

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: LUMARK

Report Number: P144818

Luminaire Tested: **LDRL-SL2-E01-E-8030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P144818
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33701)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: LDRL-SL2-E01-E-8030
Description: RL LED ROADWAY LARGE CUTOFF COBRAHEAD LUMINAIRE
(1) LIGHTBARS WITH AccuLED OPTICS - TYPE 2 W/ SPILL LIGHT CONTROL
Light Source: (21) 3000K CCT, 80 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2471.2 lumens
Efficiency: N/A
Efficacy: 100.0 lumens/watt
Luminous Opening: Rectangular (W 0.17' x L: 1' x H: 0')
IES Classification: Type II - Short - Semi-Cutoff
BUG Rating: B1 - U0 - G1

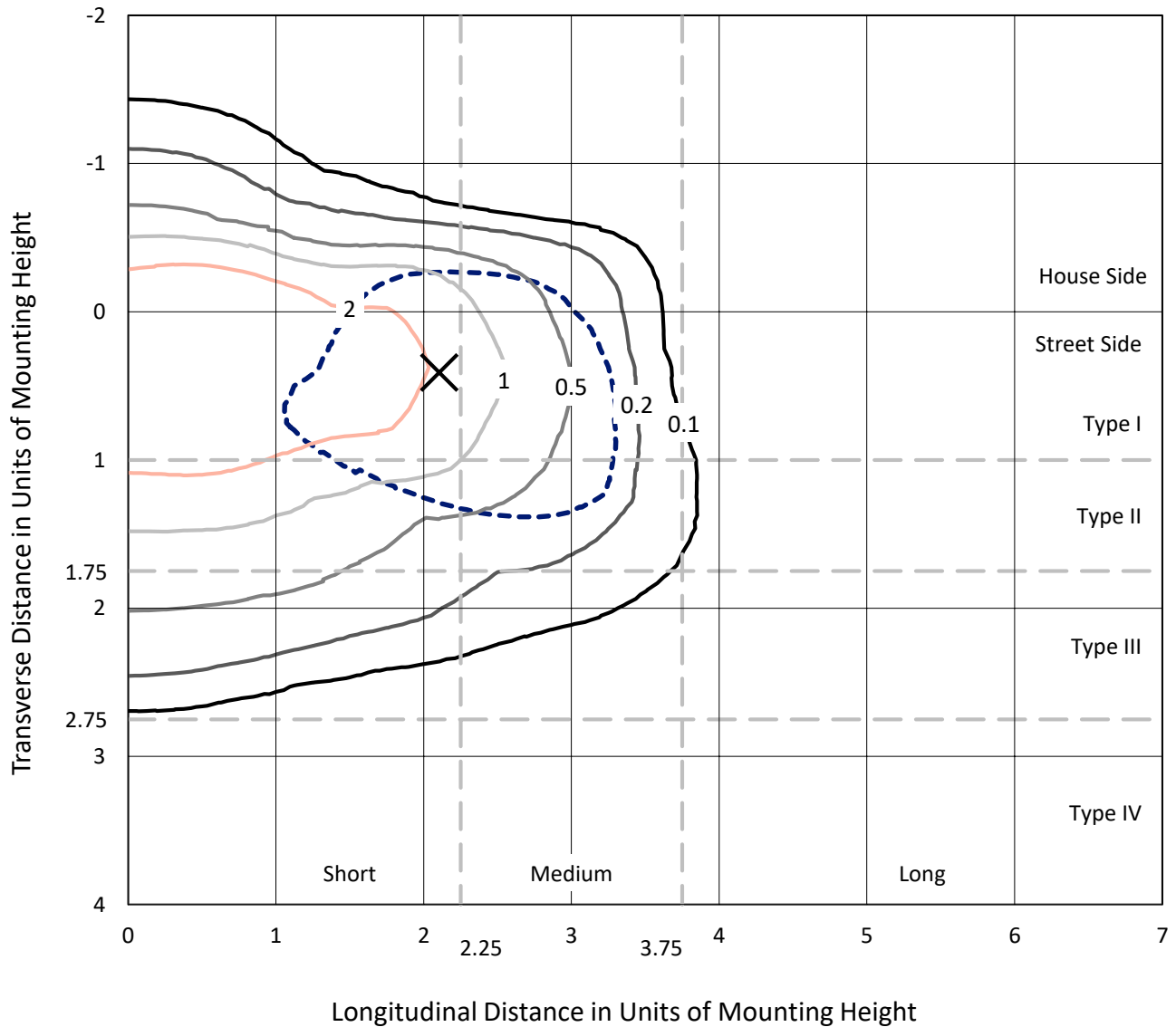
Input Watts (W): 24.7
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Iso-Footcandle Lines of Horizontal Illumination

