

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: NEO-RAY

Report Number: P332400-930

Luminaire Tested: **S123RDIW-S340D1030U930-4F0-1E-UDD-F**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P332400-930  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1807-864-5,  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: NEO-RAY  
Catalog Number: S123RDIW-S340D1030U930-4F0-1E-UDD-F  
Description: DEFINE 3 DIRECT-INDIRECT WALL MOUNT LED LUMINAIRE  
DOWNLIGHT 340 LUMENS PER FOOT, FLUSH SATIN WHITE DIFFUSER, REGRESSED  
HOUSING  
UPLIGHT 1030 LUMENS PER FOOT, NO LENS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4422.5 lumens  
Efficiency: N/A  
Efficacy: 116.4 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.06 / 1.22  
Luminous Opening: Rectangular (W 0.25' x L: 4' x H: 0')  
CIE Type: Semi-Indirect

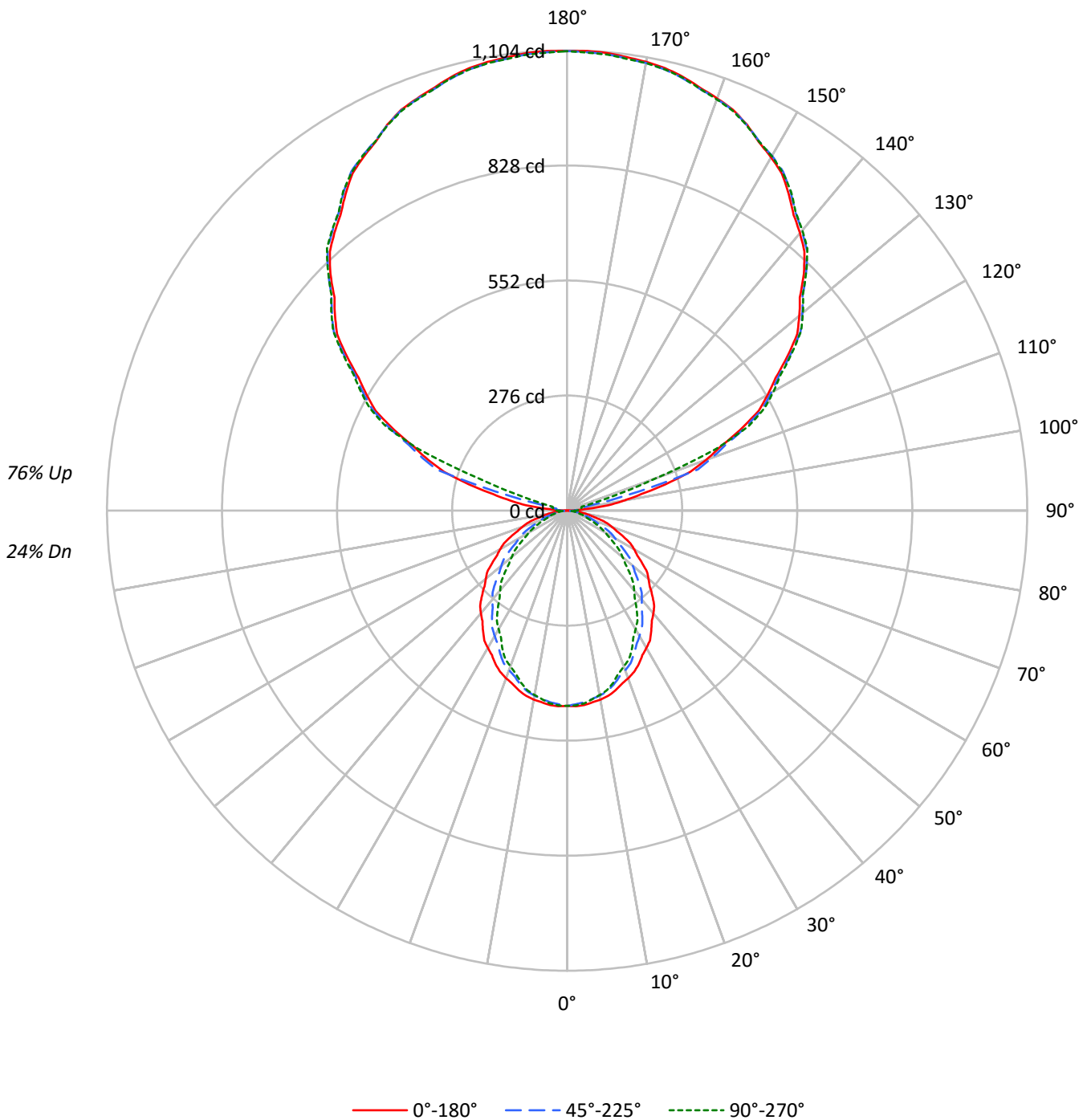
Input Watts (W): 38  
Input Voltage (V): 120  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Luminous Intensity Polar Plot





