

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: P776135

Luminaire Tested: HCDJBL51525CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

Issue Date: 2/13/2024

Test Information

Test Method: LM-79-2019
Report Number: P776135
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (A2312156B048)
Test Lab:
Issue Date: 2/13/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO COMMERCIAL
Catalog Number: HCDJBS1525CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K
Description: 8 INCH ROUND SHALLOW-WIDE LENSED WALLWASH KIT
Light Source: SELECTABLE LUMENS AND CCT ARRAY 90CRI / 2700K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2972.6 lumens
Efficiency: N/A
Efficacy: 118.9 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.17 / 1.27
Luminous Opening: Circular (Dia: 0.67' x H: 0')
CIE Type: Direct

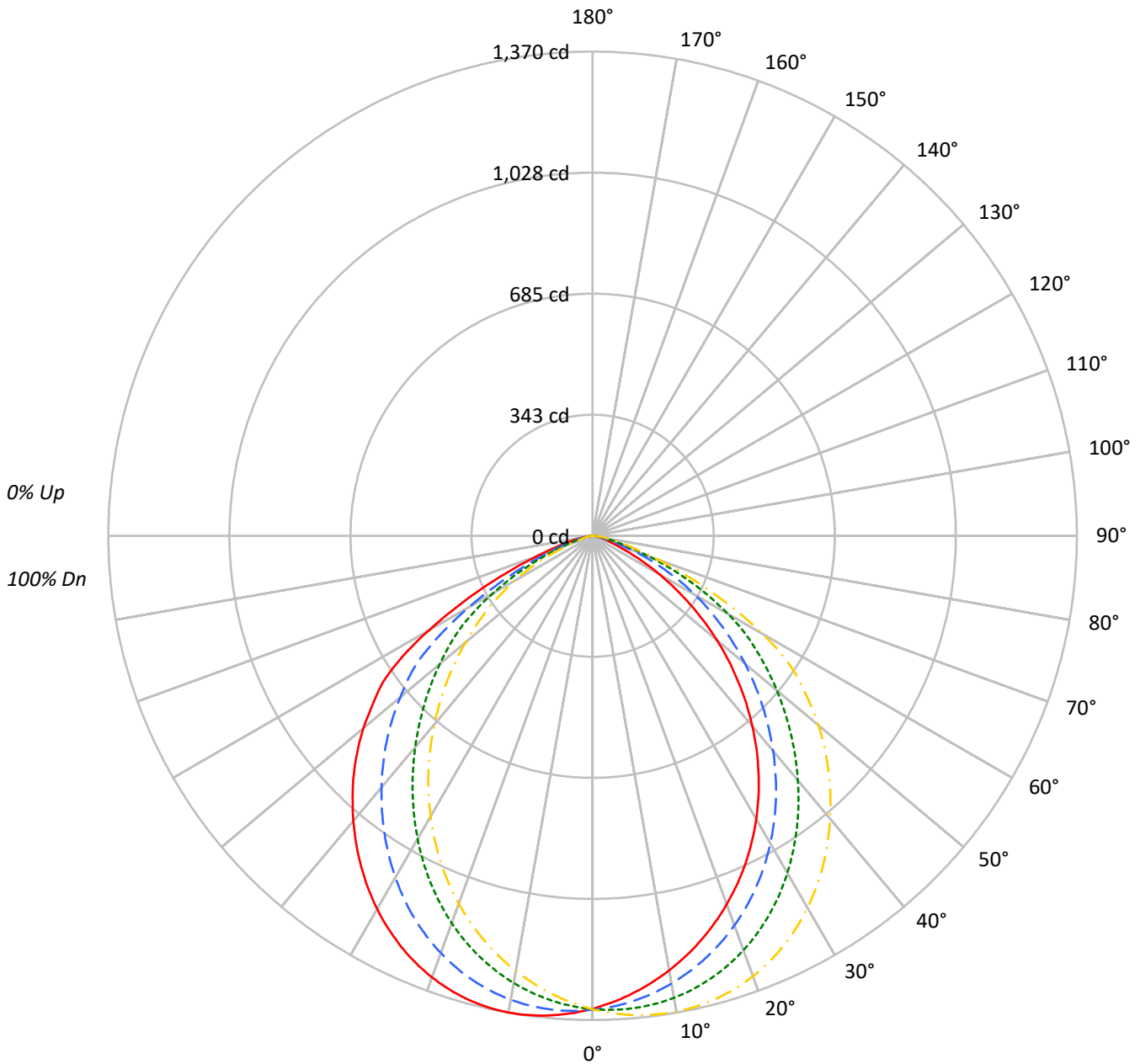
Input Watts (W): 25
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



TEST NUMBER: P776135

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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20									
RC	80									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	111	107	103	100	108	105	101	98	100	98	95	97	94	92	93	91	90	88																			
2	102	95	89	84	100	93	88	83	90	85	81	86	83	79	83	80	78	76																			
3	94	85	77	72	92	83	76	71	80	74	70	77	73	69	75	71	67	65																			
4	87	76	68	62	84	74	67	61	72	66	61	70	64	60	68	63	59	57																			
5	80	68	60	54	78	67	59	54	65	58	53	63	57	52	61	56	52	50																			
6	74	62	53	48	72	61	53	47	59	52	47	57	51	47	56	50	46	44																			
7	69	56	48	42	67	55	48	42	54	47	42	53	46	42	51	46	41	39																			
8	64	52	44	38	63	51	43	38	50	43	38	48	42	37	47	42	37	35																			
9	60	47	40	34	59	47	39	34	46	39	34	45	38	34	44	38	34	32																			
10	56	44	36	31	55	43	36	31	42	36	31	41	35	31	41	35	31	29																			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	40908	40908	40908	40908
5°	39832	41122	41753	40469
10°	38699	41148	42469	39834
15°	37451	40973	42948	38988
20°	36057	40541	43192	37883
25°	34465	39841	43203	36513
30°	32634	38842	42981	34922
35°	30502	37554	42552	33093
40°	28014	35997	41971	31122
45°	25129	34239	41242	29032
50°	21753	32312	40173	26802
55°	17815	30116	38585	24341
60°	13354	27007	32667	19906
65°	8553	21752	23673	14246
70°	4847	14943	14639	8587
75°	3680	8741	9260	4659
80°	2602	4817	5275	2215
85°	1541	2627	1366	946