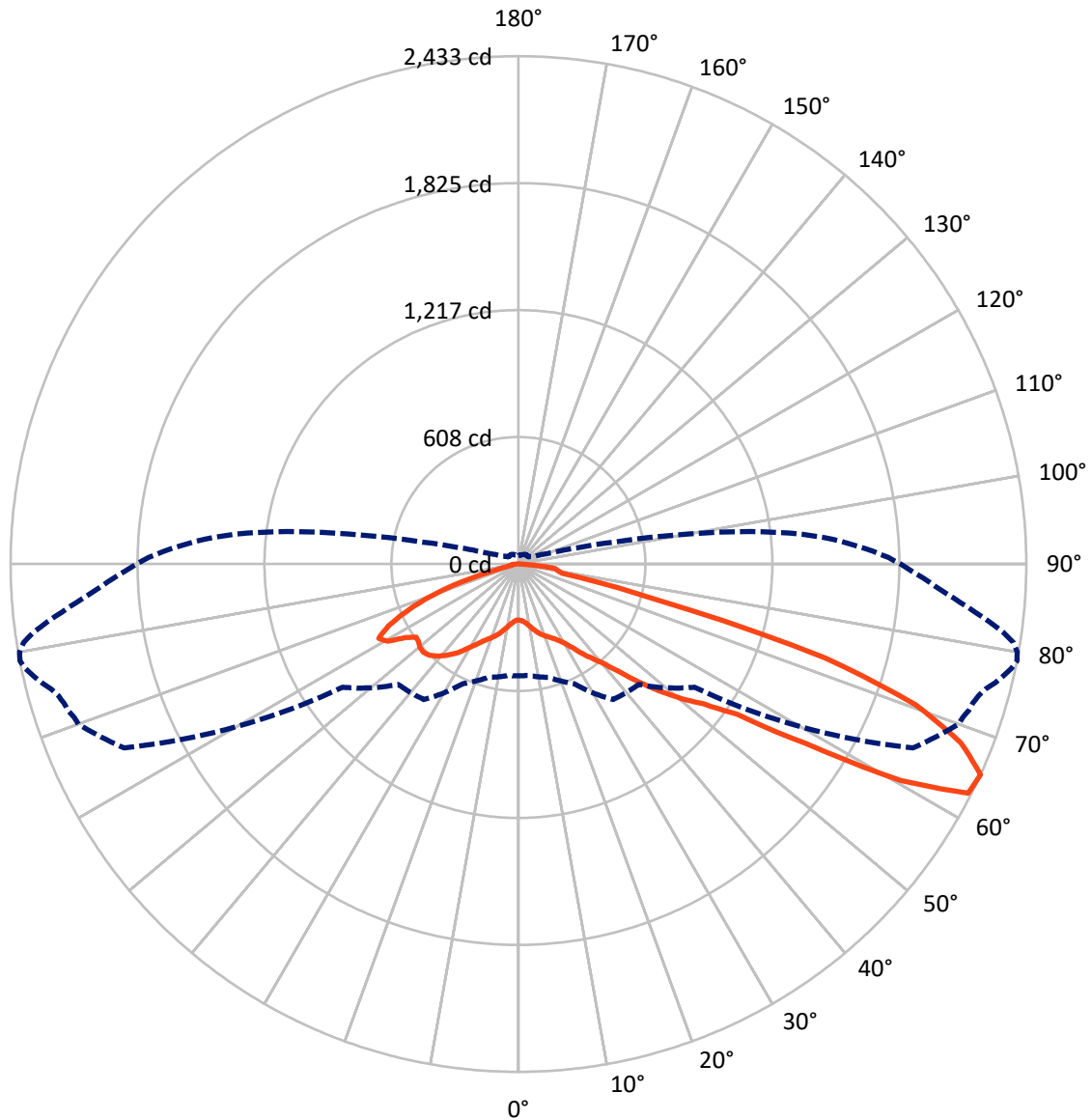
✕ Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 3.5 fc
 Type II - Short - Semi-Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 79-Deg Lateral - - - Horizontal Cone Through 65-Deg Vertical

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FLUX DISTRIBUTION:

| | | Downward | Upward | Total |
|--------------------|-----------|----------|--------|--------|
| House Side | Lumens | 560.9 | 0.0 | 560.9 |
| | % Fixture | 22.7 | 0.0 | 22.7 |
| Street Side | Lumens | 1910.3 | 0.0 | 1910.3 |
| | % Fixture | 77.3 | 0.0 | 77.3 |
| Total | Lumens | 2471.2 | 0.0 | 2471.2 |