TEST NUMBER: P332400-930

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**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   | 101 | 101 | 101 | 101 | 90 | 90 | 90 | 90 | 69 | 69 | 69 | 50 | 50 | 50 | 32 | 32 | 32 | 24 |
| 1   | 92  | 88  | 84  | 81  | 82 | 78 | 75 | 73 | 60 | 58 | 57 | 44 | 43 | 42 | 29 | 28 | 27 | 20 |
| 2   | 84  | 77  | 71  | 66  | 74 | 69 | 64 | 60 | 53 | 50 | 47 | 39 | 37 | 35 | 25 | 24 | 23 | 17 |
| 3   | 77  | 68  | 61  | 55  | 68 | 60 | 55 | 50 | 47 | 43 | 40 | 34 | 32 | 30 | 23 | 21 | 20 | 15 |
| 4   | 70  | 60  | 52  | 47  | 62 | 54 | 47 | 42 | 42 | 37 | 34 | 31 | 28 | 25 | 20 | 19 | 17 | 13 |
| 5   | 64  | 53  | 46  | 40  | 57 | 48 | 41 | 36 | 37 | 33 | 29 | 27 | 24 | 22 | 18 | 17 | 15 | 11 |
| 6   | 59  | 48  | 40  | 34  | 52 | 43 | 36 | 31 | 33 | 29 | 25 | 25 | 22 | 19 | 17 | 15 | 13 | 10 |
| 7   | 54  | 43  | 35  | 30  | 48 | 38 | 32 | 27 | 30 | 26 | 22 | 22 | 19 | 17 | 15 | 13 | 12 | 9  |
| 8   | 50  | 39  | 31  | 26  | 45 | 35 | 29 | 24 | 27 | 23 | 20 | 20 | 17 | 15 | 14 | 12 | 11 | 8  |
| 9   | 47  | 35  | 28  | 23  | 42 | 32 | 26 | 21 | 25 | 21 | 17 | 19 | 16 | 13 | 13 | 11 | 10 | 7  |
| 10  | 44  | 32  | 25  | 21  | 39 | 29 | 23 | 19 | 23 | 19 | 16 | 17 | 14 | 12 | 12 | 10 | 9  | 7  |

**AVERAGE LUMINANCE (cd/sqm):**

|     | 0°   | 45°  | 90°  |
|-----|------|------|------|
| 0°  | 5042 | 5042 | 5042 |
| 5°  | 5061 | 4991 | 5020 |
| 10° | 5032 | 4928 | 4912 |
| 15° | 4979 | 4813 | 4763 |
| 20° | 4904 | 4669 | 4560 |
| 25° | 4828 | 4507 | 4363 |
| 30° | 4727 | 4320 | 4084 |
| 35° | 4623 | 4133 | 3829 |
| 40° | 4526 | 3912 | 3513 |
| 45° | 4401 | 3694 | 3227 |
| 50° | 4262 | 3448 | 2907 |
| 55° | 4121 | 3166 | 2609 |
| 60° | 3991 | 2863 | 2282 |
| 65° | 3823 | 2534 | 1954 |
| 70° | 3610 | 2127 | 1577 |
| 75° | 3302 | 1676 | 1485 |
| 80° | 2944 | 1488 | 1364 |
| 85° | 2482 | 1309 | 1223 |



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**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 44.0   | 1.0       |
| 10°-20°   | 122.4  | 2.8       |
| 20°-30°   | 176.2  | 4.0       |
| 30°-40°   | 198.5  | 4.5       |
| 40°-50°   | 189.9  | 4.3       |
| 50°-60°   | 155.5  | 3.5       |
| 60°-70°   | 104.9  | 2.4       |
| 70°-80°   | 52.8   | 1.2       |
| 80°-90°   | 17.0   | 0.4       |
| 90°-100°  | 40.1   | 0.9       |
| 100°-110° | 191.0  | 4.3       |
| 110°-120° | 458.8  | 10.4      |
| 120°-130° | 584.2  | 13.2      |
| 130°-140° | 624.2  | 14.1      |
| 140°-150° | 583.7  | 13.2      |
| 150°-160° | 470.8  | 10.6      |
| 160°-170° | 303.9  | 6.9       |
| 170°-180° | 104.7  | 2.4       |
| 0°-30°    | 342.6  | 7.7       |
| 0°-40°    | 541.1  | 12.2      |
| 0°-60°    | 886.5  | 20.0      |
| 0°-90°    | 1061.3 | 24.0      |
| 90°-120°  | 689.8  | 15.6      |
| 90°-150°  | 2481.9 | 56.1      |
| 90°-180°  | 3361.0 | 76.0      |
| 0°-180°   | 4422.5 | 100.0     |

