

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: McGRAW-EDISON

Report Number: P198101

Luminaire Tested: **TT-C5-LED-E1-RW-SG-LWR-LW-8030**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P198101  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P34701)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: MCGRAW-EDISON  
Catalog Number: TT-C5-LED-E1-RW-SG-LWR-LW-8030  
Description: TOPTIER LED PARKING GARAGE LUMINAIRE  
RECTANGULAR DISTRIBUTION WITH SOFTENING GLASS LENS AND LumaWatt WIRELESS SENSOR  
Light Source: (160) 3000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5007.5 lumens  
Efficiency: N/A  
Efficacy: 65.0 lumens/watt  
Luminous Opening: Circular (Dia: 1.12' x H: 0')  
IES Classification: Type III - Short - Full Cutoff  
BUG Rating: B2 - U0 - G2

Input Watts (W): 77  
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: 25 FT



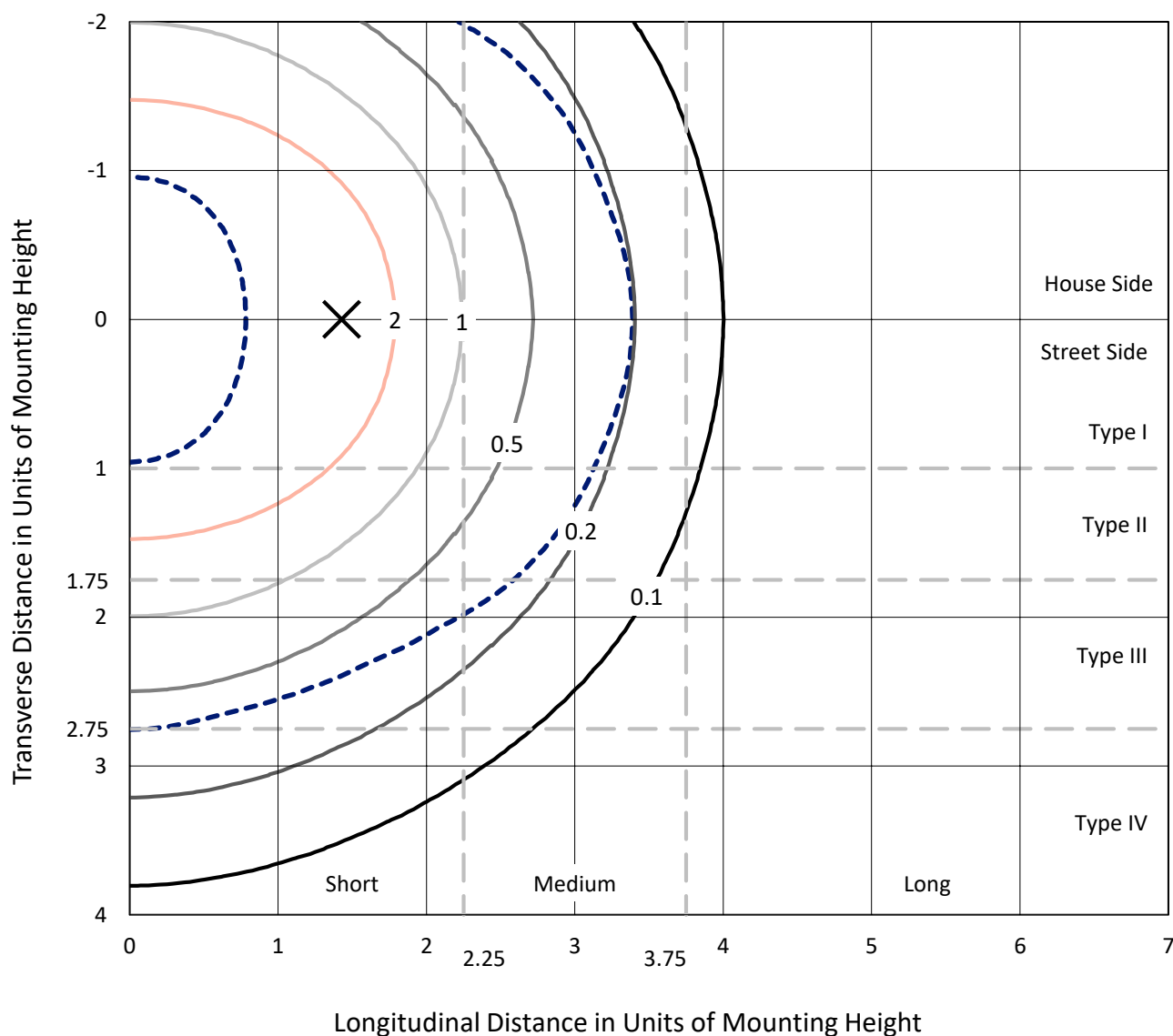
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## Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