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 157.5°
 Vertical Angle: 45°
 Luminance: 41821 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	126.4	4.3
10°-20°	357.7	12.0
20°-30°	526.6	17.7
30°-40°	603.8	20.3
40°-50°	581.1	19.5
50°-60°	463.3	15.6
60°-70°	240.5	8.1
70°-80°	64.9	2.2
80°-90°	8.3	0.3
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°	1010.7	34.0
0°-40°	1614.5	54.3
0°-60°	2659.0	89.4
0°-90°	2972.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2972.6	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	1340	1340	1340	1340	1340	
5°	1300	1342	1362	1320	1300	122
15°	1185	1296	1359	1234	1185	333
25°	1023	1183	1282	1084	1023	470
35°	818	1008	1142	888	818	510
45°	582	793	955	672	582	448
55°	335	566	725	457	335	299
65°	118	301	328	197	118	122
75°	31	74	78	40	31	34
85°	4	8	4	3	4	6
90°	0	1	0	0	0	



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
0°	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9
0.5°	1335.0	1340.8	1340.3	1339.6	1340.3	1341.6	1342.3	1342.3	1341.3	1345.4	1342.5
1°	1331.6	1338.4	1338.9	1339.4	1341.3	1343.7	1345.2	1345.2	1344.2	1347.4	1343.7
1.5°	1328.0	1335.7	1337.2	1339.1	1341.8	1345.2	1347.6	1347.6	1347.1	1349.1	1344.5
2°	1324.4	1333.1	1335.5	1338.4	1342.3	1346.9	1350.0	1350.0	1349.8	1350.8	1345.2
2.5°	1320.5	1330.2	1333.3	1337.9	1342.5	1348.3	1352.5	1352.5	1352.2	1352.5	1345.7
3°	1316.6	1327.0	1331.4	1337.0	1342.8	1349.8	1354.6	1354.6	1354.4	1353.9	1345.9
3.5°	1312.7	1323.9	1329.2	1336.0	1342.8	1351.0	1356.6	1356.6	1356.8	1355.1	1346.2
4°	1308.4	1320.5	1326.8	1334.8	1342.5	1352.0	1358.3	1358.3	1358.8	1356.1	1346.2
4.5°	1304.3	1317.1	1324.1	1333.3	1342.3	1352.7	1360.0	1360.0	1360.7	1357.1	1345.9
5°	1299.7	1313.5	1321.5	1331.9	1341.8	1353.2	1361.4	1361.4	1362.4	1357.8	1345.7
5.5°	1295.3	1309.8	1318.8	1330.2	1341.1	1353.7	1362.6	1362.6	1363.8	1358.3	1344.9
6°	1290.5	1306.0	1315.6	1328.2	1340.3	1353.9	1363.8	1363.8	1365.3	1358.5	1344.5
6.5°	1285.6	1301.8	1312.5	1326.3	1339.1	1354.2	1364.8	1364.8	1366.5	1358.8	1343.7
7°	1280.8	1297.7	1309.3	1324.1	1337.9	1354.2	1365.8	1365.8	1367.5	1358.8	1342.8
7.5°	1275.7	1293.4	1306.0	1321.9	1336.5	1353.9	1366.3	1366.3	1368.2	1358.5	1341.6
8°	1270.4	1289.0	1302.3	1319.3	1335.3	1353.7	1366.7	1366.7	1368.9	1358.3	1340.1
8.5°	1265.0	1284.4	1298.4	1316.6	1333.6	1352.9	1367.2	1367.2	1369.4	1357.5	1338.7
9°	1259.5	1279.8	1294.6	1313.7	1331.6	1352.5	1367.2	1367.2	1369.9	1357.1	1337.0
9.5°	1254.1	1275.0	1290.7	1310.8	1329.7	1351.5	1367.2	1367.2	1369.9	1356.1	1335.0
10°	1248.3	1270.1	1286.3	1307.6	1327.3	1350.3	1367.0	1367.0	1369.9	1354.9	1333.1
10.5°	1242.7	1265.0	1282.0	1304.3	1325.1	1349.3	1366.7	1366.7	1369.4	1353.7	1330.9
11°	1236.7	1259.7	1277.6	1300.6	1322.4	1347.9	1366.0	1366.0	1368.9	1352.2	1328.5
11.5°	1230.6	1254.6	1273.0	1297.2	1319.8	1346.4	1365.3	1365.3	1368.4	1350.8	1325.8
12°	1224.3	1249.0	1268.4	1293.4	1316.9	1344.7	1364.6	1364.6	1367.5	1348.8	1323.2
12.5°	1218.3	1243.5	1263.3	1289.2	1313.9	1342.8	1363.4	1363.4	1366.5	1346.9	1320.2
13°	1211.7	1237.7	1258.5	1285.1	1310.8	1340.8	1362.1	1362.1	1365.3	1344.7	1317.1
13.5°	1205.2	1231.8	1253.2	1281.0	1307.4	1338.7	1360.7	1360.7	1364.1	1342.5	1313.9
14°	1198.7	1226.0	1247.8	1276.4	1303.8	1336.2	1359.0	1359.0	1362.6	1339.9	1310.3
14.5°	1191.6	1220.0	1242.5	1272.0	1300.1	1333.6	1357.3	1357.3	1360.7	1337.2	1306.9
15°	1184.9	1213.9	1236.9	1267.2	1296.3	1330.7	1355.4	1355.4	1358.8	1334.3	1303.0
15.5°	1177.8	1207.4	1231.1	1262.4	1292.1	1328.0	1353.2	1353.2	1356.6	1331.4	1299.2
16°	1170.8	1200.8	1225.1	1257.3	1287.8	1324.8	1350.8	1350.8	1354.4	1328.0	1295.3
16.5°	1163.5	1194.3	1219.0	1251.9	1283.4	1321.5	1348.3	1348.3	1352.0	1324.6	1290.9
17°	1156.0	1187.5	1212.9	1246.4	1278.8	1318.1	1345.7	1345.7	1349.3	1321.0	1286.3
17.5°	1148.5	1180.7	1206.7	1241.0	1274.2	1314.4	1342.8	1342.8	1346.4	1317.1	1281.7
18°	1141.3	1173.7	1200.4	1235.2	1269.1	1310.6	1339.9	1339.9	1343.3	1313.2	1276.9
18.5°	1133.5	1166.7	1193.6	1229.4	1264.1	1306.4	1336.7	1336.7	1339.9	1309.1	1272.0
19°	1125.3	1159.4	1186.8	1223.4	1258.7	1302.6	1333.3	1333.3	1336.7	1305.0	1267.0
19.5°	1117.5	1151.9	1180.0	1217.1	1253.4	1298.2	1329.7	1329.7	1333.1	1300.4	1261.6
20°	1109.8	1144.6	1173.0	1211.0	1247.8	1293.6	1326.1	1326.1	1329.4	1295.8	1256.1
20.5°	1101.5	1136.9	1166.0	1204.5	1241.8	1289.0	1322.2	1322.2	1325.6	1290.9	1250.7
21°	1092.8	1129.4	1158.7	1197.9	1236.0	1284.2	1318.1	1318.1	1321.5	1286.1	1244.9