**CANDELA DISTRIBUTION:**

|      | 0°   | 22.5° | 45°  | 67.5° | 90°  | Flux |
|------|------|-------|------|-------|------|------|
| 0°   | 468  | 468   | 468  | 468   | 468  |      |
| 5°   | 468  | 466   | 462  | 465   | 465  | 44   |
| 15°  | 447  | 442   | 432  | 430   | 427  | 126  |
| 25°  | 406  | 396   | 380  | 372   | 367  | 187  |
| 35°  | 352  | 338   | 314  | 299   | 291  | 220  |
| 45°  | 289  | 271   | 243  | 222   | 212  | 223  |
| 55°  | 220  | 200   | 169  | 147   | 139  | 197  |
| 65°  | 150  | 129   | 100  | 82    | 77   | 148  |
| 75°  | 79   | 61    | 40   | 37    | 36   | 85   |
| 85°  | 20   | 12    | 11   | 10    | 10   | 23   |
| 90°  | 1    | 9     | 20   | 23    | 24   | 3    |
| 95°  | 50   | 19    | 25   | 31    | 31   | 62   |
| 105° | 244  | 248   | 179  | 43    | 36   | 259  |
| 115° | 458  | 463   | 470  | 478   | 482  | 452  |
| 125° | 645  | 652   | 655  | 657   | 658  | 576  |
| 135° | 803  | 808   | 812  | 814   | 812  | 618  |
| 145° | 927  | 932   | 934  | 936   | 936  | 580  |
| 155° | 1021 | 1020  | 1020 | 1024  | 1020 | 470  |
| 165° | 1077 | 1074  | 1074 | 1079  | 1074 | 304  |
| 175° | 1102 | 1098  | 1099 | 1104  | 1098 | 105  |
| 180° | 1102 | 1102  | 1102 | 1102  | 1102 |      |



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**CANDELA DISTRIBUTION (FULL):**

