

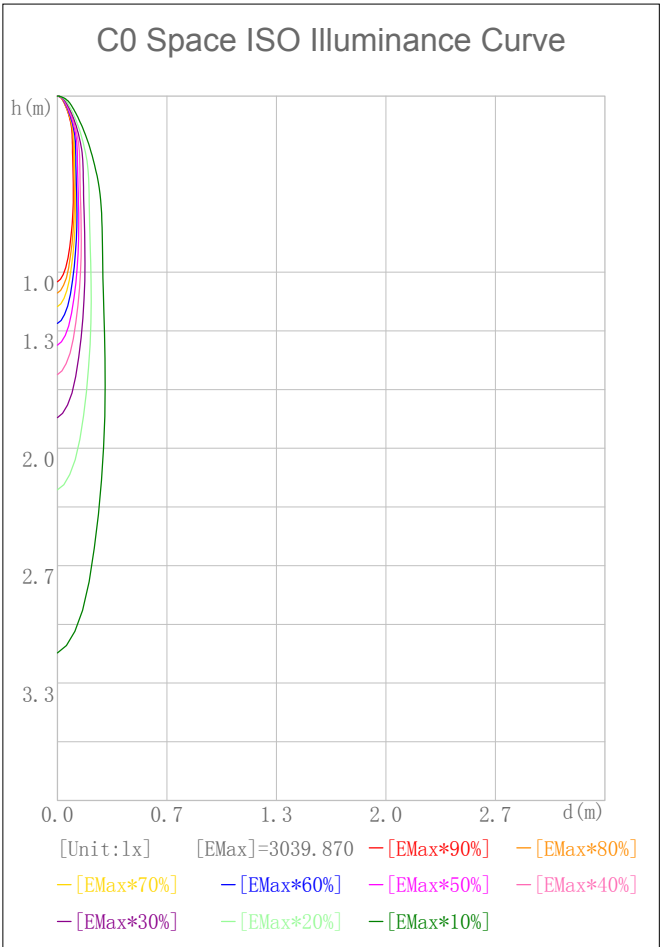
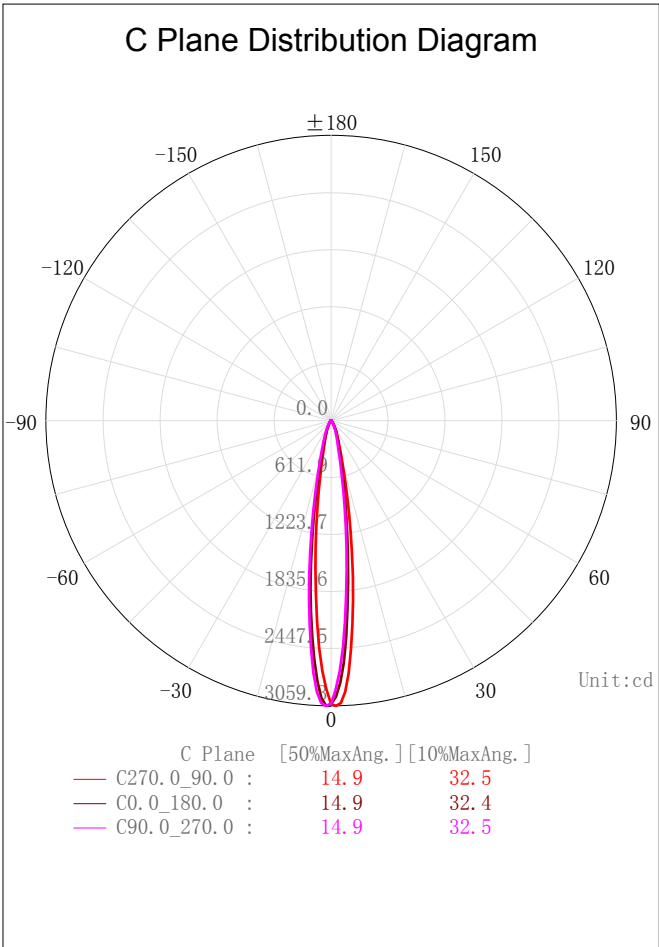
Indoor Luminaire Photometric Data

Description Information

| | | | |
|---|-------------------------|----------------------|-----------------------|
| Luminary Name: MD10-06-SL-01 3000K RA97 15D | | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | | Lamp Catalog: LED | Test Date: 2019/12/09 |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | | Shld.Ang(°): | Test Machine:GON-2000 |
| Test Lab: QUality peatment | | Frequency (Hz): | Lamp CCT(K): Ra: |
| Lum. Size (W*L*H):0.050m*0.050m*0.450m | | Lum. Area (m2):0.025 | Lum. W(kg): 0.000 |
| Test System: C, γ | Test Step: C=90.0 γ=1.0 | Temp. (°C): 25 | Humidity(%): 50.0 |

Character Parameter

| Lamp Speciality Parameter | | Luminaire Speciality Parameter | |
|---|----------------------------------|---------------------------------------|--|
| Rated Flux(lm): 378.600 | Luminary Flux(lm): 378.600 | Field Angle(10%Imax): 32.5(°) | |
| Rated Power(W): | Luminary Efficiency: 100.00% | Down Lumens&Percent: 376.582lm 99.47% | |
| Rated Voltage(V): | Luminary EER(lm/W): 64.740 | Up Lumens&Percent: 2.019lm 0.53% | |
| Tested Power(W): 5.848 | Max. Candela(cd): 3059.338 | S/MH: C0_a180=0.258 C90_270=0.258 | |
| Lamps' Inside: 1 | Max Cand@Ang. (°): C=270.0 γ=1.0 | CIE Type: Semi-Direct | |
| Tested Electrics (V, A, pf):240.2, 0.027, 0.881 | Beam Angle(50%Imax): 14.9(°) | ErP Φ use(90°): 351.837lm | |
| Lamp Size(W*L*H):0.050m*0.050m*0.450m | Left=-6.3°, Right=8.6° | IRF(%): 1741.187 | |



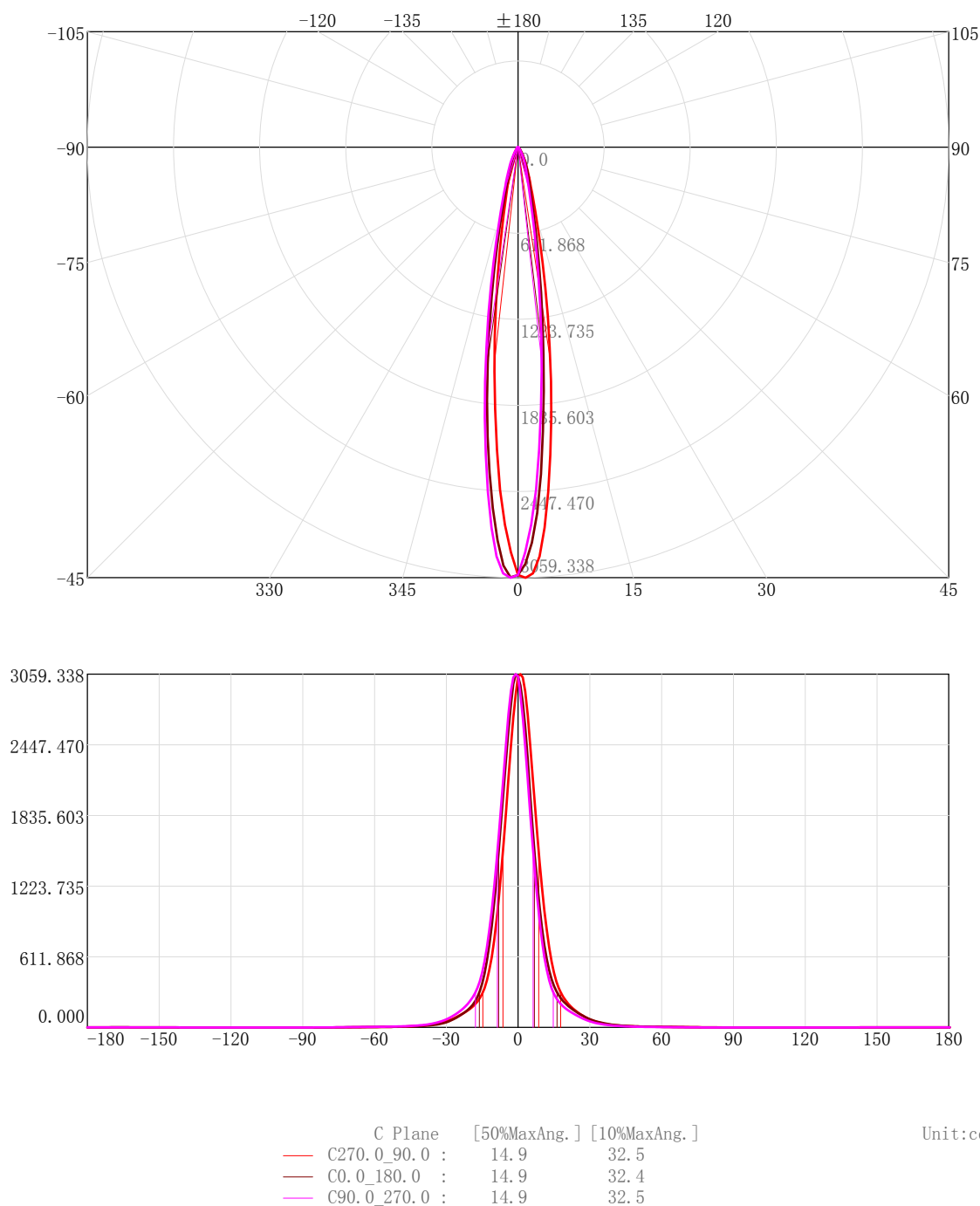
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