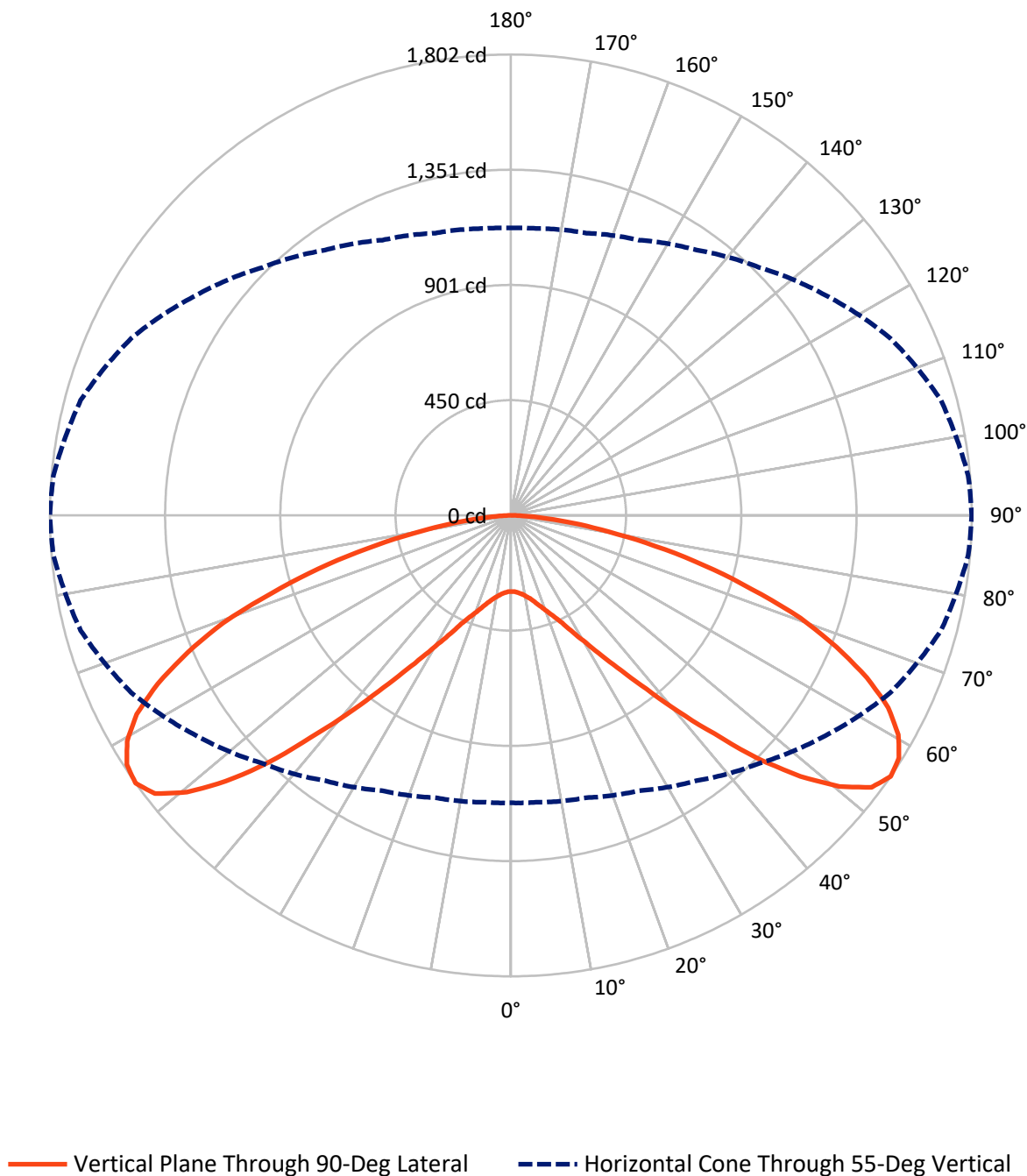


Based on 10 foot mounting height. Maximum calculated value = 4.8 fc  
 Type III - Short - Full Cutoff

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## Luminous Intensity Polar Plot



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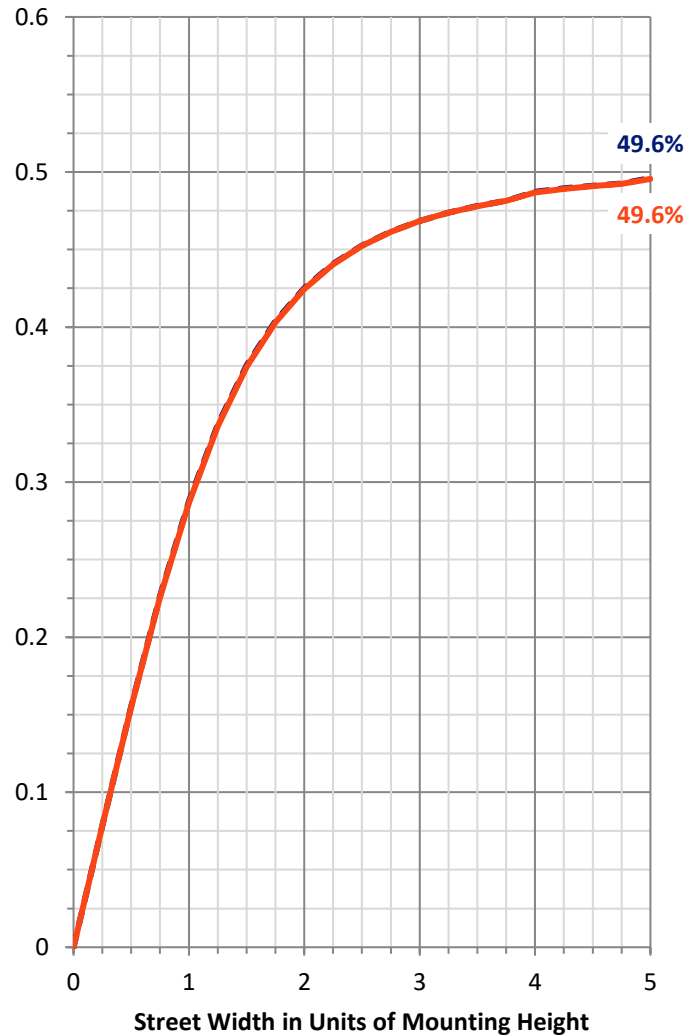
**FLUX DISTRIBUTION:**

|                    |           | Downward | Upward | Total  |
|--------------------|-----------|----------|--------|--------|
| <b>House Side</b>  | Lumens    | 2503.8   | 0.0    | 2503.8 |
|                    | % Fixture | 50.0     | 0.0    | 50.0   |
| <b>Street Side</b> | Lumens    | 2503.8   | 0.0    | 2503.8 |
|                    | % Fixture | 50.0     | 0.0    | 50.0   |
| <b>Total</b>       | Lumens    | 5007.5   | 0.0    | 5007.5 |
|                    | % Fixture | 100.0    | 0.0    | 100.0  |