|        | 0°    | 5°    | 10°   | 15°   | 20°   | 25°   | 30°   | 35°   | 40°   | 45°   | 50°   |
|--------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0°     | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 |
| 2.5°   | 469.9 | 469.6 | 469.4 | 469.1 | 468.9 | 468.3 | 467.5 | 466.7 | 465.9 | 465.0 | 465.8 |
| 5°     | 468.4 | 468.0 | 467.6 | 467.2 | 466.7 | 466.0 | 465.0 | 464.0 | 462.9 | 461.9 | 462.7 |
| 7.5°   | 464.1 | 463.6 | 463.2 | 462.7 | 462.3 | 461.4 | 460.1 | 458.8 | 457.4 | 456.1 | 456.5 |
| 10°    | 460.4 | 459.8 | 459.3 | 458.7 | 458.0 | 457.0 | 455.5 | 454.0 | 452.4 | 450.9 | 451.0 |
| 12.5°  | 455.3 | 454.6 | 454.0 | 453.3 | 452.7 | 451.3 | 449.5 | 447.7 | 445.8 | 443.9 | 443.8 |
| 15°    | 446.8 | 445.8 | 444.9 | 443.9 | 443.0 | 441.4 | 439.0 | 436.7 | 434.3 | 431.9 | 431.5 |
| 17.5°  | 436.0 | 435.0 | 433.9 | 432.8 | 431.7 | 429.7 | 426.6 | 423.6 | 420.7 | 417.7 | 416.8 |
| 20°    | 428.1 | 426.8 | 425.4 | 424.1 | 422.7 | 420.4 | 417.3 | 414.0 | 410.8 | 407.6 | 406.5 |
| 22.5°  | 419.3 | 417.8 | 416.2 | 414.7 | 413.1 | 410.7 | 407.2 | 403.8 | 400.4 | 397.0 | 395.6 |
| 25°    | 406.5 | 404.4 | 402.3 | 400.1 | 398.0 | 395.0 | 391.2 | 387.3 | 383.4 | 379.5 | 377.7 |
| 27.5°  | 390.9 | 388.6 | 386.2 | 383.9 | 381.6 | 378.3 | 374.0 | 369.6 | 365.3 | 360.9 | 358.5 |
| 30°    | 380.3 | 377.7 | 375.2 | 372.7 | 370.1 | 366.5 | 361.7 | 357.0 | 352.3 | 347.6 | 344.7 |
| 32.5°  | 369.7 | 366.7 | 363.9 | 361.0 | 358.2 | 354.2 | 349.2 | 344.2 | 339.2 | 334.2 | 331.1 |
| 35°    | 351.8 | 348.7 | 345.7 | 342.7 | 339.7 | 335.5 | 330.3 | 325.0 | 319.8 | 314.5 | 311.0 |
| 37.5°  | 333.7 | 330.3 | 326.9 | 323.6 | 320.2 | 315.7 | 310.1 | 304.5 | 299.0 | 293.3 | 289.3 |
| 40°    | 322.1 | 318.5 | 314.7 | 311.0 | 307.3 | 302.4 | 296.4 | 290.4 | 284.5 | 278.4 | 274.1 |
| 42.5°  | 309.1 | 305.3 | 301.7 | 297.9 | 294.2 | 289.3 | 283.1 | 276.9 | 270.7 | 264.5 | 259.7 |
| 45°    | 289.1 | 285.3 | 281.5 | 277.7 | 273.9 | 268.7 | 262.3 | 255.8 | 249.2 | 242.7 | 237.9 |
| 47.5°  | 269.1 | 265.0 | 260.7 | 256.6 | 252.4 | 247.1 | 240.6 | 234.1 | 227.6 | 221.1 | 215.9 |
| 50°    | 254.5 | 250.5 | 246.6 | 242.6 | 238.6 | 233.3 | 226.4 | 219.6 | 212.7 | 205.9 | 200.6 |
| 52.5°  | 241.5 | 237.2 | 232.8 | 228.5 | 224.2 | 218.7 | 211.9 | 205.1 | 198.4 | 191.6 | 186.2 |
