

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P522605

Luminaire Tested: **SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)**

Issue Date: 5/11/2021

Test Information

Test Method: LM-79-08
Report Number: P522605
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-53,
Test Lab: INNOVATION CENTER
Issue Date: 5/11/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)
Description: CORELITE SQW WALL MOUNTED LED LUMINAIRE
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 1000 LUMENS PER FOOT
Light Source: 3000K/5000K CCT, 90 CRI LEDS, TUNED TO 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

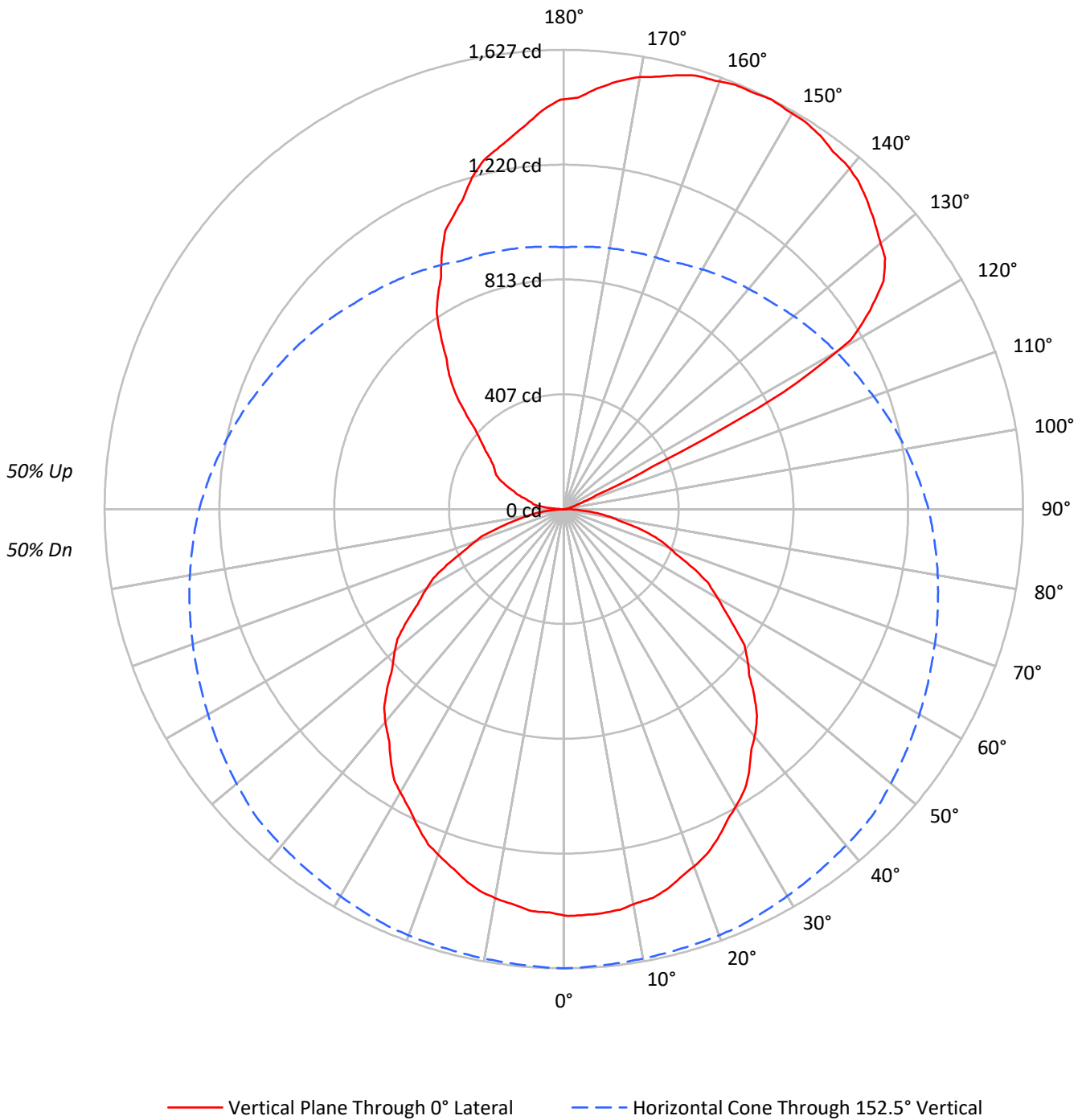
Lumens per Lamp: N/A
Luminaire Lumens: 8060.4 lumens
Efficiency: N/A
Efficacy: 102.4 lumens/watt
Spacing Criteria (0/90/45): 1.23 / 1.26 / 1.36
Luminous Opening: Rectangular (W 4' x L: 0.17' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 78.7
Input Voltage (V): 120
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: P522605
CATALOG NUMBER: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)

