

|                 |   |              |   |         |
|-----------------|---|--------------|---|---------|
| Report No       | : | Voltage      | : | V       |
| Test No         | : | Current      | : | A       |
| LumCAT          | : | Power        | : | 3.000 W |
| Luminaire       | : | PF           | : |         |
| LampCAT         | : | Ballast type | : |         |
| Lamp flux       | : | Width        | : | -35 mm  |
| Number of Lamps | : | Length       | : | -35 mm  |
| Phm Type        | : | Height       | : | 0 mm    |

### Photometric Results

|                                          |   |                                         |                            |   |                     |
|------------------------------------------|---|-----------------------------------------|----------------------------|---|---------------------|
| Lumens(lm)                               | : | 315.00                                  | Central intensity(cd)      | : | 303.899             |
| Efficiency(%)                            | : | 100.00%                                 | Maximum intensity(cd)      | : | 303.959             |
| Luminous Efficacy(lm/W)                  | : | 105.00                                  | Angle of maximum intensity | : | C=0.0 $\gamma$ =0.5 |
| Beam Angle(50%Imax)                      | : | [C0/180]Total=58.6 [C90/270]Total=55.4  |                            |   |                     |
| Field angle(10%Imax)                     | : | [C0/180]Total=102.4 [C90/270]Total=99.8 |                            |   |                     |
| Maximum s/h(1/2)                         | : | C0_180=0.85 C90_270=0.82                |                            |   |                     |
| Maximum s/h(1/4)                         | : | C0_180=0.91 C90_270=0.88                |                            |   |                     |
| Up flux rate of lamp(%)                  | : | 0.09%                                   |                            |   |                     |
| Down flux rate of lamp(%)                | : | 99.91%                                  |                            |   |                     |
| Up flux rate of LUM(%)                   | : | 0.09%                                   |                            |   |                     |
| Down flux rate of LUM(%)                 | : | 99.91%                                  |                            |   |                     |
| CIE Type                                 | : | Direct lighting                         |                            |   |                     |
| Output flux ratio in $\pi$ solid angle : | : | 96.326%                                 |                            |   |                     |

Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 2 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 0.0                | 303.899       | 0.000       | 0         | 0.00%       | 0.00%      |
| 0.5                | 303.832       | 0.073       | 0.073     | 0.02%       | 0.02%      |
| 1.0                | 303.678       | 0.218       | 0.291     | 0.07%       | 0.09%      |
| 1.5                | 303.438       | 0.363       | 0.654     | 0.12%       | 0.21%      |
| 2.0                | 303.043       | 0.508       | 1.162     | 0.16%       | 0.37%      |
| 2.5                | 302.499       | 0.652       | 1.813     | 0.21%       | 0.58%      |
| 3.0                | 301.808       | 0.795       | 2.608     | 0.25%       | 0.83%      |
| 3.5                | 300.917       | 0.937       | 3.545     | 0.30%       | 1.13%      |
| 4.0                | 300.009       | 1.077       | 4.622     | 0.34%       | 1.47%      |
| 4.5                | 298.952       | 1.217       | 5.839     | 0.39%       | 1.85%      |
| 5.0                | 297.790       | 1.355       | 7.194     | 0.43%       | 2.28%      |
| 5.5                | 296.498       | 1.491       | 8.685     | 0.47%       | 2.76%      |
| 6.0                | 295.095       | 1.625       | 10.31     | 0.52%       | 3.27%      |
| 6.5                | 293.544       | 1.757       | 12.067    | 0.56%       | 3.83%      |
| 7.0                | 291.870       | 1.886       | 13.953    | 0.60%       | 4.43%      |
| 7.5                | 290.026       | 2.013       | 15.966    | 0.64%       | 5.07%      |
| 8.0                | 288.136       | 2.137       | 18.104    | 0.68%       | 5.75%      |
| 8.5                | 286.059       | 2.259       | 20.363    | 0.72%       | 6.46%      |
| 9.0                | 283.962       | 2.377       | 22.74     | 0.75%       | 7.22%      |
| 9.5                | 281.727       | 2.493       | 25.233    | 0.79%       | 8.01%      |
| 10.0               | 279.452       | 2.605       | 27.838    | 0.83%       | 8.84%      |
| 10.5               | 276.998       | 2.715       | 30.553    | 0.86%       | 9.70%      |
| 11.0               | 274.555       | 2.820       | 33.373    | 0.90%       | 10.59%     |
| 11.5               | 272.038       | 2.923       | 36.297    | 0.93%       | 11.52%     |
| 12.0               | 269.335       | 3.022       | 39.319    | 0.96%       | 12.48%     |
| 12.5               | 266.569       | 3.117       | 42.437    | 0.99%       | 13.47%     |
| 13.0               | 263.794       | 3.209       | 45.646    | 1.02%       | 14.49%     |
| 13.5               | 260.937       | 3.297       | 48.943    | 1.05%       | 15.54%     |
| 14.0               | 258.049       | 3.382       | 52.325    | 1.07%       | 16.61%     |
| 14.5               | 254.999       | 3.462       | 55.787    | 1.10%       | 17.71%     |
| 15.0               | 251.853       | 3.538       | 59.325    | 1.12%       | 18.83%     |
| 15.5               | 248.601       | 3.609       | 62.934    | 1.15%       | 19.98%     |
| 16.0               | 245.263       | 3.675       | 66.609    | 1.17%       | 21.15%     |
| 16.5               | 241.874       | 3.737       | 70.346    | 1.19%       | 22.33%     |
| 17.0               | 238.420       | 3.795       | 74.141    | 1.20%       | 23.54%     |
| 17.5               | 234.814       | 3.847       | 77.988    | 1.22%       | 24.76%     |
| 18.0               | 231.230       | 3.895       | 81.883    | 1.24%       | 25.99%     |
| 18.5               | 227.603       | 3.939       | 85.823    | 1.25%       | 27.25%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 3 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 19.0               | 223.949       | 3.979       | 89.802    | 1.26%       | 28.51%     |
| 19.5               | 220.281       | 4.015       | 93.817    | 1.27%       | 29.78%     |
| 20.0               | 216.616       | 4.047       | 97.865    | 1.28%       | 31.07%     |
| 20.5               | 212.886       | 4.076       | 101.94    | 1.29%       | 32.36%     |
| 21.0               | 209.126       | 4.099       | 106.039   | 1.30%       | 33.66%     |
| 21.5               | 205.378       | 4.119       | 110.158   | 1.31%       | 34.97%     |
| 22.0               | 201.605       | 4.135       | 114.292   | 1.31%       | 36.28%     |
| 22.5               | 197.838       | 4.147       | 118.439   | 1.32%       | 37.60%     |
| 23.0               | 194.062       | 4.155       | 122.594   | 1.32%       | 38.92%     |
| 23.5               | 190.287       | 4.159       | 126.753   | 1.32%       | 40.24%     |
| 24.0               | 186.429       | 4.160       | 130.913   | 1.32%       | 41.56%     |
| 24.5               | 182.590       | 4.155       | 135.068   | 1.32%       | 42.88%     |
| 25.0               | 178.692       | 4.147       | 139.215   | 1.32%       | 44.20%     |
| 25.5               | 174.860       | 4.135       | 143.349   | 1.31%       | 45.51%     |
| 26.0               | 171.042       | 4.120       | 147.469   | 1.31%       | 46.82%     |
| 26.5               | 167.197       | 4.101       | 151.57    | 1.30%       | 48.12%     |
| 27.0               | 163.425       | 4.080       | 155.65    | 1.30%       | 49.41%     |
| 27.5               | 159.610       | 4.055       | 159.705   | 1.29%       | 50.70%     |
| 28.0               | 155.837       | 4.027       | 163.732   | 1.28%       | 51.98%     |
| 28.5               | 152.150       | 3.997       | 167.728   | 1.27%       | 53.25%     |
| 29.0               | 148.463       | 3.964       | 171.692   | 1.26%       | 54.51%     |
| 29.5               | 144.821       | 3.929       | 175.621   | 1.25%       | 55.75%     |
| 30.0               | 141.127       | 3.890       | 179.511   | 1.23%       | 56.99%     |
| 30.5               | 137.508       | 3.848       | 183.36    | 1.22%       | 58.21%     |
| 31.0               | 133.889       | 3.804       | 187.164   | 1.21%       | 59.42%     |
| 31.5               | 130.338       | 3.758       | 190.922   | 1.19%       | 60.61%     |
| 32.0               | 126.770       | 3.709       | 194.631   | 1.18%       | 61.79%     |
| 32.5               | 123.260       | 3.658       | 198.289   | 1.16%       | 62.95%     |
| 33.0               | 119.831       | 3.605       | 201.894   | 1.14%       | 64.09%     |
| 33.5               | 116.396       | 3.551       | 205.445   | 1.13%       | 65.22%     |
| 34.0               | 112.997       | 3.494       | 208.939   | 1.11%       | 66.33%     |
| 34.5               | 109.567       | 3.434       | 212.373   | 1.09%       | 67.42%     |
| 35.0               | 106.164       | 3.371       | 215.744   | 1.07%       | 68.49%     |
| 35.5               | 102.827       | 3.307       | 219.051   | 1.05%       | 69.54%     |
| 36.0               | 99.482        | 3.240       | 222.291   | 1.03%       | 70.57%     |
| 36.5               | 96.157        | 3.172       | 225.463   | 1.01%       | 71.58%     |
| 37.0               | 92.835        | 3.100       | 228.563   | 0.98%       | 72.56%     |
| 37.5               | 89.560        | 3.027       | 231.59    | 0.96%       | 73.52%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 4 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 38.0               | 86.376        | 2.953       | 234.543   | 0.94%       | 74.46%     |
| 38.5               | 83.266        | 2.879       | 237.422   | 0.91%       | 75.37%     |
| 39.0               | 80.224        | 2.805       | 240.227   | 0.89%       | 76.26%     |
| 39.5               | 77.193        | 2.731       | 242.958   | 0.87%       | 77.13%     |
| 40.0               | 74.242        | 2.655       | 245.613   | 0.84%       | 77.97%     |
| 40.5               | 71.429        | 2.580       | 248.193   | 0.82%       | 78.79%     |
| 41.0               | 68.700        | 2.508       | 250.701   | 0.80%       | 79.59%     |
| 41.5               | 66.040        | 2.436       | 253.136   | 0.77%       | 80.36%     |
| 42.0               | 63.456        | 2.364       | 255.5     | 0.75%       | 81.11%     |
| 42.5               | 60.909        | 2.292       | 257.793   | 0.73%       | 81.84%     |
| 43.0               | 58.492        | 2.222       | 260.015   | 0.71%       | 82.54%     |
| 43.5               | 56.152        | 2.154       | 262.168   | 0.68%       | 83.23%     |
| 44.0               | 53.869        | 2.086       | 264.254   | 0.66%       | 83.89%     |
| 44.5               | 51.623        | 2.018       | 266.272   | 0.64%       | 84.53%     |
| 45.0               | 49.412        | 1.950       | 268.222   | 0.62%       | 85.15%     |
| 45.5               | 47.249        | 1.882       | 270.104   | 0.60%       | 85.75%     |
| 46.0               | 45.207        | 1.816       | 271.92    | 0.58%       | 86.32%     |
| 46.5               | 43.265        | 1.752       | 273.672   | 0.56%       | 86.88%     |
| 47.0               | 41.419        | 1.691       | 275.363   | 0.54%       | 87.42%     |
| 47.5               | 39.652        | 1.632       | 276.995   | 0.52%       | 87.93%     |
| 48.0               | 37.977        | 1.575       | 278.57    | 0.50%       | 88.44%     |
| 48.5               | 36.378        | 1.521       | 280.091   | 0.48%       | 88.92%     |
| 49.0               | 34.824        | 1.468       | 281.559   | 0.47%       | 89.38%     |
| 49.5               | 33.349        | 1.416       | 282.975   | 0.45%       | 89.83%     |
| 50.0               | 31.918        | 1.366       | 284.34    | 0.43%       | 90.27%     |
| 50.5               | 30.553        | 1.317       | 285.657   | 0.42%       | 90.68%     |
| 51.0               | 29.242        | 1.269       | 286.927   | 0.40%       | 91.09%     |
| 51.5               | 27.998        | 1.224       | 288.151   | 0.39%       | 91.48%     |
| 52.0               | 26.832        | 1.180       | 289.331   | 0.37%       | 91.85%     |
| 52.5               | 25.728        | 1.139       | 290.47    | 0.36%       | 92.21%     |
| 53.0               | 24.676        | 1.100       | 291.57    | 0.35%       | 92.56%     |
| 53.5               | 23.666        | 1.062       | 292.632   | 0.34%       | 92.90%     |
| 54.0               | 22.699        | 1.025       | 293.657   | 0.33%       | 93.22%     |
| 54.5               | 21.761        | 0.989       | 294.647   | 0.31%       | 93.54%     |
| 55.0               | 20.869        | 0.954       | 295.601   | 0.30%       | 93.84%     |
| 55.5               | 20.005        | 0.921       | 296.522   | 0.29%       | 94.13%     |
| 56.0               | 19.156        | 0.887       | 297.409   | 0.28%       | 94.42%     |
| 56.5               | 18.342        | 0.855       | 298.264   | 0.27%       | 94.69%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 5 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 57.0               | 17.559        | 0.823       | 299.087   | 0.26%       | 94.95%     |
| 57.5               | 16.808        | 0.792       | 299.88    | 0.25%       | 95.20%     |
| 58.0               | 16.101        | 0.763       | 300.643   | 0.24%       | 95.44%     |
| 58.5               | 15.428        | 0.735       | 301.378   | 0.23%       | 95.68%     |
| 59.0               | 14.793        | 0.708       | 302.086   | 0.22%       | 95.90%     |
| 59.5               | 14.180        | 0.683       | 302.769   | 0.22%       | 96.12%     |
| 60.0               | 13.584        | 0.658       | 303.426   | 0.21%       | 96.33%     |
| 60.5               | 12.997        | 0.633       | 304.059   | 0.20%       | 96.53%     |
| 61.0               | 12.434        | 0.608       | 304.667   | 0.19%       | 96.72%     |
| 61.5               | 11.887        | 0.585       | 305.252   | 0.19%       | 96.91%     |
| 62.0               | 11.356        | 0.561       | 305.813   | 0.18%       | 97.08%     |
| 62.5               | 10.839        | 0.538       | 306.351   | 0.17%       | 97.25%     |
| 63.0               | 10.342        | 0.516       | 306.868   | 0.16%       | 97.42%     |
| 63.5               | 9.868         | 0.495       | 307.362   | 0.16%       | 97.58%     |
| 64.0               | 9.409         | 0.474       | 307.836   | 0.15%       | 97.73%     |
| 64.5               | 8.960         | 0.454       | 308.29    | 0.14%       | 97.87%     |
| 65.0               | 8.529         | 0.434       | 308.724   | 0.14%       | 98.01%     |
| 65.5               | 8.107         | 0.414       | 309.138   | 0.13%       | 98.14%     |
| 66.0               | 7.711         | 0.395       | 309.533   | 0.13%       | 98.26%     |
| 66.5               | 7.327         | 0.377       | 309.911   | 0.12%       | 98.38%     |
| 67.0               | 6.944         | 0.359       | 310.27    | 0.11%       | 98.50%     |
| 67.5               | 6.553         | 0.341       | 310.611   | 0.11%       | 98.61%     |
| 68.0               | 6.163         | 0.323       | 310.934   | 0.10%       | 98.71%     |
| 68.5               | 5.799         | 0.305       | 311.239   | 0.10%       | 98.81%     |
| 69.0               | 5.455         | 0.288       | 311.526   | 0.09%       | 98.90%     |
| 69.5               | 5.136         | 0.272       | 311.798   | 0.09%       | 98.98%     |
| 70.0               | 4.841         | 0.257       | 312.054   | 0.08%       | 99.06%     |
| 70.5               | 4.553         | 0.242       | 312.297   | 0.08%       | 99.14%     |
| 71.0               | 4.268         | 0.228       | 312.525   | 0.07%       | 99.21%     |
| 71.5               | 3.994         | 0.214       | 312.739   | 0.07%       | 99.28%     |
| 72.0               | 3.721         | 0.201       | 312.94    | 0.06%       | 99.35%     |
| 72.5               | 3.450         | 0.187       | 313.127   | 0.06%       | 99.41%     |
| 73.0               | 3.176         | 0.173       | 313.301   | 0.06%       | 99.46%     |
| 73.5               | 2.910         | 0.160       | 313.461   | 0.05%       | 99.51%     |
| 74.0               | 2.653         | 0.146       | 313.607   | 0.05%       | 99.56%     |
| 74.5               | 2.401         | 0.133       | 313.74    | 0.04%       | 99.60%     |
| 75.0               | 2.156         | 0.121       | 313.861   | 0.04%       | 99.64%     |
| 75.5               | 1.921         | 0.108       | 313.969   | 0.03%       | 99.67%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 6 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 76.0               | 1.701         | 0.096       | 314.065   | 0.03%       | 99.70%     |
| 76.5               | 1.501         | 0.085       | 314.151   | 0.03%       | 99.73%     |
| 77.0               | 1.329         | 0.076       | 314.226   | 0.02%       | 99.75%     |
| 77.5               | 1.191         | 0.067       | 314.293   | 0.02%       | 99.78%     |
| 78.0               | 1.077         | 0.061       | 314.354   | 0.02%       | 99.79%     |
| 78.5               | 0.978         | 0.055       | 314.409   | 0.02%       | 99.81%     |
| 79.0               | 0.885         | 0.050       | 314.459   | 0.02%       | 99.83%     |
| 79.5               | 0.794         | 0.045       | 314.505   | 0.01%       | 99.84%     |
| 80.0               | 0.701         | 0.040       | 314.545   | 0.01%       | 99.86%     |
| 80.5               | 0.611         | 0.035       | 314.58    | 0.01%       | 99.87%     |
| 81.0               | 0.522         | 0.031       | 314.611   | 0.01%       | 99.88%     |
| 81.5               | 0.427         | 0.026       | 314.637   | 0.01%       | 99.88%     |
| 82.0               | 0.330         | 0.021       | 314.657   | 0.01%       | 99.89%     |
| 82.5               | 0.235         | 0.015       | 314.673   | 0.00%       | 99.90%     |
| 83.0               | 0.157         | 0.011       | 314.683   | 0.00%       | 99.90%     |
| 83.5               | 0.105         | 0.007       | 314.69    | 0.00%       | 99.90%     |
| 84.0               | 0.068         | 0.005       | 314.695   | 0.00%       | 99.90%     |
| 84.5               | 0.049         | 0.003       | 314.698   | 0.00%       | 99.90%     |
| 85.0               | 0.040         | 0.002       | 314.701   | 0.00%       | 99.90%     |
| 85.5               | 0.034         | 0.002       | 314.703   | 0.00%       | 99.91%     |
| 86.0               | 0.029         | 0.002       | 314.705   | 0.00%       | 99.91%     |
| 86.5               | 0.025         | 0.001       | 314.706   | 0.00%       | 99.91%     |
| 87.0               | 0.021         | 0.001       | 314.707   | 0.00%       | 99.91%     |
| 87.5               | 0.017         | 0.001       | 314.708   | 0.00%       | 99.91%     |
| 88.0               | 0.014         | 0.001       | 314.709   | 0.00%       | 99.91%     |
| 88.5               | 0.010         | 0.001       | 314.71    | 0.00%       | 99.91%     |
| 89.0               | 0.008         | 0.000       | 314.71    | 0.00%       | 99.91%     |
| 89.5               | 0.006         | 0.000       | 314.711   | 0.00%       | 99.91%     |
| 90.0               | 0.006         | 0.000       | 314.711   | 0.00%       | 99.91%     |
| 90.5               | 0.006         | 0.000       | 314.711   | 0.00%       | 99.91%     |
| 91.0               | 0.006         | 0.000       | 314.712   | 0.00%       | 99.91%     |
| 91.5               | 0.006         | 0.000       | 314.712   | 0.00%       | 99.91%     |
| 92.0               | 0.006         | 0.000       | 314.712   | 0.00%       | 99.91%     |
| 92.5               | 0.006         | 0.000       | 314.713   | 0.00%       | 99.91%     |
| 93.0               | 0.006         | 0.000       | 314.713   | 0.00%       | 99.91%     |
| 93.5               | 0.006         | 0.000       | 314.713   | 0.00%       | 99.91%     |
| 94.0               | 0.006         | 0.000       | 314.714   | 0.00%       | 99.91%     |
| 94.5               | 0.007         | 0.000       | 314.714   | 0.00%       | 99.91%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 7 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 95.0               | 0.007         | 0.000       | 314.714   | 0.00%       | 99.91%     |
| 95.5               | 0.007         | 0.000       | 314.715   | 0.00%       | 99.91%     |
| 96.0               | 0.007         | 0.000       | 314.715   | 0.00%       | 99.91%     |
| 96.5               | 0.007         | 0.000       | 314.715   | 0.00%       | 99.91%     |
| 97.0               | 0.007         | 0.000       | 314.716   | 0.00%       | 99.91%     |
| 97.5               | 0.008         | 0.000       | 314.716   | 0.00%       | 99.91%     |
| 98.0               | 0.008         | 0.000       | 314.717   | 0.00%       | 99.91%     |
| 98.5               | 0.008         | 0.000       | 314.717   | 0.00%       | 99.91%     |
| 99.0               | 0.008         | 0.000       | 314.718   | 0.00%       | 99.91%     |
| 99.5               | 0.008         | 0.000       | 314.718   | 0.00%       | 99.91%     |
| 100.0              | 0.009         | 0.000       | 314.718   | 0.00%       | 99.91%     |
| 100.5              | 0.009         | 0.000       | 314.719   | 0.00%       | 99.91%     |
| 101.0              | 0.009         | 0.000       | 314.719   | 0.00%       | 99.91%     |
| 101.5              | 0.009         | 0.000       | 314.72    | 0.00%       | 99.91%     |
| 102.0              | 0.009         | 0.000       | 314.72    | 0.00%       | 99.91%     |
| 102.5              | 0.010         | 0.000       | 314.721   | 0.00%       | 99.91%     |
| 103.0              | 0.010         | 0.001       | 314.721   | 0.00%       | 99.91%     |
| 103.5              | 0.010         | 0.001       | 314.722   | 0.00%       | 99.91%     |
| 104.0              | 0.010         | 0.001       | 314.722   | 0.00%       | 99.91%     |
| 104.5              | 0.010         | 0.001       | 314.723   | 0.00%       | 99.91%     |
| 105.0              | 0.011         | 0.001       | 314.724   | 0.00%       | 99.91%     |
| 105.5              | 0.011         | 0.001       | 314.724   | 0.00%       | 99.91%     |
| 106.0              | 0.011         | 0.001       | 314.725   | 0.00%       | 99.91%     |
| 106.5              | 0.012         | 0.001       | 314.725   | 0.00%       | 99.91%     |
| 107.0              | 0.012         | 0.001       | 314.726   | 0.00%       | 99.91%     |
| 107.5              | 0.012         | 0.001       | 314.727   | 0.00%       | 99.91%     |
| 108.0              | 0.013         | 0.001       | 314.727   | 0.00%       | 99.91%     |
| 108.5              | 0.013         | 0.001       | 314.728   | 0.00%       | 99.91%     |
| 109.0              | 0.013         | 0.001       | 314.729   | 0.00%       | 99.91%     |
| 109.5              | 0.014         | 0.001       | 314.729   | 0.00%       | 99.91%     |
| 110.0              | 0.014         | 0.001       | 314.73    | 0.00%       | 99.91%     |
| 110.5              | 0.015         | 0.001       | 314.731   | 0.00%       | 99.91%     |
| 111.0              | 0.015         | 0.001       | 314.731   | 0.00%       | 99.91%     |
| 111.5              | 0.016         | 0.001       | 314.732   | 0.00%       | 99.91%     |
| 112.0              | 0.016         | 0.001       | 314.733   | 0.00%       | 99.92%     |
| 112.5              | 0.017         | 0.001       | 314.734   | 0.00%       | 99.92%     |
| 113.0              | 0.018         | 0.001       | 314.735   | 0.00%       | 99.92%     |
| 113.5              | 0.018         | 0.001       | 314.736   | 0.00%       | 99.92%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 8 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 114.0              | 0.019         | 0.001       | 314.737   | 0.00%       | 99.92%     |
| 114.5              | 0.019         | 0.001       | 314.738   | 0.00%       | 99.92%     |
| 115.0              | 0.020         | 0.001       | 314.739   | 0.00%       | 99.92%     |
| 115.5              | 0.021         | 0.001       | 314.74    | 0.00%       | 99.92%     |
| 116.0              | 0.022         | 0.001       | 314.741   | 0.00%       | 99.92%     |
| 116.5              | 0.022         | 0.001       | 314.742   | 0.00%       | 99.92%     |
| 117.0              | 0.023         | 0.001       | 314.743   | 0.00%       | 99.92%     |
| 117.5              | 0.024         | 0.001       | 314.744   | 0.00%       | 99.92%     |
| 118.0              | 0.025         | 0.001       | 314.745   | 0.00%       | 99.92%     |
| 118.5              | 0.025         | 0.001       | 314.746   | 0.00%       | 99.92%     |
| 119.0              | 0.026         | 0.001       | 314.748   | 0.00%       | 99.92%     |
| 119.5              | 0.027         | 0.001       | 314.749   | 0.00%       | 99.92%     |
| 120.0              | 0.028         | 0.001       | 314.75    | 0.00%       | 99.92%     |
| 120.5              | 0.029         | 0.001       | 314.751   | 0.00%       | 99.92%     |
| 121.0              | 0.030         | 0.001       | 314.753   | 0.00%       | 99.92%     |
| 121.5              | 0.031         | 0.001       | 314.754   | 0.00%       | 99.92%     |
| 122.0              | 0.032         | 0.001       | 314.756   | 0.00%       | 99.92%     |
| 122.5              | 0.033         | 0.002       | 314.757   | 0.00%       | 99.92%     |
| 123.0              | 0.034         | 0.002       | 314.759   | 0.00%       | 99.92%     |
| 123.5              | 0.035         | 0.002       | 314.76    | 0.00%       | 99.92%     |
| 124.0              | 0.036         | 0.002       | 314.762   | 0.00%       | 99.92%     |
| 124.5              | 0.037         | 0.002       | 314.764   | 0.00%       | 99.92%     |
| 125.0              | 0.039         | 0.002       | 314.765   | 0.00%       | 99.93%     |
| 125.5              | 0.040         | 0.002       | 314.767   | 0.00%       | 99.93%     |
| 126.0              | 0.041         | 0.002       | 314.769   | 0.00%       | 99.93%     |
| 126.5              | 0.042         | 0.002       | 314.771   | 0.00%       | 99.93%     |
| 127.0              | 0.043         | 0.002       | 314.773   | 0.00%       | 99.93%     |
| 127.5              | 0.044         | 0.002       | 314.774   | 0.00%       | 99.93%     |
| 128.0              | 0.046         | 0.002       | 314.776   | 0.00%       | 99.93%     |
| 128.5              | 0.047         | 0.002       | 314.778   | 0.00%       | 99.93%     |
| 129.0              | 0.048         | 0.002       | 314.78    | 0.00%       | 99.93%     |
| 129.5              | 0.049         | 0.002       | 314.782   | 0.00%       | 99.93%     |
| 130.0              | 0.051         | 0.002       | 314.785   | 0.00%       | 99.93%     |
| 130.5              | 0.052         | 0.002       | 314.787   | 0.00%       | 99.93%     |
| 131.0              | 0.053         | 0.002       | 314.789   | 0.00%       | 99.93%     |
| 131.5              | 0.055         | 0.002       | 314.791   | 0.00%       | 99.93%     |
| 132.0              | 0.056         | 0.002       | 314.793   | 0.00%       | 99.93%     |
| 132.5              | 0.057         | 0.002       | 314.796   | 0.00%       | 99.94%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0