| 55°    | 219.6 | 215.4 | 211.3 | 207.2 | 203.0 | 197.4 | 190.2 | 183.0 | 175.9 | 168.7 | 163.8 |
| 57.5°  | 199.3 | 194.9 | 190.4 | 185.8 | 181.3 | 175.5 | 168.3 | 161.0 | 153.8 | 146.7 | 142.0 |
| 60°    | 185.4 | 180.8 | 176.1 | 171.5 | 166.8 | 161.0 | 154.0 | 147.0 | 140.0 | 133.0 | 128.4 |
| 62.5°  | 171.4 | 166.7 | 162.1 | 157.5 | 152.9 | 147.0 | 140.0 | 133.0 | 126.0 | 119.0 | 114.7 |
| 65°    | 150.1 | 145.4 | 140.8 | 136.2 | 131.5 | 125.9 | 119.3 | 112.7 | 106.2 | 99.5  | 95.4  |
| 67.5°  | 128.7 | 124.0 | 119.3 | 114.6 | 109.9 | 104.4 | 98.1  | 91.8  | 85.4  | 79.2  | 76.1  |
| 70°    | 114.7 | 110.1 | 105.6 | 101.0 | 96.5  | 91.2  | 85.4  | 79.4  | 73.5  | 67.6  | 64.7  |
| 72.5°  | 100.8 | 96.3  | 91.8  | 87.2  | 82.8  | 77.9  | 72.5  | 67.1  | 61.7  | 56.3  | 54.0  |
| 75°    | 79.4  | 75.3  | 71.3  | 67.3  | 63.2  | 58.9  | 54.2  | 49.6  | 44.9  | 40.3  | 39.5  |
| 77.5°  | 59.9  | 56.3  | 52.6  | 48.9  | 45.3  | 42.0  | 39.0  | 36.0  | 33.0  | 30.0  | 29.6  |
| 80°    | 47.5  | 44.0  | 40.6  | 37.1  | 33.7  | 31.1  | 29.3  | 27.5  | 25.7  | 24.0  | 23.6  |
| 82.5°  | 35.6  | 32.6  | 29.7  | 26.7  | 23.6  | 21.8  | 21.0  | 20.1  | 19.3  | 18.4  | 18.2  |
| 85°    | 20.1  | 18.3  | 16.4  | 14.6  | 12.7  | 11.7  | 11.4  | 11.2  | 10.9  | 10.6  | 10.4  |
| 87.5°  | 7.4   | 7.1   | 6.7   | 6.4   | 6.0   | 6.0   | 6.4   | 6.9   | 7.4   | 7.9   | 8.0   |
| 90°    | 0.8   | 2.6   | 4.5   | 6.3   | 8.1   | 10.2  | 12.6  | 14.9  | 17.3  | 19.6  | 20.4  |
| 92.5°  | 15.2  | 14.8  | 14.2  | 13.7  | 13.2  | 13.9  | 15.7  | 17.4  | 19.2  | 21.0  | 22.1  |
| 95°    | 50.0  | 42.5  | 35.1  | 27.6  | 20.1  | 17.4  | 19.4  | 21.4  | 23.4  | 25.4  | 26.7  |
| 97.5°  | 100.4 | 97.0  | 93.7  | 90.3  | 87.0  | 78.8  | 65.7  | 52.6  | 39.5  | 26.3  | 27.8  |
| 100°   | 138.4 | 142.0 | 145.7 | 149.3 | 153.0 | 140.6 | 112.2 | 83.8  | 55.4  | 27.0  | 28.5  |
| 102.5° | 181.6 | 184.3 | 186.9 | 189.5 | 192.1 | 177.9 | 146.9 | 115.9 | 84.9  | 53.9  | 49.4  |
| 105°   | 244.0 | 246.1 | 248.0 | 250.1 | 252.0 | 244.8 | 228.4 | 212.1 | 195.8 | 179.4 | 147.2 |
| 107.5° | 309.9 | 311.4 | 313.1 | 314.7 | 316.3 | 318.4 | 321.0 | 323.5 | 326.1 | 328.7 | 305.1 |
| 110°   | 353.8 | 355.2 | 356.7 | 358.2 | 359.5 | 361.3 | 363.3 | 365.3 | 367.3 | 369.3 | 363.3 |