Luminous Intensity Polar Plot





TEST NUMBER: P522605

CATALOG NUMBER: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

| | | | | | | | | | | | | | | | | | | |
|-----|-----|-----|-----|-----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|
| RF | 20 | | | | 20 | | | | 20 | | | | 20 | | | | 20 | |
| RC | 80 | | | | 70 | | | | 50 | | | | 30 | | | | 10 | 0 |
| RW | 70 | 50 | 30 | 10 | 70 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 | 50 | 30 | 10 | 0 |
| RCR | | | | | | | | | | | | | | | | | | |
| 0 | 107 | 107 | 107 | 107 | 99 | 99 | 99 | 99 | 83 | 83 | 83 | 69 | 69 | 69 | 56 | 56 | 56 | 50 |
| 1 | 98 | 93 | 89 | 86 | 90 | 86 | 83 | 80 | 73 | 70 | 68 | 61 | 59 | 57 | 49 | 48 | 47 | 42 |
| 2 | 89 | 81 | 75 | 70 | 82 | 75 | 70 | 65 | 64 | 60 | 56 | 53 | 50 | 48 | 43 | 41 | 39 | 35 |
| 3 | 81 | 71 | 64 | 58 | 74 | 66 | 60 | 54 | 56 | 51 | 47 | 47 | 43 | 40 | 38 | 36 | 33 | 29 |
| 4 | 74 | 63 | 55 | 49 | 68 | 58 | 51 | 46 | 50 | 44 | 40 | 42 | 38 | 34 | 34 | 31 | 29 | 25 |
| 5 | 68 | 56 | 48 | 42 | 62 | 52 | 45 | 39 | 44 | 39 | 34 | 37 | 33 | 30 | 31 | 27 | 25 | 22 |
| 6 | 62 | 50 | 42 | 36 | 57 | 47 | 39 | 34 | 40 | 34 | 30 | 34 | 29 | 26 | 28 | 24 | 22 | 19 |
| 7 | 58 | 45 | 37 | 32 | 53 | 42 | 35 | 30 | 36 | 30 | 26 | 31 | 26 | 23 | 25 | 22 | 19 | 17 |
| 8 | 53 | 41 | 33 | 28 | 49 | 38 | 31 | 26 | 33 | 27 | 23 | 28 | 23 | 20 | 23 | 20 | 17 | 15 |
| 9 | 50 | 37 | 30 | 25 | 46 | 35 | 28 | 23 | 30 | 25 | 21 | 26 | 21 | 18 | 21 | 18 | 16 | 13 |
| 10 | 46 | 34 | 27 | 22 | 43 | 32 | 25 | 21 | 28 | 22 | 19 | 24 | 19 | 16 | 20 | 17 | 14 | 12 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 90° | 180° |
|-----|-------|-------|-------|
| 0° | 23269 | 23269 | 23269 |
| 5° | 23308 | 23538 | 23161 |
| 10° | 23263 | 23463 | 22982 |
| 15° | 23280 | 23330 | 22806 |
| 20° | 23077 | 23199 | 22471 |
| 25° | 22830 | 22992 | 22110 |
| 30° | 22592 | 22723 | 21707 |
| 35° | 22330 | 22391 | 21335 |
| 40° | 22025 | 22110 | 20896 |
| 45° | 21623 | 21783 | 20400 |
| 50° | 21197 | 21401 | 19826 |
| 55° | 20569 | 20966 | 19175 |
| 60° | 19972 | 20496 | 18406 |
| 65° | 19228 | 19924 | 17490 |
| 70° | 18227 | 18940 | 16173 |
| 75° | 16962 | 17654 | 14311 |
| 80° | 15221 | 15035 | 11836 |
| 85° | 11801 | 11986 | 7484 |