## Zonal flux distribution table

Appendix Page: 9 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 133.0              | 0.059         | 0.002       | 314.798   | 0.00%       | 99.94%     |
| 133.5              | 0.060         | 0.002       | 314.8     | 0.00%       | 99.94%     |
| 134.0              | 0.062         | 0.002       | 314.803   | 0.00%       | 99.94%     |
| 134.5              | 0.063         | 0.002       | 314.805   | 0.00%       | 99.94%     |
| 135.0              | 0.064         | 0.002       | 314.808   | 0.00%       | 99.94%     |
| 135.5              | 0.066         | 0.003       | 314.81    | 0.00%       | 99.94%     |
| 136.0              | 0.067         | 0.003       | 314.813   | 0.00%       | 99.94%     |
| 136.5              | 0.069         | 0.003       | 314.815   | 0.00%       | 99.94%     |
| 137.0              | 0.070         | 0.003       | 314.818   | 0.00%       | 99.94%     |
| 137.5              | 0.072         | 0.003       | 314.821   | 0.00%       | 99.94%     |
| 138.0              | 0.073         | 0.003       | 314.823   | 0.00%       | 99.94%     |
| 138.5              | 0.075         | 0.003       | 314.826   | 0.00%       | 99.94%     |
| 139.0              | 0.076         | 0.003       | 314.829   | 0.00%       | 99.95%     |
| 139.5              | 0.078         | 0.003       | 314.831   | 0.00%       | 99.95%     |
| 140.0              | 0.079         | 0.003       | 314.834   | 0.00%       | 99.95%     |
| 140.5              | 0.081         | 0.003       | 314.837   | 0.00%       | 99.95%     |
| 141.0              | 0.083         | 0.003       | 314.84    | 0.00%       | 99.95%     |
| 141.5              | 0.084         | 0.003       | 314.843   | 0.00%       | 99.95%     |
| 142.0              | 0.086         | 0.003       | 314.846   | 0.00%       | 99.95%     |
| 142.5              | 0.088         | 0.003       | 314.848   | 0.00%       | 99.95%     |
| 143.0              | 0.089         | 0.003       | 314.851   | 0.00%       | 99.95%     |
| 143.5              | 0.091         | 0.003       | 314.854   | 0.00%       | 99.95%     |
| 144.0              | 0.093         | 0.003       | 314.857   | 0.00%       | 99.95%     |
| 144.5              | 0.094         | 0.003       | 314.86    | 0.00%       | 99.96%     |
| 145.0              | 0.096         | 0.003       | 314.863   | 0.00%       | 99.96%     |
| 145.5              | 0.097         | 0.003       | 314.866   | 0.00%       | 99.96%     |
| 146.0              | 0.099         | 0.003       | 314.869   | 0.00%       | 99.96%     |
| 146.5              | 0.100         | 0.003       | 314.872   | 0.00%       | 99.96%     |
| 147.0              | 0.102         | 0.003       | 314.875   | 0.00%       | 99.96%     |
| 147.5              | 0.103         | 0.003       | 314.878   | 0.00%       | 99.96%     |
| 148.0              | 0.104         | 0.003       | 314.881   | 0.00%       | 99.96%     |
| 148.5              | 0.106         | 0.003       | 314.885   | 0.00%       | 99.96%     |
| 149.0              | 0.107         | 0.003       | 314.888   | 0.00%       | 99.96%     |
| 149.5              | 0.109         | 0.003       | 314.891   | 0.00%       | 99.97%     |
| 150.0              | 0.110         | 0.003       | 314.894   | 0.00%       | 99.97%     |
| 150.5              | 0.111         | 0.003       | 314.897   | 0.00%       | 99.97%     |
| 151.0              | 0.113         | 0.003       | 314.9     | 0.00%       | 99.97%     |
| 151.5              | 0.114         | 0.003       | 314.903   | 0.00%       | 99.97%     |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 10 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 152.0              | 0.116         | 0.003       | 314.906   | 0.00%       | 99.97%     |
| 152.5              | 0.117         | 0.003       | 314.909   | 0.00%       | 99.97%     |
| 153.0              | 0.118         | 0.003       | 314.912   | 0.00%       | 99.97%     |
| 153.5              | 0.119         | 0.003       | 314.914   | 0.00%       | 99.97%     |
| 154.0              | 0.121         | 0.003       | 314.917   | 0.00%       | 99.97%     |
| 154.5              | 0.122         | 0.003       | 314.92    | 0.00%       | 99.97%     |
| 155.0              | 0.123         | 0.003       | 314.923   | 0.00%       | 99.98%     |
| 155.5              | 0.124         | 0.003       | 314.926   | 0.00%       | 99.98%     |
| 156.0              | 0.125         | 0.003       | 314.929   | 0.00%       | 99.98%     |
| 156.5              | 0.126         | 0.003       | 314.932   | 0.00%       | 99.98%     |
| 157.0              | 0.127         | 0.003       | 314.934   | 0.00%       | 99.98%     |
| 157.5              | 0.128         | 0.003       | 314.937   | 0.00%       | 99.98%     |
| 158.0              | 0.129         | 0.003       | 314.94    | 0.00%       | 99.98%     |
| 158.5              | 0.130         | 0.003       | 314.942   | 0.00%       | 99.98%     |
| 159.0              | 0.131         | 0.003       | 314.945   | 0.00%       | 99.98%     |
| 159.5              | 0.132         | 0.003       | 314.947   | 0.00%       | 99.98%     |
| 160.0              | 0.133         | 0.003       | 314.95    | 0.00%       | 99.98%     |
| 160.5              | 0.133         | 0.002       | 314.952   | 0.00%       | 99.98%     |
| 161.0              | 0.134         | 0.002       | 314.955   | 0.00%       | 99.99%     |
| 161.5              | 0.134         | 0.002       | 314.957   | 0.00%       | 99.99%     |
| 162.0              | 0.135         | 0.002       | 314.959   | 0.00%       | 99.99%     |
| 162.5              | 0.135         | 0.002       | 314.962   | 0.00%       | 99.99%     |
| 163.0              | 0.135         | 0.002       | 314.964   | 0.00%       | 99.99%     |
| 163.5              | 0.135         | 0.002       | 314.966   | 0.00%       | 99.99%     |
| 164.0              | 0.135         | 0.002       | 314.968   | 0.00%       | 99.99%     |
| 164.5              | 0.135         | 0.002       | 314.97    | 0.00%       | 99.99%     |
| 165.0              | 0.135         | 0.002       | 314.972   | 0.00%       | 99.99%     |
| 165.5              | 0.135         | 0.002       | 314.974   | 0.00%       | 99.99%     |
| 166.0              | 0.135         | 0.002       | 314.976   | 0.00%       | 99.99%     |
| 166.5              | 0.135         | 0.002       | 314.978   | 0.00%       | 99.99%     |
| 167.0              | 0.134         | 0.002       | 314.979   | 0.00%       | 99.99%     |
| 167.5              | 0.134         | 0.002       | 314.981   | 0.00%       | 99.99%     |
| 168.0              | 0.134         | 0.002       | 314.982   | 0.00%       | 99.99%     |
| 168.5              | 0.133         | 0.001       | 314.984   | 0.00%       | 99.99%     |
| 169.0              | 0.132         | 0.001       | 314.985   | 0.00%       | 100.00%    |
| 169.5              | 0.132         | 0.001       | 314.987   | 0.00%       | 100.00%    |
| 170.0              | 0.131         | 0.001       | 314.988   | 0.00%       | 100.00%    |
| 170.5              | 0.131         | 0.001       | 314.989   | 0.00%       | 100.00%    |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