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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°	1067.9	1105.4	1135.9	1176.9	1217.3	1268.7	1304.7	1316.9	1307.9	1270.4	1226.8
23°	1059.2	1097.2	1128.2	1169.6	1210.8	1263.1	1299.9	1312.5	1303.0	1264.5	1220.2
23.5°	1050.2	1088.9	1120.2	1162.3	1203.7	1257.5	1295.1	1307.6	1298.2	1259.0	1213.9
24°	1041.2	1080.5	1112.0	1154.8	1197.0	1251.5	1290.0	1302.8	1293.1	1252.9	1207.1
24.5°	1032.3	1072.0	1103.7	1146.8	1189.9	1245.4	1284.6	1297.7	1287.8	1246.9	1200.4
25°	1023.1	1063.3	1095.5	1139.1	1182.7	1239.3	1279.1	1292.4	1282.5	1240.6	1193.3
25.5°	1013.9	1054.3	1087.0	1131.1	1175.2	1232.8	1273.5	1287.1	1276.6	1234.3	1186.3
26°	1004.4	1045.6	1078.3	1122.8	1167.7	1226.3	1267.7	1281.5	1270.8	1227.7	1179.0
26.5°	995.0	1036.6	1069.6	1114.4	1159.9	1219.7	1261.9	1275.7	1265.0	1220.9	1171.8
27°	985.3	1027.7	1060.8	1106.1	1152.2	1212.9	1255.6	1269.6	1259.0	1214.2	1164.0
27.5°	975.6	1018.5	1051.9	1097.7	1144.2	1205.9	1249.3	1263.8	1252.7	1207.4	1156.5
28°	965.9	1009.0	1042.9	1088.9	1135.7	1198.4	1243.0	1257.5	1246.4	1200.1	1148.5
28.5°	955.7	999.3	1033.7	1080.0	1127.5	1191.4	1236.4	1251.0	1239.6	1192.8	1140.8
29°	945.8	989.9	1024.3	1070.8	1119.0	1183.6	1229.4	1244.4	1233.1	1185.3	1132.5
29.5°	935.9	980.2	1015.1	1061.8	1110.5	1176.1	1222.6	1237.9	1226.0	1177.8	1124.3
30°	925.7	970.7	1005.4	1052.6	1101.8	1168.4	1215.6	1231.1	1219.2	1170.3	1115.8
30.5°	915.3	960.6	995.7	1043.4	1092.8	1160.1	1208.3	1224.1	1212.0	1162.3	1107.6
31°	904.9	950.6	986.0	1034.2	1084.1	1152.2	1201.1	1216.8	1204.7	1154.6	1099.1
31.5°	894.2	940.7	976.1	1024.3	1074.9	1143.9	1193.3	1209.6	1197.2	1146.6	1090.4
32°	883.8	930.5	966.1	1014.6	1065.4	1135.4	1185.8	1202.0	1189.7	1138.6	1081.7
32.5°	873.1	919.9	956.0	1004.7	1056.0	1127.0	1178.1	1194.8	1181.9	1130.1	1073.0
33°	862.5	909.7	945.6	995.0	1046.6	1118.0	1170.1	1187.3	1174.2	1121.9	1063.8
33.5°	851.6	899.3	935.4	984.8	1036.9	1109.3	1162.1	1179.0	1166.2	1113.2	1054.8
34°	840.4	888.9	925.2	974.9	1027.4	1100.6	1153.6	1171.0	1158.2	1104.7	1045.6
34.5°	829.5	878.2	914.8	964.4	1017.5	1091.4	1145.4	1163.1	1150.0	1096.2	1036.4
35°	818.4	867.3	904.4	954.5	1007.6	1082.2	1136.9	1155.1	1141.7	1087.2	1026.9
35.5°	807.3	856.4	893.5	943.9	997.4	1073.0	1128.2	1146.6	1133.5	1078.3	1017.7
36°	795.9	845.5	882.8	933.4	987.5	1063.5	1119.7	1137.9	1124.8	1069.1	1007.8
36.5°	784.5	834.6	871.9	922.5	977.3	1054.1	1110.5	1129.4	1116.3	1060.4	998.1
37°	773.1	823.5	861.3	912.4	967.1	1044.1	1101.5	1120.9	1107.3	1050.9	988.7
37.5°	761.7	812.3	850.1	901.7	956.5	1034.4	1092.3	1112.0	1098.6	1041.7	979.0
38°	749.9	801.2	839.0	890.8	946.0	1024.5	1083.1	1103.0	1089.7	1032.3	969.1
38.5°	738.2	789.8	827.8	879.4	935.4	1014.6	1073.9	1094.0	1080.7	1023.1	959.1
39°	726.8	778.2	816.7	869.0	925.2	1004.7	1064.5	1085.3	1071.5	1013.4	949.2
39.5°	715.2	767.1	805.6	857.9	914.1	994.5	1054.8	1075.9	1062.5	1003.7	939.3
40°	702.9	755.7	794.2	847.0	903.2	984.1	1045.3	1066.4	1053.1	994.0	928.8
40.5°	691.2	744.0	782.8	835.6	892.3	973.9	1035.7	1057.0	1043.6	984.3	918.9
41°	679.1	732.4	771.4	824.7	881.4	963.5	1025.5	1047.8	1034.2	974.4	908.5
41.5°	667.3	720.8	760.0	813.6	870.5	952.8	1015.8	1038.1	1024.5	964.9	898.3
42°	654.9	709.2	748.2	802.4	859.6	942.2	1005.6	1028.1	1014.8	954.8	888.2
42.5°	643.3	697.3	737.0	791.3	848.7	931.8	995.9	1018.5	1005.1	944.6	877.5
43°	630.9	685.4	725.4	780.1	837.5	921.1	985.5	1008.8	995.5	934.2	867.1
43.5°	618.6	673.6	714.0	768.5	826.4	910.4	975.3	998.8	985.5	924.2	856.7