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**CANDELA DISTRIBUTION (continued):**

|        | 0°     | 5°     | 10°    | 15°    | 20°    | 25°    | 30°    | 35°    | 40°    | 45°    | 50°    |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 112.5° | 395.7  | 397.0  | 398.3  | 399.7  | 401.0  | 402.6  | 404.6  | 406.6  | 408.6  | 410.6  | 410.7  |
| 115°   | 457.8  | 458.9  | 459.9  | 461.1  | 462.1  | 463.5  | 465.1  | 466.8  | 468.4  | 470.0  | 471.9  |
| 117.5° | 517.9  | 519.2  | 520.6  | 521.9  | 523.3  | 524.3  | 525.2  | 526.0  | 526.8  | 527.7  | 529.1  |
| 120°   | 555.2  | 556.8  | 558.5  | 560.1  | 561.7  | 562.9  | 563.4  | 563.9  | 564.5  | 565.0  | 566.5  |
| 122.5° | 593.2  | 594.5  | 595.9  | 597.2  | 598.6  | 599.6  | 600.3  | 601.0  | 601.7  | 602.3  | 603.4  |
| 125°   | 645.3  | 646.8  | 648.2  | 649.6  | 651.1  | 652.2  | 652.9  | 653.6  | 654.4  | 655.1  | 655.5  |
| 127.5° | 695.7  | 697.2  | 698.6  | 700.1  | 701.6  | 702.7  | 703.6  | 704.5  | 705.3  | 706.2  | 706.8  |
| 130°   | 727.2  | 728.6  | 730.1  | 731.6  | 733.0  | 734.1  | 734.8  | 735.6  | 736.3  | 737.0  | 737.8  |
| 132.5° | 757.3  | 758.8  | 760.2  | 761.7  | 763.1  | 764.2  | 764.8  | 765.3  | 765.9  | 766.5  | 767.2  |
| 135°   | 803.3  | 804.5  | 805.5  | 806.6  | 807.7  | 808.6  | 809.3  | 810.1  | 810.8  | 811.5  | 812.0  |
| 137.5° | 842.6  | 844.0  | 845.4  | 846.8  | 848.2  | 849.1  | 849.5  | 849.9  | 850.3  | 850.7  | 851.5  |
| 140°   | 868.9  | 869.9  | 871.1  | 872.1  | 873.2  | 874.0  | 874.6  | 875.1  | 875.6  | 876.2  | 876.9  |
| 142.5° | 893.1  | 894.1  | 895.3  | 896.3  | 897.5  | 898.3  | 898.8  | 899.4  | 899.9  | 900.4  | 901.1  |
| 145°   | 927.0  | 928.2  | 929.5  | 930.8  | 932.1  | 932.9  | 933.3  | 933.6  | 934.0  | 934.3  | 934.7  |
| 147.5° | 959.0  | 959.8  | 960.6  | 961.4  | 962.3  | 962.9  | 963.2  | 963.6  | 963.9  | 964.3  | 964.7  |
| 150°   | 978.6  | 979.1  | 979.7  | 980.2  | 980.7  | 981.2  | 981.5  | 981.9  | 982.3  | 982.7  | 983.0  |
| 152.5° | 996.3  | 996.5  | 996.8  | 997.0  | 997.3  | 997.5  | 997.8  | 997.9  | 998.2  | 998.4  | 999.1  |
| 155°   | 1021.2 | 1020.8 | 1020.4 | 1020.1 | 1019.7 | 1019.6 | 1019.8 | 1019.9 | 1020.2 | 1020.3 | 1021.2 |
| 157.5° | 1040.5 | 1040.5 | 1040.4 | 1040.4 | 1040.3 | 1040.2 | 1040.1 | 1039.8 | 1039.7 | 1039.5 | 1040.6 |
| 160°   | 1052.3 | 1052.1 | 1051.9 | 1051.7 | 1051.6 | 1051.3 | 1051.2 | 1051.0 | 1050.8 | 1050.7 | 1051.7 |
| 162.5° | 1063.4 | 1062.9 | 1062.5 | 1062.0 | 1061.5 | 1061.2 | 1061.0 | 1060.9 | 1060.6 | 1060.5 | 1061.7 |
| 165°   | 1076.8 | 1076.3 | 1075.8 | 1075.2 | 1074.6 | 1074.3 | 1074.1 | 1073.9 | 1073.7 | 1073.6 | 1075.1 |
| 167.5° | 1087.3 | 1086.6 | 1085.9 | 1085.2 | 1084.4 | 1084.0 | 1084.0 | 1084.0 | 1084.0 | 1084.0 | 1085.5 |
| 170°   | 1093.2 | 1092.5 | 1091.8 | 1091.0 | 1090.3 | 1090.0 | 1090.0 | 1090.0 | 1090.0 | 1090.0 | 1091.4 |
| 172.5° | 1097.1 | 1096.3 | 1095.4 | 1094.5 | 1093.6 | 1093.3 | 1093.4 | 1093.6 | 1093.7 | 1093.9 | 1095.4 |
| 175°   | 1102.2 | 1101.3 | 1100.4 | 1099.5 | 1098.6 | 1098.2 | 1098.4 | 1098.6 | 1098.8 | 1098.9 | 1100.2 |
| 177.5° | 1103.5 | 1102.8 | 1102.1 | 1101.4 | 1100.7 | 1100.3 | 1100.5 | 1100.7 | 1100.7 | 1100.9 | 1102.1 |
| 180°   | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 |



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**CANDELA DISTRIBUTION (continued):**