2D Plane Light Intensity Distribution Curve

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

C Plane Distribution Diagram



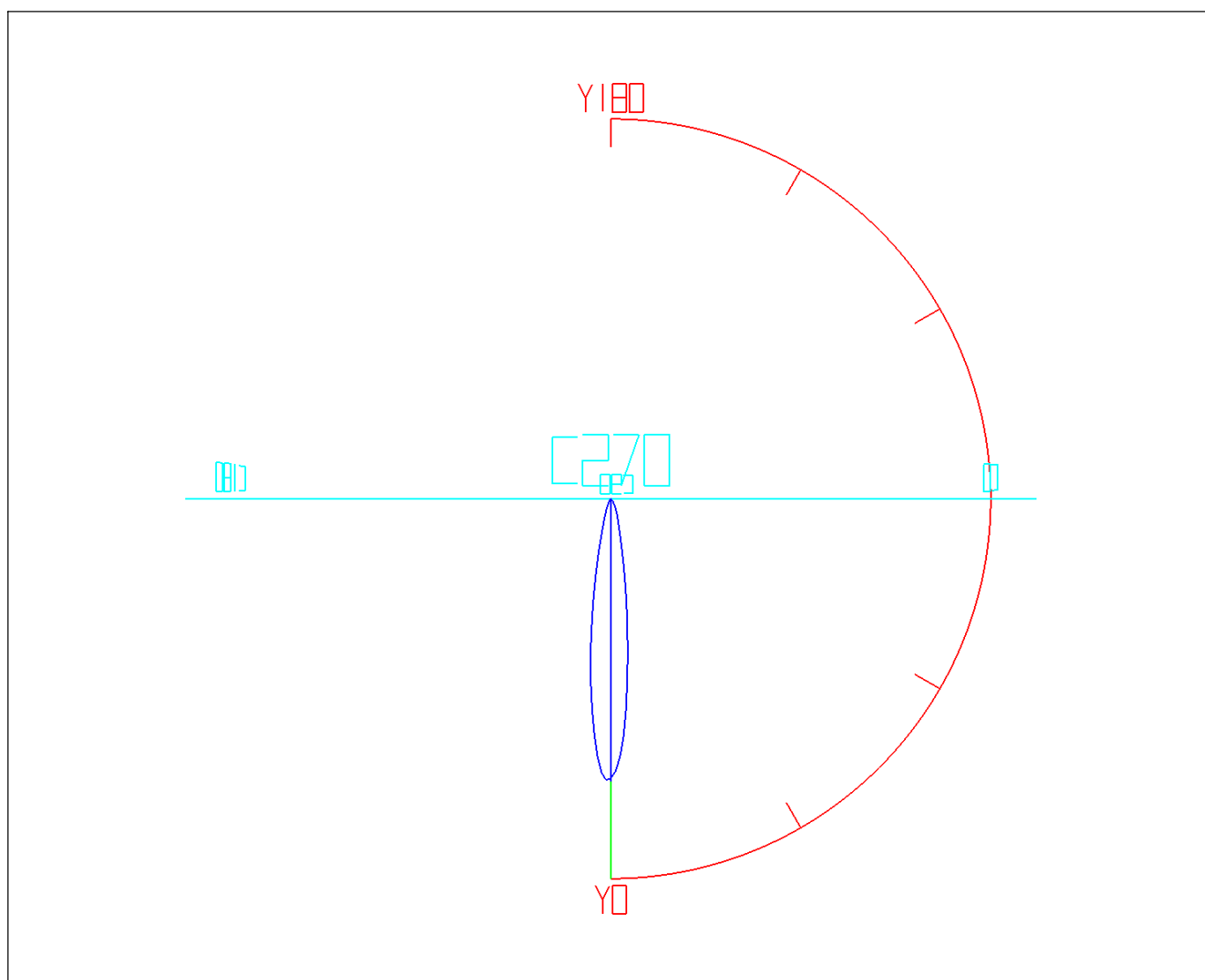
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

3D Light Intensity Distribution Modal

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

3D Light Intensity Distribution Modal



Curves: 3D Model — Fixture — Vert. HUD — Hori. HUD —
View Angles: Orient:0 Tilt:0 Roll:0 Spin:0