TEST NUMBER: P522605

CATALOG NUMBER: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 136.4 | 1.7 |
| 10°-20° | 389.6 | 4.8 |
| 20°-30° | 586.0 | 7.3 |
| 30°-40° | 700.1 | 8.7 |
| 40°-50° | 719.8 | 8.9 |
| 50°-60° | 648.0 | 8.0 |
| 60°-70° | 493.4 | 6.1 |
| 70°-80° | 281.3 | 3.5 |
| 80°-90° | 73.8 | 0.9 |
| 90°-100° | 36.6 | 0.5 |
| 100°-110° | 162.5 | 2.0 |
| 110°-120° | 467.0 | 5.8 |
| 120°-130° | 711.3 | 8.8 |
| 130°-140° | 772.1 | 9.6 |
| 140°-150° | 738.4 | 9.2 |
| 150°-160° | 608.3 | 7.5 |
| 160°-170° | 398.1 | 4.9 |
| 170°-180° | 137.8 | 1.7 |
| 0°-30° | 1111.9 | 13.8 |
| 0°-40° | 1812.0 | 22.5 |
| 0°-60° | 3179.7 | 39.4 |
| 0°-90° | 4028.3 | 50.0 |
| 90°-120° | 666.1 | 8.3 |
| 90°-150° | 2888.0 | 35.8 |
| 90°-180° | 4032.0 | 50.0 |
| 0°-180° | 8060.4 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 45° | 90° | 135° | 180° | Flux |
|------|------|------|------|------|------|------|
| 0° | 1441 | 1441 | 1441 | 1441 | 1441 | |
| 5° | 1438 | 1436 | 1452 | 1432 | 1429 | 137 |
| 15° | 1393 | 1393 | 1396 | 1376 | 1364 | 392 |
| 25° | 1282 | 1293 | 1291 | 1263 | 1241 | 590 |
| 35° | 1133 | 1146 | 1136 | 1108 | 1082 | 708 |
| 45° | 947 | 954 | 954 | 918 | 893 | 729 |
| 55° | 731 | 747 | 745 | 707 | 681 | 656 |
| 65° | 503 | 516 | 522 | 479 | 458 | 497 |
| 75° | 272 | 280 | 283 | 250 | 229 | 288 |
| 85° | 64 | 69 | 65 | 54 | 40 | 75 |
| 90° | 0 | 0 | 0 | 0 | 0 | 2 |
| 95° | 5 | 8 | 26 | 57 | 55 | 7 |
| 105° | 36 | 99 | 187 | 128 | 136 | 42 |
| 115° | 350 | 921 | 470 | 220 | 247 | 484 |
| 125° | 1391 | 1211 | 750 | 372 | 316 | 1221 |
| 135° | 1533 | 1388 | 995 | 616 | 491 | 1184 |
| 145° | 1605 | 1494 | 1187 | 877 | 749 | 1005 |
| 155° | 1621 | 1555 | 1329 | 1100 | 1003 | 750 |
| 165° | 1587 | 1547 | 1425 | 1280 | 1218 | 450 |
| 175° | 1494 | 1498 | 1468 | 1403 | 1370 | 144 |
| 180° | 1451 | 1451 | 1451 | 1451 | 1451 | |