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
45°	582.0	637.5	678.9	734.6	793.0	877.7	944.1	968.6	955.2	892.8	824.5
45.5°	569.7	625.6	667.5	723.5	781.8	866.8	933.4	958.4	945.1	881.9	813.6
46°	557.3	613.5	655.6	711.8	770.7	855.9	922.8	947.7	934.7	871.2	802.7
46.5°	545.0	601.4	644.3	700.4	759.5	844.8	912.1	937.3	924.2	860.3	791.5
47°	532.8	589.5	632.4	689.1	748.4	833.7	901.0	926.7	913.3	849.2	780.4
47.5°	520.3	577.4	620.8	677.7	736.8	822.5	890.3	915.8	902.4	838.0	768.7
48°	507.4	565.3	608.9	666.5	725.6	811.4	879.2	904.9	891.8	826.2	757.4
48.5°	495.3	552.9	597.3	654.9	714.5	800.2	868.1	893.7	880.6	814.5	745.7
49°	483.0	541.1	585.4	643.5	703.1	788.6	856.7	882.6	869.3	802.7	733.9
49.5°	470.6	529.0	574.0	632.1	691.5	777.2	845.5	871.2	857.4	790.5	722.0
50°	458.0	516.9	562.6	620.5	680.3	765.8	833.7	859.6	845.8	778.4	710.1
50.5°	445.4	504.7	550.8	609.4	669.0	754.2	821.8	847.7	833.7	765.8	698.5
51°	433.1	492.4	539.1	598.0	657.6	742.6	809.9	835.6	821.5	753.7	686.9
51.5°	420.9	480.3	527.5	586.6	646.2	731.0	797.8	823.2	809.2	741.9	675.5
52°	408.4	468.4	515.9	575.2	634.6	718.9	785.5	810.7	796.6	730.5	664.6
52.5°	396.2	456.3	504.3	563.8	622.9	707.0	773.1	798.1	784.0	719.3	653.2
53°	383.6	444.2	492.9	552.5	611.3	694.6	760.5	785.9	772.1	707.5	641.8
53.5°	371.3	432.3	481.3	541.3	599.9	682.5	747.9	773.1	760.5	695.1	628.5
54°	359.2	420.5	469.9	529.5	588.3	670.4	735.8	761.5	749.1	681.1	615.0
54.5°	347.1	408.6	458.2	518.3	576.9	658.8	723.9	750.3	737.3	665.6	599.5
55°	334.7	396.7	446.9	506.9	565.8	647.2	712.6	739.0	724.9	648.1	583.5
55.5°	322.9	384.6	435.7	496.0	554.9	636.0	700.7	726.1	710.1	631.2	566.8
56°	310.7	373.2	424.1	484.9	543.7	624.4	688.3	711.8	693.9	612.3	549.6
56.5°	298.9	361.6	413.0	473.7	532.6	612.0	674.5	695.8	677.0	593.4	532.4
57°	287.0	349.7	402.1	463.1	520.5	598.7	659.8	679.6	658.8	574.0	514.9
57.5°	275.1	338.4	391.2	452.2	508.4	585.4	644.0	661.5	639.2	554.9	496.3
58°	264.0	327.0	379.8	441.3	495.5	570.9	627.8	642.8	619.3	534.1	477.9
58.5°	252.4	315.8	368.6	429.7	483.0	556.1	610.8	622.9	599.2	513.2	459.5
59°	241.0	304.7	357.7	418.0	469.4	540.8	592.4	602.8	578.1	492.9	441.1
59.5°	229.6	293.5	346.6	406.2	456.1	524.9	574.0	581.3	556.6	472.8	422.4
60°	218.7	282.2	335.5	394.3	442.3	509.1	555.1	560.5	535.0	451.7	404.2
60.5°	207.8	271.3	323.8	382.4	428.9	492.9	536.0	538.9	513.5	431.4	386.1
61°	197.2	260.6	312.7	370.1	414.7	476.4	516.1	518.1	492.2	411.3	368.1
61.5°	186.3	249.5	301.3	358.2	400.6	459.7	496.0	496.5	470.4	390.7	350.2
62°	176.1	238.6	289.9	345.9	386.8	442.7	476.7	475.7	449.3	370.8	332.3
62.5°	165.9	227.7	278.8	333.8	372.3	425.8	456.3	454.6	427.7	351.4	315.1
63°	156.0	217.0	267.1	321.6	358.0	408.4	436.4	433.5	407.1	333.3	298.4
63.5°	145.8	206.4	256.0	308.8	343.7	391.2	416.8	412.7	386.6	314.9	281.9
64°	136.6	196.2	244.9	296.7	329.6	374.2	397.9	392.6	366.7	297.4	265.9
64.5°	127.4	185.8	233.7	284.3	315.3	357.0	378.6	372.7	347.3	280.5	250.4
65°	118.4	175.4	222.8	272.2	301.1	340.1	360.2	353.4	327.7	264.0	235.7
65.5°	109.7	165.4	211.7	259.9	286.8	323.3	341.7	334.2	308.6	248.5	222.6
66°	101.5	155.7	200.8	247.8	272.5	306.9	323.6	315.6	289.7	233.5	209.7