Zonal Flux Tabulation

| Zone(γ) | Zone Flux (lm) | Sums Flux (lm) | Zone%Lamp | Sums%Lamp | Zone(γ) | Zone Flux (lm) | Sums Flux (lm) | Zone%Lamp | Sums%Lamp |
|-----------|-------------------|-------------------|-----------|-----------|-----------|-------------------|-------------------|-----------|-----------|
| 0.0-1.0 | 2.88 | 2.88 | 0.76 | 0.76 | 47.0-48.0 | 0.77 | 364.36 | 0.20 | 96.24 |
| 1.0-2.0 | 8.42 | 11.30 | 2.22 | 2.99 | 48.0-49.0 | 0.73 | 365.09 | 0.19 | 96.43 |
| 2.0-3.0 | 13.30 | 24.60 | 3.51 | 6.50 | 49.0-50.0 | 0.68 | 365.77 | 0.18 | 96.61 |
| 3.0-4.0 | 17.16 | 41.77 | 4.53 | 11.03 | 50.0-51.0 | 0.65 | 366.42 | 0.17 | 96.78 |
| 4.0-5.0 | 19.83 | 61.59 | 5.24 | 16.27 | 51.0-52.0 | 0.61 | 367.03 | 0.16 | 96.94 |
| 5.0-6.0 | 21.40 | 82.99 | 5.65 | 21.92 | 52.0-53.0 | 0.58 | 367.61 | 0.15 | 97.10 |
| 6.0-7.0 | 22.03 | 105.02 | 5.82 | 27.74 | 53.0-54.0 | 0.55 | 368.17 | 0.15 | 97.24 |
| 7.0-8.0 | 21.82 | 126.84 | 5.76 | 33.50 | 54.0-55.0 | 0.53 | 368.70 | 0.14 | 97.38 |
| 8.0-9.0 | 20.91 | 147.74 | 5.52 | 39.02 | 55.0-56.0 | 0.51 | 369.21 | 0.13 | 97.52 |
| 9.0-10.0 | 19.50 | 167.25 | 5.15 | 44.17 | 56.0-57.0 | 0.49 | 369.70 | 0.13 | 97.65 |
| 10.0-11.0 | 17.81 | 185.06 | 4.70 | 48.88 | 57.0-58.0 | 0.47 | 370.18 | 0.13 | 97.77 |
| 11.0-12.0 | 16.02 | 201.08 | 4.23 | 53.11 | 58.0-59.0 | 0.46 | 370.63 | 0.12 | 97.90 |
| 12.0-13.0 | 14.28 | 215.36 | 3.77 | 56.88 | 59.0-60.0 | 0.44 | 371.08 | 0.12 | 98.01 |
| 13.0-14.0 | 12.70 | 228.06 | 3.35 | 60.24 | 60.0-61.0 | 0.43 | 371.50 | 0.11 | 98.13 |
| 14.0-15.0 | 11.33 | 239.39 | 2.99 | 63.23 | 61.0-62.0 | 0.41 | 371.92 | 0.11 | 98.24 |
| 15.0-16.0 | 10.21 | 249.60 | 2.70 | 65.93 | 62.0-63.0 | 0.40 | 372.32 | 0.11 | 98.34 |
| 16.0-17.0 | 9.31 | 258.92 | 2.46 | 68.39 | 63.0-64.0 | 0.38 | 372.70 | 0.10 | 98.44 |
| 17.0-18.0 | 8.59 | 267.50 | 2.27 | 70.66 | 64.0-65.0 | 0.37 | 373.07 | 0.10 | 98.54 |
| 18.0-19.0 | 7.98 | 275.49 | 2.11 | 72.77 | 65.0-66.0 | 0.35 | 373.42 | 0.09 | 98.63 |
| 19.0-20.0 | 7.47 | 282.96 | 1.97 | 74.74 | 66.0-67.0 | 0.33 | 373.75 | 0.09 | 98.72 |
| 20.0-21.0 | 7.01 | 289.96 | 1.85 | 76.59 | 67.0-68.0 | 0.31 | 374.06 | 0.08 | 98.80 |
| 21.0-22.0 | 6.59 | 296.56 | 1.74 | 78.33 | 68.0-69.0 | 0.29 | 374.36 | 0.08 | 98.88 |
| 22.0-23.0 | 6.20 | 302.76 | 1.64 | 79.97 | 69.0-70.0 | 0.27 | 374.63 | 0.07 | 98.95 |
| 23.0-24.0 | 5.82 | 308.58 | 1.54 | 81.51 | 70.0-71.0 | 0.25 | 374.88 | 0.07 | 99.02 |
| 24.0-25.0 | 5.43 | 314.01 | 1.43 | 82.94 | 71.0-72.0 | 0.24 | 375.12 | 0.06 | 99.08 |
| 25.0-26.0 | 5.03 | 319.04 | 1.33 | 84.27 | 72.0-73.0 | 0.22 | 375.34 | 0.06 | 99.14 |
| 26.0-27.0 | 4.62 | 323.66 | 1.22 | 85.49 | 73.0-74.0 | 0.20 | 375.54 | 0.05 | 99.19 |
| 27.0-28.0 | 4.22 | 327.89 | 1.12 | 86.60 | 74.0-75.0 | 0.18 | 375.71 | 0.05 | 99.24 |
| 28.0-29.0 | 3.83 | 331.72 | 1.01 | 87.62 | 75.0-76.0 | 0.15 | 375.86 | 0.04 | 99.28 |
| 29.0-30.0 | 3.47 | 335.19 | 0.92 | 88.53 | 76.0-77.0 | 0.13 | 375.99 | 0.03 | 99.31 |
| 30.0-31.0 | 3.15 | 338.34 | 0.83 | 89.37 | 77.0-78.0 | 0.10 | 376.09 | 0.03 | 99.34 |
| 31.0-32.0 | 2.86 | 341.20 | 0.75 | 90.12 | 78.0-79.0 | 0.08 | 376.17 | 0.02 | 99.36 |
| 32.0-33.0 | 2.59 | 343.79 | 0.68 | 90.80 | 79.0-80.0 | 0.07 | 376.24 | 0.02 | 99.38 |
| 33.0-34.0 | 2.35 | 346.14 | 0.62 | 91.43 | 80.0-81.0 | 0.06 | 376.30 | 0.01 | 99.39 |
| 34.0-35.0 | 2.13 | 348.27 | 0.56 | 91.99 | 81.0-82.0 | 0.05 | 376.35 | 0.01 | 99.40 |
| 35.0-36.0 | 1.94 | 350.21 | 0.51 | 92.50 | 82.0-83.0 | 0.04 | 376.39 | 0.01 | 99.42 |
| 36.0-37.0 | 1.77 | 351.97 | 0.47 | 92.97 | 83.0-84.0 | 0.04 | 376.43 | 0.01 | 99.43 |
| 37.0-38.0 | 1.61 | 353.59 | 0.43 | 93.39 | 84.0-85.0 | 0.03 | 376.46 | 0.01 | 99.44 |
| 38.0-39.0 | 1.48 | 355.07 | 0.39 | 93.78 | 85.0-86.0 | 0.03 | 376.49 | 0.01 | 99.44 |
| 39.0-40.0 | 1.36 | 356.43 | 0.36 | 94.14 | 86.0-87.0 | 0.03 | 376.52 | 0.01 | 99.45 |
| 40.0-41.0 | 1.26 | 357.68 | 0.33 | 94.47 | 87.0-88.0 | 0.02 | 376.55 | 0.01 | 99.46 |
| 41.0-42.0 | 1.16 | 358.85 | 0.31 | 94.78 | 88.0-89.0 | 0.02 | 376.56 | 0.01 | 99.46 |
| 42.0-43.0 | 1.08 | 359.93 | 0.29 | 95.07 | 89.0-90.0 | 0.02 | 376.58 | 0.00 | 99.47 |
| 43.0-44.0 | 1.01 | 360.94 | 0.27 | 95.34 | 90.0-91.0 | 0.01 | 376.60 | 0.00 | 99.47 |
| 44.0-45.0 | 0.94 | 361.88 | 0.25 | 95.58 | 91.0-92.0 | 0.01 | 376.61 | 0.00 | 99.47 |
| 45.0-46.0 | 0.88 | 362.76 | 0.23 | 95.82 | 92.0-93.0 | 0.01 | 376.62 | 0.00 | 99.48 |
| 46.0-47.0 | 0.82 | 363.59 | 0.22 | 96.03 | 93.0-94.0 | 0.01 | 376.62 | 0.00 | 99.48 |

Zonal Flux Tabulation - (Cont.)

| Zone(γ) | Zone Flux (lm) | Sums Flux (lm) | Zone%Lamp | Sums%Lamp | Zone(γ) | Zone Flux (lm) | Sums Flux (lm) | Zone%Lamp | Sums%Lamp |
|-------------|-------------------|-------------------|-----------|-----------|-------------|-------------------|-------------------|-----------|-----------|
| 94.0-95.0 | 0.00 | 376.63 | 0.00 | 99.48 | 141.0-142.0 | 0.04 | 376.75 | 0.01 | 99.51 |
| 95.0-96.0 | 0.00 | 376.63 | 0.00 | 99.48 | 142.0-143.0 | 0.04 | 376.79 | 0.01 | 99.52 |
| 96.0-97.0 | 0.00 | 376.63 | 0.00 | 99.48 | 143.0-144.0 | 0.05 | 376.84 | 0.01 | 99.54 |
| 97.0-98.0 | 0.00 | 376.63 | 0.00 | 99.48 | 144.0-145.0 | 0.06 | 376.90 | 0.01 | 99.55 |
| 98.0-99.0 | 0.00 | 376.63 | 0.00 | 99.48 | 145.0-146.0 | 0.06 | 376.96 | 0.02 | 99.57 |
| 99.0-100.0 | 0.00 | 376.63 | 0.00 | 99.48 | 146.0-147.0 | 0.06 | 377.02 | 0.02 | 99.58 |
| 100.0-101.0 | 0.00 | 376.63 | 0.00 | 99.48 | 147.0-148.0 | 0.07 | 377.09 | 0.02 | 99.60 |
| 101.0-102.0 | 0.00 | 376.63 | 0.00 | 99.48 | 148.0-149.0 | 0.07 | 377.16 | 0.02 | 99.62 |
| 102.0-103.0 | 0.00 | 376.63 | 0.00 | 99.48 | 149.0-150.0 | 0.07 | 377.23 | 0.02 | 99.64 |
| 103.0-104.0 | 0.00 | 376.63 | 0.00 | 99.48 | 150.0-151.0 | 0.07 | 377.31 | 0.02 | 99.66 |
| 104.0-105.0 | 0.00 | 376.63 | 0.00 | 99.48 | 151.0-152.0 | 0.08 | 377.38 | 0.02 | 99.68 |
| 105.0-106.0 | 0.00 | 376.63 | 0.00 | 99.48 | 152.0-153.0 | 0.08 | 377.46 | 0.02 | 99.70 |
| 106.0-107.0 | 0.00 | 376.63 | 0.00 | 99.48 | 153.0-154.0 | 0.07 | 377.53 | 0.02 | 99.72 |
| 107.0-108.0 | 0.00 | 376.63 | 0.00 | 99.48 | 154.0-155.0 | 0.07 | 377.61 | 0.02 | 99.74 |
| 108.0-109.0 | 0.00 | 376.63 | 0.00 | 99.48 | 155.0-156.0 | 0.07 | 377.68 | 0.02 | 99.76 |
| 109.0-110.0 | 0.00 | 376.63 | 0.00 | 99.48 | 156.0-157.0 | 0.07 | 377.75 | 0.02 | 99.78 |
| 110.0-111.0 | 0.00 | 376.63 | 0.00 | 99.48 | 157.0-158.0 | 0.07 | 377.82 | 0.02 | 99.79 |
| 111.0-112.0 | 0.00 | 376.63 | 0.00 | 99.48 | 158.0-159.0 | 0.07 | 377.89 | 0.02 | 99.81 |
| 112.0-113.0 | 0.00 | 376.63 | 0.00 | 99.48 | 159.0-160.0 | 0.06 | 377.95 | 0.02 | 99.83 |
| 113.0-114.0 | 0.00 | 376.63 | 0.00 | 99.48 | 160.0-161.0 | 0.06 | 378.01 | 0.02 | 99.84 |
| 114.0-115.0 | 0.00 | 376.63 | 0.00 | 99.48 | 161.0-162.0 | 0.06 | 378.07 | 0.02 | 99.86 |
| 115.0-116.0 | 0.00 | 376.63 | 0.00 | 99.48 | 162.0-163.0 | 0.06 | 378.13 | 0.01 | 99.88 |
| 116.0-117.0 | 0.00 | 376.63 | 0.00 | 99.48 | 163.0-164.0 | 0.05 | 378.18 | 0.01 | 99.89 |
| 117.0-118.0 | 0.00 | 376.63 | 0.00 | 99.48 | 164.0-165.0 | 0.05 | 378.23 | 0.01 | 99.90 |
| 118.0-119.0 | 0.00 | 376.63 | 0.00 | 99.48 | 165.0-166.0 | 0.05 | 378.28 | 0.01 | 99.92 |
| 119.0-120.0 | 0.00 | 376.63 | 0.00 | 99.48 | 166.0-167.0 | 0.04 | 378.33 | 0.01 | 99.93 |
| 120.0-121.0 | 0.00 | 376.63 | 0.00 | 99.48 | 167.0-168.0 | 0.04 | 378.37 | 0.01 | 99.94 |
| 121.0-122.0 | 0.00 | 376.63 | 0.00 | 99.48 | 168.0-169.0 | 0.04 | 378.41 | 0.01 | 99.95 |
| 122.0-123.0 | 0.00 | 376.63 | 0.00 | 99.48 | 169.0-170.0 | 0.03 | 378.44 | 0.01 | 99.96 |
| 123.0-124.0 | 0.00 | 376.63 | 0.00 | 99.48 | 170.0-171.0 | 0.03 | 378.47 | 0.01 | 99.97 |
| 124.0-125.0 | 0.00 | 376.63 | 0.00 | 99.48 | 171.0-172.0 | 0.03 | 378.50 | 0.01 | 99.97 |
| 125.0-126.0 | 0.00 | 376.63 | 0.00 | 99.48 | 172.0-173.0 | 0.02 | 378.53 | 0.01 | 99.98 |
| 126.0-127.0 | 0.00 | 376.63 | 0.00 | 99.48 | 173.0-174.0 | 0.02 | 378.55 | 0.01 | 99.99 |
| 127.0-128.0 | 0.00 | 376.63 | 0.00 | 99.48 | 174.0-175.0 | 0.02 | 378.56 | 0.00 | 99.99 |
| 128.0-129.0 | 0.00 | 376.63 | 0.00 | 99.48 | 175.0-176.0 | 0.01 | 378.58 | 0.00 | 99.99 |
| 129.0-130.0 | 0.00 | 376.63 | 0.00 | 99.48 | 176.0-177.0 | 0.01 | 378.59 | 0.00 | 100.00 |
| 130.0-131.0 | 0.00 | 376.63 | 0.00 | 99.48 | 177.0-178.0 | 0.01 | 378.59 | 0.00 | 100.00 |
| 131.0-132.0 | 0.00 | 376.63 | 0.00 | 99.48 | 178.0-179.0 | 0.00 | 378.60 | 0.00 | 100.00 |
| 132.0-133.0 | 0.00 | 376.63 | 0.00 | 99.48 | 179.0-180.0 | 0.00 | 378.60 | 0.00 | 100.00 |
| 133.0-134.0 | 0.00 | 376.63 | 0.00 | 99.48 | | | | | |
| 134.0-135.0 | 0.00 | 376.63 | 0.00 | 99.48 | | | | | |
| 135.0-136.0 | 0.00 | 376.63 | 0.00 | 99.48 | | | | | |
| 136.0-137.0 | 0.00 | 376.64 | 0.00 | 99.48 | | | | | |
| 137.0-138.0 | 0.01 | 376.65 | 0.00 | 99.48 | | | | | |
| 138.0-139.0 | 0.02 | 376.66 | 0.00 | 99.49 | | | | | |
| 139.0-140.0 | 0.02 | 376.68 | 0.01 | 99.49 | | | | | |
| 140.0-141.0 | 0.03 | 376.71 | 0.01 | 99.50 | | | | | |

