

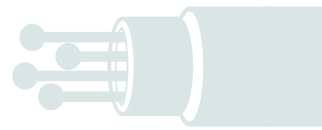
Main characteristics

- Singlemode over the whole wavelength range
- Standard and PM versions

Applications

Singlemode light delivery

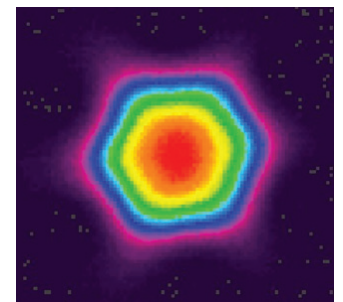
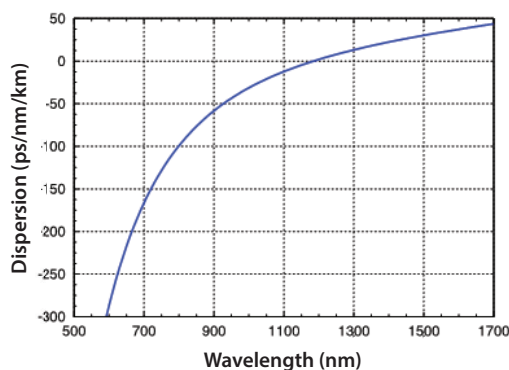
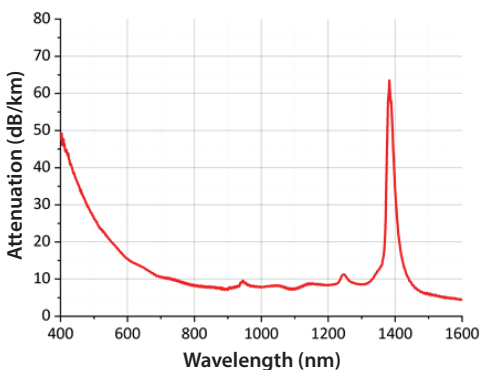
Those fibers display an endlessly single mode behavior and do not exhibit a high order mode cut off. They are therefore ideally suited for excellent mode delivery in the visible and above.



Fibre specifications

| Fibre type | ESM-5-125 | ESM-5-125-PM | ESM-10-125 | ESM-10-225-PM |
|---|-------------------------------|--------------|-------------|---------------|
| Optical parameters | | | | |
| Numerical Aperture @ 1064 nm | 0.20+/-0.01 | 0.20+/-0.01 | 0.1+/-0.02 | 0.1+/-0.02 |
| LP ₁₁ cut-off wavelength (nm) | None | | | |
| Background loss @ 532 nm (dB/km) | < 50 | < 38 | <40 | <38 |
| Background loss @ 1060 nm (dB/km) | < 18 | < 19 | <12 | <15 |
| Background loss @ 1550 nm (dB/km) | < 15 | < 29 | <5 | <10 |
| Mode Field Diameter @ 1064 nm (μm) | 4.3 +/- 0.2 | 4.5 +/- 0.2 | 8.8 +/-0.4 | 8.7 +/-0.4 |
| Effective Area @ 1064 nm (μm ²) | 12.6 +/- 0.1 | 15.1 +/- 0.1 | 56.5 +/-0.2 | 55.6 +/-0.2 |
| Physical/Material parameters | | | | |
| Material | F300 Silica | | | |
| Core Diameter (μm) | 4.8 +/- 0.1 | 5.1 +/- 0.1 | 10 +/-0.1 | 9.1 +/-0.5 |
| Cladding Diameter (μm) | 125 +/- 2 | 124 +/- 2 | 125 +/- 5 | 225 +/- 5 |
| Coating Outside Diameter (μm) | 246 +/- 10 | 240 +/- 10 | 250 +/-10 | 355 +/- 10 |
| Coating Type | Dual coat high index acrylate | | | |

Typical measured attenuation and dispersion



Measured fundamental mode shape of the ESM-5-125-PM @ 532 nm