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
67.5°	80.2	127.4	168.3	211.7	231.3	259.6	272.0	263.5	236.1	194.2	171.0
68°	74.1	118.4	157.9	199.8	218.5	244.6	255.8	247.3	221.1	180.9	159.6
68.5°	68.3	109.7	147.7	187.9	205.6	229.8	239.8	231.5	206.1	167.8	149.2
69°	62.2	101.0	137.3	176.3	192.8	216.3	226.0	217.5	191.1	156.7	139.3
69.5°	57.6	92.5	127.2	164.5	180.2	203.0	212.2	203.7	176.3	146.3	129.8
70°	54.3	85.0	117.2	153.6	167.4	189.4	198.6	189.6	164.0	136.4	121.1
70.5°	52.1	77.7	107.5	142.4	156.0	175.8	184.8	175.8	152.3	127.2	112.9
71°	49.7	70.7	98.3	131.5	145.1	164.2	171.0	164.0	141.4	118.4	104.9
71.5°	47.2	63.7	89.4	121.1	134.4	152.3	159.1	152.6	131.3	110.2	97.6
72°	44.8	56.7	82.1	111.2	124.2	141.4	147.7	141.9	122.1	102.7	90.8
72.5°	42.4	51.6	75.1	101.7	114.3	131.0	137.3	132.0	113.4	95.4	84.0
73°	40.0	48.0	68.1	93.0	105.1	121.3	127.6	122.6	105.4	88.6	78.0
73.5°	37.8	45.5	61.0	84.5	96.6	112.1	118.4	113.8	98.1	82.3	72.2
74°	35.6	43.1	53.8	77.7	88.6	103.7	109.7	105.8	91.1	76.3	66.6
74.5°	33.4	40.9	48.7	70.7	80.9	95.7	101.7	98.3	84.5	70.7	61.5
75°	31.2	38.8	44.1	63.9	74.1	88.2	94.2	91.3	78.5	65.4	56.4
75.5°	29.3	36.6	40.4	57.2	67.6	81.1	87.2	84.8	72.4	60.1	51.8
76°	27.4	34.4	37.1	51.6	61.5	74.6	80.7	78.5	66.8	55.2	47.2
76.5°	25.7	32.5	34.2	46.5	55.7	68.3	74.6	72.9	61.5	50.6	43.1
77°	24.0	30.3	31.7	42.1	50.9	63.0	68.8	67.3	56.2	46.3	39.0
77.5°	22.3	28.3	29.5	38.0	46.0	57.4	63.5	62.2	51.3	41.9	35.1
78°	20.6	26.6	27.9	34.4	41.7	52.3	58.1	57.2	46.7	38.0	31.5
78.5°	19.1	24.9	25.9	31.2	37.5	47.7	53.3	52.3	42.1	34.4	28.1
79°	17.7	23.3	24.5	28.3	33.9	43.4	48.7	48.0	37.8	30.8	24.9
79.5°	16.2	21.6	22.8	25.7	30.5	39.2	44.3	43.6	33.9	27.6	22.5
80°	14.8	19.9	21.3	23.3	27.4	35.4	40.2	39.5	30.0	24.9	19.9
80.5°	13.6	18.4	19.6	21.1	24.5	32.0	36.3	35.8	26.4	22.0	17.2
81°	12.4	17.0	18.4	19.1	22.3	28.3	32.7	32.2	23.5	19.4	14.8
81.5°	11.1	15.7	17.0	17.4	19.9	25.4	29.1	28.8	20.6	16.7	12.1
82°	9.9	14.3	15.7	15.7	17.7	22.8	25.9	25.4	17.7	14.0	10.2
82.5°	9.0	13.1	14.3	14.3	15.3	20.3	23.3	22.8	14.5	11.4	8.5
83°	7.8	11.6	13.1	12.8	13.1	17.9	20.6	20.1	11.6	9.4	6.8
83.5°	6.8	10.7	12.1	11.9	11.4	15.3	17.9	17.4	9.4	7.5	5.3
84°	6.1	9.4	10.9	10.7	9.9	12.8	15.3	14.8	7.3	5.8	4.1
84.5°	5.1	8.5	9.7	9.7	8.7	11.1	12.6	12.1	5.6	4.4	3.1
85°	4.4	7.5	8.7	8.7	7.5	9.4	10.7	9.9	3.9	2.9	2.2
85.5°	3.6	6.5	8.0	7.8	6.3	7.8	8.7	8.0	2.4	1.9	1.5
86°	2.9	5.6	7.0	7.0	5.6	6.5	7.0	6.3	1.5	1.2	0.7
86.5°	2.2	4.6	6.1	6.1	4.6	5.3	5.6	4.6	1.0	0.5	0.2
87°	1.7	3.9	5.1	5.3	3.9	4.1	4.4	3.4	0.7	0.2	0.0
87.5°	1.2	3.1	4.4	4.6	3.1	3.4	3.1	2.4	0.5	0.0	0.0
88°	1.0	2.4	3.6	3.9	2.7	2.4	2.2	1.5	0.2	0.0	0.0
88.5°	0.5	1.9	2.9	3.1	1.9	1.7	1.5	0.7	0.2	0.0	0.0