TEST NUMBER: P522605

CATALOG NUMBER: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° | 112.5° | 135° | 157.5° | 180° |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0° | 1441.2 | 1441.2 | 1441.2 | 1441.2 | 1441.2 | 1441.2 | 1441.2 | 1441.2 | 1441.2 |
| 2.5° | 1439.6 | 1442.7 | 1441.2 | 1439.0 | 1451.7 | 1437.5 | 1439.6 | 1437.8 | 1429.9 |
| 5° | 1438.1 | 1437.2 | 1436.1 | 1437.5 | 1452.3 | 1433.5 | 1432.1 | 1429.0 | 1429.0 |
| 7.5° | 1432.7 | 1431.7 | 1430.5 | 1426.3 | 1438.3 | 1419.8 | 1420.4 | 1417.2 | 1413.1 |
| 10° | 1418.9 | 1421.9 | 1420.0 | 1418.2 | 1431.1 | 1409.3 | 1409.8 | 1406.7 | 1401.8 |
| 12.5° | 1412.5 | 1412.3 | 1411.1 | 1405.3 | 1417.3 | 1395.6 | 1395.3 | 1391.4 | 1388.0 |
| 15° | 1392.7 | 1391.7 | 1392.7 | 1382.8 | 1395.7 | 1375.9 | 1375.5 | 1367.3 | 1364.4 |
| 17.5° | 1364.2 | 1365.7 | 1367.2 | 1357.2 | 1368.8 | 1345.3 | 1345.0 | 1335.4 | 1333.6 |
| 20° | 1343.1 | 1343.1 | 1350.2 | 1339.3 | 1350.2 | 1327.5 | 1328.0 | 1308.8 | 1307.8 |
| 22.5° | 1318.1 | 1319.7 | 1327.6 | 1316.7 | 1326.0 | 1302.4 | 1301.3 | 1285.2 | 1281.1 |
| 25° | 1281.5 | 1282.5 | 1292.6 | 1279.7 | 1290.6 | 1265.9 | 1263.3 | 1242.1 | 1241.1 |
| 27.5° | 1241.7 | 1241.3 | 1253.4 | 1238.4 | 1247.1 | 1225.2 | 1222.1 | 1199.6 | 1198.2 |
| 30° | 1211.8 | 1209.8 | 1225.9 | 1210.9 | 1218.8 | 1196.1 | 1194.6 | 1167.2 | 1164.3 |
| 32.5° | 1180.2 | 1179.0 | 1193.6 | 1181.0 | 1186.5 | 1165.3 | 1157.4 | 1134.9 | 1133.5 |
| 35° | 1132.9 | 1129.0 | 1146.1 | 1133.0 | 1136.0 | 1116.2 | 1107.7 | 1084.4 | 1082.4 |
| 37.5° | 1079.0 | 1077.2 | 1089.7 | 1081.5 | 1086.2 | 1065.5 | 1051.3 | 1029.0 | 1027.8 |
| 40° | 1045.0 | 1040.1 | 1054.1 | 1045.1 | 1049.0 | 1028.3 | 1015.7 | 993.4 | 991.4 |
| 42.5° | 1003.8 | 1003.6 | 1015.3 | 1007.9 | 1012.7 | 991.1 | 975.3 | 953.8 | 951.0 |
| 45° | 947.0 | 944.0 | 954.0 | 952.1 | 954.0 | 931.3 | 917.7 | 893.4 | 893.4 |
| 47.5° | 884.3 | 882.3 | 895.8 | 890.4 | 893.2 | 873.4 | 855.8 | 834.1 | 830.5 |