| | % Fixture | 100.0 | 0.0 | 100.0 |

Coefficient of Utilization

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 26.7 | 1.1 |
| 10°-20° | 86.8 | 3.5 |
| 20°-30° | 149.6 | 6.1 |
| 30°-40° | 244.0 | 9.9 |
| 40°-50° | 407.3 | 16.5 |
| 50°-60° | 550.7 | 22.3 |
| 60°-70° | 684.1 | 27.7 |
| 70°-80° | 273.9 | 11.1 |
| 80°-90° | 48.1 | 1.9 |
| 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° | 2471.2 | 100.0 |
| 0°-180° | 2471.2 | 100.0 |



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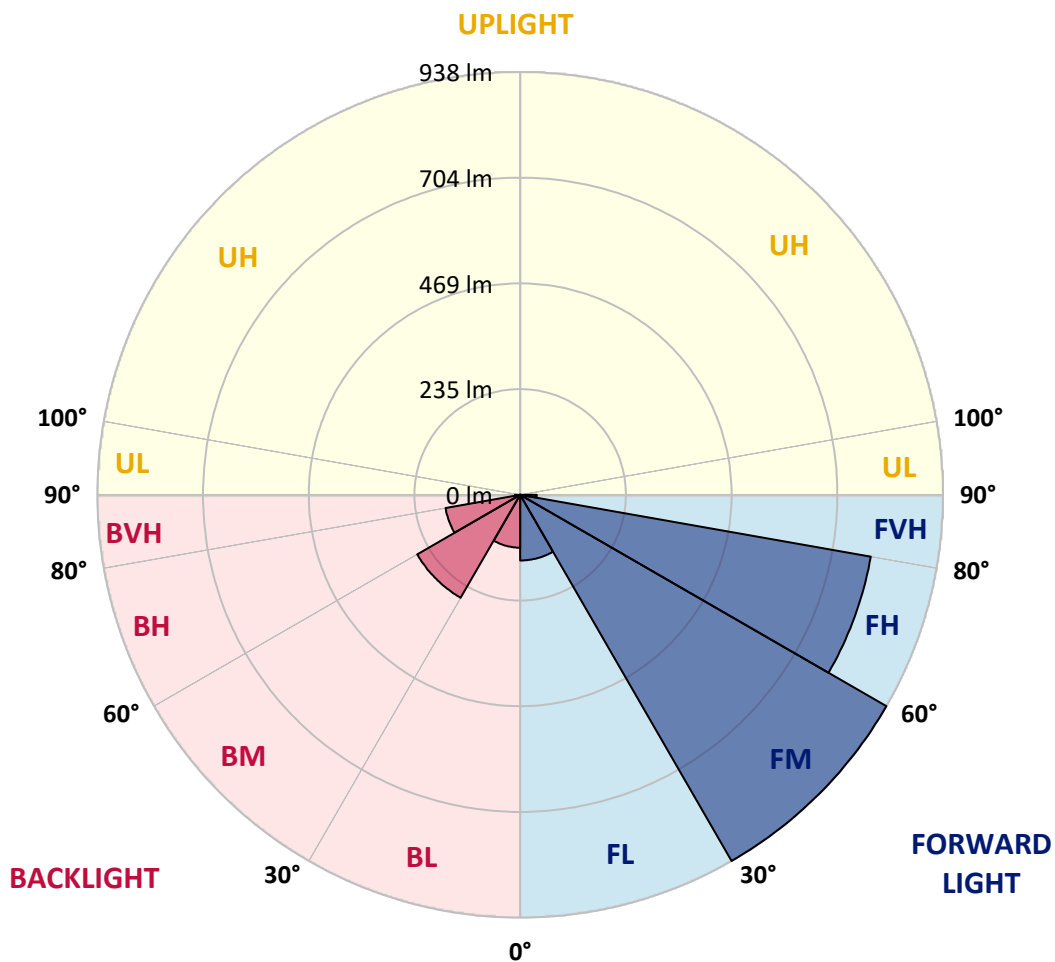
CATALOG NUMBER: LDRL-SL2-E01-E-8030