Operator: 0

## Zonal flux distribution table

Appendix Page: 11 Total:36

| $\gamma(^{\circ})$ | Average I(cd) | Zonal F(lm) | Sum F(lm) | Eff Flux(%) | Eff Sum(%) |
|--------------------|---------------|-------------|-----------|-------------|------------|
| 171.0              | 0.130         | 0.001       | 314.99    | 0.00%       | 100.00%    |
| 171.5              | 0.129         | 0.001       | 314.991   | 0.00%       | 100.00%    |
| 172.0              | 0.128         | 0.001       | 314.992   | 0.00%       | 100.00%    |
| 172.5              | 0.127         | 0.001       | 314.993   | 0.00%       | 100.00%    |
| 173.0              | 0.126         | 0.001       | 314.994   | 0.00%       | 100.00%    |
| 173.5              | 0.125         | 0.001       | 314.995   | 0.00%       | 100.00%    |
| 174.0              | 0.124         | 0.001       | 314.996   | 0.00%       | 100.00%    |
| 174.5              | 0.124         | 0.001       | 314.996   | 0.00%       | 100.00%    |
| 175.0              | 0.123         | 0.001       | 314.997   | 0.00%       | 100.00%    |
| 175.5              | 0.123         | 0.001       | 314.998   | 0.00%       | 100.00%    |
| 176.0              | 0.123         | 0.000       | 314.998   | 0.00%       | 100.00%    |
| 176.5              | 0.123         | 0.000       | 314.999   | 0.00%       | 100.00%    |
| 177.0              | 0.123         | 0.000       | 314.999   | 0.00%       | 100.00%    |
| 177.5              | 0.123         | 0.000       | 314.999   | 0.00%       | 100.00%    |
| 178.0              | 0.124         | 0.000       | 315       | 0.00%       | 100.00%    |
| 178.5              | 0.124         | 0.000       | 315       | 0.00%       | 100.00%    |
| 179.0              | 0.125         | 0.000       | 315       | 0.00%       | 100.00%    |
| 179.5              | 0.126         | 0.000       | 315       | 0.00%       | 100.00%    |
| 180.0              | 0.125         | 0.000       | 315       | 0.00%       | 100.00%    |

Equipment: 0  
Temperature( $^{\circ}\text{C}$ ): 0

Date:  
Humidity(%): 0%

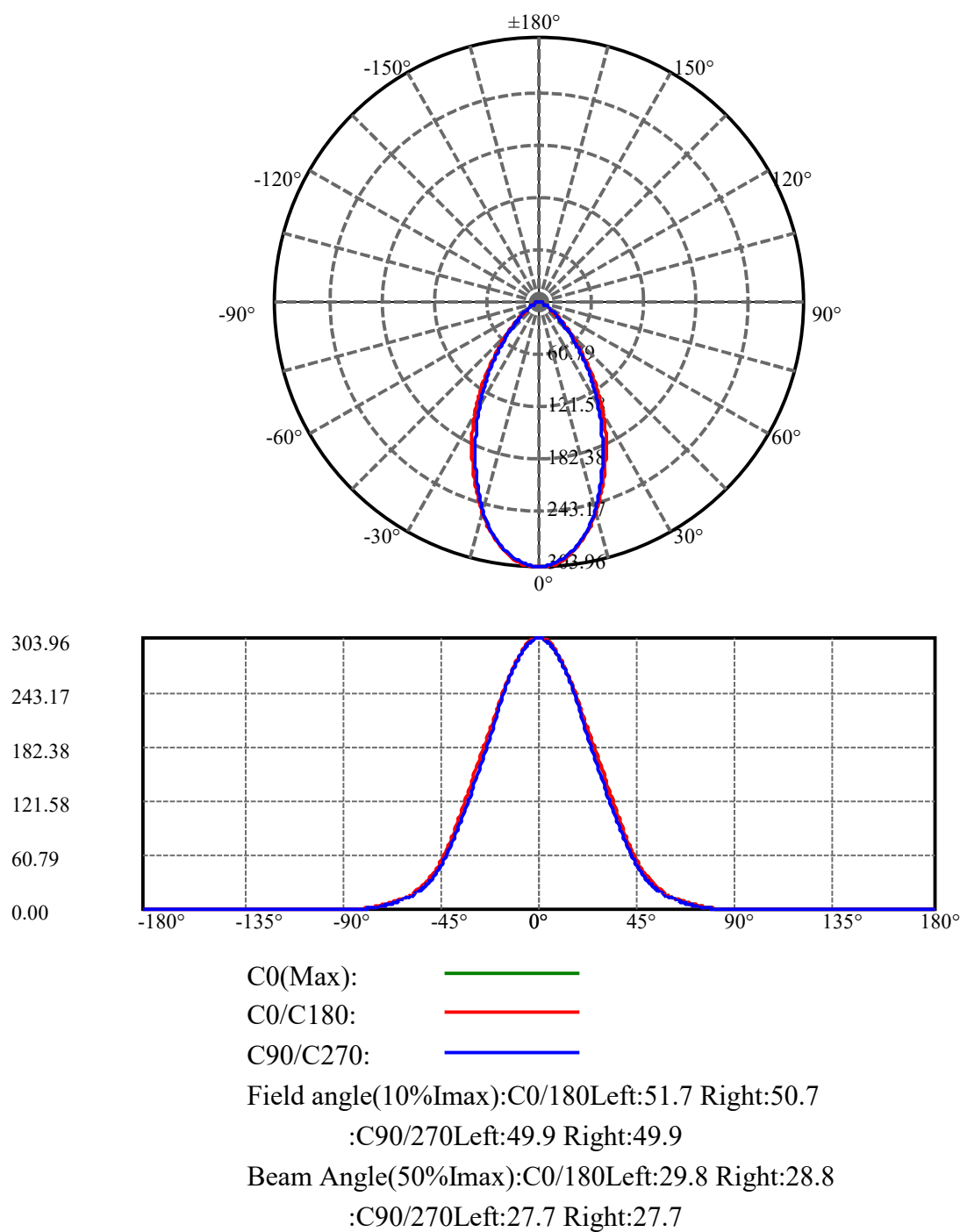
Operator: 0

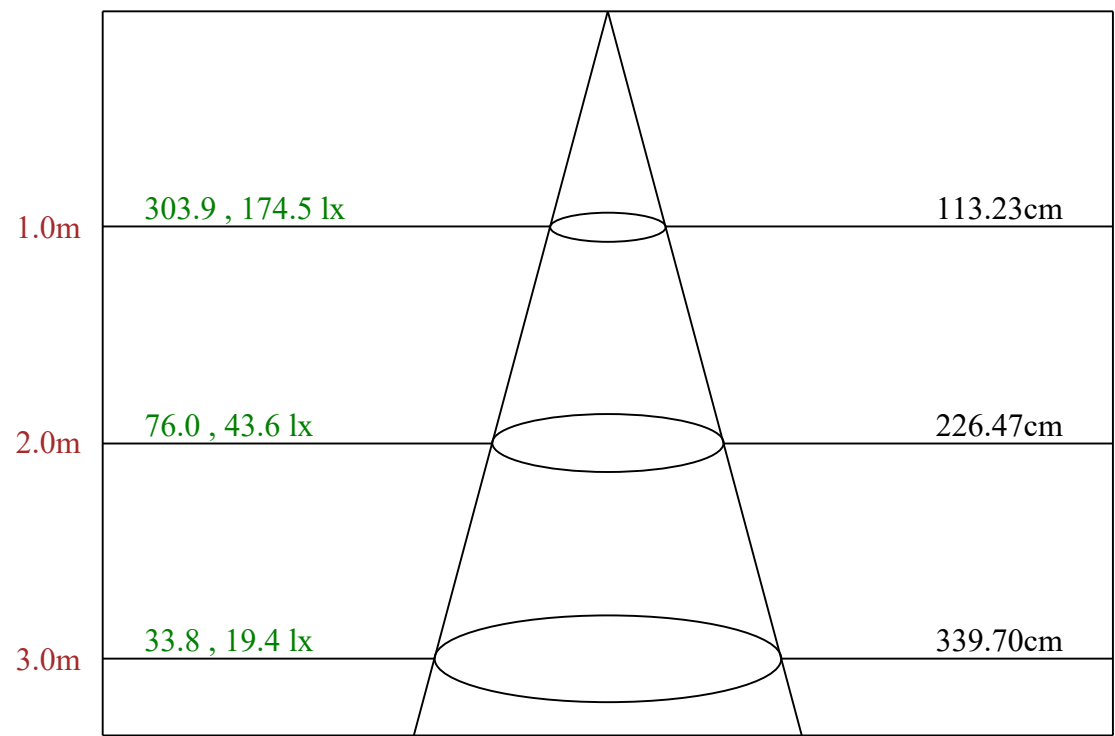
## ZONAL LUMEN SUMMARY

| Zone    | Lumens | %Lamp   | %Fixt   |
|---------|--------|---------|---------|
| 0-30    | 179.51 | 56.99%  | 56.99%  |
| 0-40    | 245.61 | 77.97%  | 77.97%  |
| 0-60    | 303.43 | 96.33%  | 96.33%  |
| 0-90    | 314.71 | 99.91%  | 99.91%  |
| 0-120   | 314.75 | 99.92%  | 99.92%  |
| 0-180   | 315.00 | 100.00% | 100.00% |
| 60-90   | 11.28  | 3.58%   | 3.58%   |
| 90-120  | 0.04   | 0.01%   | 0.01%   |
| 90-130  | 0.07   | 0.02%   | 0.02%   |
| 90-150  | 0.18   | 0.06%   | 0.06%   |
| 90-180  | 0.29   | 0.09%   | 0.09%   |
| 0-41.27 | 252.00 | 80.00%  | 80.00%  |

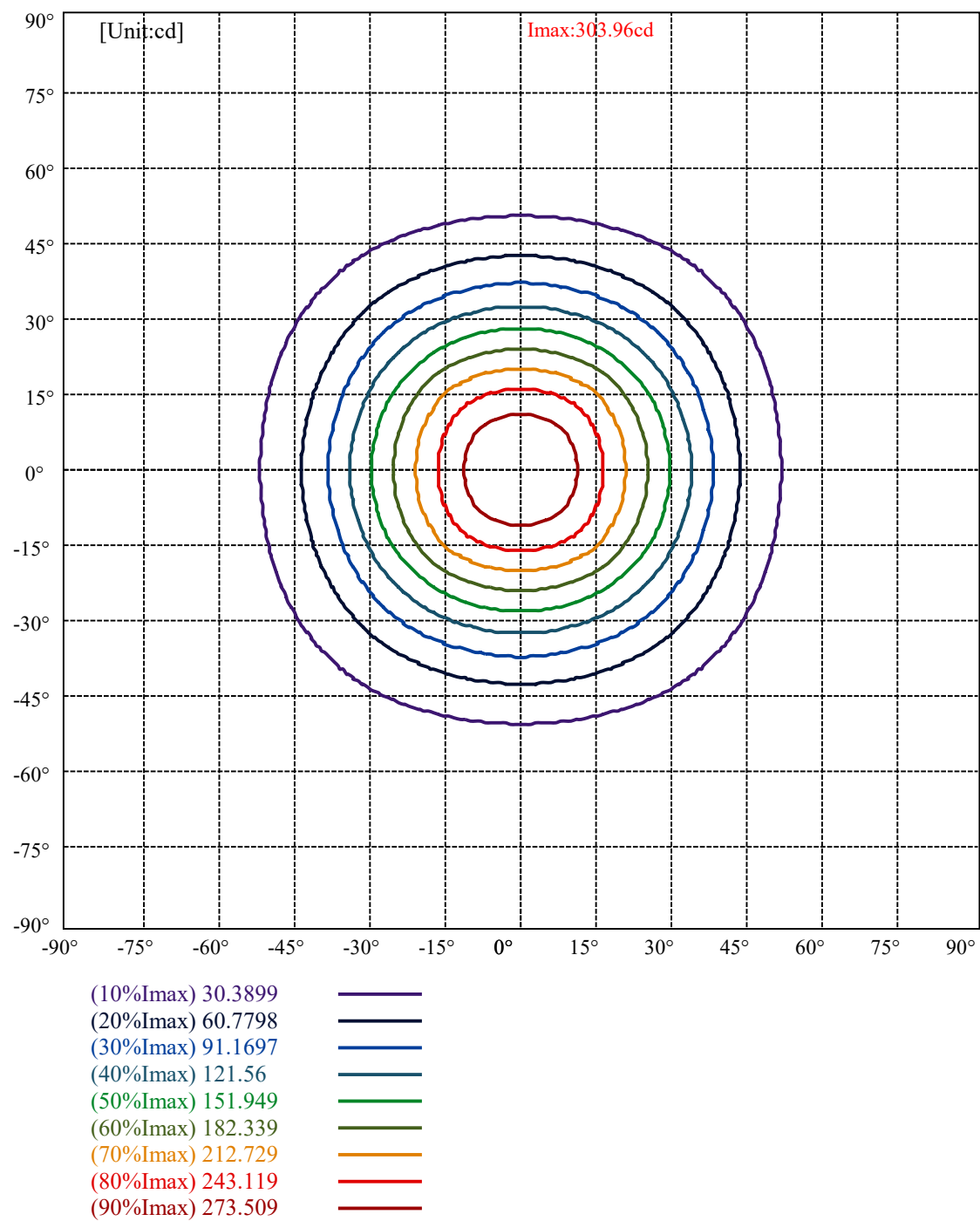
## ZONAL LUMEN SUMMARY

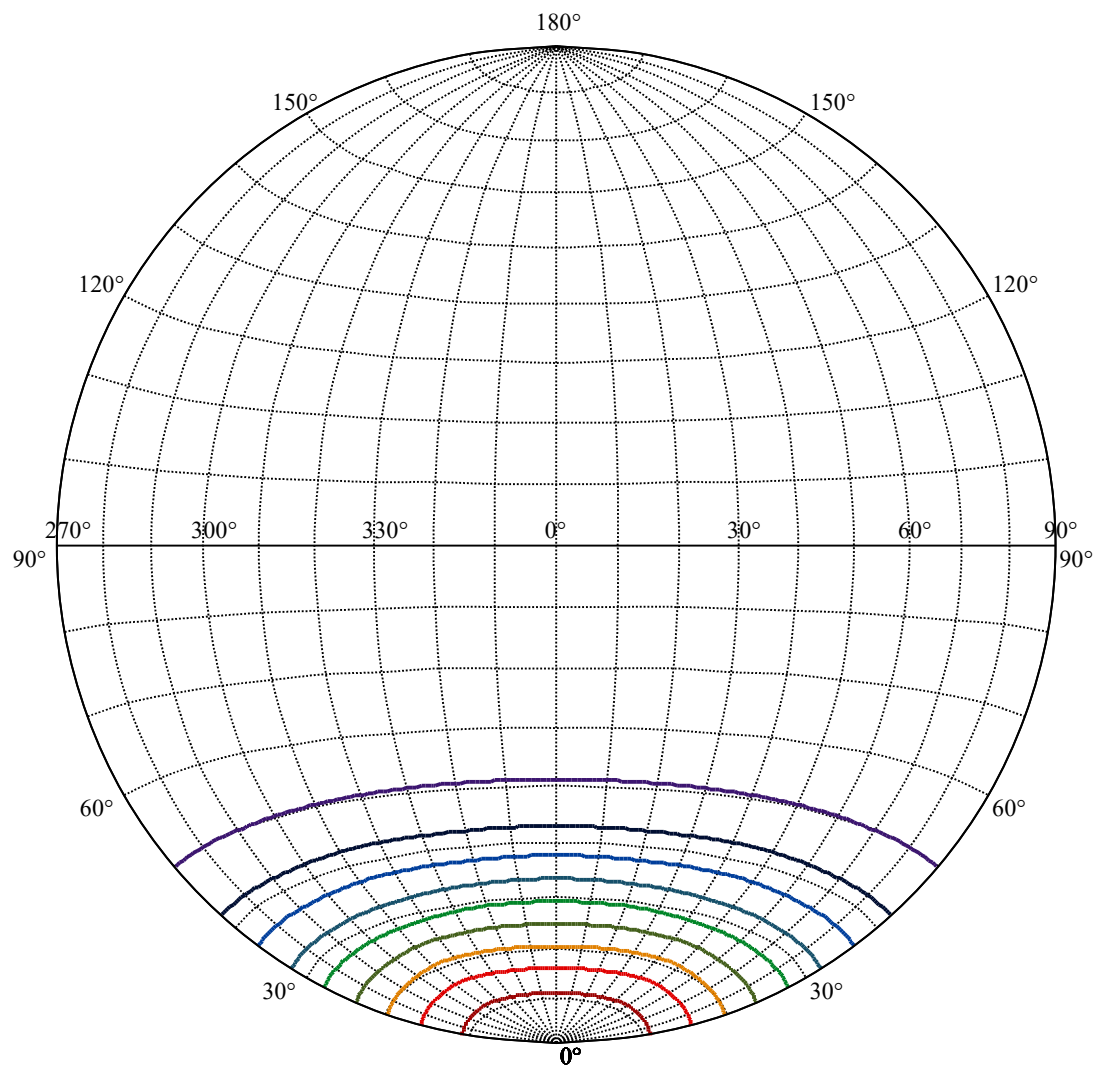
|         |       |
|---------|-------|
| 0-10    | 27.84 |
| 10-20   | 70.03 |
| 20-30   | 81.65 |
| 30-40   | 66.10 |
| 40-50   | 38.73 |
| 50-60   | 19.09 |
| 60-70   | 8.63  |
| 70-80   | 2.49  |
| 80-90   | 0.17  |
| 90-100  | 0.01  |
| 100-110 | 0.01  |
| 110-120 | 0.02  |
| 120-130 | 0.03  |
| 130-140 | 0.05  |
| 140-150 | 0.06  |
| 150-160 | 0.06  |
| 160-170 | 0.04  |
| 170-180 | 0.01  |