|        | 55°   | 60°   | 65°   | 70°   | 75°   | 80°   | 85°   | 90°   |
|--------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0°     | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 | 468.4 |
| 2.5°   | 466.5 | 467.2 | 468.1 | 468.3 | 468.2 | 468.1 | 467.9 | 467.8 |
| 5°     | 463.5 | 464.2 | 465.0 | 465.3 | 465.1 | 465.0 | 464.8 | 464.6 |
| 7.5°   | 457.0 | 457.4 | 457.8 | 457.9 | 457.5 | 457.3 | 457.0 | 456.7 |
| 10°    | 451.1 | 451.2 | 451.3 | 451.1 | 450.7 | 450.3 | 449.8 | 449.4 |
| 12.5°  | 443.8 | 443.8 | 443.8 | 443.4 | 443.0 | 442.5 | 442.0 | 441.5 |
| 15°    | 431.0 | 430.6 | 430.2 | 429.7 | 429.2 | 428.5 | 428.0 | 427.4 |
| 17.5°  | 415.9 | 415.0 | 414.1 | 413.2 | 412.3 | 411.4 | 410.6 | 409.7 |
| 20°    | 405.4 | 404.3 | 403.2 | 402.2 | 401.1 | 400.1 | 399.2 | 398.1 |
| 22.5°  | 394.3 | 392.9 | 391.5 | 390.4 | 389.4 | 388.5 | 387.5 | 386.6 |
| 25°    | 375.9 | 374.2 | 372.4 | 371.0 | 370.1 | 369.2 | 368.3 | 367.4 |
| 27.5°  | 356.0 | 353.6 | 351.1 | 349.2 | 347.7 | 346.3 | 345.0 | 343.5 |
| 30°    | 341.9 | 339.0 | 336.1 | 334.0 | 332.6 | 331.3 | 330.0 | 328.6 |
| 32.5°  | 327.9 | 324.8 | 321.6 | 319.4 | 318.0 | 316.6 | 315.1 | 313.7 |
| 35°    | 307.3 | 303.6 | 300.0 | 297.4 | 296.0 | 294.4 | 292.9 | 291.4 |
| 37.5°  | 285.1 | 281.0 | 276.9 | 273.9 | 272.0 | 270.1 | 268.2 | 266.4 |
| 40°    | 269.7 | 265.3 | 260.9 | 257.7 | 255.8 | 253.9 | 251.9 | 250.0 |
| 42.5°  | 254.9 | 250.1 | 245.3 | 242.1 | 240.3 | 238.6 | 236.8 | 235.1 |
| 45°    | 233.1 | 228.3 | 223.5 | 220.0 | 218.1 | 216.1 | 214.0 | 212.0 |
| 47.5°  | 210.6 | 205.4 | 200.2 | 196.7 | 194.9 | 193.1 | 191.2 | 189.4 |
| 50°    | 195.4 | 190.2 | 185.0 | 181.4 | 179.4 | 177.5 | 175.5 | 173.6 |
| 52.5°  | 180.8 | 175.3 | 169.9 | 166.3 | 164.5 | 162.8 | 161.1 | 159.3 |
| 55°    | 158.9 | 154.0 | 149.1 | 145.8 | 144.1 | 142.4 | 140.7 | 139.0 |
| 57.5°  | 137.4 | 132.7 | 128.2 | 125.1 | 123.7 | 122.2 | 120.8 | 119.4 |
| 60°    | 123.8 | 119.3 | 114.7 | 111.7 | 110.3 | 108.8 | 107.5 | 106.0 |
| 62.5°  | 110.4 | 106.2 | 101.8 | 98.9  | 97.4  | 96.0  | 94.4  | 92.9  |
| 65°    | 91.2  | 87.2  | 83.0  | 80.5  | 79.5  | 78.6  | 77.7  | 76.7  |
| 67.5°  | 73.0  | 69.9  | 66.8  | 64.7  | 63.8  | 62.8  | 61.8  | 60.8  |
| 70°    | 61.7  | 58.8  | 55.8  | 53.9  | 52.9  | 52.0  | 51.0  | 50.1  |
| 72.5°  | 51.5  | 49.2  | 46.7  | 45.3  | 44.9  | 44.5  | 44.2  | 43.8  |
| 75°    | 38.6  | 37.7  | 36.9  | 36.4  | 36.2  | 36.0  | 35.9  | 35.7  |
| 77.5°  | 29.1  | 28.6  | 28.2  | 27.9  | 27.7  | 27.6  | 27.4  | 27.2  |
| 80°    | 23.4  | 23.2  | 22.9  | 22.7  | 22.5  | 22.3  | 22.2  | 22.0  |
| 82.5°  | 17.9  | 17.7  | 17.4  | 17.3  | 17.3  | 17.2  | 17.2  | 17.2  |
| 85°    | 10.3  | 10.1  | 9.9   | 9.9   | 9.9   | 9.9   | 9.9   | 9.9   |
| 87.5°  | 8.1   | 8.2   | 8.2   | 8.2   | 8.2   | 8.2   | 8.2   | 8.2   |
| 90°    | 21.1  | 21.9  | 22.6  | 23.1  | 23.5  | 23.8  | 24.2  | 24.5  |
| 92.5°  | 23.3  | 24.5  | 25.6  | 26.3  | 26.5  | 26.7  | 27.0  | 27.1  |
| 95°    | 28.0  | 29.2  | 30.5  | 31.1  | 31.1  | 31.1  | 31.1  | 31.1  |
| 97.5°  | 29.3  | 30.7  | 32.2  | 33.0  | 33.2  | 33.3  | 33.6  | 33.8  |
| 100°   | 29.9  | 31.4  | 32.9  | 33.7  | 33.8  | 34.0  | 34.2  | 34.4  |
| 102.5° | 44.8  | 40.4  | 35.8  | 33.8  | 34.1  | 34.4  | 34.7  | 35.1  |
| 105°   | 115.0 | 82.7  | 50.5  | 34.6  | 35.0  | 35.3  | 35.6  | 36.0  |
| 107.5° | 281.4 | 257.9 | 234.2 | 210.3 | 186.0 | 161.8 | 137.5 | 113.2 |
| 110°   | 357.3 | 351.3 | 345.3 | 329.3 | 303.3 | 277.2 | 251.2 | 225.2 |