**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 29.5   | 0.6       |
| 10°-20°   | 102.2  | 2.0       |
| 20°-30°   | 223.3  | 4.5       |
| 30°-40°   | 449.0  | 9.0       |
| 40°-50°   | 848.6  | 16.9      |
| 50°-60°   | 1251.8 | 25.0      |
| 60°-70°   | 1233.0 | 24.6      |
| 70°-80°   | 718.0  | 14.3      |
| 80°-90°   | 152.0  | 3.0       |
| 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°-90°    | 5007.5 | 100.0     |
| 0°-180°   | 5007.5 | 100.0     |

**Coefficient of Utilization**



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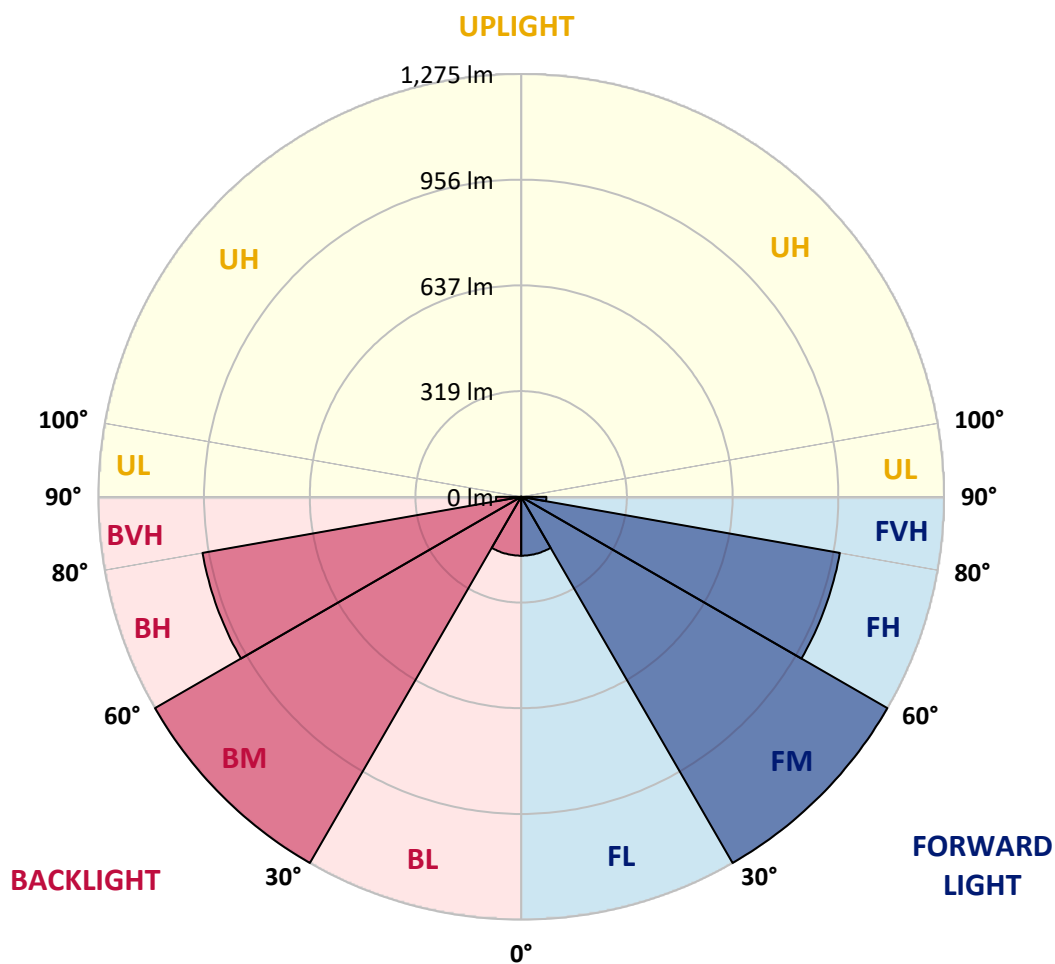
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