Max , Ave      Beam angle of C0 plane 59.03





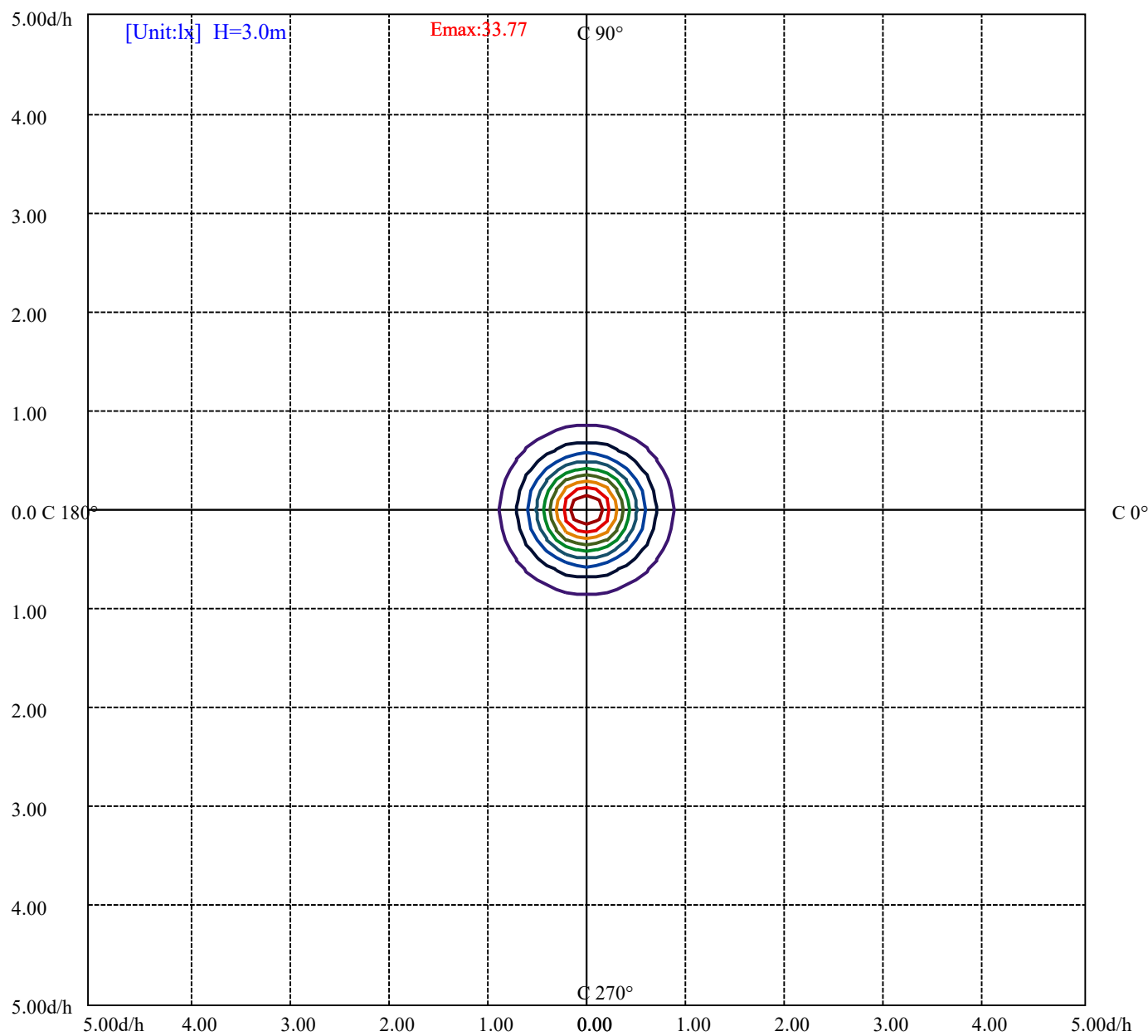
House

[Unit:cd]

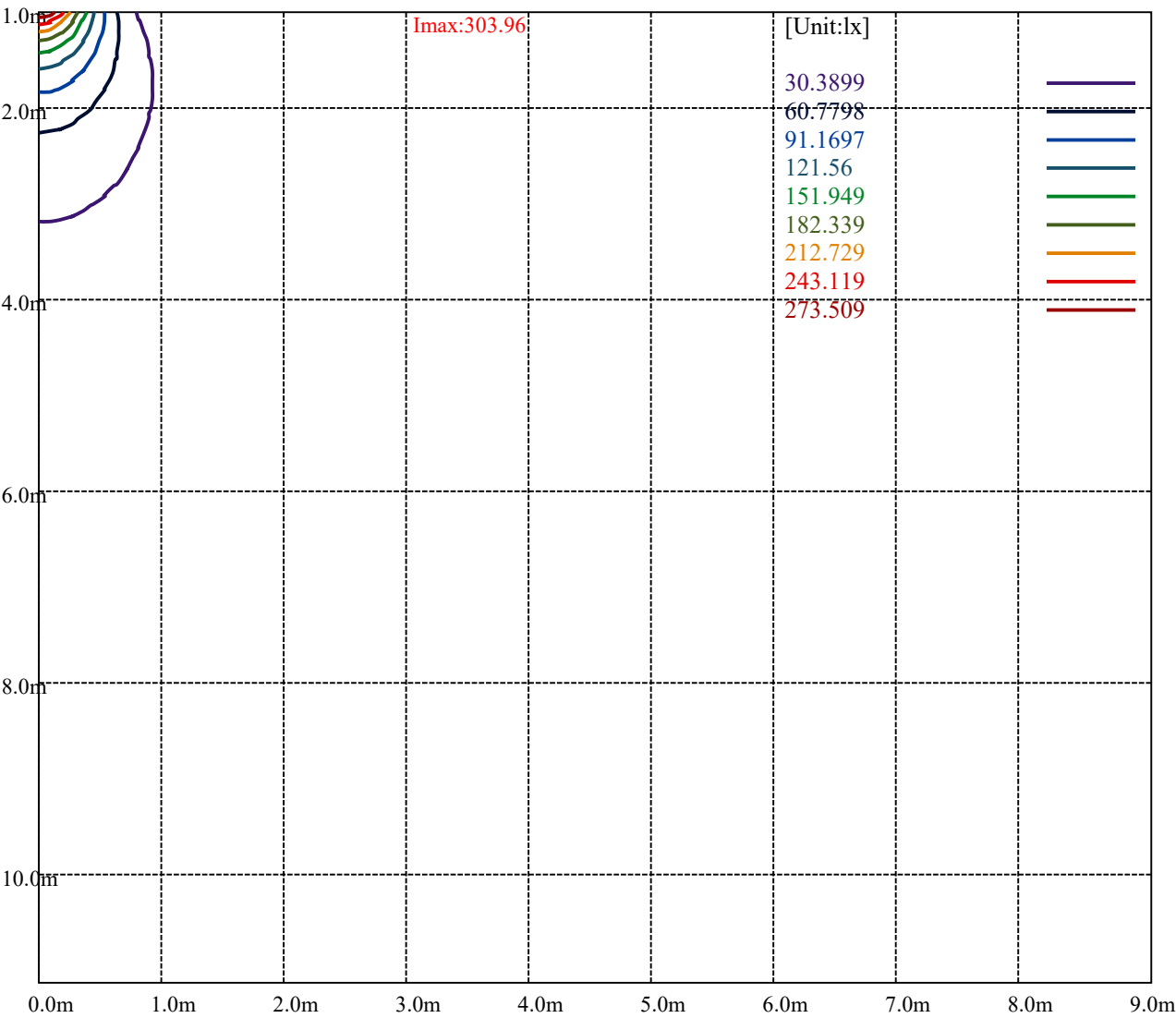
Road

|                   |  |
|-------------------|--|
| Imax:303.96       |  |
| (10%Imax) 30.3899 |  |
| (20%Imax) 60.7798 |  |
| (30%Imax) 91.1697 |  |
| (40%Imax) 121.56  |  |
| (50%Imax) 151.949 |  |
| (60%Imax) 182.339 |  |
| (70%Imax) 212.729 |  |
| (80%Imax) 243.119 |  |
| (90%Imax) 273.509 |  |





|           |          |   |
|-----------|----------|---|
| (10%Emax) | 3.376656 | — |
| (20%Emax) | 6.753311 | — |
| (30%Emax) | 10.12997 | — |
| (40%Emax) | 13.50667 | — |
| (50%Emax) | 16.88322 | — |
| (60%Emax) | 20.25989 | — |
| (70%Emax) | 23.63656 | — |
| (80%Emax) | 27.01322 | — |
| (90%Emax) | 30.38989 | — |



Luminance Limiting Curve(no luminous side)

Appendix Page: 19 Total:36

Luminance Table

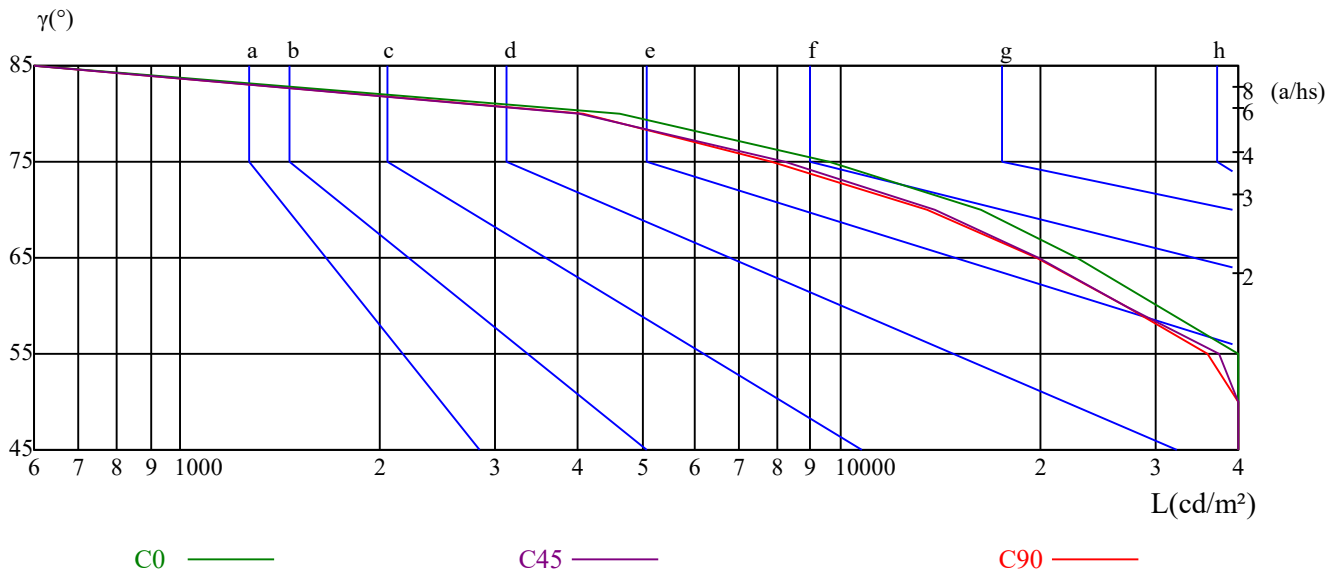
| $\gamma$ | 45    | 50    | 55    | 60    | 65    | 70    | 75   | 80   | 85  |
|----------|-------|-------|-------|-------|-------|-------|------|------|-----|
| C0       | 76320 | 54607 | 39946 | 30115 | 22798 | 16298 | 9590 | 4621 | 477 |
| C45      | 73119 | 51799 | 37333 | 26928 | 19882 | 13906 | 8257 | 4028 | 465 |
| C90      | 69715 | 48616 | 35816 | 27024 | 19786 | 13478 | 7847 | 4082 | 477 |

| L(Hor)(65) | L(Ver)(65) | L45(65) | L(Hor)(75) | L(Ver)(75) | L45(75) | L(Hor)(85) | L(Ver)(85) | L45(85) |
|------------|------------|---------|------------|------------|---------|------------|------------|---------|
| 22798      | 19786      | 19882   | 9590       | 7847       | 8257    | 477        | 477        | 465     |

Glare Table

| Glare | Quality | Service Values Illuminance(lx) |      |      |       |       |       |       |       |
|-------|---------|--------------------------------|------|------|-------|-------|-------|-------|-------|
| 1.15  | A       | 2000                           | 1000 | 500  | <=300 |       |       |       |       |
| 1.5   | B       |                                | 2000 | 1000 | 500   | <=300 |       |       |       |
| 1.85  | C       |                                |      | 2000 | 1000  | 500   | <=300 |       |       |
| 2.2   | D       |                                |      |      | 2000  | 1000  | 500   | <=300 |       |
| 2.55  | E       |                                |      |      |       | 2000  | 1000  | 500   | <=300 |
|       |         | a                              | b    | c    | d     | e     | f     | g     | h     |

Luminance Limiting Curve



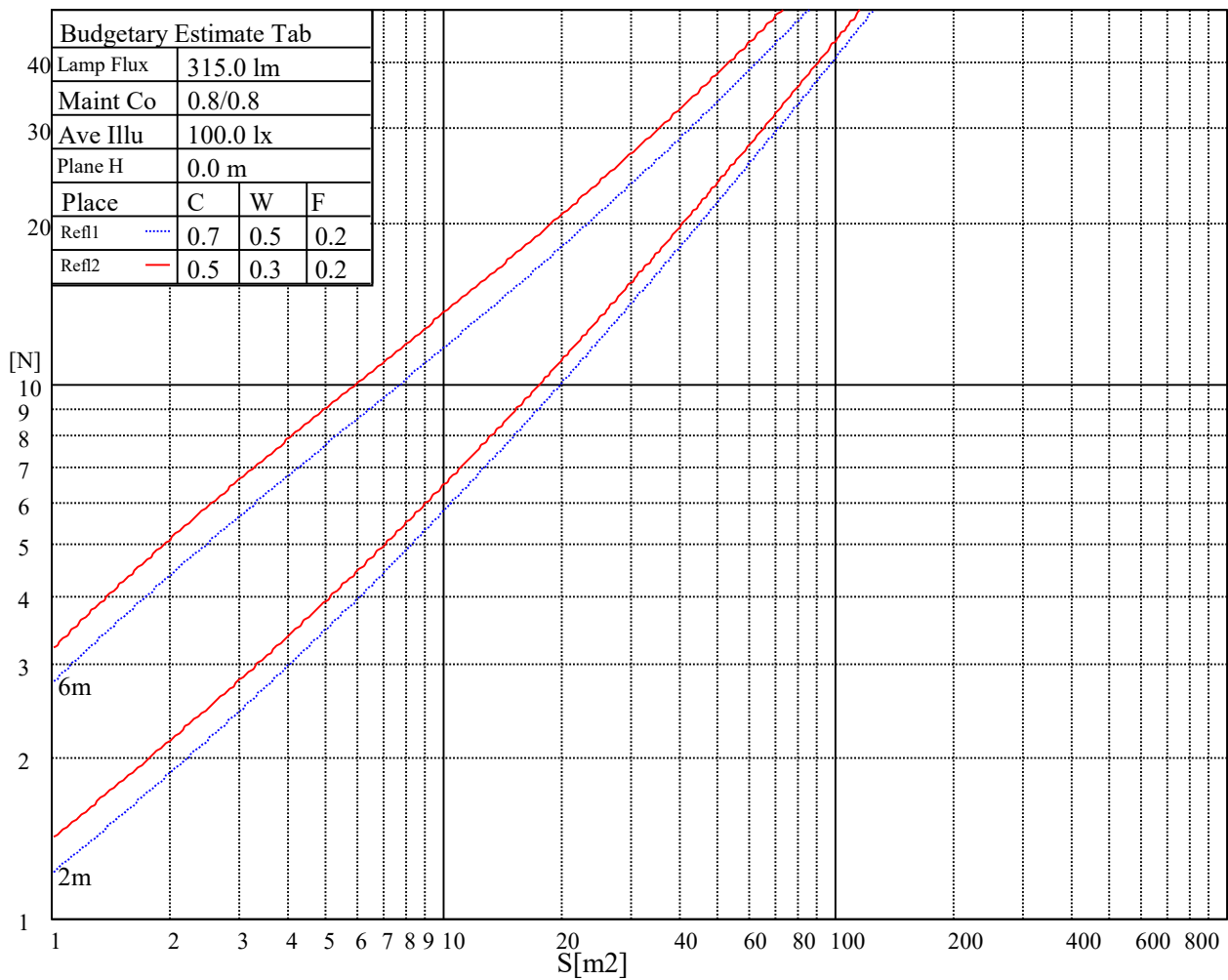
Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

