.0	694.0	693.4	692.8
39°	676.2	675.9	676.2	668.5	667.3	665.8
39.5°	650.7	649.8	650.7	644.1	642.0	639.4
40°	626.0	624.8	626.0	620.7	617.1	614.1
40.5°	602.0	601.7	602.0	598.1	593.4	590.4
41°	579.4	580.3	579.4	576.7	570.5	567.5
41.5°	557.7	560.4	557.7	556.3	549.1	545.9
42°	537.6	541.1	537.6	536.7	529.0	525.7
42.5°	518.6	522.4	518.6	518.3	510.0	506.7
43°	500.8	504.3	500.8	500.2	492.1	488.6
43.5°	483.5	486.8	483.5	483.2	475.5	472.0



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
45°	438.4	439.9	438.4	436.9	432.2	429.2
45.5°	425.1	426.2	425.1	423.6	419.1	416.8
46°	412.9	413.5	412.9	410.8	407.0	404.9
46.5°	401.0	401.6	401.0	398.6	395.7	393.9
47°	390.0	390.9	390.0	387.7	384.7	383.5
47.5°	379.9	381.1	379.9	377.3	374.6	373.7
48°	370.7	371.9	370.7	368.4	365.7	364.5
48.5°	362.1	363.0	362.1	359.8	357.7	357.1
49°	353.8	354.7	353.8	352.0	350.3	350.0
49.5°	346.1	346.4	346.1	344.6	343.4	343.1
50°	338.4	338.7	338.4	337.2	336.3	336.0
50.5°	331.0	331.0	331.0	329.8	329.2	328.9
51°	323.5	323.5	323.5	322.4	321.5	320.9
51.5°	316.1	316.4	316.1	314.6	313.5	313.2
52°	308.4	308.7	308.4	306.9	305.7	305.1
52.5°	300.4	301.0	300.4	299.2	297.7	297.1
53°	292.7	293.3	292.7	291.5	290.3	289.7
53.5°	285.3	285.8	285.3	283.8	282.6	282.0
54°	277.5	278.1	277.5	276.4	275.2	274.9
54.5°	270.4	271.0	270.4	269.2	268.0	267.7
55°	263.3	263.6	263.3	262.4	261.2	260.6
55.5°	256.5	256.8	256.5	255.6	254.4	253.8
56°	249.6	249.9	249.6	248.7	247.9	247.3
56.5°	243.1	243.4	243.1	242.2	241.3	240.7
57°	236.6	236.9	236.6	235.7	234.8	234.2
57.5°	230.0	230.6	230.0	229.5	228.6	227.7
58°	224.1	224.4	224.1	223.2	222.3	222.0
58.5°	217.9	218.2	217.9	217.3	216.4	216.1
59°	211.6	212.2	211.6	211.0	210.5	210.2
59.5°	206.0	206.3	206.0	205.1	204.5	204.2
60°	200.1	200.4	200.1	199.5	198.9	198.6
60.5°	194.4	194.7	194.4	193.8	193.2	192.9
61°	189.1	189.4	189.1	188.5	187.9	187.6
61.5°	183.7	184.0	183.7	183.1	182.6	182.3
62°	178.4	178.4	178.4	177.8	177.2	177.2
62.5°	173.1	173.3	173.1	172.5	172.2	171.9
63°	168.0	168.0	168.0	167.4	167.1	166.8
63.5°	163.0	163.3	163.0	162.4	162.1	161.8
64°	157.9	158.2	157.9	157.6	157.3	157.0
64.5°	153.2	153.5	153.2	152.9	152.6	152.3
65°	148.4	148.7	148.4	148.1	147.8	147.5
65.5°	144.0	144.0	144.0	143.4	143.1	143.1
66°	139.2	139.5	139.2	138.9	138.6	138.3