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL51525CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°	202.5°	225°
90°	0.0	0.7	1.2	1.5	0.7	0.5	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
0°	1339.9	1339.9	1339.9	1339.9	1339.9	1339.9
0.5°	1339.6	1338.4	1337.2	1336.5	1335.5	1335.0
1°	1339.4	1337.0	1334.8	1333.3	1331.9	1331.6
1.5°	1338.9	1335.5	1332.1	1329.7	1328.2	1328.0
2°	1338.4	1333.8	1329.4	1326.3	1324.4	1324.4
2.5°	1337.4	1331.9	1326.5	1322.7	1320.5	1320.5
3°	1336.5	1329.9	1323.4	1318.8	1316.4	1316.6
3.5°	1335.5	1328.0	1320.2	1314.9	1312.3	1312.7
4°	1334.0	1325.6	1316.9	1310.8	1307.6	1308.4
4.5°	1332.8	1323.2	1313.2	1306.4	1303.3	1304.3
5°	1331.1	1320.5	1309.6	1302.1	1298.4	1299.7
5.5°	1329.4	1317.6	1305.7	1297.5	1293.8	1295.3
6°	1327.5	1314.7	1301.6	1292.9	1289.0	1290.5
6.5°	1325.3	1311.5	1297.5	1288.0	1283.9	1285.6
7°	1323.2	1308.4	1293.1	1283.2	1278.8	1280.8
7.5°	1320.7	1304.7	1288.8	1278.1	1273.5	1275.7
8°	1318.1	1301.1	1284.2	1272.8	1268.2	1270.4
8.5°	1315.4	1297.2	1279.3	1267.4	1262.6	1265.0
9°	1312.3	1293.4	1274.5	1261.9	1256.8	1259.5
9.5°	1309.3	1289.2	1269.4	1256.3	1251.0	1254.1
10°	1306.0	1284.9	1264.1	1250.5	1245.2	1248.3
10.5°	1302.6	1280.8	1258.7	1244.4	1239.1	1242.7
11°	1298.9	1275.9	1253.2	1238.6	1233.1	1236.7
11.5°	1295.3	1271.1	1247.3	1232.3	1226.8	1230.6
12°	1291.2	1266.2	1241.5	1226.0	1220.2	1224.3
12.5°	1287.1	1261.1	1235.5	1219.5	1213.7	1218.3
13°	1282.7	1256.1	1229.4	1212.9	1207.1	1211.7
13.5°	1278.3	1250.5	1223.1	1206.2	1200.6	1205.2
14°	1273.7	1244.9	1216.6	1199.6	1193.6	1198.7
14.5°	1269.1	1239.3	1210.3	1192.6	1186.5	1191.6
15°	1264.1	1233.5	1203.5	1185.3	1179.5	1184.9
15.5°	1259.0	1227.5	1196.5	1178.1	1172.0	1177.8
16°	1253.6	1221.2	1189.7	1170.8	1165.0	1170.8
16.5°	1248.3	1214.9	1182.4	1163.3	1157.5	1163.5
17°	1242.7	1208.3	1175.2	1155.8	1150.0	1156.0
17.5°	1236.9	1201.6	1167.7	1147.8	1142.2	1148.5
18°	1230.9	1194.8	1160.1	1140.3	1134.5	1141.3
18.5°	1224.8	1187.8	1152.4	1132.1	1126.2	1133.5
19°	1218.8	1180.7	1144.4	1124.3	1118.5	1125.3
19.5°	1212.2	1173.5	1136.4	1115.8	1110.3	1117.5
20°	1205.7	1166.0	1128.2	1107.6	1102.0	1109.8
20.5°	1198.9	1158.5	1119.9	1098.9	1093.8	1101.5
21°	1192.1	1150.7	1111.5	1090.4	1085.1	1092.8

TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
22.5°	1170.8	1126.7	1085.6	1063.8	1058.9	1067.9
23°	1163.3	1118.5	1076.8	1054.8	1049.9	1059.2
23.5°	1155.8	1110.0	1067.9	1045.8	1041.0	1050.2
24°	1147.8	1101.3	1058.7	1036.6	1031.8	1041.2
24.5°	1140.0	1092.8	1049.5	1026.9	1022.6	1032.3
25°	1132.1	1083.9	1039.8	1017.5	1013.1	1023.1
25.5°	1123.8	1075.4	1030.6	1008.0	1003.7	1013.9
26°	1115.6	1066.2	1021.1	998.4	994.2	1004.4
26.5°	1107.1	1057.2	1011.4	988.4	984.6	995.0
27°	1098.6	1047.8	1001.7	978.5	974.9	985.3
27.5°	1089.9	1038.6	991.8	968.6	964.9	975.6
28°	1081.2	1029.1	981.9	958.6	954.8	965.9
28.5°	1072.2	1019.4	972.0	948.5	944.8	955.7
29°	1063.3	1010.0	961.8	938.0	934.9	945.8
29.5°	1054.1	1000.3	951.6	927.6	924.5	935.9
30°	1044.9	990.6	941.4	917.5	914.1	925.7
30.5°	1035.7	980.4	931.0	906.8	903.9	915.3
31°	1026.5	970.5	920.6	896.4	893.2	904.9
31.5°	1016.8	960.3	910.0	885.7	882.8	894.2
32°	1007.3	950.2	899.3	874.8	871.9	883.8
32.5°	997.4	940.0	888.9	864.2	861.3	873.1
33°	987.7	929.8	878.2	853.3	850.4	862.5
33.5°	977.8	919.2	867.6	842.4	839.5	851.6
34°	967.8	909.0	856.4	831.5	828.3	840.4
34.5°	958.2	898.3	845.8	820.6	817.4	829.5
35°	948.0	887.9	834.6	809.4	806.0	818.4
35.5°	937.8	877.5	823.7	798.1	795.1	807.3
36°	927.6	866.6	813.1	787.2	783.5	795.9
36.5°	917.5	856.2	801.9	776.0	772.6	784.5
37°	907.0	845.5	791.0	764.6	761.0	773.1
37.5°	896.6	834.9	780.1	753.2	749.6	761.7
38°	886.2	824.0	769.0	741.9	738.0	749.9
38.5°	875.8	813.1	758.1	730.7	726.6	738.2
39°	865.6	802.4	746.7	719.3	715.0	726.8
39.5°	855.0	791.8	735.8	708.0	703.4	715.2
40°	844.3	780.9	724.7	696.6	691.7	702.9
40.5°	833.9	770.0	713.8	685.2	680.1	691.2
41°	823.2	758.8	702.6	673.8	668.0	679.1
41.5°	812.8	748.4	691.2	662.4	656.4	667.3
42°	802.2	737.7	680.3	650.8	644.7	654.9
42.5°	791.3	726.6	669.4	639.4	632.9	643.3
43°	780.6	715.7	658.5	627.8	620.8	630.9
43.5°	770.0	705.1	647.2	616.6	609.1	618.6



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
45°	737.5	672.4	614.2	582.3	573.1	582.0
45.5°	726.6	661.9	603.1	571.1	561.4	569.7
46°	715.9	651.3	592.4	559.7	549.6	557.3
46.5°	704.8	640.1	581.3	548.3	537.4	545.0
47°	693.7	629.2	570.6	537.0	525.6	532.8
47.5°	682.5	618.6	559.2	525.6	513.5	520.3
48°	671.1	607.7	548.8	514.4	501.6	507.4
48.5°	660.0	596.8	537.7	503.1	489.7	495.3
49°	648.6	586.1	527.0	491.9	477.9	483.0
49.5°	637.0	575.2	516.1	480.5	466.2	470.6
50°	625.9	564.3	505.2	469.4	454.1	458.0
50.5°	614.7	553.2	494.3	458.5	442.3	445.4
51°	603.8	542.3	483.7	447.3	430.6	433.1
51.5°	592.9	531.9	473.0	436.0	419.0	420.9
52°	582.7	521.7	462.6	425.3	407.4	408.4
52.5°	571.8	511.5	452.2	414.4	395.5	396.2
53°	560.5	501.4	442.3	403.8	383.9	383.6
53.5°	548.3	490.9	431.8	392.9	372.5	371.3
54°	535.3	480.0	421.7	382.2	360.9	359.2
54.5°	522.2	468.9	411.3	372.0	349.5	347.1
55°	507.7	457.3	400.6	361.6	338.4	334.7
55.5°	493.1	444.9	389.5	350.7	327.2	322.9
56°	477.9	432.6	378.6	340.3	316.3	310.7
56.5°	462.8	420.0	367.4	329.4	305.2	298.9
57°	446.9	406.9	356.3	318.7	294.3	287.0
57.5°	431.4	393.6	344.9	307.8	283.4	275.1
58°	415.4	380.3	333.8	297.4	272.7	264.0
58.5°	399.4	366.9	321.9	286.8	262.1	252.4
59°	383.6	353.1	310.5	276.1	251.4	241.0
59.5°	367.9	339.6	298.9	265.5	240.7	229.6
60°	351.9	326.0	287.0	255.0	230.1	218.7
60.5°	336.4	312.4	275.1	244.1	219.7	207.8
61°	321.2	298.9	263.3	233.7	209.3	197.2
61.5°	305.7	285.6	251.4	223.3	199.1	186.3
62°	290.4	272.2	239.8	212.9	189.2	176.1
62.5°	275.9	259.2	227.9	202.2	179.0	165.9
63°	261.3	246.3	216.0	191.8	169.3	156.0
63.5°	247.3	233.5	204.7	180.9	159.6	145.8
64°	234.0	220.9	193.3	170.5	150.4	136.6
64.5°	221.1	209.0	182.1	160.1	141.2	127.4
65°	208.3	197.2	171.0	150.2	132.2	118.4
65.5°	195.7	185.0	160.6	139.8	123.0	109.7
66°	182.9	173.4	149.7	129.6	114.6	101.5