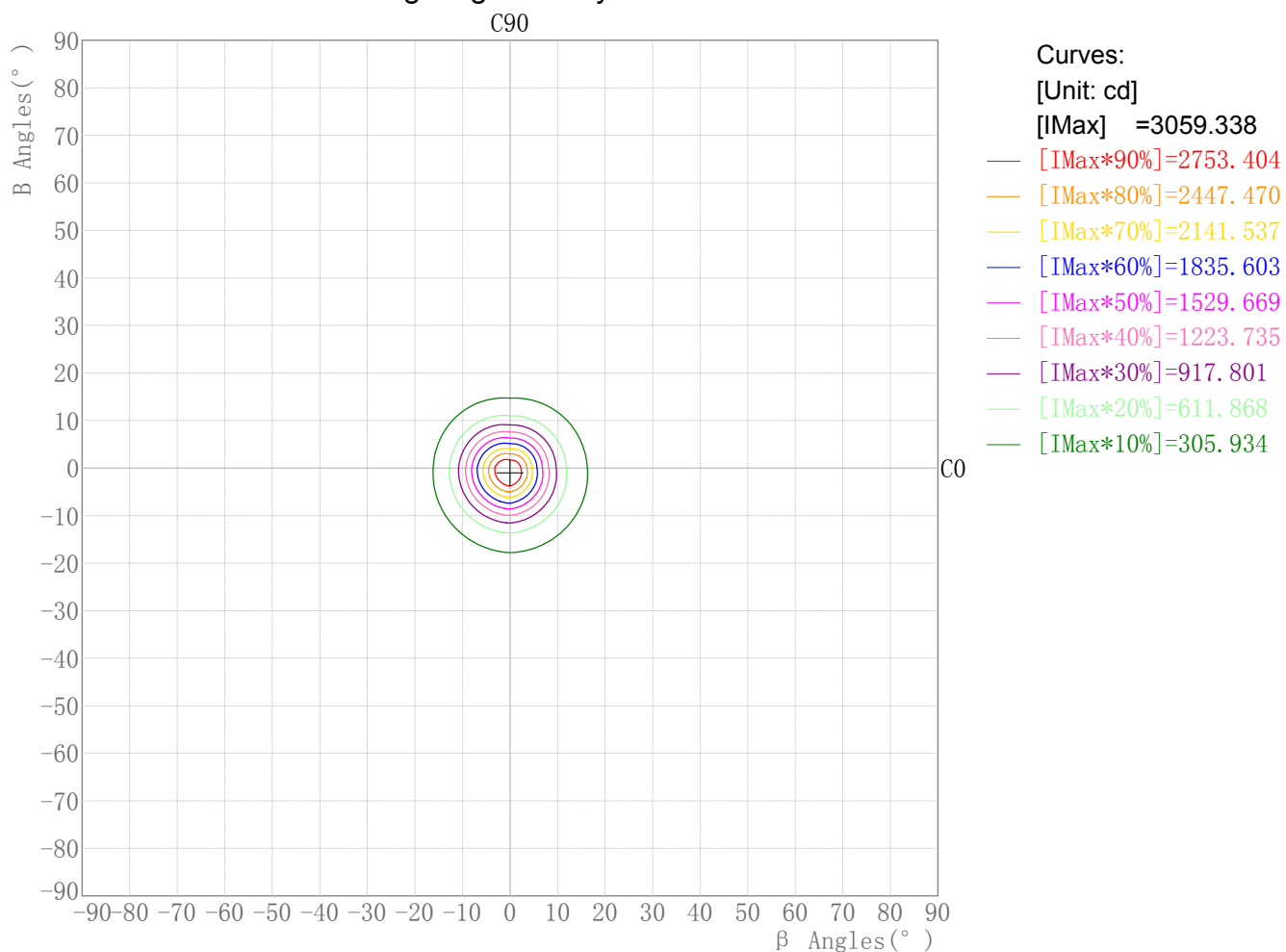
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