TEST NUMBER: P332400-930

CATALOG NUMBER: S123RDIW-S340D1030U930-4F0-1E-UDD-F

**CANDELA DISTRIBUTION (continued):**

|        | 55°    | 60°    | 65°    | 70°    | 75°    | 80°    | 85°    | 90°    |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 112.5° | 410.8  | 410.9  | 411.0  | 408.3  | 402.8  | 397.4  | 391.8  | 386.4  |
| 115°   | 473.7  | 475.5  | 477.4  | 478.6  | 479.3  | 480.0  | 480.8  | 481.5  |
| 117.5° | 530.6  | 532.1  | 533.5  | 534.3  | 534.4  | 534.6  | 534.8  | 534.9  |
| 120°   | 567.9  | 569.4  | 570.9  | 571.6  | 571.6  | 571.6  | 571.6  | 571.6  |
| 122.5° | 604.4  | 605.4  | 606.4  | 607.1  | 607.2  | 607.3  | 607.5  | 607.6  |
| 125°   | 655.8  | 656.2  | 656.6  | 657.0  | 657.3  | 657.6  | 658.0  | 658.4  |
| 127.5° | 707.4  | 707.9  | 708.6  | 708.7  | 708.3  | 707.9  | 707.6  | 707.2  |
| 130°   | 738.5  | 739.2  | 739.9  | 740.1  | 739.7  | 739.4  | 739.0  | 738.7  |
| 132.5° | 767.9  | 768.7  | 769.4  | 769.5  | 769.0  | 768.5  | 768.0  | 767.4  |
| 135°   | 812.6  | 813.2  | 813.7  | 813.7  | 813.2  | 812.6  | 812.0  | 811.5  |
| 137.5° | 852.4  | 853.3  | 854.2  | 854.4  | 854.0  | 853.7  | 853.3  | 853.0  |
| 140°   | 877.7  | 878.4  | 879.1  | 879.3  | 879.0  | 878.6  | 878.2  | 877.8  |
| 142.5° | 901.6  | 902.2  | 902.8  | 902.8  | 902.3  | 901.8  | 901.3  | 900.7  |
| 145°   | 935.1  | 935.5  | 935.8  | 936.0  | 936.0  | 936.0  | 936.0  | 936.0  |
| 147.5° | 965.1  | 965.4  | 965.8  | 965.6  | 964.7  | 963.8  | 963.0  | 962.2  |
| 150°   | 983.4  | 983.7  | 984.1  | 984.1  | 983.5  | 982.9  | 982.4  | 981.9  |
| 152.5° | 999.7  | 1000.4 | 1001.0 | 1000.9 | 1000.0 | 999.2  | 998.4  | 997.6  |
| 155°   | 1022.1 | 1023.0 | 1024.0 | 1023.9 | 1022.8 | 1021.7 | 1020.6 | 1019.5 |
| 157.5° | 1041.7 | 1042.8 | 1043.8 | 1043.7 | 1042.3 | 1040.9 | 1039.4 | 1038.0 |
| 160°   | 1052.8 | 1053.9 | 1055.0 | 1054.9 | 1053.6 | 1052.4 | 1051.1 | 1049.8 |
| 162.5° | 1062.9 | 1064.2 | 1065.4 | 1065.4 | 1064.4 | 1063.2 | 1062.1 | 1060.9 |
| 165°   | 1076.4 | 1077.9 | 1079.4 | 1079.5 | 1078.2 | 1076.9 | 1075.6 | 1074.4 |
| 167.5° | 1087.0 | 1088.4 | 1089.9 | 1089.9 | 1088.4 | 1087.0 | 1085.5 | 1084.0 |
| 170°   | 1092.8 | 1094.3 | 1095.8 | 1095.8 | 1094.3 | 1092.8 | 1091.4 | 1090.0 |
| 172.5° | 1096.8 | 1098.2 | 1099.7 | 1099.6 | 1098.0 | 1096.4 | 1094.8 | 1093.2 |
| 175°   | 1101.5 | 1102.8 | 1104.1 | 1104.0 | 1102.5 | 1101.1 | 1099.6 | 1098.1 |
| 177.5° | 1103.3 | 1104.4 | 1105.5 | 1105.5 | 1104.0 | 1102.5 | 1101.1 | 1099.6 |
| 180°   | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 | 1102.2 |

(END OF REPORT)