| 50° | 843.9 | 841.9 | 853.0 | 850.0 | 852.0 | 832.2 | 814.6 | 791.3 | 789.3 |
| 52.5° | 801.8 | 799.9 | 811.7 | 807.9 | 809.1 | 791.7 | 772.5 | 751.6 | 748.1 |
| 55° | 730.7 | 735.6 | 746.9 | 745.8 | 744.8 | 727.1 | 707.4 | 686.1 | 681.2 |
| 57.5° | 669.4 | 671.4 | 679.4 | 680.9 | 677.5 | 665.9 | 642.0 | 621.2 | 616.1 |
| 60° | 618.5 | 624.4 | 635.7 | 635.7 | 634.7 | 619.9 | 594.3 | 575.9 | 570.0 |
| 62.5° | 571.6 | 578.3 | 588.0 | 590.4 | 589.4 | 571.4 | 549.8 | 532.2 | 524.7 |
| 65° | 503.3 | 508.2 | 516.4 | 521.5 | 521.5 | 501.7 | 479.0 | 462.8 | 457.8 |
| 67.5° | 432.2 | 438.1 | 445.7 | 451.7 | 448.9 | 430.5 | 410.9 | 396.2 | 387.9 |
| 70° | 386.1 | 392.0 | 397.2 | 403.2 | 401.2 | 384.4 | 364.8 | 348.5 | 342.6 |
| 72.5° | 339.2 | 345.9 | 350.3 | 355.5 | 352.7 | 335.9 | 318.8 | 304.0 | 296.5 |
| 75° | 271.9 | 273.8 | 279.9 | 284.0 | 283.0 | 266.2 | 249.6 | 237.3 | 229.4 |
| 77.5° | 205.8 | 206.6 | 211.6 | 213.3 | 208.6 | 197.9 | 184.5 | 174.9 | 167.0 |
| 80° | 163.7 | 163.7 | 168.8 | 169.6 | 161.7 | 155.8 | 142.5 | 135.2 | 127.3 |
| 82.5° | 120.9 | 121.7 | 128.4 | 128.4 | 122.1 | 115.4 | 106.1 | 98.1 | 93.4 |
| 85° | 63.7 | 64.7 | 68.7 | 71.6 | 64.7 | 60.7 | 53.6 | 45.4 | 40.4 |
| 87.5° | 17.0 | 17.8 | 23.4 | 26.5 | 20.2 | 20.2 | 12.9 | 8.9 | 7.3 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 92.5° | 1.1 | 1.1 | 2.2 | 3.3 | 5.4 | 20.2 | 22.7 | 20.5 | 19.5 |
| 95° | 5.4 | 5.4 | 8.1 | 25.7 | 25.7 | 41.5 | 56.8 | 55.4 | 55.4 |
| 97.5° | 12.2 | 13.5 | 18.9 | 78.2 | 58.4 | 56.8 | 81.1 | 89.2 | 90.0 |
| 100° | 17.6 | 18.9 | 29.7 | 127.5 | 86.5 | 73.3 | 86.5 | 105.5 | 109.5 |
| 102.5° | 24.1 | 26.4 | 47.0 | 201.3 | 122.2 | 87.8 | 101.7 | 115.3 | 119.2 |
| 105° | 36.5 | 40.5 | 98.7 | 337.3 | 186.6 | 116.5 | 128.4 | 135.2 | 136.5 |
| 107.5° | 54.9 | 69.7 | 270.1 | 474.4 | 264.7 | 154.2 | 161.1 | 165.8 | 167.4 |
| 110° | 74.4 | 106.1 | 469.1 | 557.1 | 323.1 | 183.0 | 178.5 | 190.6 | 187.9 |