Rectangle ISO Lighting Intensity Diagram

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

ISO Lighting Intensity Curve



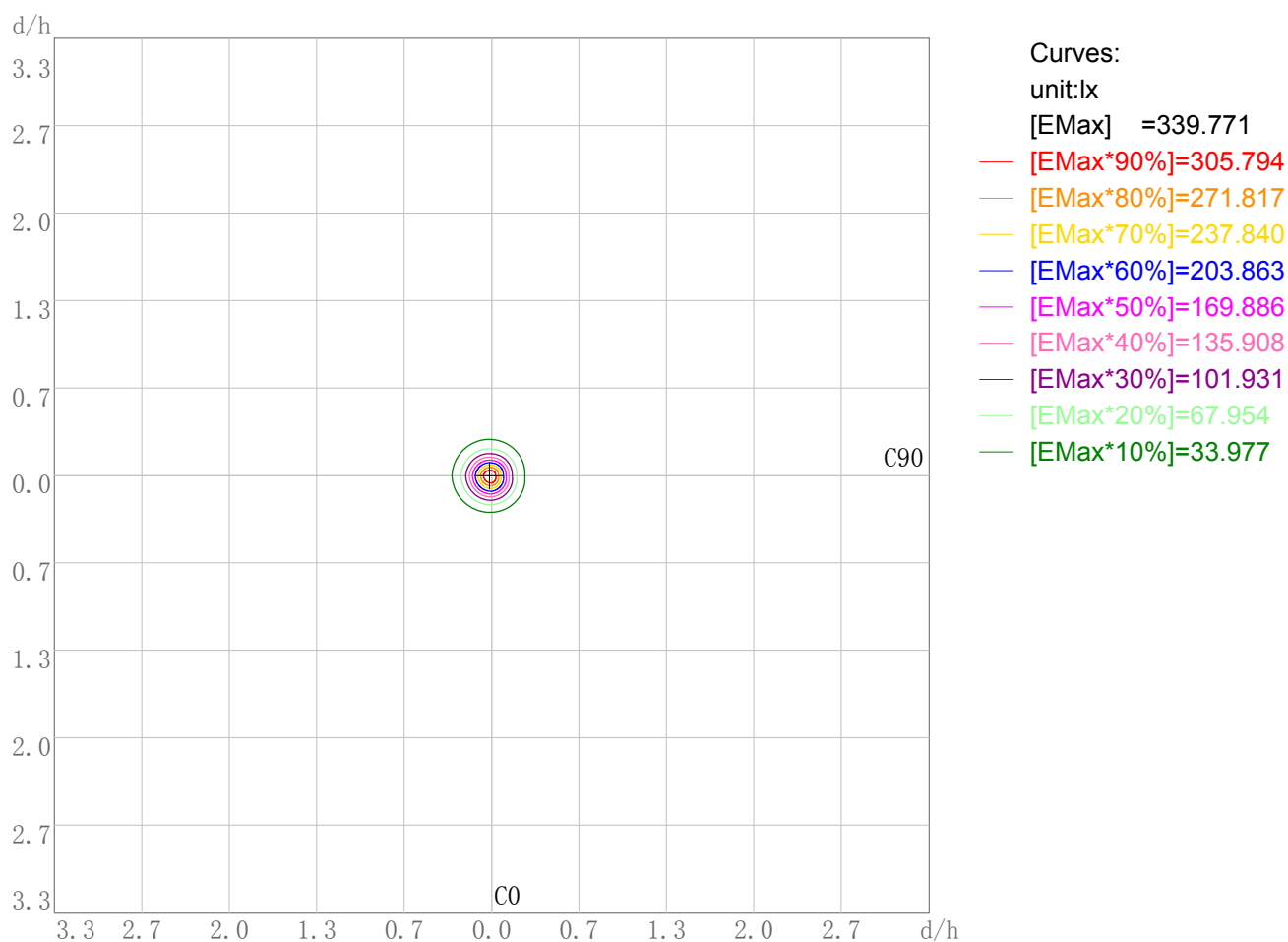
Maximum Light Intensity(cd): 3059.34

Maximum Cand.@Angle: H=-0.0°,V=-1.0°

Plane ISO-Illuminance Diagram

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

Plane ISO-Illuminance Curve



Working Plane Luminaire Mounting Height(m): 3.00

Working Plane Maximum Illuminance(lx): 339.77

Working Plane Maximum Illuminance Position(d/h):H-0.0 V-0.0

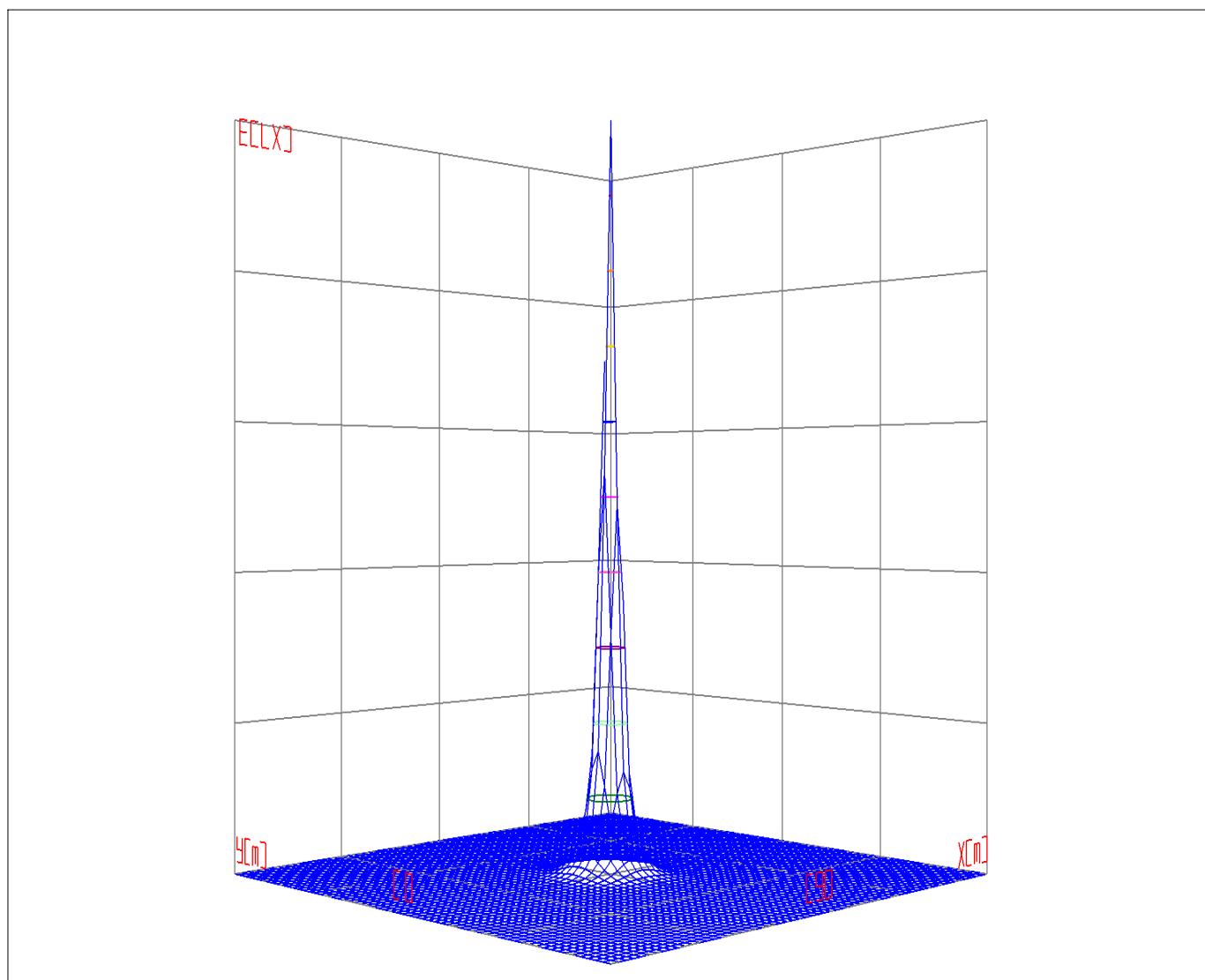
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

3D Plane ISO Illuminance Diagram

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

3D Plane Illuminance Modal



Curves: 3D Model — 90% — 80% — 70% — 60% — 50% — 40% — 30% — 20% — 10% —
View Angles(deg): 0 Height(m): 3.0 Distance(m): 10.0

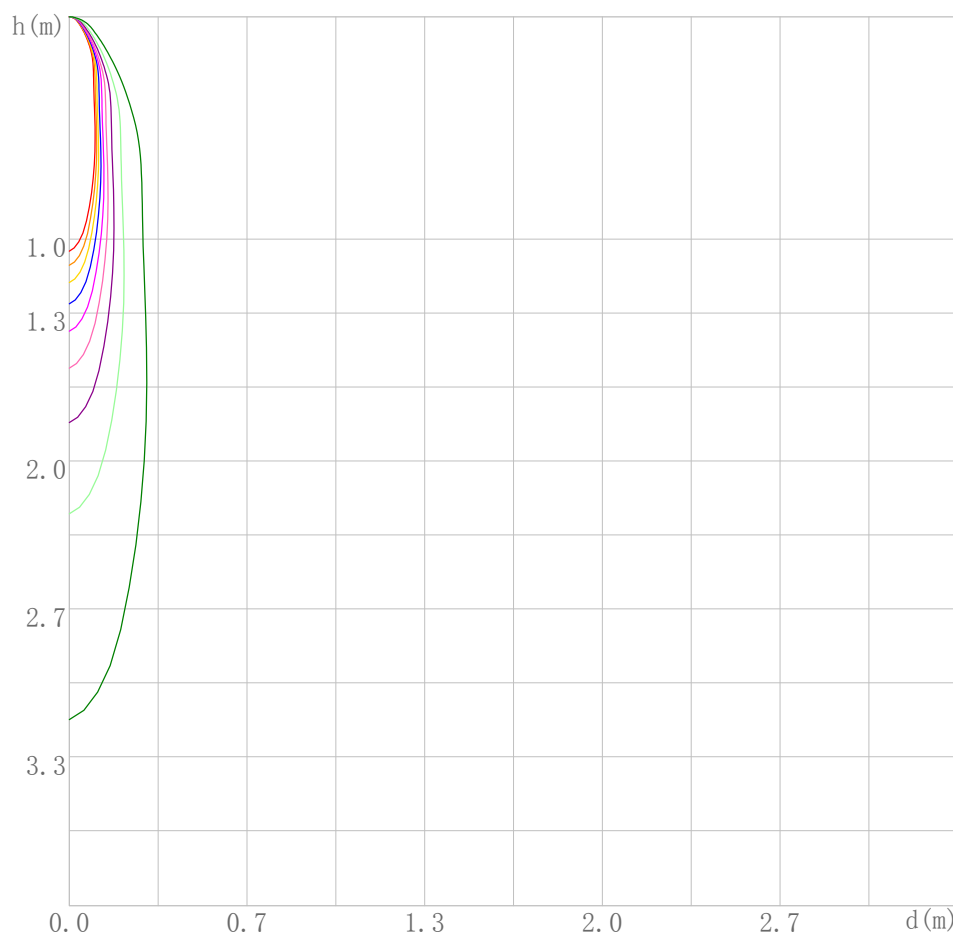
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