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

| Zone | | Lumens | % Fixture | Zone Rating/Lumen Limit | | |
|------|-------------|--------|-----------|-------------------------|------|---------|
| | | | | B | U | G |
| FL | (0°-30°) | 145.7 | 5.9 | | | |
| FM | (30°-60°) | 938.1 | 38.0 | | | |
| FH | (60°-80°) | 789.9 | 32.0 | | | G1/1800 |
| FVH | (80°-90°) | 36.5 | 1.5 | | | G1/100 |
| BL | (0°-30°) | 117.3 | 4.7 | B1/500 | | |
| BM | (30°-60°) | 263.8 | 10.7 | B1/1000 | | |
| BH | (60°-80°) | 168.2 | 6.8 | B1/500 | | G1/500 |
| BVH | (80°-90°) | 11.6 | 0.5 | | | G1/100 |
| UL | (90°-100°) | 0.0 | 0.0 | | U0/0 | |
| UH | (100°-180°) | 0.0 | 0.0 | | U0/0 | |

BUG Rating: B1-U0-G1

Type II Short





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CANDELA DISTRIBUTION (FULL):

| | 0° | 5° | 15° | 25° | 35° | 45° | 55° | 65° | 70° | 71° | 72° |
|-------|-------|-------|-------|-------|-------|--------|--------|--------|--------|--------|--------|
| 0° | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 |
| 2.5° | 270.6 | 270.4 | 271.3 | 271.9 | 271.9 | 272.3 | 272.1 | 271.1 | 271.3 | 271.6 | 271.3 |
| 5° | 273.6 | 272.9 | 273.8 | 274.8 | 275.5 | 276.3 | 277.2 | 277.3 | 278.0 | 278.0 | 277.8 |
| 7.5° | 280.2 | 279.7 | 280.9 | 281.2 | 282.7 | 284.1 | 285.8 | 287.0 | 287.6 | 288.0 | 288.5 |
| 10° | 291.5 | 291.2 | 291.5 | 292.2 | 292.9 | 294.4 | 297.3 | 299.8 | 301.3 | 301.3 | 302.0 |
| 12.5° | 305.2 | 303.8 | 304.2 | 302.8 | 303.2 | 306.4 | 309.7 | 314.0 | 316.5 | 316.8 | 317.2 |
| 15° | 315.8 | 315.1 | 314.6 | 312.8 | 314.1 | 318.4 | 323.6 | 329.7 | 331.9 | 333.7 | 333.5 |
| 17.5° | 325.8 | 324.9 | 323.8 | 321.2 | 322.6 | 329.3 | 337.3 | 344.0 | 347.7 | 348.1 | 348.4 |
| 20° | 337.6 | 336.6 | 334.4 | 329.2 | 328.8 | 338.3 | 348.9 | 356.2 | 359.5 | 361.1 | 361.6 |
| 22.5° | 352.6 | 351.3 | 347.2 | 337.1 | 334.4 | 345.5 | 358.2 | 367.1 | 370.7 | 372.2 | 373.0 |
| 25° | 371.9 | 369.2 | 362.7 | 346.9 | 341.3 | 353.0 | 368.1 | 379.0 | 383.8 | 385.4 | 386.4 |
| 27.5° | 389.2 | 387.2 | 379.5 | 360.7 | 351.1 | 362.9 | 380.3 | 394.1 | 400.9 | 402.8 | 404.3 |
| 30° | 409.5 | 406.6 | 400.4 | 380.5 | 367.6 | 378.1 | 400.2 | 417.8 | 426.0 | 426.2 | 429.6 |
| 32.5° | 457.1 | 455.2 | 449.5 | 427.6 | 406.0 | 406.6 | 427.2 | 451.4 | 459.6 | 461.0 | 464.0 |
| 35° | 527.7 | 527.0 | 526.8 | 514.7 | 498.6 | 482.1 | 483.6 | 502.0 | 507.6 | 509.8 | 510.8 |
| 37.5° | 574.1 | 580.0 | 594.3 | 603.1 | 599.1 | 602.6 | 584.0 | 561.6 | 558.4 | 556.0 | 557.0 |
| 40° | 614.1 | 619.3 | 648.4 | 688.9 | 713.5 | 730.9 | 714.5 | 645.7 | 620.0 | 612.6 | 609.7 |
| 42.5° | 637.7 | 643.6 | 685.2 | 750.0 | 812.8 | 854.0 | 858.3 | 762.6 | 697.5 | 696.6 | 685.8 |
| 45° | 650.5 | 656.5 | 706.1 | 793.4 | 882.1 | 956.4 | 994.9 | 906.6 | 810.9 | 803.8 | 788.8 |
| 47.5° | 648.0 | 653.6 | 705.2 | 809.4 | 923.2 | 1024.4 | 1101.4 | 1052.1 | 941.7 | 924.7 | 903.9 |
| 50° | 617.1 | 621.2 | 675.4 | 783.2 | 912.2 | 1052.8 | 1174.3 | 1185.6 | 1089.8 | 1066.6 | 1035.6 |
| 52.5° | 585.2 | 592.5 | 637.4 | 736.8 | 862.4 | 1035.2 | 1217.9 | 1307.2 | 1228.0 | 1212.1 | 1172.3 |
| 55° | 568.0 | 573.7 | 610.4 | 695.3 | 809.9 | 975.3 | 1235.9 | 1421.8 | 1396.0 | 1389.5 | 1361.4 |
| 57.5° | 567.3 | 572.9 | 602.1 | 670.1 | 767.2 | 912.9 | 1241.2 | 1598.9 | 1674.6 | 1676.3 | 1668.2 |
| 60° | 595.0 | 600.8 | 625.2 | 682.3 | 754.0 | 859.4 | 1222.4 | 1850.0 | 2017.5 | 2032.3 | 2057.1 |
| 62.5° | 598.9 | 601.6 | 631.1 | 708.1 | 802.0 | 819.3 | 1145.3 | 2059.2 | 2253.1 | 2266.8 | 2280.5 |
| 65° | 535.8 | 535.6 | 561.8 | 632.7 | 792.0 | 815.3 | 1029.3 | 2084.8 | 2243.7 | 2251.9 | 2269.0 |
| 67.5° | 399.5 | 396.2 | 411.0 | 475.8 | 628.4 | 816.3 | 891.9 | 1891.2 | 2068.8 | 2084.5 | 2090.2 |
| 70° | 205.9 | 211.2 | 221.3 | 261.0 | 399.0 | 657.1 | 766.2 | 1595.6 | 1816.1 | 1822.0 | 1842.4 |
| 72.5° | 84.6 | 82.4 | 89.3 | 109.7 | 199.7 | 434.3 | 633.8 | 1259.2 | 1499.9 | 1495.9 | 1499.6 |
| 75° | 47.1 | 47.8 | 49.8 | 57.2 | 97.1 | 218.1 | 544.5 | 891.4 | 1020.0 | 950.2 | 929.1 |
| 77.5° | 37.8 | 38.1 | 38.3 | 39.7 | 53.0 | 116.3 | 417.9 | 587.1 | 513.0 | 476.3 | 462.3 |
| 80° | 27.7 | 29.5 | 31.6 | 31.9 | 36.5 | 66.0 | 229.2 | 494.2 | 433.0 | 402.6 | 377.6 |
| 82.5° | 22.3 | 23.1 | 27.5 | 28.2 | 29.0 | 39.3 | 103.8 | 464.2 | 431.3 | 400.2 | 365.8 |
| 85° | 13.3 | 14.9 | 22.5 | 22.6 | 23.0 | 24.0 | 57.4 | 189.1 | 235.1 | 207.8 | 190.2 |
| 87.5° | 4.7 | 6.1 | 11.1 | 9.3 | 11.8 | 9.8 | 25.2 | 63.3 | 78.0 | 74.1 | 65.7 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |



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CANDELA DISTRIBUTION (continued):

| | 73° | 74° | 75° | 76° | 77° | 78° | 79° | 80° | 81° | 82° | 83° |
|-------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0° | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 |
| 2.5° | 271.1 | 271.1 | 271.4 | 271.3 | 271.3 | 271.3 | 271.3 | 270.9 | 270.9 | 270.4 | 270.8 |
| 5° | 277.8 | 277.7 | 277.8 | 278.0 | 277.8 | 278.2 | 278.0 | 277.8 | 278.0 | 277.8 | 278.0 |
| 7.5° | 288.6 | 287.8 | 289.0 | 288.3 | 288.1 | 289.2 | 288.6 | 289.2 | 289.3 | 289.2 | 289.0 |
| 10° | 302.3 | 302.8 | 302.8 | 302.8 | 302.5 | 303.5 | 303.7 | 304.0 | 304.2 | 304.8 | 304.8 |
| 12.5° | 318.0 | 318.2 | 318.9 | 318.7 | 319.0 | 320.2 | 321.1 | 321.2 | 321.4 | 321.9 | 321.2 |
| 15° | 334.9 | 335.2 | 335.2 | 336.8 | 336.2 | 337.9 | 338.4 | 338.4 | 338.6 | 340.6 | 340.8 |
| 17.5° | 349.9 | 349.9 | 351.3 | 351.3 | 352.6 | 353.0 | 354.5 | 354.6 | 355.3 | 357.2 | 357.3 |
| 20° | 362.6 | 363.3 | 364.1 | 365.1 | 365.6 | 366.6 | 367.6 | 368.7 | 369.5 | 371.0 | 371.2 |
| 22.5° | 374.6 | 375.2 | 376.6 | 377.3 | 378.4 | 379.1 | 380.0 | 381.1 | 382.5 | 384.5 | 385.0 |
| 25° | 388.4 | 389.1 | 390.6 | 391.6 | 393.0 | 394.0 | 395.5 | 397.0 | 397.9 | 399.9 | 401.4 |
| 27.5° | 406.0 | 408.0 | 410.0 | 410.5 | 411.5 | 413.9 | 415.9 | 417.9 | 419.8 | 420.8 | 422.7 |
| 30° | 431.6 | 431.6 | 435.8 | 435.8 | 437.7 | 439.9 | 441.2 | 443.4 | 446.8 | 447.8 | 450.2 |
| 32.5° | 466.1 | 466.9 | 468.4 | 473.0 | 476.3 | 477.4 | 478.4 | 481.6 | 483.6 | 486.1 | 489.0 |
| 35° | 515.2 | 516.0 | 516.9 | 521.2 | 525.1 | 526.1 | 527.2 | 529.2 | 532.6 | 536.9 | 535.6 |
| 37.5° | 559.2 | 559.7 | 562.4 | 567.3 | 569.5 | 572.2 | 573.1 | 576.8 | 578.6 | 582.7 | 582.9 |
| 40° | 612.2 | 611.0 | 612.6 | 618.1 | 621.5 | 621.3 | 624.0 | 630.8 | 632.1 | 634.0 | 638.7 |
| 42.5° | 686.2 | 681.8 | 686.5 | 688.4 | 693.4 | 696.6 | 702.0 | 706.6 | 709.8 | 716.9 | 720.3 |
| 45° | 781.7 | 777.1 | 781.0 | 781.9 | 792.3 | 795.5 | 803.6 | 809.7 | 816.6 | 824.7 | 827.1 |
| 47.5° | 890.6 | 882.1 | 877.4 | 882.6 | 895.1 | 900.4 | 908.3 | 914.0 | 921.3 | 925.5 | 924.2 |
| 50° | 1016.7 | 996.4 | 987.0 | 984.3 | 993.2 | 1000.6 | 1013.0 | 1015.7 | 1019.0 | 1018.9 | 1019.0 |
| 52.5° | 1157.3 | 1136.2 | 1116.4 | 1102.8 | 1101.4 | 1111.4 | 1114.4 | 1115.1 | 1114.1 | 1106.5 | 1101.7 |
| 55° | 1340.9 | 1339.4 | 1318.7 | 1290.3 | 1288.4 | 1287.3 | 1269.5 | 1267.3 | 1263.3 | 1251.6 | 1235.6 |
| 57.5° | 1674.1 | 1691.0 | 1677.3 | 1676.7 | 1661.8 | 1652.0 | 1619.4 | 1603.2 | 1586.2 | 1554.6 | 1529.5 |
| 60° | 2059.3 | 2083.8 | 2097.3 | 2103.2 | 2132.3 | 2132.3 | 2105.6 | 2082.6 | 2054.9 | 2006.8 | 1959.9 |
| 62.5° | 2291.3 | 2312.7 | 2332.6 | 2363.8 | 2400.8 | 2417.2 | 2418.5 | 2398.1 | 2363.2 | 2308.3 | 2242.0 |
| 65° | 2276.6 | 2292.4 | 2316.6 | 2353.4 | 2383.9 | 2413.3 | 2433.1 | 2426.8 | 2400.1 | 2345.3 | 2273.0 |
| 67.5° | 2110.3 | 2133.4 | 2164.7 | 2198.6 | 2227.0 | 2254.6 | 2286.5 | 2288.9 | 2281.8 | 2229.7 | 2164.3 |
| 70° | 1853.7 | 1883.5 | 1903.2 | 1945.9 | 1958.7 | 1986.8 | 2018.8 | 2034.2 | 2022.7 | 1982.5 | 1944.2 |
| 72.5° | 1506.0 | 1529.5 | 1532.9 | 1514.3 | 1520.7 | 1527.6 | 1535.4 | 1499.4 | 1485.6 | 1431.9 | 1407.3 |
| 75° | 913.2 | 882.3 | 856.3 | 830.5 | 753.3 | 726.0 | 684.0 | 601.1 | 591.6 | 534.8 | 495.3 |
| 77.5° | 434.3 | 421.3 | 397.9 | 358.5 | 306.2 | 256.1 | 212.5 | 172.7 | 157.8 | 130.0 | 110.7 |
| 80° | 363.6 | 348.1 | 327.0 | 297.8 | 261.1 | 224.7 | 190.2 | 160.7 | 131.0 | 106.7 | 85.2 |
| 82.5° | 333.5 | 306.5 | 276.8 | 251.7 | 225.9 | 201.0 | 177.9 | 151.2 | 135.5 | 109.4 | 89.3 |
| 85° | 168.6 | 147.7 | 119.7 | 100.8 | 85.1 | 69.2 | 59.9 | 51.1 | 45.6 | 36.3 | 31.6 |
| 87.5° | 56.5 | 46.3 | 34.4 | 29.2 | 26.3 | 22.6 | 20.8 | 19.7 | 19.2 | 17.0 | 15.2 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |



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CANDELA DISTRIBUTION (continued):

| | 84° | 85° | 86° | 87° | 88° | 89° | 90° | 91° | 92° | 93° | 94° |
|-------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0° | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 |
| 2.5° | 270.8 | 270.8 | 270.8 | 270.8 | 270.6 | 270.6 | 270.6 | 270.6 | 270.6 | 270.6 | 270.8 |
| 5° | 277.7 | 277.7 | 277.8 | 278.3 | 277.3 | 277.7 | 278.0 | 277.5 | 278.0 | 277.5 | 278.2 |
| 7.5° | 288.8 | 289.3 | 289.0 | 289.7 | 289.3 | 290.3 | 289.7 | 289.2 | 289.5 | 289.5 | 289.7 |
| 10° | 304.5 | 305.2 | 304.7 | 305.0 | 305.0 | 305.7 | 304.8 | 305.0 | 305.2 | 304.8 | 305.0 |
| 12.5° | 321.9 | 322.2 | 322.1 | 323.1 | 322.6 | 323.1 | 322.6 | 323.2 | 323.6 | 323.9 | 323.9 |
| 15° | 340.8 | 341.1 | 342.2 | 342.0 | 343.0 | 342.7 | 342.8 | 342.0 | 343.7 | 342.7 | 343.0 |
| 17.5° | 358.2 | 358.0 | 359.4 | 359.9 | 360.0 | 360.2 | 360.7 | 360.0 | 360.2 | 360.7 | 360.4 |
| 20° | 371.7 | 372.9 | 373.2 | 374.6 | 375.6 | 375.9 | 375.7 | 376.3 | 376.9 | 376.3 | 376.3 |
| 22.5° | 386.0 | 387.7 | 388.2 | 389.1 | 390.1 | 390.3 | 391.3 | 391.8 | 392.1 | 391.9 | 392.1 |
| 25° | 403.3 | 404.4 | 405.6 | 407.3 | 408.5 | 408.7 | 409.5 | 410.2 | 410.3 | 410.2 | 411.2 |
| 27.5° | 424.4 | 425.9 | 427.4 | 429.4 | 430.8 | 431.1 | 433.0 | 433.0 | 434.0 | 434.5 | 434.8 |
| 30° | 451.5 | 452.0 | 455.9 | 457.9 | 457.4 | 459.8 | 462.3 | 462.2 | 463.4 | 463.7 | 464.5 |
| 32.5° | 491.0 | 491.0 | 494.4 | 496.9 | 499.6 | 498.8 | 502.7 | 502.0 | 503.9 | 504.9 | 504.4 |
| 35° | 539.0 | 540.7 | 543.2 | 544.7 | 547.6 | 549.1 | 551.8 | 553.3 | 554.2 | 554.0 | 552.1 |
| 37.5° | 588.4 | 591.1 | 592.1 | 595.9 | 598.7 | 601.3 | 601.6 | 599.9 | 600.6 | 597.2 | 596.2 |
| 40° | 645.0 | 648.9 | 651.2 | 656.8 | 656.5 | 659.7 | 660.0 | 655.1 | 654.3 | 649.9 | 645.3 |
| 42.5° | 724.0 | 729.4 | 731.2 | 735.5 | 732.1 | 733.6 | 725.2 | 723.1 | 716.4 | 709.3 | 699.0 |
| 45° | 830.5 | 827.8 | 829.0 | 827.8 | 818.8 | 812.3 | 805.3 | 795.4 | 785.4 | 771.7 | 757.1 |
| 47.5° | 924.2 | 925.5 | 916.7 | 911.2 | 896.7 | 887.4 | 874.7 | 857.3 | 845.2 | 826.8 | 807.4 |
| 50° | 1015.2 | 1000.1 | 987.8 | 975.0 | 962.1 | 945.1 | 926.0 | 910.7 | 892.9 | 870.0 | 846.2 |
| 52.5° | 1089.1 | 1069.7 | 1054.8 | 1036.6 | 1019.2 | 1000.3 | 980.4 | 958.1 | 934.8 | 911.8 | 882.5 |
| 55° | 1220.1 | 1191.9 | 1172.8 | 1140.9 | 1121.2 | 1094.7 | 1079.1 | 1050.3 | 1017.9 | 987.5 | 956.2 |
| 57.5° | 1501.1 | 1458.9 | 1437.1 | 1419.1 | 1388.4 | 1344.8 | 1317.1 | 1269.7 | 1223.4 | 1191.0 | 1139.1 |
| 60° | 1924.5 | 1881.6 | 1845.5 | 1802.8 | 1755.7 | 1696.6 | 1670.3 | 1614.4 | 1548.2 | 1494.7 | 1426.0 |
| 62.5° | 2188.3 | 2129.1 | 2070.5 | 2010.6 | 1963.3 | 1917.0 | 1862.5 | 1806.1 | 1740.6 | 1667.9 | 1592.8 |
| 65° | 2198.9 | 2127.9 | 2057.8 | 1996.7 | 1941.3 | 1881.3 | 1830.1 | 1772.9 | 1704.0 | 1629.1 | 1551.1 |
| 67.5° | 2088.5 | 2009.0 | 1933.9 | 1866.9 | 1803.6 | 1747.9 | 1694.4 | 1640.5 | 1566.8 | 1504.0 | 1424.2 |
| 70° | 1868.6 | 1796.0 | 1728.0 | 1651.7 | 1603.2 | 1540.6 | 1488.5 | 1431.7 | 1378.9 | 1320.2 | 1245.4 |
| 72.5° | 1372.5 | 1317.8 | 1240.2 | 1207.8 | 1181.8 | 1115.4 | 1076.6 | 1071.9 | 1038.1 | 967.7 | 911.8 |
| 75° | 510.4 | 434.5 | 411.5 | 425.2 | 402.4 | 410.0 | 407.1 | 390.9 | 391.6 | 379.6 | 365.4 |
| 77.5° | 99.9 | 92.8 | 87.3 | 88.8 | 82.5 | 79.8 | 85.6 | 83.9 | 80.9 | 81.7 | 80.3 |
| 80° | 68.0 | 57.6 | 52.2 | 50.1 | 47.6 | 46.4 | 46.1 | 45.6 | 44.6 | 44.1 | 42.5 |
| 82.5° | 67.0 | 49.8 | 39.3 | 33.8 | 31.7 | 30.7 | 29.9 | 29.7 | 29.4 | 29.2 | 29.7 |
| 85° | 26.7 | 21.6 | 19.7 | 18.1 | 17.6 | 17.0 | 17.0 | 16.9 | 16.7 | 17.0 | 17.7 |
| 87.5° | 13.0 | 11.0 | 10.0 | 9.1 | 8.8 | 8.6 | 8.6 | 8.8 | 8.9 | 9.6 | 11.0 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |



REPORT NUMBER: P144818

CATALOG NUMBER: LDRL-SL2-E01-E-8030

CANDELA DISTRIBUTION (continued):