| Zone |             | Lumens | % Fixture | Zone Rating/Lumen Limit |      |         |
|------|-------------|--------|-----------|-------------------------|------|---------|
|      |             |        |           | B                       | U    | G       |
| FL   | (0°-30°)    | 177.5  | 3.5       |                         |      |         |
| FM   | (30°-60°)   | 1274.7 | 25.5      |                         |      |         |
| FH   | (60°-80°)   | 975.5  | 19.5      |                         |      | G1/1800 |
| FVH  | (80°-90°)   | 76.0   | 1.5       |                         |      | G1/100  |
| BL   | (0°-30°)    | 177.5  | 3.5       | B1/500                  |      |         |
| BM   | (30°-60°)   | 1274.7 | 25.5      | B2/2500                 |      |         |
| BH   | (60°-80°)   | 975.5  | 19.5      | B2/1000                 |      | G2/1000 |
| BVH  | (80°-90°)   | 76.0   | 1.5       |                         |      | G1/100  |
| UL   | (90°-100°)  | 0.0    | 0.0       |                         | U0/0 |         |
| UH   | (100°-180°) | 0.0    | 0.0       |                         | U0/0 |         |

**BUG Rating: B2-U0-G2**

Type III Short



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**CANDELA DISTRIBUTION (FULL):**