| Illumination assessment according UGR             |     |                  |       |       |       |       |                |       |       |       |       |
|---------------------------------------------------|-----|------------------|-------|-------|-------|-------|----------------|-------|-------|-------|-------|
| Rf of Ceiling                                     | 70  | 70               | 50    | 50    | 30    | 70    | 70             | 50    | 50    | 30    |       |
| Rf of Wall                                        | 50  | 30               | 50    | 30    | 30    | 50    | 30             | 50    | 30    | 30    |       |
| Rf of Floor                                       | 20  | 20               | 20    | 20    | 20    | 20    | 20             | 20    | 20    | 20    |       |
| Room dimensions                                   |     | Viewed crosswise |       |       |       |       | Viewed endwise |       |       |       |       |
| X                                                 | Y   |                  |       |       |       |       |                |       |       |       |       |
| 2H                                                | 2H  | 24.28            | 25.46 | 24.64 | 25.78 | 26.09 | 23.80          | 24.99 | 24.17 | 25.30 | 25.62 |
|                                                   | 3H  | 24.48            | 25.53 | 24.86 | 25.87 | 26.22 | 23.96          | 25.01 | 24.34 | 25.35 | 25.69 |
|                                                   | 4H  | 24.47            | 25.44 | 24.87 | 25.80 | 26.17 | 23.93          | 24.91 | 24.33 | 25.26 | 25.63 |
|                                                   | 6H  | 24.42            | 25.31 | 24.83 | 25.69 | 26.09 | 23.88          | 24.77 | 24.29 | 25.15 | 25.55 |
|                                                   | 8H  | 24.35            | 25.20 | 24.77 | 25.59 | 26.00 | 23.81          | 24.67 | 24.23 | 25.05 | 25.46 |
|                                                   | 12H | 24.28            | 25.10 | 24.71 | 25.49 | 25.91 | 23.74          | 24.56 | 24.17 | 24.95 | 25.37 |
| 4H                                                | 2H  | 24.26            | 25.24 | 24.66 | 25.59 | 25.96 | 23.83          | 24.80 | 24.23 | 25.16 | 25.53 |
|                                                   | 3H  | 24.51            | 25.32 | 24.93 | 25.71 | 26.13 | 24.02          | 24.83 | 24.44 | 25.22 | 25.64 |
|                                                   | 4H  | 24.55            | 25.25 | 24.99 | 25.68 | 26.12 | 24.05          | 24.75 | 24.49 | 25.17 | 25.62 |
|                                                   | 6H  | 24.46            | 25.08 | 24.93 | 25.53 | 25.98 | 23.95          | 24.57 | 24.42 | 25.02 | 25.47 |
|                                                   | 8H  | 24.41            | 24.98 | 24.89 | 25.44 | 25.91 | 23.90          | 24.48 | 24.39 | 24.93 | 25.41 |
|                                                   | 12H | 24.37            | 24.89 | 24.85 | 25.35 | 25.86 | 23.86          | 24.39 | 24.35 | 24.84 | 25.36 |
| 8H                                                | 4H  | 24.42            | 24.99 | 24.90 | 25.45 | 25.92 | 23.92          | 24.50 | 24.41 | 24.95 | 25.43 |
|                                                   | 6H  | 24.31            | 24.79 | 24.82 | 25.26 | 25.78 | 23.82          | 24.29 | 24.32 | 24.77 | 25.28 |
|                                                   | 8H  | 24.31            | 24.71 | 24.84 | 25.23 | 25.73 | 23.81          | 24.21 | 24.34 | 24.73 | 25.23 |
|                                                   | 12H | 24.26            | 24.58 | 24.79 | 25.10 | 25.62 | 23.76          | 24.08 | 24.30 | 24.60 | 25.12 |
| 12H                                               | 4H  | 24.37            | 24.90 | 24.86 | 25.35 | 25.87 | 23.88          | 24.41 | 24.37 | 24.86 | 25.38 |
|                                                   | 6H  | 24.31            | 24.71 | 24.83 | 25.23 | 25.73 | 23.81          | 24.21 | 24.34 | 24.73 | 25.23 |
|                                                   | 8H  | 24.26            | 24.58 | 24.80 | 25.10 | 25.62 | 23.76          | 24.09 | 24.30 | 24.60 | 25.12 |
| Variation with the observer position at spacings: |     |                  |       |       |       |       |                |       |       |       |       |
| S = 1.0H                                          |     | 1.4/-2.3         |       |       |       |       | 1.4/-2.1       |       |       |       |       |
| S = 1.5H                                          |     | 3.1/-3.8         |       |       |       |       | 3.1/-3.6       |       |       |       |       |
| S = 2.0H                                          |     | 5.4/-5.1         |       |       |       |       | 5.5/-4.7       |       |       |       |       |
| Standard tables:                                  |     | BK1              |       |       |       |       | BK1            |       |       |       |       |
| Uncorrected UGR                                   |     | 5.8              |       |       |       |       | 6.3            |       |       |       |       |

UGR calculation is based on CIE Publ. 117 ,S/H = 0.25



| RHOC | 80                                      |      |      | 70   |      |      | 50   |      |      | 30   |      |      | 10   |      |      | 0    |
|------|-----------------------------------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| RHOW | 50                                      | 30   | 10   | 50   | 30   | 10   | 50   | 30   | 10   | 50   | 30   | 10   | 50   | 30   | 10   | 0    |
| RCR  | COEFFICIENTS OF UTILIZATION RHOFC=20 CU |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| 0    | 1.19                                    | 1.19 | 1.19 | 1.16 | 1.16 | 1.16 | 1.11 | 1.11 | 1.11 | 1.06 | 1.06 | 1.06 | 1.02 | 1.02 | 1.02 | 1.00 |
| 1    | 1.09                                    | 1.07 | 1.04 | 1.07 | 1.05 | 1.02 | 1.03 | 1.01 | 0.99 | 0.99 | 0.98 | 0.96 | 0.96 | 0.95 | 0.93 | 0.91 |
| 2    | 1.00                                    | 0.96 | 0.92 | 0.98 | 0.94 | 0.91 | 0.95 | 0.92 | 0.89 | 0.92 | 0.89 | 0.87 | 0.89 | 0.87 | 0.85 | 0.83 |
| 3    | 0.92                                    | 0.86 | 0.82 | 0.91 | 0.85 | 0.81 | 0.88 | 0.83 | 0.80 | 0.85 | 0.82 | 0.78 | 0.83 | 0.80 | 0.77 | 0.75 |
| 4    | 0.85                                    | 0.79 | 0.74 | 0.84 | 0.78 | 0.73 | 0.81 | 0.76 | 0.72 | 0.79 | 0.75 | 0.71 | 0.77 | 0.74 | 0.71 | 0.69 |
| 5    | 0.78                                    | 0.72 | 0.67 | 0.77 | 0.71 | 0.67 | 0.76 | 0.70 | 0.66 | 0.74 | 0.69 | 0.65 | 0.72 | 0.68 | 0.65 | 0.63 |
| 6    | 0.73                                    | 0.66 | 0.61 | 0.72 | 0.66 | 0.61 | 0.70 | 0.65 | 0.61 | 0.69 | 0.64 | 0.60 | 0.68 | 0.63 | 0.60 | 0.58 |
| 7    | 0.68                                    | 0.61 | 0.56 | 0.67 | 0.61 | 0.56 | 0.66 | 0.60 | 0.56 | 0.64 | 0.59 | 0.55 | 0.63 | 0.59 | 0.55 | 0.54 |
| 8    | 0.63                                    | 0.57 | 0.52 | 0.63 | 0.56 | 0.52 | 0.62 | 0.56 | 0.52 | 0.61 | 0.55 | 0.51 | 0.59 | 0.55 | 0.51 | 0.50 |
| 9    | 0.59                                    | 0.53 | 0.48 | 0.59 | 0.53 | 0.48 | 0.58 | 0.52 | 0.48 | 0.57 | 0.52 | 0.48 | 0.56 | 0.51 | 0.48 | 0.46 |
| 10   | 0.56                                    | 0.49 | 0.45 | 0.55 | 0.49 | 0.45 | 0.54 | 0.49 | 0.45 | 0.54 | 0.48 | 0.45 | 0.53 | 0.48 | 0.45 | 0.43 |

## Intensity data(cd)

Appendix Page: 23 Total:36

| C/γ(°) | 0.0    | 0.5    | 1.0    | 1.5    | 2.0    | 2.5    | 3.0    | 3.5    | 4.0    |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 303.90 | 303.96 | 303.79 | 303.70 | 303.51 | 303.10 | 302.53 | 301.70 | 300.87 |
| 22.5   | 303.90 | 303.86 | 303.78 | 303.57 | 303.30 | 302.94 | 302.36 | 301.55 | 300.72 |
| 45.0   | 303.90 | 303.82 | 303.66 | 303.51 | 303.13 | 302.52 | 301.78 | 300.91 | 300.00 |
| 67.5   | 303.90 | 303.80 | 303.60 | 303.27 | 302.70 | 302.06 | 301.31 | 300.38 | 299.42 |
| 90.0   | 303.90 | 303.75 | 303.53 | 303.11 | 302.58 | 301.85 | 301.04 | 299.97 | 298.94 |
| 112.5  | 303.90 | 303.80 | 303.60 | 303.27 | 302.70 | 302.06 | 301.31 | 300.38 | 299.42 |
| 135.0  | 303.90 | 303.82 | 303.66 | 303.51 | 303.13 | 302.52 | 301.78 | 300.91 | 300.00 |
| 157.5  | 303.90 | 303.86 | 303.78 | 303.57 | 303.30 | 302.94 | 302.36 | 301.55 | 300.72 |
| 180.0  | 303.90 | 303.96 | 303.79 | 303.70 | 303.51 | 303.10 | 302.53 | 301.70 | 300.87 |
| 202.5  | 303.90 | 303.86 | 303.78 | 303.57 | 303.30 | 302.94 | 302.36 | 301.55 | 300.72 |
| 225.0  | 303.90 | 303.82 | 303.66 | 303.51 | 303.13 | 302.52 | 301.78 | 300.91 | 300.00 |
| 247.5  | 303.90 | 303.80 | 303.60 | 303.27 | 302.70 | 302.06 | 301.31 | 300.38 | 299.42 |
| 270.0  | 303.90 | 303.75 | 303.53 | 303.11 | 302.58 | 301.85 | 301.04 | 299.97 | 298.94 |
| 292.5  | 303.90 | 303.80 | 303.60 | 303.27 | 302.70 | 302.06 | 301.31 | 300.38 | 299.42 |
| 315.0  | 303.90 | 303.82 | 303.66 | 303.51 | 303.13 | 302.52 | 301.78 | 300.91 | 300.00 |
| 337.5  | 303.90 | 303.86 | 303.78 | 303.57 | 303.30 | 302.94 | 302.36 | 301.55 | 300.72 |
| 360.0  | 303.90 | 303.96 | 303.79 | 303.70 | 303.51 | 303.10 | 302.53 | 301.70 | 300.87 |

| C/γ(°) | 4.5    | 5.0    | 5.5    | 6.0    | 6.5    | 7.0    | 7.5    | 8.0    | 8.5    |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 299.89 | 298.84 | 297.42 | 295.82 | 294.03 | 292.04 | 289.96 | 287.85 | 285.62 |
| 22.5   | 299.70 | 298.48 | 297.16 | 295.62 | 293.85 | 292.07 | 290.24 | 288.39 | 286.37 |
| 45.0   | 298.88 | 297.72 | 296.46 | 295.11 | 293.70 | 292.27 | 290.65 | 288.95 | 287.01 |
| 67.5   | 298.31 | 297.11 | 295.93 | 294.73 | 293.33 | 291.68 | 289.74 | 287.76 | 285.70 |
| 90.0   | 297.94 | 296.85 | 295.46 | 294.04 | 292.56 | 290.88 | 289.00 | 287.05 | 284.71 |
| 112.5  | 298.31 | 297.11 | 295.93 | 294.73 | 293.33 | 291.68 | 289.74 | 287.76 | 285.70 |
| 135.0  | 298.88 | 297.72 | 296.46 | 295.11 | 293.70 | 292.27 | 290.65 | 288.95 | 287.01 |
| 157.5  | 299.70 | 298.48 | 297.16 | 295.62 | 293.85 | 292.07 | 290.24 | 288.39 | 286.37 |
| 180.0  | 299.89 | 298.84 | 297.42 | 295.82 | 294.03 | 292.04 | 289.96 | 287.85 | 285.62 |
| 202.5  | 299.70 | 298.48 | 297.16 | 295.62 | 293.85 | 292.07 | 290.24 | 288.39 | 286.37 |
| 225.0  | 298.88 | 297.72 | 296.46 | 295.11 | 293.70 | 292.27 | 290.65 | 288.95 | 287.01 |
| 247.5  | 298.31 | 297.11 | 295.93 | 294.73 | 293.33 | 291.68 | 289.74 | 287.76 | 285.70 |
| 270.0  | 297.94 | 296.85 | 295.46 | 294.04 | 292.56 | 290.88 | 289.00 | 287.05 | 284.71 |
| 292.5  | 298.31 | 297.11 | 295.93 | 294.73 | 293.33 | 291.68 | 289.74 | 287.76 | 285.70 |
| 315.0  | 298.88 | 297.72 | 296.46 | 295.11 | 293.70 | 292.27 | 290.65 | 288.95 | 287.01 |
| 337.5  | 299.70 | 298.48 | 297.16 | 295.62 | 293.85 | 292.07 | 290.24 | 288.39 | 286.37 |
| 360.0  | 299.89 | 298.84 | 297.42 | 295.82 | 294.03 | 292.04 | 289.96 | 287.85 | 285.62 |

| C/γ(°) | 9.0    | 9.5    | 10.0   | 10.5   | 11.0   | 11.5   | 12.0   | 12.5   | 13.0   |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 283.52 | 281.35 | 279.14 | 276.71 | 274.28 | 271.56 | 268.88 | 266.11 | 263.36 |
| 22.5   | 284.28 | 281.89 | 279.61 | 277.14 | 274.80 | 272.37 | 269.68 | 266.84 | 264.11 |
| 45.0   | 284.93 | 282.83 | 280.78 | 278.47 | 276.05 | 273.68 | 270.97 | 268.24 | 265.59 |
| 67.5   | 283.64 | 281.44 | 278.99 | 276.40 | 273.85 | 271.27 | 268.64 | 265.94 | 262.92 |
| 90.0   | 282.47 | 280.14 | 277.72 | 275.25 | 272.77 | 270.09 | 267.21 | 264.41 | 261.75 |
| 112.5  | 283.64 | 281.44 | 278.99 | 276.40 | 273.85 | 271.27 | 268.64 | 265.94 | 262.92 |
| 135.0  | 284.93 | 282.83 | 280.78 | 278.47 | 276.05 | 273.68 | 270.97 | 268.24 | 265.59 |
| 157.5  | 284.28 | 281.89 | 279.61 | 277.14 | 274.80 | 272.37 | 269.68 | 266.84 | 264.11 |
| 180.0  | 283.52 | 281.35 | 279.14 | 276.71 | 274.28 | 271.56 | 268.88 | 266.11 | 263.36 |
| 202.5  | 284.28 | 281.89 | 279.61 | 277.14 | 274.80 | 272.37 | 269.68 | 266.84 | 264.11 |
| 225.0  | 284.93 | 282.83 | 280.78 | 278.47 | 276.05 | 273.68 | 270.97 | 268.24 | 265.59 |
| 247.5  | 283.64 | 281.44 | 278.99 | 276.40 | 273.85 | 271.27 | 268.64 | 265.94 | 262.92 |
| 270.0  | 282.47 | 280.14 | 277.72 | 275.25 | 272.77 | 270.09 | 267.21 | 264.41 | 261.75 |
| 292.5  | 283.64 | 281.44 | 278.99 | 276.40 | 273.85 | 271.27 | 268.64 | 265.94 | 262.92 |
| 315.0  | 284.93 | 282.83 | 280.78 | 278.47 | 276.05 | 273.68 | 270.97 | 268.24 | 265.59 |
| 337.5  | 284.28 | 281.89 | 279.61 | 277.14 | 274.80 | 272.37 | 269.68 | 266.84 | 264.11 |
| 360.0  | 283.52 | 281.35 | 279.14 | 276.71 | 274.28 | 271.56 | 268.88 | 266.11 | 263.36 |

Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

## Intensity data(cd)

Appendix Page: 24 Total:36

| C/γ(°) | 13.5   | 14.0   | 14.5   | 15.0   | 15.5   | 16.0   | 16.5   | 17.0   | 17.5   |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 260.54 | 257.56 | 254.25 | 251.13 | 247.98 | 244.65 | 241.34 | 237.89 | 234.28 |
| 22.5   | 261.34 | 258.40 | 255.38 | 252.30 | 249.16 | 245.97 | 242.62 | 239.34 | 235.90 |
| 45.0   | 263.01 | 260.41 | 257.58 | 254.54 | 251.40 | 248.23 | 245.02 | 241.59 | 238.02 |
| 67.5   | 259.77 | 256.79 | 253.82 | 250.71 | 247.39 | 243.95 | 240.54 | 237.01 | 233.33 |
| 90.0   | 258.73 | 255.61 | 252.18 | 248.60 | 244.94 | 241.15 | 237.30 | 233.59 | 229.73 |
| 112.5  | 259.77 | 256.79 | 253.82 | 250.71 | 247.39 | 243.95 | 240.54 | 237.01 | 233.33 |
| 135.0  | 263.01 | 260.41 | 257.58 | 254.54 | 251.40 | 248.23 | 245.02 | 241.59 | 238.02 |
| 157.5  | 261.34 | 258.40 | 255.38 | 252.30 | 249.16 | 245.97 | 242.62 | 239.34 | 235.90 |
| 180.0  | 260.54 | 257.56 | 254.25 | 251.13 | 247.98 | 244.65 | 241.34 | 237.89 | 234.28 |
| 202.5  | 261.34 | 258.40 | 255.38 | 252.30 | 249.16 | 245.97 | 242.62 | 239.34 | 235.90 |
| 225.0  | 263.01 | 260.41 | 257.58 | 254.54 | 251.40 | 248.23 | 245.02 | 241.59 | 238.02 |
| 247.5  | 259.77 | 256.79 | 253.82 | 250.71 | 247.39 | 243.95 | 240.54 | 237.01 | 233.33 |
| 270.0  | 258.73 | 255.61 | 252.18 | 248.60 | 244.94 | 241.15 | 237.30 | 233.59 | 229.73 |
| 292.5  | 259.77 | 256.79 | 253.82 | 250.71 | 247.39 | 243.95 | 240.54 | 237.01 | 233.33 |
| 315.0  | 263.01 | 260.41 | 257.58 | 254.54 | 251.40 | 248.23 | 245.02 | 241.59 | 238.02 |
| 337.5  | 261.34 | 258.40 | 255.38 | 252.30 | 249.16 | 245.97 | 242.62 | 239.34 | 235.90 |
| 360.0  | 260.54 | 257.56 | 254.25 | 251.13 | 247.98 | 244.65 | 241.34 | 237.89 | 234.28 |
| C/γ(°) | 18.0   | 18.5   | 19.0   | 19.5   | 20.0   | 20.5   | 21.0   | 21.5   | 22.0   |
| 0.0    | 230.78 | 227.44 | 224.00 | 220.49 | 217.04 | 213.51 | 209.92 | 206.39 | 202.98 |
| 22.5   | 232.42 | 228.89 | 225.54 | 222.06 | 218.59 | 215.09 | 211.44 | 207.89 | 204.33 |
| 45.0   | 234.50 | 230.97 | 227.25 | 223.55 | 219.94 | 216.21 | 212.42 | 208.65 | 204.91 |
| 67.5   | 229.66 | 225.84 | 221.95 | 218.08 | 214.17 | 210.16 | 206.25 | 202.25 | 198.18 |
| 90.0   | 225.90 | 221.99 | 218.11 | 214.38 | 210.51 | 206.66 | 202.88 | 199.06 | 195.01 |
| 112.5  | 229.66 | 225.84 | 221.95 | 218.08 | 214.17 | 210.16 | 206.25 | 202.25 | 198.18 |
| 135.0  | 234.50 | 230.97 | 227.25 | 223.55 | 219.94 | 216.21 | 212.42 | 208.65 | 204.91 |
| 157.5  | 232.42 | 228.89 | 225.54 | 222.06 | 218.59 | 215.09 | 211.44 | 207.89 | 204.33 |
| 180.0  | 230.78 | 227.44 | 224.00 | 220.49 | 217.04 | 213.51 | 209.92 | 206.39 | 202.98 |
| 202.5  | 232.42 | 228.89 | 225.54 | 222.06 | 218.59 | 215.09 | 211.44 | 207.89 | 204.33 |
| 225.0  | 234.50 | 230.97 | 227.25 | 223.55 | 219.94 | 216.21 | 212.42 | 208.65 | 204.91 |
| 247.5  | 229.66 | 225.84 | 221.95 | 218.08 | 214.17 | 210.16 | 206.25 | 202.25 | 198.18 |
| 270.0  | 225.90 | 221.99 | 218.11 | 214.38 | 210.51 | 206.66 | 202.88 | 199.06 | 195.01 |
| 292.5  | 229.66 | 225.84 | 221.95 | 218.08 | 214.17 | 210.16 | 206.25 | 202.25 | 198.18 |
| 315.0  | 234.50 | 230.97 | 227.25 | 223.55 | 219.94 | 216.21 | 212.42 | 208.65 | 204.91 |
| 337.5  | 232.42 | 228.89 | 225.54 | 222.06 | 218.59 | 215.09 | 211.44 | 207.89 | 204.33 |
| 360.0  | 230.78 | 227.44 | 224.00 | 220.49 | 217.04 | 213.51 | 209.92 | 206.39 | 202.98 |
| C/γ(°) | 22.5   | 23.0   | 23.5   | 24.0   | 24.5   | 25.0   | 25.5   | 26.0   | 26.5   |
| 0.0    | 199.48 | 196.09 | 192.66 | 189.21 | 185.85 | 182.47 | 179.00 | 175.47 | 171.90 |
| 22.5   | 200.73 | 197.08 | 193.50 | 189.78 | 186.05 | 182.24 | 178.64 | 175.03 | 171.31 |
| 45.0   | 201.17 | 197.31 | 193.34 | 189.23 | 185.04 | 180.66 | 176.36 | 171.95 | 167.78 |
| 67.5   | 194.18 | 190.22 | 186.27 | 182.34 | 178.43 | 174.55 | 170.75 | 167.03 | 163.17 |
| 90.0   | 191.05 | 187.17 | 183.40 | 179.52 | 175.84 | 172.17 | 168.38 | 164.83 | 161.14 |
| 112.5  | 194.18 | 190.22 | 186.27 | 182.34 | 178.43 | 174.55 | 170.75 | 167.03 | 163.17 |
| 135.0  | 201.17 | 197.31 | 193.34 | 189.23 | 185.04 | 180.66 | 176.36 | 171.95 | 167.78 |
| 157.5  | 200.73 | 197.08 | 193.50 | 189.78 | 186.05 | 182.24 | 178.64 | 175.03 | 171.31 |
| 180.0  | 199.48 | 196.09 | 192.66 | 189.21 | 185.85 | 182.47 | 179.00 | 175.47 | 171.90 |
| 202.5  | 200.73 | 197.08 | 193.50 | 189.78 | 186.05 | 182.24 | 178.64 | 175.03 | 171.31 |
| 225.0  | 201.17 | 197.31 | 193.34 | 189.23 | 185.04 | 180.66 | 176.36 | 171.95 | 167.78 |
| 247.5  | 194.18 | 190.22 | 186.27 | 182.34 | 178.43 | 174.55 | 170.75 | 167.03 | 163.17 |
| 270.0  | 191.05 | 187.17 | 183.40 | 179.52 | 175.84 | 172.17 | 168.38 | 164.83 | 161.14 |
| 292.5  | 194.18 | 190.22 | 186.27 | 182.34 | 178.43 | 174.55 | 170.75 | 167.03 | 163.17 |
| 315.0  | 201.17 | 197.31 | 193.34 | 189.23 | 185.04 | 180.66 | 176.36 | 171.95 | 167.78 |
| 337.5  | 200.73 | 197.08 | 193.50 | 189.78 | 186.05 | 182.24 | 178.64 | 175.03 | 171.31 |
| 360.0  | 199.48 | 196.09 | 192.66 | 189.21 | 185.85 | 182.47 | 179.00 | 175.47 | 171.90 |

Equipment: 0  
Temperature(°C): 0Date:  
Humidity(%): 0%

Operator: 0



## Intensity data(cd)

Appendix Page: 25 Total:36

| C/γ(°) | 27.0   | 27.5   | 28.0   | 28.5   | 29.0   | 29.5   | 30.0   | 30.5   | 31.0   |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 168.45 | 164.82 | 161.36 | 157.94 | 154.41 | 150.89 | 147.23 | 143.60 | 139.97 |
| 22.5   | 167.65 | 164.04 | 160.40 | 156.76 | 153.03 | 149.35 | 145.48 | 141.75 | 137.97 |
| 45.0   | 163.68 | 159.55 | 155.46 | 151.47 | 147.66 | 143.96 | 140.32 | 136.70 | 133.12 |
| 67.5   | 159.41 | 155.58 | 151.84 | 148.24 | 144.50 | 140.82 | 137.17 | 133.64 | 130.05 |
| 90.0   | 157.48 | 153.73 | 149.94 | 146.33 | 142.91 | 139.42 | 135.85 | 132.29 | 128.85 |
| 112.5  | 159.41 | 155.58 | 151.84 | 148.24 | 144.50 | 140.82 | 137.17 | 133.64 | 130.05 |
| 135.0  | 163.68 | 159.55 | 155.46 | 151.47 | 147.66 | 143.96 | 140.32 | 136.70 | 133.12 |
| 157.5  | 167.65 | 164.04 | 160.40 | 156.76 | 153.03 | 149.35 | 145.48 | 141.75 | 137.97 |
| 180.0  | 168.45 | 164.82 | 161.36 | 157.94 | 154.41 | 150.89 | 147.23 | 143.60 | 139.97 |
| 202.5  | 167.65 | 164.04 | 160.40 | 156.76 | 153.03 | 149.35 | 145.48 | 141.75 | 137.97 |
| 225.0  | 163.68 | 159.55 | 155.46 | 151.47 | 147.66 | 143.96 | 140.32 | 136.70 | 133.12 |
| 247.5  | 159.41 | 155.58 | 151.84 | 148.24 | 144.50 | 140.82 | 137.17 | 133.64 | 130.05 |
| 270.0  | 157.48 | 153.73 | 149.94 | 146.33 | 142.91 | 139.42 | 135.85 | 132.29 | 128.85 |
| 292.5  | 159.41 | 155.58 | 151.84 | 148.24 | 144.50 | 140.82 | 137.17 | 133.64 | 130.05 |
| 315.0  | 163.68 | 159.55 | 155.46 | 151.47 | 147.66 | 143.96 | 140.32 | 136.70 | 133.12 |
| 337.5  | 167.65 | 164.04 | 160.40 | 156.76 | 153.03 | 149.35 | 145.48 | 141.75 | 137.97 |
| 360.0  | 168.45 | 164.82 | 161.36 | 157.94 | 154.41 | 150.89 | 147.23 | 143.60 | 139.97 |

| C/γ(°) | 31.5   | 32.0   | 32.5   | 33.0   | 33.5   | 34.0   | 34.5   | 35.0   | 35.5   |
|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0.0    | 136.41 | 132.80 | 129.32 | 125.97 | 122.60 | 119.03 | 115.45 | 111.89 | 108.31 |
| 22.5   | 134.21 | 130.39 | 126.71 | 123.04 | 119.41 | 115.77 | 112.17 | 108.57 | 105.06 |
| 45.0   | 129.70 | 126.27 | 122.83 | 119.50 | 116.15 | 112.90 | 109.55 | 106.32 | 103.12 |
| 67.5   | 126.56 | 123.06 | 119.58 | 116.18 | 112.81 | 109.50 | 106.20 | 102.88 | 99.63  |
| 90.0   | 125.37 | 121.93 | 118.51 | 115.22 | 111.82 | 108.62 | 105.26 | 101.89 | 98.69  |
| 112.5  | 126.56 | 123.06 | 119.58 | 116.18 | 112.81 | 109.50 | 106.20 | 102.88 | 99.63  |
| 135.0  | 129.70 | 126.27 | 122.83 | 119.50 | 116.15 | 112.90 | 109.55 | 106.32 | 103.12 |
| 157.5  | 134.21 | 130.39 | 126.71 | 123.04 | 119.41 | 115.77 | 112.17 | 108.57 | 105.06 |
| 180.0  | 136.41 | 132.80 | 129.32 | 125.97 | 122.60 | 119.03 | 115.45 | 111.89 | 108.31 |
| 202.5  | 134.21 | 130.39 | 126.71 | 123.04 | 119.41 | 115.77 | 112.17 | 108.57 | 105.06 |
| 225.0  | 129.70 | 126.27 | 122.83 | 119.50 | 116.15 | 112.90 | 109.55 | 106.32 | 103.12 |
| 247.5  | 126.56 | 123.06 | 119.58 | 116.18 | 112.81 | 109.50 | 106.20 | 102.88 | 99.63  |
| 270.0  | 125.37 | 121.93 | 118.51 | 115.22 | 111.82 | 108.62 | 105.26 | 101.89 | 98.69  |
| 292.5  | 126.56 | 123.06 | 119.58 | 116.18 | 112.81 | 109.50 | 106.20 | 102.88 | 99.63  |
| 315.0  | 129.70 | 126.27 | 122.83 | 119.50 | 116.15 | 112.90 | 109.55 | 106.32 | 103.12 |
| 337.5  | 134.21 | 130.39 | 126.71 | 123.04 | 119.41 | 115.77 | 112.17 | 108.57 | 105.06 |
| 360.0  | 136.41 | 132.80 | 129.32 | 125.97 | 122.60 | 119.03 | 115.45 | 111.89 | 108.31 |

| C/γ(°) | 36.0   | 36.5   | 37.0  | 37.5  | 38.0  | 38.5  | 39.0  | 39.5  | 40.0  |
|--------|--------|--------|-------|-------|-------|-------|-------|-------|-------|
| 0.0    | 104.63 | 101.03 | 97.50 | 93.79 | 90.33 | 86.99 | 83.72 | 80.56 | 77.49 |
| 22.5   | 101.55 | 98.13  | 94.70 | 91.40 | 88.19 | 84.98 | 81.74 | 78.57 | 75.53 |
| 45.0   | 99.86  | 96.67  | 93.44 | 90.29 | 87.18 | 84.11 | 81.07 | 78.04 | 75.06 |
| 67.5   | 96.40  | 93.12  | 89.84 | 86.63 | 83.50 | 80.46 | 77.58 | 74.67 | 71.85 |
| 90.0   | 95.62  | 92.39  | 89.22 | 86.06 | 82.95 | 80.04 | 77.28 | 74.43 | 71.58 |
| 112.5  | 96.40  | 93.12  | 89.84 | 86.63 | 83.50 | 80.46 | 77.58 | 74.67 | 71.85 |
| 135.0  | 99.86  | 96.67  | 93.44 | 90.29 | 87.18 | 84.11 | 81.07 | 78.04 | 75.06 |
| 157.5  | 101.55 | 98.13  | 94.70 | 91.40 | 88.19 | 84.98 | 81.74 | 78.57 | 75.53 |
| 180.0  | 104.63 | 101.03 | 97.50 | 93.79 | 90.33 | 86.99 | 83.72 | 80.56 | 77.49 |
| 202.5  | 101.55 | 98.13  | 94.70 | 91.40 | 88.19 | 84.98 | 81.74 | 78.57 | 75.53 |
| 225.0  | 99.86  | 96.67  | 93.44 | 90.29 | 87.18 | 84.11 | 81.07 | 78.04 | 75.06 |
| 247.5  | 96.40  | 93.12  | 89.84 | 86.63 | 83.50 | 80.46 | 77.58 | 74.67 | 71.85 |
| 270.0  | 95.62  | 92.39  | 89.22 | 86.06 | 82.95 | 80.04 | 77.28 | 74.43 | 71.58 |
| 292.5  | 96.40  | 93.12  | 89.84 | 86.63 | 83.50 | 80.46 | 77.58 | 74.67 | 71.85 |
| 315.0  | 99.86  | 96.67  | 93.44 | 90.29 | 87.18 | 84.11 | 81.07 | 78.04 | 75.06 |
| 337.5  | 101.55 | 98.13  | 94.70 | 91.40 | 88.19 | 84.98 | 81.74 | 78.57 | 75.53 |
| 360.0  | 104.63 | 101.03 | 97.50 | 93.79 | 90.33 | 86.99 | 83.72 | 80.56 | 77.49 |

Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

## Intensity data(cd)

Appendix Page: 26 Total:36

| C/ $\gamma$ (°) | 40.5  | 41.0  | 41.5  | 42.0  | 42.5  | 43.0  | 43.5  | 44.0  | 44.5  |
|-----------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0             | 74.55 | 71.82 | 69.13 | 66.48 | 63.87 | 61.46 | 59.18 | 56.79 | 54.31 |
| 22.5            | 72.67 | 69.86 | 67.18 | 64.60 | 62.04 | 59.66 | 57.40 | 55.18 | 52.96 |
| 45.0            | 72.17 | 69.35 | 66.62 | 64.02 | 61.45 | 58.98 | 56.55 | 54.21 | 51.97 |
| 67.5            | 69.18 | 66.57 | 63.95 | 61.35 | 58.85 | 56.43 | 54.05 | 51.78 | 49.61 |
| 90.0            | 68.86 | 66.22 | 63.70 | 61.23 | 58.72 | 56.33 | 54.03 | 51.82 | 49.60 |
| 112.5           | 69.18 | 66.57 | 63.95 | 61.35 | 58.85 | 56.43 | 54.05 | 51.78 | 49.61 |
| 135.0           | 72.17 | 69.35 | 66.62 | 64.02 | 61.45 | 58.98 | 56.55 | 54.21 | 51.97 |
| 157.5           | 72.67 | 69.86 | 67.18 | 64.60 | 62.04 | 59.66 | 57.40 | 55.18 | 52.96 |
| 180.0           | 74.55 | 71.82 | 69.13 | 66.48 | 63.87 | 61.46 | 59.18 | 56.79 | 54.31 |
| 202.5           | 72.67 | 69.86 | 67.18 | 64.60 | 62.04 | 59.66 | 57.40 | 55.18 | 52.96 |
| 225.0           | 72.17 | 69.35 | 66.62 | 64.02 | 61.45 | 58.98 | 56.55 | 54.21 | 51.97 |
| 247.5           | 69.18 | 66.57 | 63.95 | 61.35 | 58.85 | 56.43 | 54.05 | 51.78 | 49.61 |
| 270.0           | 68.86 | 66.22 | 63.70 | 61.23 | 58.72 | 56.33 | 54.03 | 51.82 | 49.60 |
| 292.5           | 69.18 | 66.57 | 63.95 | 61.35 | 58.85 | 56.43 | 54.05 | 51.78 | 49.61 |
| 315.0           | 72.17 | 69.35 | 66.62 | 64.02 | 61.45 | 58.98 | 56.55 | 54.21 | 51.97 |
| 337.5           | 72.67 | 69.86 | 67.18 | 64.60 | 62.04 | 59.66 | 57.40 | 55.18 | 52.96 |
| 360.0           | 74.55 | 71.82 | 69.13 | 66.48 | 63.87 | 61.46 | 59.18 | 56.79 | 54.31 |
| C/ $\gamma$ (°) | 45.0  | 45.5  | 46.0  | 46.5  | 47.0  | 47.5  | 48.0  | 48.5  | 49.0  |
| 0.0             | 51.92 | 49.68 | 47.51 | 45.49 | 43.52 | 41.67 | 39.99 | 38.40 | 36.83 |
| 22.5            | 50.73 | 48.55 | 46.50 | 44.57 | 42.80 | 41.12 | 39.51 | 37.96 | 36.38 |
| 45.0            | 49.74 | 47.52 | 45.45 | 43.48 | 41.56 | 39.70 | 37.95 | 36.36 | 34.87 |
| 67.5            | 47.50 | 45.45 | 43.52 | 41.64 | 39.85 | 38.11 | 36.44 | 34.79 | 33.19 |
| 90.0            | 47.43 | 45.27 | 43.23 | 41.27 | 39.43 | 37.69 | 36.03 | 34.42 | 32.89 |
| 112.5           | 47.50 | 45.45 | 43.52 | 41.64 | 39.85 | 38.11 | 36.44 | 34.79 | 33.19 |
| 135.0           | 49.74 | 47.52 | 45.45 | 43.48 | 41.56 | 39.70 | 37.95 | 36.36 | 34.87 |
| 157.5           | 50.73 | 48.55 | 46.50 | 44.57 | 42.80 | 41.12 | 39.51 | 37.96 | 36.38 |
| 180.0           | 51.92 | 49.68 | 47.51 | 45.49 | 43.52 | 41.67 | 39.99 | 38.40 | 36.83 |
| 202.5           | 50.73 | 48.55 | 46.50 | 44.57 | 42.80 | 41.12 | 39.51 | 37.96 | 36.38 |
| 225.0           | 49.74 | 47.52 | 45.45 | 43.48 | 41.56 | 39.70 | 37.95 | 36.36 | 34.87 |
| 247.5           | 47.50 | 45.45 | 43.52 | 41.64 | 39.85 | 38.11 | 36.44 | 34.79 | 33.19 |
| 270.0           | 47.43 | 45.27 | 43.23 | 41.27 | 39.43 | 37.69 | 36.03 | 34.42 | 32.89 |
| 292.5           | 47.50 | 45.45 | 43.52 | 41.64 | 39.85 | 38.11 | 36.44 | 34.79 | 33.19 |
| 315.0           | 49.74 | 47.52 | 45.45 | 43.48 | 41.56 | 39.70 | 37.95 | 36.36 | 34.87 |
| 337.5           | 50.73 | 48.55 | 46.50 | 44.57 | 42.80 | 41.12 | 39.51 | 37.96 | 36.38 |
| 360.0           | 51.92 | 49.68 | 47.51 | 45.49 | 43.52 | 41.67 | 39.99 | 38.40 | 36.83 |
| C/ $\gamma$ (°) | 49.5  | 50.0  | 50.5  | 51.0  | 51.5  | 52.0  | 52.5  | 53.0  | 53.5  |
| 0.0             | 35.31 | 33.77 | 32.35 | 31.01 | 29.68 | 28.39 | 27.14 | 26.02 | 24.92 |
| 22.5            | 34.88 | 33.41 | 31.94 | 30.48 | 29.16 | 27.99 | 26.88 | 25.83 | 24.83 |
| 45.0            | 33.44 | 32.03 | 30.68 | 29.38 | 28.10 | 26.87 | 25.70 | 24.58 | 23.52 |
| 67.5            | 31.72 | 30.31 | 29.03 | 27.80 | 26.65 | 25.60 | 24.59 | 23.61 | 22.66 |
| 90.0            | 31.44 | 30.07 | 28.79 | 27.62 | 26.49 | 25.35 | 24.33 | 23.35 | 22.38 |
| 112.5           | 31.72 | 30.31 | 29.03 | 27.80 | 26.65 | 25.60 | 24.59 | 23.61 | 22.66 |
| 135.0           | 33.44 | 32.03 | 30.68 | 29.38 | 28.10 | 26.87 | 25.70 | 24.58 | 23.52 |
| 157.5           | 34.88 | 33.41 | 31.94 | 30.48 | 29.16 | 27.99 | 26.88 | 25.83 | 24.83 |
| 180.0           | 35.31 | 33.77 | 32.35 | 31.01 | 29.68 | 28.39 | 27.14 | 26.02 | 24.92 |
| 202.5           | 34.88 | 33.41 | 31.94 | 30.48 | 29.16 | 27.99 | 26.88 | 25.83 | 24.83 |
| 225.0           | 33.44 | 32.03 | 30.68 | 29.38 | 28.10 | 26.87 | 25.70 | 24.58 | 23.52 |
| 247.5           | 31.72 | 30.31 | 29.03 | 27.80 | 26.65 | 25.60 | 24.59 | 23.61 | 22.66 |
| 270.0           | 31.44 | 30.07 | 28.79 | 27.62 | 26.49 | 25.35 | 24.33 | 23.35 | 22.38 |
| 292.5           | 31.72 | 30.31 | 29.03 | 27.80 | 26.65 | 25.60 | 24.59 | 23.61 | 22.66 |
| 315.0           | 33.44 | 32.03 | 30.68 | 29.38 | 28.10 | 26.87 | 25.70 | 24.58 | 23.52 |
| 337.5           | 34.88 | 33.41 | 31.94 | 30.48 | 29.16 | 27.99 | 26.88 | 25.83 | 24.83 |
| 360.0           | 35.31 | 33.77 | 32.35 | 31.01 | 29.68 | 28.39 | 27.14 | 26.02 | 24.92 |

Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

## Intensity data(cd)

Appendix Page: 27 Total:36

| C/ $\gamma$ (°) | 54.0  | 54.5  | 55.0  | 55.5  | 56.0  | 56.5  | 57.0  | 57.5  | 58.0  |
|-----------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0             | 23.90 | 22.95 | 22.04 | 21.15 | 20.28 | 19.42 | 18.62 | 17.84 | 17.11 |
| 22.5            | 23.83 | 22.87 | 21.98 | 21.11 | 20.25 | 19.42 | 18.63 | 17.86 | 17.13 |
| 45.0            | 22.57 | 21.57 | 20.60 | 19.64 | 18.71 | 17.82 | 16.98 | 16.21 | 15.49 |
| 67.5            | 21.74 | 20.84 | 20.00 | 19.20 | 18.42 | 17.69 | 16.96 | 16.25 | 15.57 |
| 90.0            | 21.42 | 20.56 | 19.77 | 19.00 | 18.22 | 17.45 | 16.70 | 15.99 | 15.33 |
| 112.5           | 21.74 | 20.84 | 20.00 | 19.20 | 18.42 | 17.69 | 16.96 | 16.25 | 15.57 |
| 135.0           | 22.57 | 21.57 | 20.60 | 19.64 | 18.71 | 17.82 | 16.98 | 16.21 | 15.49 |
| 157.5           | 23.83 | 22.87 | 21.98 | 21.11 | 20.25 | 19.42 | 18.63 | 17.86 | 17.13 |
| 180.0           | 23.90 | 22.95 | 22.04 | 21.15 | 20.28 | 19.42 | 18.62 | 17.84 | 17.11 |
| 202.5           | 23.83 | 22.87 | 21.98 | 21.11 | 20.25 | 19.42 | 18.63 | 17.86 | 17.13 |
| 225.0           | 22.57 | 21.57 | 20.60 | 19.64 | 18.71 | 17.82 | 16.98 | 16.21 | 15.49 |
| 247.5           | 21.74 | 20.84 | 20.00 | 19.20 | 18.42 | 17.69 | 16.96 | 16.25 | 15.57 |
| 270.0           | 21.42 | 20.56 | 19.77 | 19.00 | 18.22 | 17.45 | 16.70 | 15.99 | 15.33 |
| 292.5           | 21.74 | 20.84 | 20.00 | 19.20 | 18.42 | 17.69 | 16.96 | 16.25 | 15.57 |
| 315.0           | 22.57 | 21.57 | 20.60 | 19.64 | 18.71 | 17.82 | 16.98 | 16.21 | 15.49 |
| 337.5           | 23.83 | 22.87 | 21.98 | 21.11 | 20.25 | 19.42 | 18.63 | 17.86 | 17.13 |
| 360.0           | 23.90 | 22.95 | 22.04 | 21.15 | 20.28 | 19.42 | 18.62 | 17.84 | 17.11 |
| C/ $\gamma$ (°) | 58.5  | 59.0  | 59.5  | 60.0  | 60.5  | 61.0  | 61.5  | 62.0  | 62.5  |
| 0.0             | 16.42 | 15.76 | 15.11 | 14.49 | 13.87 | 13.30 | 12.73 | 12.17 | 11.64 |
| 22.5            | 16.42 | 15.76 | 15.10 | 14.46 | 13.85 | 13.28 | 12.73 | 12.20 | 11.67 |
| 45.0            | 14.81 | 14.16 | 13.55 | 12.95 | 12.38 | 11.85 | 11.31 | 10.81 | 10.31 |
| 67.5            | 14.92 | 14.30 | 13.74 | 13.18 | 12.62 | 12.05 | 11.50 | 10.97 | 10.45 |
| 90.0            | 14.72 | 14.14 | 13.57 | 13.00 | 12.42 | 11.83 | 11.27 | 10.73 | 10.22 |
| 112.5           | 14.92 | 14.30 | 13.74 | 13.18 | 12.62 | 12.05 | 11.50 | 10.97 | 10.45 |
| 135.0           | 14.81 | 14.16 | 13.55 | 12.95 | 12.38 | 11.85 | 11.31 | 10.81 | 10.31 |
| 157.5           | 16.42 | 15.76 | 15.10 | 14.46 | 13.85 | 13.28 | 12.73 | 12.20 | 11.67 |
| 180.0           | 16.42 | 15.76 | 15.11 | 14.49 | 13.87 | 13.30 | 12.73 | 12.17 | 11.64 |
| 202.5           | 16.42 | 15.76 | 15.10 | 14.46 | 13.85 | 13.28 | 12.73 | 12.20 | 11.67 |
| 225.0           | 14.81 | 14.16 | 13.55 | 12.95 | 12.38 | 11.85 | 11.31 | 10.81 | 10.31 |
| 247.5           | 14.92 | 14.30 | 13.74 | 13.18 | 12.62 | 12.05 | 11.50 | 10.97 | 10.45 |
| 270.0           | 14.72 | 14.14 | 13.57 | 13.00 | 12.42 | 11.83 | 11.27 | 10.73 | 10.22 |
| 292.5           | 14.92 | 14.30 | 13.74 | 13.18 | 12.62 | 12.05 | 11.50 | 10.97 | 10.45 |
| 315.0           | 14.81 | 14.16 | 13.55 | 12.95 | 12.38 | 11.85 | 11.31 | 10.81 | 10.31 |
| 337.5           | 16.42 | 15.76 | 15.10 | 14.46 | 13.85 | 13.28 | 12.73 | 12.20 | 11.67 |
| 360.0           | 16.42 | 15.76 | 15.11 | 14.49 | 13.87 | 13.30 | 12.73 | 12.17 | 11.64 |
| C/ $\gamma$ (°) | 63.0  | 63.5  | 64.0  | 64.5  | 65.0  | 65.5  | 66.0  | 66.5  | 67.0  |
| 0.0             | 11.15 | 10.67 | 10.19 | 9.71  | 9.27  | 8.82  | 8.41  | 8.01  | 7.64  |
| 22.5            | 11.16 | 10.66 | 10.16 | 9.66  | 9.19  | 8.74  | 8.30  | 7.89  | 7.49  |
| 45.0            | 9.84  | 9.37  | 8.93  | 8.50  | 8.08  | 7.68  | 7.30  | 6.95  | 6.58  |
| 67.5            | 9.94  | 9.47  | 9.03  | 8.60  | 8.19  | 7.78  | 7.40  | 7.04  | 6.67  |
| 90.0            | 9.73  | 9.27  | 8.86  | 8.45  | 8.05  | 7.64  | 7.28  | 6.87  | 6.44  |
| 112.5           | 9.94  | 9.47  | 9.03  | 8.60  | 8.19  | 7.78  | 7.40  | 7.04  | 6.67  |
| 135.0           | 9.84  | 9.37  | 8.93  | 8.50  | 8.08  | 7.68  | 7.30  | 6.95  | 6.58  |
| 157.5           | 11.16 | 10.66 | 10.16 | 9.66  | 9.19  | 8.74  | 8.30  | 7.89  | 7.49  |
| 180.0           | 11.15 | 10.67 | 10.19 | 9.71  | 9.27  | 8.82  | 8.41  | 8.01  | 7.64  |
| 202.5           | 11.16 | 10.66 | 10.16 | 9.66  | 9.19  | 8.74  | 8.30  | 7.89  | 7.49  |
| 225.0           | 9.84  | 9.37  | 8.93  | 8.50  | 8.08  | 7.68  | 7.30  | 6.95  | 6.58  |
| 247.5           | 9.94  | 9.47  | 9.03  | 8.60  | 8.19  | 7.78  | 7.40  | 7.04  | 6.67  |
| 270.0           | 9.73  | 9.27  | 8.86  | 8.45  | 8.05  | 7.64  | 7.28  | 6.87  | 6.44  |
| 292.5           | 9.94  | 9.47  | 9.03  | 8.60  | 8.19  | 7.78  | 7.40  | 7.04  | 6.67  |
| 315.0           | 9.84  | 9.37  | 8.93  | 8.50  | 8.08  | 7.68  | 7.30  | 6.95  | 6.58  |
| 337.5           | 11.16 | 10.66 | 10.16 | 9.66  | 9.19  | 8.74  | 8.30  | 7.89  | 7.49  |
| 360.0           | 11.15 | 10.67 | 10.19 | 9.71  | 9.27  | 8.82  | 8.41  | 8.01  | 7.64  |

Equipment: 0  
Temperature(°C): 0

Date:  
Humidity(%): 0%

Operator: 0

| C/γ(°) | 67.5 | 68.0 | 68.5 | 69.0 | 69.5 | 70.0 | 70.5 | 71.0 | 71.5 |
|--------|------|------|------|------|------|------|------|------|------|
| 0.0    | 7.19 | 6.78 | 6.40 | 6.04 | 5.69 | 5.36 | 5.04 | 4.73 | 4.42 |
| 22.5   | 7.07 | 6.67 | 6.28 | 5.92 | 5.58 | 5.26 | 4.95 | 4.65 | 4.35 |
| 45.0   | 6.23 | 5.85 | 5.50 | 5.16 | 4.85 | 4.58 | 4.30 | 4.04 | 3.77 |
| 67.5   | 6.31 | 5.91 | 5.55 | 5.21 | 4.91 | 4.63 | 4.36 | 4.09 | 3.83 |
| 90.0   | 6.03 | 5.66 | 5.33 | 5.02 | 4.72 | 4.44 | 4.15 | 3.87 | 3.62 |
| 112.5  | 6.31 | 5.91 | 5.55 | 5.21 | 4.91 | 4.63 | 4.36 | 4.09 | 3.83 |
| 135.0  | 6.23 | 5.85 | 5.50 | 5.16 | 4.85 | 4.58 | 4.30 | 4.04 | 3.77 |
| 157.5  | 7.07 | 6.67 | 6.28 | 5.92 | 5.58 | 5.26 | 4.95 | 4.65 | 4.35 |
| 180.0  | 7.19 | 6.78 | 6.40 | 6.04 | 5.69 | 5.36 | 5.04 | 4.73 | 4.42 |
| 202.5  | 7.07 | 6.67 | 6.28 | 5.92 | 5.58 | 5.26 | 4.95 | 4.65 | 4.35 |
| 225.0  | 6.23 | 5.85 | 5.50 | 5.16 | 4.85 | 4.58 | 4.30 | 4.04 | 3.77 |
| 247.5  | 6.31 | 5.91 | 5.55 | 5.21 | 4.91 | 4.63 | 4.36 | 4.09 | 3.83 |
| 270.0  | 6.03 | 5.66 | 5.33 | 5.02 | 4.72 | 4.44 | 4.15 | 3.87 | 3.62 |
| 292.5  | 6.31 | 5.91 | 5.55 | 5.21 | 4.91 | 4.63 | 4.36 | 4.09 | 3.83 |
| 315.0  | 6.23 | 5.85 | 5.50 | 5.16 | 4.85 | 4.58 | 4.30 | 4.04 | 3.77 |
| 337.5  | 7.07 | 6.67 | 6.28 | 5.92 | 5.58 | 5.26 | 4.95 | 4.65 | 4.35 |
| 360.0  | 7.19 | 6.78 | 6.40 | 6.04 | 5.69 | 5.36 | 5.04 | 4.73 | 4.42 |