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL5125CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
67.5°	148.2	141.7	120.1	102.0	89.4	80.2
68°	138.3	131.5	110.7	93.2	82.6	74.1
68.5°	128.6	121.8	101.7	84.5	75.8	68.3
69°	119.4	112.9	93.2	78.0	69.3	62.2
69.5°	110.9	104.4	84.8	71.4	62.5	57.6
70°	103.2	96.2	78.2	64.7	55.7	54.3
70.5°	95.4	88.6	71.9	58.1	50.9	52.1
71°	88.2	82.3	65.4	52.6	47.5	49.7
71.5°	81.6	76.1	58.9	48.0	45.0	47.2
72°	75.1	70.0	53.5	43.8	42.9	44.8
72.5°	69.5	63.7	48.7	40.2	40.7	42.4
73°	63.9	57.6	44.1	37.1	38.5	40.0
73.5°	58.6	52.3	40.0	34.2	36.3	37.8
74°	53.8	47.7	36.3	31.7	34.2	35.6
74.5°	48.9	43.4	33.2	29.8	32.2	33.4
75°	44.6	39.5	30.0	27.9	30.3	31.2
75.5°	40.4	35.6	27.4	26.2	28.3	29.3
76°	36.8	32.2	24.7	24.5	26.4	27.4
76.5°	32.9	28.8	22.5	23.0	24.7	25.7
77°	29.8	25.9	20.6	21.3	23.0	24.0
77.5°	26.6	23.3	18.6	20.1	21.3	22.3
78°	24.0	20.8	17.0	18.6	19.9	20.6
78.5°	21.6	18.4	15.5	17.2	18.4	19.1
79°	18.9	16.5	14.0	16.0	17.0	17.7
79.5°	16.5	14.5	12.8	14.5	15.5	16.2
80°	14.0	12.6	11.6	13.3	14.0	14.8
80.5°	12.1	11.1	10.7	12.1	12.8	13.6
81°	10.4	9.7	9.7	11.1	11.6	12.4
81.5°	8.7	8.7	8.7	9.9	10.4	11.1
82°	7.3	7.8	7.8	9.0	9.2	9.9
82.5°	6.1	6.5	6.8	8.0	8.2	9.0
83°	4.8	5.6	6.1	7.0	7.3	7.8
83.5°	3.9	4.6	5.1	6.1	6.3	6.8
84°	3.1	3.9	4.4	5.1	5.3	6.1
84.5°	2.2	3.1	3.9	4.4	4.4	5.1
85°	1.7	2.7	3.1	3.6	3.6	4.4
85.5°	1.2	1.9	2.4	3.1	2.9	3.6
86°	0.7	1.5	1.9	2.4	2.4	2.9
86.5°	0.2	1.0	1.2	1.7	1.9	2.2
87°	0.0	0.5	0.7	1.2	1.5	1.7
87.5°	0.0	0.2	0.2	0.7	1.0	1.2
88°	0.0	0.0	0.0	0.2	0.5	1.0
88.5°	0.0	0.0	0.0	0.0	0.2	0.5



TEST NUMBER: P776135

CATALOG NUMBER: HCDJBL51525CSD-HCD81TRH-HCD81TRLWW-2500lm-2700K

CANDELA DISTRIBUTION (continued):

	247.5°	270°	292.5°	315°	337.5°	360°
90°	0.0	0.0	0.0	0.0	0.0	0.0



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1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report





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

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Peachtree City, GA 30269

Scaled Data Report



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Scaled Data Report





21.5°	1084.6	1121.4	1151.2	1190.9	1229.9	1279.1	1313.7	1325.6	1317.1	1281.0	1239.1
22°	1076.3	1113.6	1143.7	1183.9	1223.8	1274.0	1309.3	1321.2	1312.7	1275.7	1232.8



44°	606.5	661.7	702.1	757.4	815.3	899.3	964.7	988.7	975.6	913.8	846.0
44.5°	594.4	649.6	690.8	746.2	804.1	888.6	954.5	978.5	965.7	903.4	835.4



66.5°	93.7	146.0	190.1	235.7	258.7	290.9	305.9	297.7	271.0	220.4	196.7
67°	86.0	136.4	179.5	223.6	245.1	274.9	288.9	280.5	253.6	207.3	183.8



89°	0.2	1.5	2.4	2.7	1.5	1.2	0.7	0.2	0.0	0.0	0.0
89.5°	0.0	1.0	1.7	1.9	1.0	0.7	0.2	0.0	0.0	0.0	0.0

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21.5°	1185.1	1142.7	1103.0	1081.7	1076.3	1084.6
22°	1177.8	1134.7	1094.5	1072.7	1067.9	1076.3



44°	759.3	694.4	636.0	605.0	597.3	606.5
44.5°	748.2	683.3	625.1	593.9	585.2	594.4



66.5°	170.3	162.8	139.5	120.1	105.8	93.7
67°	158.6	151.9	129.3	110.7	97.4	86.0

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89°	0.0	0.0	0.0	0.0	0.0	0.2
89.5°	0.0	0.0	0.0	0.0	0.0	0.0

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(END OF REPORT)