TEST NUMBER: P522605

CATALOG NUMBER: SQW-F-100U-100D-93050-1D-UNV-STD-W-4 (4000K)

CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° | 112.5° | 135° | 157.5° | 180° |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 112.5° | 125.2 | 218.2 | 688.7 | 625.0 | 381.5 | 217.1 | 194.7 | 214.5 | 216.0 |
| 115° | 350.1 | 601.3 | 920.7 | 721.6 | 470.5 | 276.2 | 220.4 | 239.5 | 247.4 |
| 117.5° | 878.8 | 1045.6 | 1042.9 | 811.0 | 555.9 | 345.7 | 251.2 | 260.3 | 269.3 |
| 120° | 1181.6 | 1206.7 | 1104.5 | 871.5 | 611.1 | 395.6 | 277.1 | 273.3 | 281.2 |
| 122.5° | 1294.1 | 1273.7 | 1151.0 | 924.5 | 667.3 | 447.6 | 310.7 | 287.3 | 294.2 |
| 125° | 1391.1 | 1351.5 | 1211.3 | 1000.2 | 750.3 | 524.3 | 371.8 | 317.7 | 316.4 |
| 127.5° | 1444.9 | 1403.4 | 1270.3 | 1065.8 | 826.6 | 604.0 | 441.3 | 360.7 | 348.5 |
| 130° | 1470.9 | 1432.6 | 1311.4 | 1106.1 | 877.4 | 658.0 | 492.1 | 398.4 | 379.9 |
| 132.5° | 1502.3 | 1460.8 | 1340.6 | 1147.4 | 926.1 | 708.8 | 542.9 | 443.7 | 422.1 |
| 135° | 1533.1 | 1494.7 | 1388.4 | 1201.2 | 995.0 | 783.5 | 616.5 | 518.5 | 490.7 |
| 137.5° | 1560.7 | 1525.5 | 1432.2 | 1243.6 | 1057.2 | 857.1 | 694.3 | 598.9 | 565.1 |
| 140° | 1579.0 | 1540.7 | 1450.6 | 1276.2 | 1095.1 | 903.4 | 746.3 | 651.0 | 624.6 |
| 142.5° | 1585.5 | 1562.0 | 1470.1 | 1303.5 | 1137.2 | 947.7 | 798.2 | 699.7 | 675.4 |
| 145° | 1604.7 | 1588.9 | 1493.9 | 1336.4 | 1187.0 | 1013.8 | 877.4 | 775.4 | 749.0 |
| 147.5° | 1617.2 | 1593.4 | 1515.8 | 1371.8 | 1235.7 | 1073.1 | 949.3 | 851.4 | 826.8 |
| 150° | 1618.3 | 1599.7 | 1533.1 | 1393.7 | 1268.1 | 1116.1 | 993.7 | 901.2 | 878.8 |
| 152.5° | 1626.9 | 1604.2 | 1541.7 | 1412.2 | 1291.9 | 1152.6 | 1038.0 | 952.0 | 927.4 |
| 155° | 1621.0 | 1605.1 | 1554.7 | 1436.0 | 1328.9 | 1199.4 | 1100.5 | 1024.3 | 1003.1 |
| 157.5° | 1621.0 | 1601.4 | 1556.3 | 1454.5 | 1364.6 | 1251.0 | 1158.9 | 1088.5 | 1072.6 |
| 160° | 1610.1 | 1602.2 | 1557.4 | 1467.6 | 1383.0 | 1279.9 | 1197.8 | 1133.8 | 1112.6 |
| 162.5° | 1605.8 | 1592.6 | 1559.6 | 1476.4 | 1399.2 | 1303.5 | 1231.3 | 1170.7 | 1154.8 |
| 165° | 1587.2 | 1575.3 | 1546.6 | 1480.4 | 1424.9 | 1345.6 | 1280.3 | 1226.0 | 1218.1 |
| 167.5° | 1565.8 | 1556.5 | 1537.7 | 1486.9 | 1442.0 | 1377.2 | 1322.2 | 1278.4 | 1267.6 |
| 170° | 1550.7 | 1536.1 | 1529.0 | 1490.3 | 1450.6 | 1396.4 | 1349.2 | 1309.7 | 1297.8 |
| 172.5° | 1524.7 | 1522.8 | 1517.1 | 1482.0 | 1458.2 | 1413.5 | 1374.1 | 1338.0 | 1330.3 |
| 175° | 1493.9 | 1493.9 | 1497.9 | 1476.1 | 1468.2 | 1431.2 | 1403.3 | 1381.4 | 1369.5 |
| 177.5° | 1458.2 | 1459.2 | 1467.9 | 1466.9 | 1467.9 | 1446.8 | 1438.7 | 1418.1 | 1416.0 |
| 180° | 1450.6 | 1450.6 | 1450.6 | 1450.6 | 1450.6 | 1450.6 | 1450.6 | 1450.6 | 1450.6 |

(END OF REPORT)