| C/γ(°) | 72.0 | 72.5 | 73.0 | 73.5 | 74.0 | 74.5 | 75.0 | 75.5 | 76.0 |
|--------|------|------|------|------|------|------|------|------|------|
| 0.0    | 4.11 | 3.81 | 3.51 | 3.22 | 2.93 | 2.65 | 2.39 | 2.14 | 1.89 |
| 22.5   | 4.06 | 3.76 | 3.46 | 3.17 | 2.88 | 2.60 | 2.33 | 2.08 | 1.84 |
| 45.0   | 3.52 | 3.26 | 3.01 | 2.76 | 2.52 | 2.29 | 2.06 | 1.83 | 1.62 |
| 67.5   | 3.56 | 3.31 | 3.05 | 2.79 | 2.54 | 2.30 | 2.06 | 1.83 | 1.62 |
| 90.0   | 3.38 | 3.13 | 2.88 | 2.64 | 2.42 | 2.18 | 1.95 | 1.74 | 1.55 |
| 112.5  | 3.56 | 3.31 | 3.05 | 2.79 | 2.54 | 2.30 | 2.06 | 1.83 | 1.62 |
| 135.0  | 3.52 | 3.26 | 3.01 | 2.76 | 2.52 | 2.29 | 2.06 | 1.83 | 1.62 |
| 157.5  | 4.06 | 3.76 | 3.46 | 3.17 | 2.88 | 2.60 | 2.33 | 2.08 | 1.84 |
| 180.0  | 4.11 | 3.81 | 3.51 | 3.22 | 2.93 | 2.65 | 2.39 | 2.14 | 1.89 |
| 202.5  | 4.06 | 3.76 | 3.46 | 3.17 | 2.88 | 2.60 | 2.33 | 2.08 | 1.84 |
| 225.0  | 3.52 | 3.26 | 3.01 | 2.76 | 2.52 | 2.29 | 2.06 | 1.83 | 1.62 |
| 247.5  | 3.56 | 3.31 | 3.05 | 2.79 | 2.54 | 2.30 | 2.06 | 1.83 | 1.62 |
| 270.0  | 3.38 | 3.13 | 2.88 | 2.64 | 2.42 | 2.18 | 1.95 | 1.74 | 1.55 |
| 292.5  | 3.56 | 3.31 | 3.05 | 2.79 | 2.54 | 2.30 | 2.06 | 1.83 | 1.62 |
| 315.0  | 3.52 | 3.26 | 3.01 | 2.76 | 2.52 | 2.29 | 2.06 | 1.83 | 1.62 |
| 337.5  | 4.06 | 3.76 | 3.46 | 3.17 | 2.88 | 2.60 | 2.33 | 2.08 | 1.84 |
| 360.0  | 4.11 | 3.81 | 3.51 | 3.22 | 2.93 | 2.65 | 2.39 | 2.14 | 1.89 |

| C/γ(°) | 76.5 | 77.0 | 77.5 | 78.0 | 78.5 | 79.0 | 79.5 | 80.0 | 80.5 |
|--------|------|------|------|------|------|------|------|------|------|
| 0.0    | 1.66 | 1.47 | 1.32 | 1.20 | 1.08 | 0.98 | 0.88 | 0.77 | 0.67 |
| 22.5   | 1.62 | 1.42 | 1.27 | 1.15 | 1.04 | 0.94 | 0.84 | 0.73 | 0.64 |
| 45.0   | 1.45 | 1.29 | 1.16 | 1.04 | 0.95 | 0.86 | 0.76 | 0.67 | 0.59 |
| 67.5   | 1.42 | 1.26 | 1.13 | 1.02 | 0.93 | 0.84 | 0.76 | 0.67 | 0.59 |
| 90.0   | 1.38 | 1.23 | 1.10 | 1.00 | 0.91 | 0.84 | 0.76 | 0.68 | 0.60 |
| 112.5  | 1.42 | 1.26 | 1.13 | 1.02 | 0.93 | 0.84 | 0.76 | 0.67 | 0.59 |
| 135.0  | 1.45 | 1.29 | 1.16 | 1.04 | 0.95 | 0.86 | 0.76 | 0.67 | 0.59 |
| 157.5  | 1.62 | 1.42 | 1.27 | 1.15 | 1.04 | 0.94 | 0.84 | 0.73 | 0.64 |
| 180.0  | 1.66 | 1.47 | 1.32 | 1.20 | 1.08 | 0.98 | 0.88 | 0.77 | 0.67 |
| 202.5  | 1.62 | 1.42 | 1.27 | 1.15 | 1.04 | 0.94 | 0.84 | 0.73 | 0.64 |
| 225.0  | 1.45 | 1.29 | 1.16 | 1.04 | 0.95 | 0.86 | 0.76 | 0.67 | 0.59 |
| 247.5  | 1.42 | 1.26 | 1.13 | 1.02 | 0.93 | 0.84 | 0.76 | 0.67 | 0.59 |
| 270.0  | 1.38 | 1.23 | 1.10 | 1.00 | 0.91 | 0.84 | 0.76 | 0.68 | 0.60 |
| 292.5  | 1.42 | 1.26 | 1.13 | 1.02 | 0.93 | 0.84 | 0.76 | 0.67 | 0.59 |
| 315.0  | 1.45 | 1.29 | 1.16 | 1.04 | 0.95 | 0.86 | 0.76 | 0.67 | 0.59 |
| 337.5  | 1.62 | 1.42 | 1.27 | 1.15 | 1.04 | 0.94 | 0.84 | 0.73 | 0.64 |
| 360.0  | 1.66 | 1.47 | 1.32 | 1.20 | 1.08 | 0.98 | 0.88 | 0.77 | 0.67 |

| C/ $\gamma(^{\circ})$ | 81.0 | 81.5 | 82.0 | 82.5 | 83.0 | 83.5 | 84.0 | 84.5 | 85.0 |
|-----------------------|------|------|------|------|------|------|------|------|------|
| 0.0                   | 0.56 | 0.46 | 0.35 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 22.5                  | 0.54 | 0.45 | 0.34 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 45.0                  | 0.50 | 0.41 | 0.32 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 67.5                  | 0.51 | 0.41 | 0.32 | 0.24 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 90.0                  | 0.52 | 0.42 | 0.33 | 0.25 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 112.5                 | 0.51 | 0.41 | 0.32 | 0.24 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 135.0                 | 0.50 | 0.41 | 0.32 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 157.5                 | 0.54 | 0.45 | 0.34 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 180.0                 | 0.56 | 0.46 | 0.35 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 202.5                 | 0.54 | 0.45 | 0.34 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 225.0                 | 0.50 | 0.41 | 0.32 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 247.5                 | 0.51 | 0.41 | 0.32 | 0.24 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 270.0                 | 0.52 | 0.42 | 0.33 | 0.25 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 292.5                 | 0.51 | 0.41 | 0.32 | 0.24 | 0.16 | 0.11 | 0.07 | 0.05 | 0.04 |
| 315.0                 | 0.50 | 0.41 | 0.32 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 337.5                 | 0.54 | 0.45 | 0.34 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
| 360.0                 | 0.56 | 0.46 | 0.35 | 0.23 | 0.16 | 0.10 | 0.07 | 0.05 | 0.04 |
|                       |      |      |      |      |      |      |      |      |      |
| C/ $\gamma(^{\circ})$ | 85.5 | 86.0 | 86.5 | 87.0 | 87.5 | 88.0 | 88.5 | 89.0 | 89.5 |
| 0.0                   | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 22.5                  | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 45.0                  | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 67.5                  | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 90.0                  | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 112.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 135.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 157.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 180.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 202.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 225.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 247.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 270.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 292.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 315.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 337.5                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
| 360.0                 | 0.03 | 0.03 | 0.03 | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.01 |
|                       |      |      |      |      |      |      |      |      |      |
| C/ $\gamma(^{\circ})$ | 90.0 | 90.5 | 91.0 | 91.5 | 92.0 | 92.5 | 93.0 | 93.5 | 94.0 |
| 0.0                   | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 22.5                  | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 45.0                  | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 67.5                  | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 90.0                  | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 112.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 135.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 157.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 180.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 202.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 225.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 247.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 270.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 292.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 315.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 337.5                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |
| 360.0                 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 | 0.01 |

| C/ $\gamma(^{\circ})$ | 94.5  | 95.0  | 95.5  | 96.0  | 96.5  | 97.0  | 97.5  | 98.0  | 98.5  |
|-----------------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0                   | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 22.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 45.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 67.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 90.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 112.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 135.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 157.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 180.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 202.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 225.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 247.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 270.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 292.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 315.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 337.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 360.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| C/ $\gamma(^{\circ})$ | 99.0  | 99.5  | 100.0 | 100.5 | 101.0 | 101.5 | 102.0 | 102.5 | 103.0 |
| 0.0                   | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 22.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 45.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 67.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 90.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 112.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 135.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 157.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 180.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 202.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 225.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 247.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 270.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 292.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 315.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 337.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 360.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| C/ $\gamma(^{\circ})$ | 103.5 | 104.0 | 104.5 | 105.0 | 105.5 | 106.0 | 106.5 | 107.0 | 107.5 |
| 0.0                   | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 22.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 45.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 67.5                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 90.0                  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 112.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 135.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 157.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 180.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 202.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 225.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 247.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 270.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 292.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 315.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 337.5                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |
| 360.0                 | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  |

| C/ $\gamma$ (°) | 108.0 | 108.5 | 109.0 | 109.5 | 110.0 | 110.5 | 111.0 | 111.5 | 112.0 |
|-----------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0             | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 22.5            | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 45.0            | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 67.5            | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  |
| 90.0            | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 112.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  |
| 135.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 157.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 180.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 202.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 225.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 247.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  |
| 270.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 292.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  |
| 315.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 337.5           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| 360.0           | 0.01  | 0.01  | 0.01  | 0.01  | 0.01  | 0.02  | 0.02  | 0.02  | 0.02  |
| C/ $\gamma$ (°) | 112.5 | 113.0 | 113.5 | 114.0 | 114.5 | 115.0 | 115.5 | 116.0 | 116.5 |
| 0.0             | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 22.5            | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 45.0            | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 67.5            | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 90.0            | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 112.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 135.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 157.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 180.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 202.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 225.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 247.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 270.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 292.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 315.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 337.5           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| 360.0           | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  | 0.02  |
| C/ $\gamma$ (°) | 117.0 | 117.5 | 118.0 | 118.5 | 119.0 | 119.5 | 120.0 | 120.5 | 121.0 |
| 0.0             | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 22.5            | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 45.0            | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 67.5            | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 90.0            | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 112.5           | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 135.0           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 157.5           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 180.0           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 202.5           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 225.0           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 247.5           | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 270.0           | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 292.5           | 0.02  | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 315.0           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 337.5           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |
| 360.0           | 0.02  | 0.02  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  |

| C/ $\gamma(^{\circ})$ | 121.5 | 122.0 | 122.5 | 123.0 | 123.5 | 124.0 | 124.5 | 125.0 | 125.5 |
|-----------------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0                   | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 22.5                  | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 45.0                  | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 67.5                  | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 90.0                  | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  |
| 112.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 135.0                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 157.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 180.0                 | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 202.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 225.0                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 247.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 270.0                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  |
| 292.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 315.0                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 337.5                 | 0.03  | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| 360.0                 | 0.03  | 0.03  | 0.03  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  | 0.04  |
| C/ $\gamma(^{\circ})$ | 126.0 | 126.5 | 127.0 | 127.5 | 128.0 | 128.5 | 129.0 | 129.5 | 130.0 |
| 0.0                   | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 22.5                  | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 45.0                  | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 67.5                  | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 90.0                  | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 112.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 135.0                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 157.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 180.0                 | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 202.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 225.0                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 247.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 270.0                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 292.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 315.0                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 337.5                 | 0.04  | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| 360.0                 | 0.04  | 0.04  | 0.04  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  | 0.05  |
| C/ $\gamma(^{\circ})$ | 130.5 | 131.0 | 131.5 | 132.0 | 132.5 | 133.0 | 133.5 | 134.0 | 134.5 |
| 0.0                   | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 22.5                  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 45.0                  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 67.5                  | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 90.0                  | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 112.5                 | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 135.0                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 157.5                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 180.0                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 202.5                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 225.0                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 247.5                 | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 270.0                 | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 292.5                 | 0.05  | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 315.0                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 337.5                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |
| 360.0                 | 0.05  | 0.05  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  | 0.06  |



| C/ $\gamma$ (°) | 135.0 | 135.5 | 136.0 | 136.5 | 137.0 | 137.5 | 138.0 | 138.5 | 139.0 |
|-----------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0             | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 22.5            | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 45.0            | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 67.5            | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 90.0            | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 112.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 135.0           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 157.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 180.0           | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 202.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 225.0           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 247.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 270.0           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 292.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  |
| 315.0           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 337.5           | 0.06  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| 360.0           | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.07  | 0.08  | 0.08  |
| C/ $\gamma$ (°) | 139.5 | 140.0 | 140.5 | 141.0 | 141.5 | 142.0 | 142.5 | 143.0 | 143.5 |
| 0.0             | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 22.5            | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 45.0            | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 67.5            | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 90.0            | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 112.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 135.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 157.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 180.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 202.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 225.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 247.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 270.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 292.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 315.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| 337.5           | 0.08  | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  |
| 360.0           | 0.08  | 0.08  | 0.08  | 0.08  | 0.09  | 0.09  | 0.09  | 0.09  | 0.09  |
| C/ $\gamma$ (°) | 144.0 | 144.5 | 145.0 | 145.5 | 146.0 | 146.5 | 147.0 | 147.5 | 148.0 |
| 0.0             | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 22.5            | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 45.0            | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 67.5            | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 90.0            | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 112.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 135.0           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 157.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 180.0           | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 202.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 225.0           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 247.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 270.0           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 292.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 315.0           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |
| 337.5           | 0.09  | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  |
| 360.0           | 0.09  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.10  | 0.11  |

| C/γ(°) | 148.5 | 149.0 | 149.5 | 150.0 | 150.5 | 151.0 | 151.5 | 152.0 | 152.5 |
|--------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0    | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  | 0.12  | 0.12  |
| 22.5   | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 45.0   | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 67.5   | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 90.0   | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  |
| 112.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 135.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 157.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 180.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  | 0.12  | 0.12  |
| 202.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 225.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 247.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 270.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  |
| 292.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 315.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 337.5  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  |
| 360.0  | 0.11  | 0.11  | 0.11  | 0.11  | 0.11  | 0.12  | 0.12  | 0.12  | 0.12  |
|        |       |       |       |       |       |       |       |       |       |
| C/γ(°) | 153.0 | 153.5 | 154.0 | 154.5 | 155.0 | 155.5 | 156.0 | 156.5 | 157.0 |
| 0.0    | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 22.5   | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 45.0   | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 67.5   | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 90.0   | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  |
| 112.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 135.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 157.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 180.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 202.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 225.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 247.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 270.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  |
| 292.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 315.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 337.5  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  |
| 360.0  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
|        |       |       |       |       |       |       |       |       |       |
| C/γ(°) | 157.5 | 158.0 | 158.5 | 159.0 | 159.5 | 160.0 | 160.5 | 161.0 | 161.5 |
| 0.0    | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.14  | 0.14  |
| 22.5   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  |
| 45.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 67.5   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 90.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 112.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 135.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 157.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  |
| 180.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.14  | 0.14  |
| 202.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  |
| 225.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 247.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 270.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 292.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 315.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 337.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  |
| 360.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.14  | 0.14  |

| C/γ(°) | 162.0 | 162.5 | 163.0 | 163.5 | 164.0 | 164.5 | 165.0 | 165.5 | 166.0 |
|--------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 0.0    | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 22.5   | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 45.0   | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  |
| 67.5   | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 90.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 112.5  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 135.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  |
| 157.5  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 180.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 202.5  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 225.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  |
| 247.5  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 270.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 292.5  | 0.13  | 0.13  | 0.13  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 315.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  |
| 337.5  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
| 360.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  |
|        |       |       |       |       |       |       |       |       |       |
| C/γ(°) | 166.5 | 167.0 | 167.5 | 168.0 | 168.5 | 169.0 | 169.5 | 170.0 | 170.5 |
| 0.0    | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 22.5   | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 45.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 67.5   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 90.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 112.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 135.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 157.5  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 180.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
| 202.5  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 225.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 247.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 270.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 292.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 315.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 337.5  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  |
| 360.0  | 0.14  | 0.14  | 0.14  | 0.14  | 0.14  | 0.13  | 0.13  | 0.13  | 0.13  |
|        |       |       |       |       |       |       |       |       |       |
| C/γ(°) | 171.0 | 171.5 | 172.0 | 172.5 | 173.0 | 173.5 | 174.0 | 174.5 | 175.0 |
| 0.0    | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 22.5   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 45.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 67.5   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 90.0   | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 112.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 135.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 157.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 180.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 202.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 225.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 247.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 270.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 292.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  |
| 315.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 337.5  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |
| 360.0  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.13  | 0.12  | 0.12  | 0.12  |

| Intensity data(cd) |       |       |       |       |       |       |       |       | Appendix Page: 36 Total:36 |
|--------------------|-------|-------|-------|-------|-------|-------|-------|-------|----------------------------|
| C/ $\gamma$ (°)    | 175.5 | 176.0 | 176.5 | 177.0 | 177.5 | 178.0 | 178.5 | 179.0 | 179.5                      |
| 0.0                | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 22.5               | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 45.0               | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13                       |
| 67.5               | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13                       |
| 90.0               | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  | 0.13                       |
| 112.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13                       |
| 135.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13                       |
| 157.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 180.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 202.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 225.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13                       |
| 247.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13                       |
| 270.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13  | 0.13                       |
| 292.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13  | 0.13                       |
| 315.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13  | 0.13                       |
| 337.5              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
| 360.0              | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.12  | 0.13                       |
|                    |       |       |       |       |       |       |       |       |                            |
| C/ $\gamma$ (°)    | 180.0 |       |       |       |       |       |       |       |                            |
| 0.0                | 0.13  |       |       |       |       |       |       |       |                            |
| 22.5               | 0.13  |       |       |       |       |       |       |       |                            |
| 45.0               | 0.13  |       |       |       |       |       |       |       |                            |
| 67.5               | 0.13  |       |       |       |       |       |       |       |                            |
| 90.0               | 0.13  |       |       |       |       |       |       |       |                            |
| 112.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 135.0              | 0.13  |       |       |       |       |       |       |       |                            |
| 157.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 180.0              | 0.13  |       |       |       |       |       |       |       |                            |
| 202.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 225.0              | 0.13  |       |       |       |       |       |       |       |                            |
| 247.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 270.0              | 0.13  |       |       |       |       |       |       |       |                            |
| 292.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 315.0              | 0.13  |       |       |       |       |       |       |       |                            |
| 337.5              | 0.13  |       |       |       |       |       |       |       |                            |
| 360.0              | 0.13  |       |       |       |       |       |       |       |                            |