Space ISO Illuminance Diagram

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

Space ISO Illuminance Curve



Curves:

[Unit: lx]

[EMax] =3039.870

— [EMax*90%]=2735.883

— [EMax*80%]=2431.896

— [EMax*70%]=2127.909

— [EMax*60%]=1823.922

— [EMax*50%]=1519.935

— [EMax*40%]=1215.948

— [EMax*30%]=911.961

— [EMax*20%]=607.974

— [EMax*10%]=303.987

Space Plane Maximum Illuminance and @Angle:3039.87lx,0.0deg

Plane Maximum Lighting Intensity and @Angle:3039.870cd,0deg

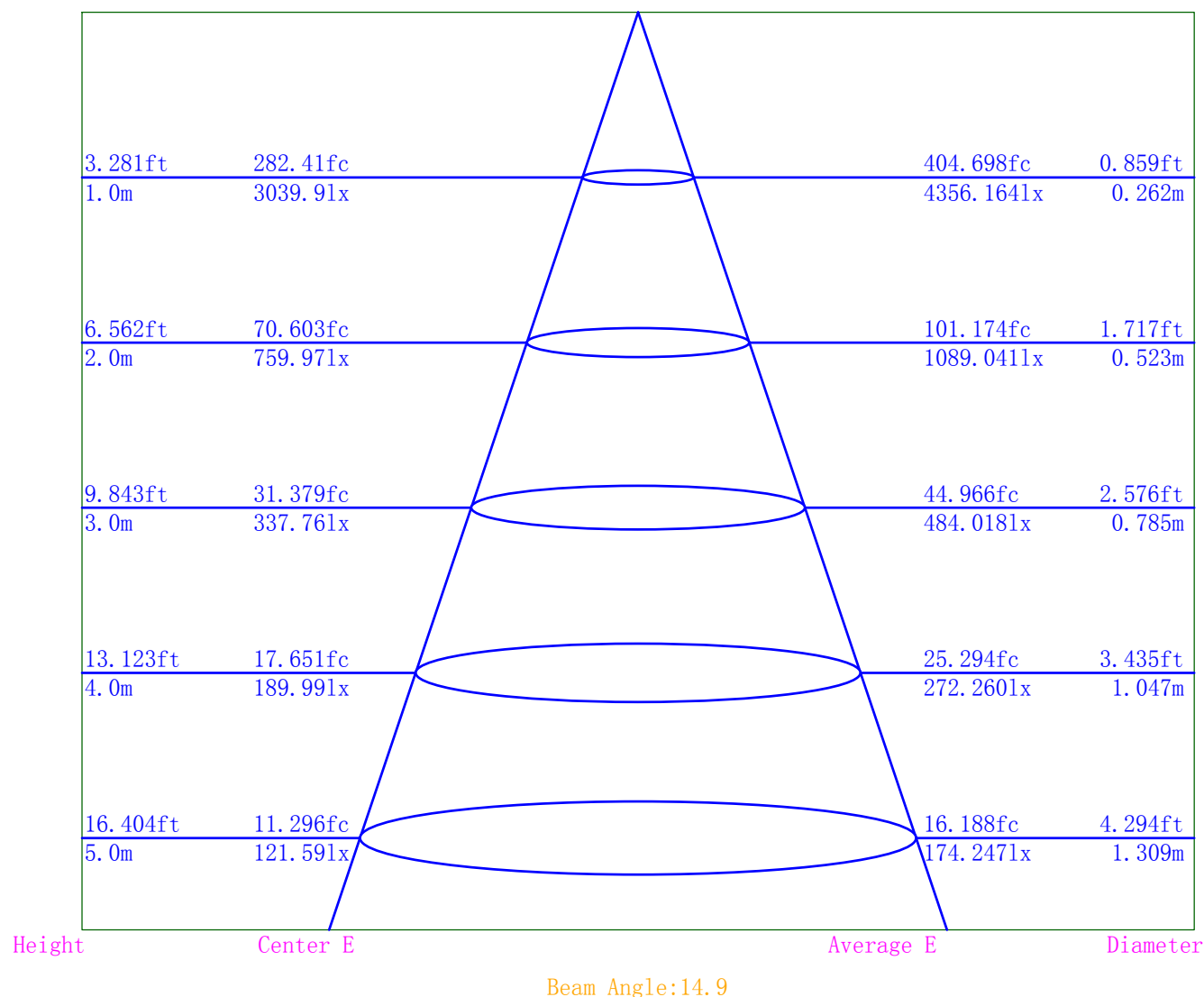
IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

Illuminance-Distance Diagram

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |

Illuminance-Distance Curve



Indoor Luminance Limiting Curves

Table with 3 columns: Lum. Name, Lum. Catalog, Test ID; Lamp Name, Lamp Catalog, Test Lab; Manufacture, Test Machine, Test Date.

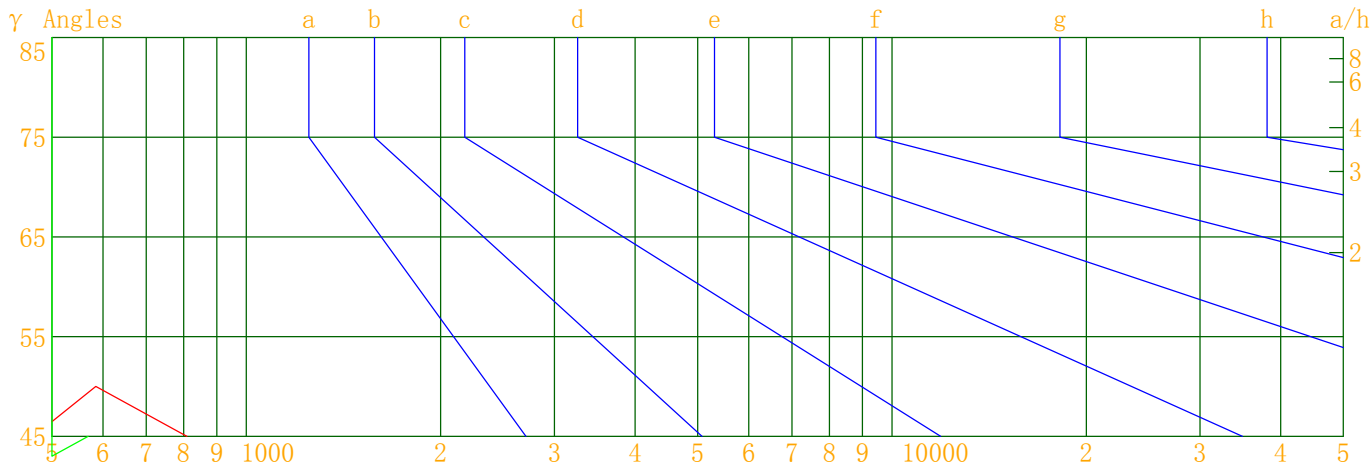
Glare Grade Table

Table with 10 columns: GI, Quality, and 8 columns for Using Illuminance (a-h).

Luminance Table

Table with 10 columns: Gama (deg), 45, 50, 55, 60, 65, 70, 75, 80, 85; C0; C90.