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
67.5°	126.2	126.2	126.2	125.9	125.6	125.3
68°	122.0	122.0	122.0	121.7	121.4	121.1
68.5°	117.5	117.8	117.5	117.5	117.2	117.0
69°	113.7	113.7	113.7	113.1	113.1	113.1
69.5°	109.5	109.8	109.5	109.2	109.2	108.9
70°	105.7	106.0	105.7	105.4	105.7	105.4
70.5°	101.8	102.1	101.8	101.8	101.8	101.5
71°	98.0	98.3	98.0	98.0	98.0	98.0
71.5°	94.4	94.4	94.4	94.4	94.1	94.1
72°	90.8	90.8	90.8	90.5	90.5	90.5
72.5°	87.3	87.3	87.3	87.0	87.0	87.0
73°	83.7	83.7	83.7	83.4	83.4	83.4
73.5°	80.1	80.1	80.1	80.1	79.8	79.8
74°	76.9	76.9	76.9	76.6	76.6	76.6
74.5°	73.3	73.3	73.3	73.3	73.3	73.3
75°	70.1	70.1	70.1	70.1	70.1	70.1
75.5°	66.8	67.1	66.8	66.8	66.8	66.8
76°	63.8	63.8	63.8	63.5	63.5	63.8
76.5°	60.6	60.6	60.6	60.6	60.6	60.6
77°	57.6	57.6	57.6	57.6	57.6	57.6
77.5°	54.6	54.6	54.6	54.6	54.6	54.6
78°	51.6	51.6	51.6	51.6	51.6	51.6
78.5°	48.7	49.0	48.7	48.7	49.0	49.0
79°	46.0	46.0	46.0	46.0	46.0	46.0
79.5°	43.3	43.3	43.3	43.0	43.3	43.3
80°	40.4	40.4	40.4	40.4	40.7	40.7
80.5°	38.0	38.0	38.0	38.0	38.0	38.0
81°	35.3	35.3	35.3	35.3	35.3	35.3
81.5°	32.7	32.7	32.7	32.7	32.7	32.7
82°	30.3	30.3	30.3	30.3	30.3	30.3
82.5°	27.9	27.6	27.9	27.9	27.9	27.9
83°	25.2	25.2	25.2	25.5	25.5	25.5
83.5°	22.9	22.9	22.9	23.2	23.2	23.2
84°	20.8	20.8	20.8	20.8	20.8	20.8
84.5°	18.4	18.4	18.4	18.4	18.4	18.7
85°	16.3	16.3	16.3	16.3	16.3	16.3
85.5°	14.0	14.2	14.0	14.2	14.0	14.2
86°	11.9	11.9	11.9	11.9	11.9	11.9
86.5°	9.8	10.1	9.8	9.8	9.8	10.1
87°	7.7	8.0	7.7	8.0	8.0	8.0
87.5°	5.9	6.2	5.9	5.9	5.9	5.9
88°	4.5	4.5	4.5	4.2	4.2	3.9
88.5°	3.0	3.6	3.0	2.7	2.4	2.4



TEST NUMBER: P776225

CATALOG NUMBER: HCDJBL3040CSD-HCD42TRMW-3000lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
90°	0.6	0.9	0.6	0.3	0.0	0.0

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



Report Generated By 670245859 / DESKTOP-T8S5UU9

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Cooper Lighting Solutions Photometric Lab
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Peachtree City, GA 30269

Scaled Data Report





— 0°-180° - - 45°-225° - - - - 90°-270° - · - 135°-315°

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1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



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Peachtree City, GA 30269

Scaled Data Report





21.5°	1767.9	1765.0	1759.9	1761.4	1758.4	1761.4	1759.9	1765.0	1767.9	1765.0	1759.9
22°	1743.3	1740.3	1735.9	1736.5	1733.5	1736.5	1735.9	1740.3	1743.3	1740.3	1735.9



44°	456.5	460.1	466.9	467.5	470.5	467.5	466.9	460.1	456.5	460.1	466.9
44.5°	442.3	445.8	451.8	452.7	454.7	452.7	451.8	445.8	442.3	445.8	451.8



66.5°	133.9	134.2	134.5	134.8	135.1	134.8	134.5	134.2	133.9	134.2	134.5
67°	129.7	129.7	130.0	130.3	130.6	130.3	130.0	129.7	129.7	129.7	130.0



89°	0.9	1.2	1.8	2.1	2.4	2.1	1.8	1.2	0.9	1.2	1.8
89.5°	0.0	0.3	0.9	1.2	1.5	1.2	0.9	0.3	0.0	0.3	0.9

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Scaled Data Report





21.5°	1761.4	1758.4	1761.4	1759.9	1765.0	1767.9
22°	1736.5	1733.5	1736.5	1735.9	1740.3	1743.3



44°	467.5	470.5	467.5	466.9	460.1	456.5
44.5°	452.7	454.7	452.7	451.8	445.8	442.3



66.5°	134.8	135.1	134.8	134.5	134.2	133.9
67°	130.3	130.6	130.3	130.0	129.7	129.7

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Scaled Data Report



89°	2.1	2.4	2.1	1.8	1.2	0.9
89.5°	1.2	1.5	1.2	0.9	0.3	0.0

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Peachtree City, GA 30269

Scaled Data Report



(END OF REPORT)