| | 95° | 96° | 97° | 98° | 99° | 100° | 101° | 102° | 103° | 104° | 105° |
|-------|--------|--------|--------|--------|--------|-------|-------|-------|-------|-------|-------|
| 0° | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 |
| 2.5° | 270.4 | 270.6 | 270.2 | 270.4 | 270.2 | 269.9 | 269.7 | 270.2 | 270.1 | 269.9 | 269.9 |
| 5° | 277.3 | 278.0 | 277.7 | 277.3 | 277.3 | 277.2 | 277.2 | 277.2 | 277.0 | 277.2 | 276.7 |
| 7.5° | 289.3 | 289.2 | 289.2 | 288.8 | 288.5 | 288.8 | 288.6 | 288.1 | 288.3 | 288.0 | 287.5 |
| 10° | 304.7 | 304.2 | 305.0 | 305.0 | 304.3 | 304.2 | 303.8 | 303.3 | 303.3 | 302.8 | 302.8 |
| 12.5° | 322.9 | 322.4 | 323.6 | 322.7 | 321.7 | 321.6 | 320.5 | 320.2 | 320.7 | 320.5 | 320.2 |
| 15° | 341.5 | 341.6 | 342.2 | 342.0 | 340.8 | 340.8 | 339.5 | 339.6 | 338.6 | 338.3 | 337.4 |
| 17.5° | 359.5 | 359.7 | 359.2 | 359.2 | 358.4 | 357.9 | 356.3 | 356.5 | 355.8 | 354.5 | 353.5 |
| 20° | 375.7 | 375.6 | 374.4 | 375.4 | 373.7 | 373.4 | 372.0 | 370.7 | 371.0 | 369.7 | 367.6 |
| 22.5° | 391.6 | 391.3 | 390.9 | 390.4 | 389.6 | 389.2 | 387.7 | 387.6 | 385.9 | 383.8 | 382.2 |
| 25° | 410.0 | 409.8 | 409.3 | 409.5 | 407.8 | 408.0 | 405.3 | 404.6 | 403.6 | 401.4 | 400.1 |
| 27.5° | 433.8 | 433.8 | 432.5 | 432.0 | 431.4 | 430.8 | 428.4 | 426.7 | 424.2 | 421.7 | 419.0 |
| 30° | 463.0 | 462.7 | 462.3 | 461.0 | 459.1 | 458.1 | 453.9 | 451.2 | 447.8 | 443.1 | 439.0 |
| 32.5° | 504.7 | 501.8 | 499.5 | 496.4 | 493.4 | 490.2 | 483.6 | 479.0 | 473.6 | 466.1 | 459.6 |
| 35° | 551.1 | 546.2 | 543.7 | 537.5 | 531.7 | 525.3 | 517.4 | 508.1 | 500.7 | 490.7 | 480.2 |
| 37.5° | 589.4 | 585.7 | 579.0 | 571.9 | 563.8 | 551.6 | 542.7 | 532.7 | 519.7 | 508.8 | 496.1 |
| 40° | 636.7 | 628.3 | 618.6 | 606.8 | 595.7 | 582.0 | 569.7 | 555.3 | 539.5 | 523.6 | 507.1 |
| 42.5° | 686.3 | 673.3 | 657.5 | 643.8 | 626.9 | 609.0 | 593.0 | 573.6 | 553.3 | 532.1 | 509.9 |
| 45° | 737.0 | 720.9 | 699.8 | 680.4 | 657.0 | 634.5 | 611.6 | 585.1 | 557.4 | 529.0 | 501.2 |
| 47.5° | 783.4 | 759.9 | 736.0 | 709.8 | 682.8 | 653.9 | 621.3 | 586.6 | 550.1 | 512.8 | 478.0 |
| 50° | 819.9 | 790.5 | 760.3 | 730.1 | 697.0 | 659.5 | 618.5 | 573.1 | 528.2 | 483.4 | 443.4 |
| 52.5° | 852.1 | 819.2 | 782.0 | 744.6 | 703.7 | 657.6 | 606.3 | 552.8 | 498.1 | 448.7 | 403.8 |
| 55° | 914.5 | 873.2 | 824.2 | 776.0 | 724.3 | 666.2 | 602.3 | 536.8 | 473.8 | 420.0 | 372.2 |
| 57.5° | 1084.2 | 1028.3 | 952.5 | 885.5 | 820.0 | 735.5 | 645.3 | 564.6 | 484.5 | 420.8 | 367.6 |
| 60° | 1351.4 | 1260.4 | 1173.7 | 1071.5 | 965.5 | 849.6 | 728.7 | 620.0 | 522.3 | 442.4 | 378.4 |
| 62.5° | 1506.4 | 1410.3 | 1298.7 | 1175.0 | 1037.6 | 896.3 | 757.6 | 630.6 | 523.4 | 436.5 | 365.6 |
| 65° | 1464.5 | 1367.9 | 1245.2 | 1118.6 | 972.4 | 828.0 | 690.2 | 568.3 | 464.4 | 384.0 | 316.2 |
| 67.5° | 1340.3 | 1239.3 | 1124.0 | 983.6 | 843.8 | 710.0 | 584.4 | 469.6 | 377.6 | 302.7 | 242.7 |
| 70° | 1159.5 | 1069.7 | 958.6 | 829.1 | 693.6 | 573.2 | 467.4 | 363.9 | 286.1 | 217.4 | 170.1 |
| 72.5° | 860.5 | 781.0 | 711.7 | 603.5 | 504.2 | 409.8 | 323.6 | 253.2 | 186.2 | 140.8 | 108.4 |
| 75° | 361.2 | 334.4 | 323.1 | 283.4 | 246.4 | 202.1 | 152.1 | 121.2 | 98.2 | 83.6 | 66.3 |
| 77.5° | 87.6 | 87.6 | 82.4 | 77.1 | 70.9 | 64.1 | 56.7 | 50.6 | 47.6 | 44.9 | 42.7 |
| 80° | 42.5 | 42.2 | 40.8 | 40.7 | 39.5 | 38.0 | 37.1 | 36.0 | 35.4 | 34.8 | 34.4 |
| 82.5° | 29.9 | 29.7 | 29.2 | 29.9 | 29.7 | 30.4 | 30.7 | 30.9 | 30.9 | 31.1 | 31.2 |
| 85° | 18.9 | 19.6 | 20.9 | 22.6 | 24.1 | 26.0 | 27.7 | 29.0 | 30.0 | 30.9 | 31.6 |
| 87.5° | 12.0 | 13.7 | 14.7 | 17.2 | 19.7 | 22.6 | 25.8 | 27.2 | 28.4 | 28.5 | 27.5 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |



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CATALOG NUMBER: LDRL-SL2-E01-E-8030

CANDELA DISTRIBUTION (continued):