Luminance Limiting Curve



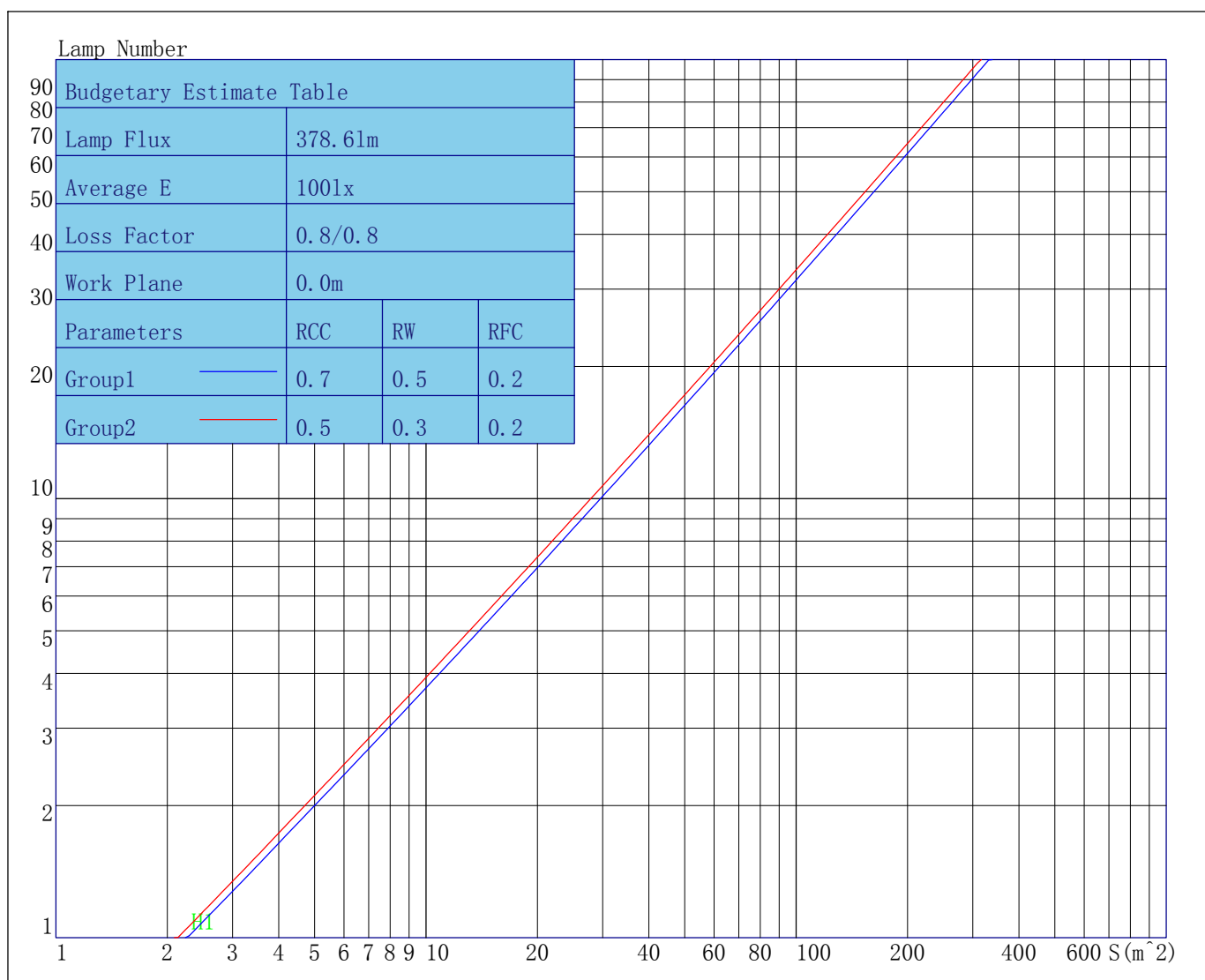
Luminous Size: Length(m)=0.050 Width(m)=0.050 Height(m)=0.450 Area(m^2)=0.025000
Luminous Type: Without Luminous Side
Luminous Curves: C0-C180 Color: C90-C270 Color:

IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

Indoor Budgetary Estimate Table

| | | |
|---|-----------------------|----------------------------|
| Lum. Name: MD10-06-SL-01 3000K RA97 15D | Lum. Catalog: | Test ID: 01 |
| Lamp Name: | Lamp Catalog: LED | Test Lab: Quality peatment |
| Manufacture: Shenzhen Norming Lighting Co., Ltd | Test Machine:GON-2000 | Test Date: 2019/12/09 |



Parameters1: Rhocc = 0.7 Rhow = 0.5 Rhofc = 0.2 LLF = 0.8
Parameters2: Rhocc = 0.5 Rhow = 0.3 Rhofc = 0.2 LLF = 0.8
Average Illuminance(lx): 100 Cavity Height: H1(m) = 2

Indoor Coefficient of Utilization Table

Table with 3 columns: Lum. Name, Lum. Catalog, Test ID; Lamp Name, Lamp Catalog, Test Lab; Manufacture, Test Machine, Test Date.

Table with 2 main sections: 'Coefficients of Utilization - Zonal Cavity Method' and 'Coefficient of Utilization(%)'. The first section includes RhoCC, RhoW, and RCR values. The second section is a grid of utilization coefficients for different room dimensions.

Unified Glare Rating Table

Table with 3 columns: Lum. Name, Lum. Catalog, Test ID; Lamp Name, Lamp Catalog, Test Lab; Manufacture, Test Machine, Test Date.

Unified Glare Rating Table

Table with 11 columns for room surfaces (Ceiling, Wall, Floor) and room sizes (X=2H to X=12H, Y=2H to Y=12H) showing Unified Glare Rating (UGR) values. Includes a section for Variations with the observer position at spacings (S=1.0H to S=2.0H) and a Reduced UGR Table with Nordic Standard and Correction Value.

to the CIE Pub.117, data has been corrected, refers to the lamp's lumens 8.2flm.

Candela Tabulation

| V/H | C0.0 | C90.0 | C180.0 | C270.0 |
|--------|---------|---------|---------|---------|
| γ 0.0 | 3039.87 | 3039.87 | 3039.87 | 3039.87 |
| γ 1.0 | 2961.68 | 2879.52 | 3057.15 | 3059.34 |
| γ 2.0 | 2812.37 | 2684.14 | 2974.17 | 3029.80 |
| γ 3.0 | 2602.66 | 2437.20 | 2795.76 | 2911.37 |
| γ 4.0 | 2328.34 | 2153.51 | 2569.12 | 2709.40 |
| γ 5.0 | 2027.17 | 1867.33 | 2322.11 | 2458.27 |
| γ 6.0 | 1744.75 | 1602.80 | 2067.77 | 2195.97 |
| γ 7.0 | 1481.71 | 1356.80 | 1810.05 | 1936.71 |
| γ 8.0 | 1249.49 | 1129.21 | 1550.50 | 1679.20 |
| γ 9.0 | 1044.70 | 927.97 | 1301.27 | 1435.90 |
| γ 10.0 | 863.61 | 754.80 | 1078.21 | 1214.78 |
| γ 11.0 | 712.24 | 610.59 | 881.63 | 1014.91 |
| γ 12.0 | 589.80 | 496.82 | 714.39 | 841.50 |
| γ 13.0 | 493.34 | 407.45 | 577.42 | 693.45 |
| γ 14.0 | 418.02 | 340.27 | 465.51 | 571.85 |
| γ 15.0 | 360.02 | 291.08 | 379.65 | 474.84 |
| γ 16.0 | 315.85 | 253.43 | 313.80 | 399.48 |
| γ 17.0 | 279.95 | 224.26 | 264.05 | 341.82 |
| γ 18.0 | 250.30 | 200.33 | 225.99 | 296.96 |
| γ 19.0 | 225.41 | 180.06 | 196.00 | 260.64 |
| γ 20.0 | 204.12 | 162.52 | 172.21 | 230.90 |
| γ 21.0 | 185.33 | 147.87 | 152.26 | 204.78 |
| γ 22.0 | 168.69 | 134.74 | 135.76 | 182.60 |
| γ 23.0 | 153.54 | 122.37 | 121.08 | 163.43 |
| γ 24.0 | 139.73 | 110.17 | 107.68 | 146.91 |
| γ 25.0 | 126.25 | 99.00 | 94.60 | 131.11 |
| γ 26.0 | 113.94 | 88.11 | 82.52 | 116.64 |
| γ 27.0 | 102.25 | 77.76 | 71.79 | 103.05 |
| γ 28.0 | 91.00 | 68.57 | 61.70 | 90.97 |
| γ 29.0 | 80.53 | 60.54 | 52.58 | 79.99 |
| γ 30.0 | 71.84 | 53.44 | 45.24 | 70.38 |
| γ 31.0 | 63.90 | 47.10 | 39.06 | 61.98 |
| γ 32.0 | 56.91 | 41.50 | 33.93 | 54.45 |
| γ 33.0 | 50.86 | 36.56 | 29.53 | 47.87 |
| γ 34.0 | 45.49 | 32.33 | 25.94 | 42.03 |
| γ 35.0 | 40.57 | 28.61 | 22.90 | 36.91 |
| γ 36.0 | 36.24 | 25.38 | 20.38 | 32.53 |
| γ 37.0 | 32.34 | 22.58 | 18.24 | 28.83 |
| γ 38.0 | 28.93 | 20.16 | 16.49 | 25.75 |
| γ 39.0 | 25.92 | 18.04 | 14.97 | 22.98 |
| γ 40.0 | 23.27 | 16.28 | 13.70 | 20.75 |
| γ 41.0 | 20.96 | 14.72 | 12.62 | 18.82 |
| γ 42.0 | 18.95 | 13.35 | 11.62 | 17.21 |
| γ 43.0 | 17.21 | 12.11 | 10.79 | 15.73 |
| γ 44.0 | 15.71 | 10.99 | 9.99 | 14.46 |
| γ 45.0 | 14.31 | 10.06 | 9.26 | 13.30 |
| γ 46.0 | 13.09 | 9.19 | 8.58 | 12.30 |

Candela Tabulation - (Cont.)