|       | 0°     | 5°     | 15°    | 25°    | 35°    | 45°    | 55°    | 65°    | 75°    | 85°    | 90°    |
|-------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0°    | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  | 297.4  |
| 2.5°  | 299.7  | 299.7  | 299.7  | 299.7  | 298.6  | 299.7  | 298.6  | 298.6  | 298.6  | 298.6  | 298.6  |
| 5°    | 303.2  | 304.4  | 303.2  | 303.2  | 303.2  | 303.2  | 303.2  | 303.2  | 302.1  | 302.1  | 303.2  |
| 7.5°  | 311.3  | 311.3  | 311.3  | 311.3  | 310.2  | 311.3  | 310.2  | 310.2  | 310.2  | 310.2  | 310.2  |
| 10°   | 322.9  | 322.9  | 322.9  | 322.9  | 321.7  | 321.7  | 321.7  | 320.6  | 320.6  | 320.6  | 320.6  |
| 12.5° | 336.8  | 337.9  | 337.9  | 336.8  | 335.6  | 335.6  | 334.5  | 334.5  | 334.5  | 334.5  | 333.3  |
| 15°   | 357.6  | 356.4  | 356.4  | 354.1  | 354.1  | 351.8  | 353.0  | 351.8  | 350.7  | 349.5  | 350.7  |
| 17.5° | 378.4  | 379.6  | 379.6  | 377.3  | 376.1  | 375.0  | 372.6  | 372.6  | 371.5  | 372.6  | 372.6  |
| 20°   | 410.8  | 410.8  | 408.5  | 406.2  | 402.7  | 401.6  | 399.3  | 399.3  | 396.9  | 399.3  | 399.3  |
| 22.5° | 443.2  | 443.2  | 440.9  | 439.8  | 435.1  | 431.7  | 430.5  | 429.4  | 428.2  | 430.5  | 428.2  |
| 25°   | 483.7  | 483.7  | 481.4  | 476.8  | 472.2  | 471.0  | 467.5  | 467.5  | 468.7  | 469.9  | 465.2  |
| 27.5° | 525.4  | 526.6  | 524.2  | 520.8  | 516.1  | 511.5  | 511.5  | 512.7  | 513.8  | 518.5  | 517.3  |
| 30°   | 576.3  | 575.2  | 571.7  | 567.1  | 564.8  | 561.3  | 562.4  | 567.1  | 571.7  | 576.3  | 576.3  |
| 32.5° | 628.4  | 627.2  | 626.1  | 621.5  | 620.3  | 619.1  | 624.9  | 634.2  | 643.4  | 646.9  | 652.7  |
| 35°   | 684.0  | 684.0  | 682.8  | 679.3  | 681.6  | 687.4  | 696.7  | 714.0  | 727.9  | 744.1  | 744.1  |
| 37.5° | 745.3  | 743.0  | 744.1  | 744.1  | 749.9  | 760.3  | 782.3  | 815.9  | 844.8  | 861.0  | 861.0  |
| 40°   | 808.9  | 805.5  | 806.6  | 812.4  | 822.8  | 848.3  | 886.5  | 932.8  | 979.1  | 999.9  | 1006.8 |
| 42.5° | 870.3  | 866.8  | 871.4  | 877.2  | 902.7  | 942.0  | 998.7  | 1069.3 | 1135.3 | 1167.7 | 1166.5 |
| 45°   | 927.0  | 929.3  | 935.1  | 949.0  | 986.0  | 1043.9 | 1124.9 | 1219.8 | 1305.4 | 1343.6 | 1357.5 |
| 47.5° | 983.7  | 984.8  | 992.9  | 1017.3 | 1069.3 | 1142.2 | 1240.6 | 1366.8 | 1461.6 | 1506.8 | 1524.1 |
| 50°   | 1036.9 | 1039.2 | 1053.1 | 1087.8 | 1149.2 | 1237.1 | 1358.7 | 1492.9 | 1597.1 | 1650.3 | 1665.3 |
| 52.5° | 1084.4 | 1086.7 | 1102.9 | 1145.7 | 1218.6 | 1320.5 | 1447.8 | 1585.5 | 1695.4 | 1756.8 | 1766.0 |
| 55°   | 1123.7 | 1126.0 | 1142.2 | 1187.4 | 1266.1 | 1371.4 | 1501.0 | 1637.6 | 1740.6 | 1794.9 | 1801.9 |
| 57.5° | 1146.9 | 1148.0 | 1165.4 | 1211.7 | 1289.2 | 1387.6 | 1512.6 | 1644.5 | 1734.8 | 1783.4 | 1789.2 |
| 60°   | 1148.0 | 1150.3 | 1166.5 | 1208.2 | 1280.0 | 1370.2 | 1489.4 | 1607.5 | 1689.6 | 1733.6 | 1740.6 |
| 62.5° | 1127.2 | 1128.4 | 1142.2 | 1174.6 | 1236.0 | 1314.7 | 1424.6 | 1531.1 | 1605.2 | 1648.0 | 1656.1 |
| 65°   | 1079.7 | 1079.7 | 1086.7 | 1111.0 | 1158.4 | 1225.6 | 1319.3 | 1417.7 | 1486.0 | 1525.3 | 1529.9 |
| 67.5° | 1001.1 | 1001.1 | 1002.2 | 1018.4 | 1050.8 | 1104.0 | 1183.9 | 1266.1 | 1327.4 | 1366.8 | 1372.5 |
| 70°   | 900.4  | 899.2  | 890.0  | 900.4  | 921.2  | 966.3  | 1036.9 | 1099.4 | 1149.2 | 1180.4 | 1201.3 |
| 72.5° | 773.1  | 768.4  | 761.5  | 759.2  | 780.0  | 819.4  | 877.2  | 920.0  | 947.8  | 981.4  | 983.7  |
| 75°   | 624.9  | 622.6  | 613.4  | 613.4  | 634.2  | 665.4  | 711.7  | 740.7  | 754.5  | 776.5  | 781.2  |
| 77.5° | 466.4  | 465.2  | 468.7  | 469.9  | 481.4  | 515.0  | 541.6  | 562.4  | 559.0  | 572.9  | 577.5  |
| 80°   | 326.4  | 328.7  | 328.7  | 327.5  | 339.1  | 351.8  | 380.7  | 386.5  | 381.9  | 386.5  | 386.5  |
| 82.5° | 207.2  | 206.0  | 203.7  | 207.2  | 216.4  | 226.8  | 238.4  | 239.6  | 243.0  | 239.6  | 241.9  |
| 85°   | 104.2  | 103.0  | 105.3  | 106.5  | 111.1  | 116.9  | 127.3  | 129.6  | 123.8  | 123.8  | 121.5  |
| 87.5° | 35.9   | 38.2   | 35.9   | 37.0   | 37.0   | 42.8   | 41.7   | 41.7   | 41.7   | 41.7   | 44.0   |
| 90°   | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    | 0.0    |

(END OF REPORT)