| | 106° | 107° | 108° | 109° | 110° | 115° | 125° | 135° | 145° | 155° | 165° |
|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0° | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 | 268.6 |
| 2.5° | 269.9 | 269.7 | 270.1 | 269.7 | 269.7 | 269.6 | 269.1 | 268.6 | 268.1 | 267.9 | 267.4 |
| 5° | 276.5 | 276.5 | 276.8 | 276.2 | 276.3 | 275.6 | 274.1 | 272.4 | 270.9 | 269.6 | 268.1 |
| 7.5° | 287.6 | 287.1 | 287.3 | 287.1 | 286.8 | 285.4 | 282.1 | 277.8 | 273.8 | 269.6 | 266.2 |
| 10° | 302.5 | 301.5 | 301.5 | 301.1 | 300.6 | 298.8 | 291.7 | 283.2 | 274.8 | 267.2 | 261.6 |
| 12.5° | 319.0 | 319.2 | 317.8 | 317.0 | 316.2 | 312.3 | 301.6 | 288.1 | 274.8 | 262.6 | 253.7 |
| 15° | 336.2 | 336.1 | 334.6 | 334.1 | 332.2 | 326.5 | 310.4 | 290.7 | 271.6 | 253.7 | 240.4 |
| 17.5° | 351.8 | 351.1 | 349.6 | 348.6 | 346.5 | 338.9 | 316.3 | 289.5 | 263.2 | 239.7 | 223.0 |
| 20° | 366.0 | 365.1 | 363.8 | 361.9 | 359.9 | 348.9 | 318.5 | 283.4 | 249.8 | 223.0 | 206.1 |
| 22.5° | 380.6 | 378.8 | 377.3 | 374.7 | 372.5 | 357.9 | 317.0 | 272.6 | 234.6 | 204.4 | 186.4 |
| 25° | 397.0 | 394.8 | 391.6 | 388.6 | 385.2 | 365.1 | 312.8 | 259.1 | 216.4 | 184.3 | 166.1 |
| 27.5° | 414.7 | 411.5 | 407.3 | 403.4 | 398.0 | 370.5 | 305.5 | 244.1 | 196.5 | 164.4 | 145.5 |
| 30° | 433.5 | 427.6 | 422.3 | 416.4 | 409.5 | 373.0 | 295.1 | 225.5 | 174.5 | 144.2 | 125.2 |
| 32.5° | 451.7 | 443.8 | 436.0 | 427.4 | 417.9 | 372.0 | 280.2 | 203.6 | 152.6 | 125.2 | 109.4 |
| 35° | 470.3 | 458.8 | 448.0 | 436.3 | 424.9 | 367.0 | 259.8 | 179.3 | 131.8 | 109.6 | 98.1 |
| 37.5° | 482.9 | 468.6 | 454.2 | 440.2 | 426.4 | 356.0 | 232.6 | 152.1 | 113.1 | 98.2 | 90.0 |
| 40° | 489.3 | 471.8 | 454.2 | 436.8 | 419.8 | 337.8 | 200.9 | 127.3 | 99.8 | 89.8 | 83.9 |
| 42.5° | 487.5 | 465.7 | 443.9 | 423.3 | 402.4 | 308.7 | 166.4 | 106.8 | 90.5 | 83.2 | 78.0 |
| 45° | 472.1 | 446.1 | 421.3 | 399.5 | 373.4 | 271.4 | 136.7 | 94.2 | 83.4 | 77.8 | 72.9 |
| 47.5° | 443.3 | 414.2 | 383.8 | 359.2 | 334.7 | 228.2 | 113.8 | 86.3 | 77.1 | 72.6 | 67.7 |
| 50° | 406.5 | 372.9 | 342.5 | 315.8 | 291.9 | 187.9 | 98.1 | 79.5 | 72.1 | 68.2 | 63.0 |
| 52.5° | 366.0 | 329.8 | 302.1 | 274.1 | 250.7 | 156.8 | 87.1 | 72.1 | 67.2 | 63.1 | 58.9 |
| 55° | 332.4 | 298.9 | 270.8 | 242.6 | 218.9 | 137.2 | 78.0 | 66.3 | 62.6 | 58.4 | 55.0 |
| 57.5° | 323.4 | 285.3 | 254.5 | 227.9 | 203.6 | 125.2 | 71.4 | 61.1 | 58.6 | 55.4 | 51.7 |
| 60° | 327.1 | 285.1 | 250.7 | 221.5 | 196.0 | 115.6 | 66.5 | 57.6 | 55.5 | 52.7 | 48.8 |
| 62.5° | 313.8 | 269.4 | 234.6 | 203.6 | 179.4 | 103.5 | 63.0 | 55.9 | 54.5 | 50.6 | 46.3 |
| 65° | 267.4 | 226.7 | 193.3 | 166.4 | 145.7 | 87.1 | 60.1 | 57.4 | 56.0 | 49.3 | 44.6 |
| 67.5° | 203.6 | 169.6 | 142.8 | 122.7 | 107.7 | 72.1 | 59.4 | 62.5 | 59.8 | 50.0 | 44.1 |
| 70° | 140.8 | 115.1 | 97.9 | 85.7 | 76.3 | 60.8 | 61.6 | 68.0 | 64.1 | 52.2 | 46.9 |
| 72.5° | 89.3 | 74.6 | 66.2 | 61.6 | 57.1 | 51.3 | 61.1 | 67.4 | 62.1 | 52.5 | 46.9 |
| 75° | 57.2 | 51.1 | 48.3 | 46.6 | 45.2 | 44.7 | 53.8 | 55.4 | 50.0 | 45.6 | 43.7 |
| 77.5° | 40.5 | 39.5 | 39.0 | 38.8 | 39.0 | 40.2 | 44.6 | 41.7 | 36.3 | 36.5 | 37.5 |
| 80° | 34.3 | 34.3 | 33.9 | 34.1 | 34.4 | 34.9 | 35.6 | 30.7 | 27.9 | 30.0 | 33.4 |
| 82.5° | 31.4 | 31.9 | 32.2 | 32.6 | 33.1 | 32.4 | 30.2 | 23.3 | 22.5 | 29.2 | 32.7 |
| 85° | 31.9 | 31.9 | 32.1 | 32.4 | 32.6 | 29.2 | 25.2 | 17.6 | 17.2 | 32.7 | 30.9 |
| 87.5° | 27.3 | 27.0 | 25.8 | 25.0 | 23.8 | 20.1 | 16.7 | 9.8 | 10.1 | 20.3 | 21.6 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |

REPORT NUMBER: P144818

CATALOG NUMBER: LDRL-SL2-E01-E-8030

CANDELA DISTRIBUTION (continued):

| | 175° | 180° |
|-------|-------|-------|
| 0° | 268.6 | 268.6 |
| 2.5° | 267.2 | 267.2 |
| 5° | 267.2 | 267.2 |
| 7.5° | 265.0 | 264.3 |
| 10° | 258.6 | 257.8 |
| 12.5° | 248.8 | 248.0 |
| 15° | 233.8 | 232.8 |
| 17.5° | 215.0 | 213.4 |
| 20° | 195.5 | 193.1 |
| 22.5° | 175.9 | 174.0 |
| 25° | 155.8 | 154.1 |
| 27.5° | 136.1 | 134.4 |
| 30° | 117.8 | 117.1 |
| 32.5° | 104.3 | 103.6 |
| 35° | 94.4 | 94.0 |
| 37.5° | 87.6 | 87.3 |
| 40° | 81.7 | 81.4 |
| 42.5° | 76.3 | 75.8 |
| 45° | 70.9 | 71.1 |
| 47.5° | 65.5 | 65.3 |
| 50° | 60.8 | 60.8 |
| 52.5° | 56.9 | 56.7 |
| 55° | 53.3 | 53.2 |
| 57.5° | 49.8 | 49.6 |
| 60° | 46.8 | 46.3 |
| 62.5° | 43.9 | 43.5 |
| 65° | 42.0 | 41.9 |
| 67.5° | 40.7 | 40.2 |
| 70° | 40.3 | 39.0 |
| 72.5° | 39.3 | 37.6 |
| 75° | 37.0 | 36.1 |
| 77.5° | 32.6 | 31.6 |
| 80° | 25.2 | 23.3 |
| 82.5° | 21.1 | 18.2 |
| 85° | 15.5 | 14.3 |
| 87.5° | 11.3 | 8.9 |
| 90° | 0.0 | 0.0 |

(END OF REPORT)