| V/H | C0.0 | C90.0 | C180.0 | C270.0 |
|--------|-------|-------|--------|--------|
| γ 47.0 | 11.98 | 8.42 | 7.96 | 11.40 |
| γ 48.0 | 11.03 | 7.77 | 7.35 | 10.61 |
| γ 49.0 | 10.15 | 7.17 | 6.86 | 9.88 |
| γ 50.0 | 9.40 | 6.62 | 6.39 | 9.22 |
| γ 51.0 | 8.73 | 6.15 | 5.99 | 8.64 |
| γ 52.0 | 8.15 | 5.74 | 5.63 | 8.09 |
| γ 53.0 | 7.61 | 5.36 | 5.33 | 7.62 |
| γ 54.0 | 7.13 | 5.05 | 5.06 | 7.19 |
| γ 55.0 | 6.72 | 4.76 | 4.83 | 6.82 |
| γ 56.0 | 6.37 | 4.50 | 4.62 | 6.50 |
| γ 57.0 | 6.07 | 4.26 | 4.44 | 6.24 |
| γ 58.0 | 5.77 | 4.03 | 4.27 | 5.98 |
| γ 59.0 | 5.47 | 3.84 | 4.09 | 5.74 |
| γ 60.0 | 5.24 | 3.64 | 3.94 | 5.52 |
| γ 61.0 | 5.01 | 3.46 | 3.80 | 5.30 |
| γ 62.0 | 4.77 | 3.27 | 3.66 | 5.09 |
| γ 63.0 | 4.54 | 3.09 | 3.49 | 4.88 |
| γ 64.0 | 4.32 | 2.90 | 3.31 | 4.65 |
| γ 65.0 | 4.09 | 2.72 | 3.15 | 4.45 |
| γ 66.0 | 3.89 | 2.54 | 2.99 | 4.24 |
| γ 67.0 | 3.65 | 2.32 | 2.82 | 4.03 |
| γ 68.0 | 3.42 | 2.13 | 2.60 | 3.78 |
| γ 69.0 | 3.12 | 1.93 | 2.43 | 3.58 |
| γ 70.0 | 2.93 | 1.77 | 2.22 | 3.29 |
| γ 71.0 | 2.75 | 1.62 | 2.05 | 3.09 |
| γ 72.0 | 2.55 | 1.43 | 1.86 | 2.89 |
| γ 73.0 | 2.34 | 1.24 | 1.67 | 2.67 |
| γ 74.0 | 2.11 | 1.06 | 1.46 | 2.44 |
| γ 75.0 | 1.88 | 0.87 | 1.24 | 2.21 |
| γ 76.0 | 1.63 | 0.65 | 1.02 | 1.98 |
| γ 77.0 | 1.37 | 0.42 | 0.81 | 1.72 |
| γ 78.0 | 1.11 | 0.23 | 0.56 | 1.46 |
| γ 79.0 | 0.96 | 0.17 | 0.34 | 1.18 |
| γ 80.0 | 0.88 | 0.11 | 0.25 | 0.99 |
| γ 81.0 | 0.81 | 0.05 | 0.19 | 0.90 |
| γ 82.0 | 0.73 | 0.01 | 0.16 | 0.83 |
| γ 83.0 | 0.67 | 0.00 | 0.10 | 0.76 |
| γ 84.0 | 0.60 | 0.00 | 0.05 | 0.70 |
| γ 85.0 | 0.53 | 0.00 | 0.00 | 0.63 |
| γ 86.0 | 0.47 | 0.00 | 0.00 | 0.57 |
| γ 87.0 | 0.40 | 0.00 | 0.00 | 0.51 |
| γ 88.0 | 0.35 | 0.00 | 0.00 | 0.44 |
| γ 89.0 | 0.29 | 0.00 | 0.00 | 0.38 |
| γ 90.0 | 0.25 | 0.00 | 0.00 | 0.31 |
| γ 91.0 | 0.22 | 0.00 | 0.00 | 0.25 |
| γ 92.0 | 0.17 | 0.00 | 0.00 | 0.19 |
| γ 93.0 | 0.14 | 0.00 | 0.00 | 0.15 |

Candela Tabulation - (Cont.)

| V/H | C0.0 | C90.0 | C180.0 | C270.0 |
|---------|------|-------|--------|--------|
| γ 94.0 | 0.11 | 0.00 | 0.00 | 0.09 |
| γ 95.0 | 0.08 | 0.00 | 0.00 | 0.04 |
| γ 96.0 | 0.04 | 0.00 | 0.00 | 0.00 |
| γ 97.0 | 0.01 | 0.00 | 0.00 | 0.00 |
| γ 98.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 99.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 100.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 101.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 102.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 103.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 104.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 105.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 106.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 107.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 108.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 109.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 110.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 111.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 112.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 113.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 114.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 115.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 116.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 117.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 118.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 119.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 120.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 121.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 122.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 123.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 124.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 125.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 126.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 127.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 128.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 129.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 130.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 131.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 132.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 133.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 134.0 | 0.00 | 0.00 | 0.00 | 0.00 |
| γ 135.0 | 0.00 | 0.00 | 0.00 | 0.01 |
| γ 136.0 | 0.00 | 0.00 | 0.05 | 0.07 |
| γ 137.0 | 0.07 | 0.00 | 0.14 | 0.14 |
| γ 138.0 | 0.15 | 0.07 | 0.23 | 0.23 |
| γ 139.0 | 0.23 | 0.18 | 0.34 | 0.32 |
| γ 140.0 | 0.34 | 0.28 | 0.43 | 0.42 |

IES Indoor Report

Photometric Filename:MD10-06-SL-01 3000K RA97 15D.IES

Candela Tabulation - (Cont.)

| V/H | C0.0 | C90.0 | C180.0 | C270.0 |
|---------|------|-------|--------|--------|
| γ 141.0 | 0.45 | 0.39 | 0.55 | 0.52 |
| γ 142.0 | 0.57 | 0.50 | 0.67 | 0.62 |
| γ 143.0 | 0.67 | 0.61 | 0.78 | 0.74 |
| γ 144.0 | 0.78 | 0.73 | 0.89 | 0.86 |
| γ 145.0 | 0.89 | 0.83 | 1.00 | 0.96 |
| γ 146.0 | 0.99 | 0.92 | 1.11 | 1.07 |
| γ 147.0 | 1.07 | 1.02 | 1.21 | 1.16 |
| γ 148.0 | 1.16 | 1.10 | 1.29 | 1.24 |
| γ 149.0 | 1.25 | 1.18 | 1.37 | 1.33 |
| γ 150.0 | 1.32 | 1.24 | 1.45 | 1.39 |
| γ 151.0 | 1.39 | 1.29 | 1.51 | 1.46 |
| γ 152.0 | 1.44 | 1.33 | 1.56 | 1.51 |
| γ 153.0 | 1.50 | 1.37 | 1.61 | 1.56 |
| γ 154.0 | 1.54 | 1.40 | 1.65 | 1.60 |
| γ 155.0 | 1.58 | 1.43 | 1.68 | 1.63 |
| γ 156.0 | 1.61 | 1.45 | 1.71 | 1.66 |
| γ 157.0 | 1.64 | 1.46 | 1.74 | 1.68 |
| γ 158.0 | 1.66 | 1.47 | 1.76 | 1.70 |
| γ 159.0 | 1.69 | 1.48 | 1.77 | 1.72 |
| γ 160.0 | 1.72 | 1.50 | 1.79 | 1.73 |
| γ 161.0 | 1.73 | 1.51 | 1.79 | 1.74 |
| γ 162.0 | 1.75 | 1.53 | 1.81 | 1.75 |
| γ 163.0 | 1.76 | 1.56 | 1.82 | 1.76 |
| γ 164.0 | 1.78 | 1.58 | 1.83 | 1.76 |
| γ 165.0 | 1.79 | 1.60 | 1.84 | 1.77 |
| γ 166.0 | 1.80 | 1.61 | 1.83 | 1.78 |
| γ 167.0 | 1.80 | 1.62 | 1.84 | 1.77 |
| γ 168.0 | 1.81 | 1.64 | 1.84 | 1.77 |
| γ 169.0 | 1.80 | 1.64 | 1.83 | 1.76 |
| γ 170.0 | 1.79 | 1.63 | 1.82 | 1.74 |
| γ 171.0 | 1.76 | 1.61 | 1.81 | 1.72 |
| γ 172.0 | 1.74 | 1.58 | 1.79 | 1.70 |
| γ 173.0 | 1.70 | 1.57 | 1.75 | 1.67 |
| γ 174.0 | 1.67 | 1.53 | 1.72 | 1.63 |
| γ 175.0 | 1.64 | 1.50 | 1.68 | 1.60 |
| γ 176.0 | 1.61 | 1.47 | 1.64 | 1.56 |
| γ 177.0 | 1.58 | 1.44 | 1.61 | 1.53 |
| γ 178.0 | 1.58 | 1.42 | 1.58 | 1.51 |
| γ 179.0 | 1.56 | 1.41 | 1.56 | 1.51 |
| γ 180.0 | 1.52 | 1.52 | 1.52 | 1.52 |