

Singlemode G.657.A1&A2 200 µm

Fibre type	G.657.A1 200µm	G.657.A2 200µm
OPK code	200A1	200A2
Core	Germanium doped silica	
Cladding	Silica, step index and matched clad type	
Coating	Dual layers of UV-cured acrylate	
Optical Characteristics		
Attenuation coefficient Loose tube Cables (typical / max.) ^(1,2)		
at 1310 nm	0.32 / 0.36 dB/km	
at 1550 nm	0.19 / 0.24 dB/km	
at 1625 nm	0.22 / 0.26 dB/km	
Attenuation coefficient Tight Buffered Cables (typical / max.) ^(1,2)		
at 1310 nm	0.35 / 0.40 dB/km	
at 1550 nm	0.25 / 0.40 dB/km	
Attenuation discontinuity ⁽²⁾	≤ 0.1 dB	
Cable cut-off wavelength [λcc]	≤ 1260 nm	
Zero dispersion wavelength	1302–1324 nm	1300–1324 nm
Zero dispersion slope [ps/(nm ² /km)]	≤ 0.092 ps/(nm.km)	
Chromatic dispersion at 1285 ~ 1330 nm	≤ 3.5 ps/(nm.km)	
Chromatic dispersion at 1550 nm	≤ 18.0 ps/(nm.km)	
Maximum individual fiber PMD	≤ 0.1 ps/√km	
Fiber PMD link value	≤ 0.06 ps/√km	
Effective group index of refraction at 1310 nm	1.467	
Effective group index of refraction at 1550 nm	1.468	
Backscatter coefficient at 1310 nm	-79.2 dB	
Backscatter coefficient at 1550 nm	-81.7 dB	
Backscatter coefficient at 1625 nm	-82.5 dB	
Geometrical Characteristics		
Mode field diameter at 1310 nm	8.9 ± 0.4 µm	8.6 ± 0.4 µm
Mode field diameter at 1550 nm	10.1 ± 0.4 µm	9.8 ± 0.4 µm
Core/Cladding concentricity error	≤ 0.5 µm	
Cladding diameter	125.0 ± 0.7 µm	
Cladding non-circularity	≤ 0.7 %	
Primary coating diameter (uncoloured fibre)	185 ± 10 µm	190 ± 10 µm
Primary coating diameter (coloured fibre)	190 ± 10 µm	200 ± 10 µm
Fibre curl radius	≥ 4.0 m	
Coating-Cladding concentricity	≤ 12 µm	
Macrobending loss		
10 turns, mandrel radius 15 mm at 1550 nm	≤ 0.25 dB	≤ 0.03 dB
10 turns, mandrel radius 15 mm at 1625 nm	≤ 1.0 dB	≤ 0.1 dB
1 turn, mandrel radius 7.5 mm at 1550 nm		≤ 0.5 dB
1 turn, mandrel radius 7.5 mm at 1625 nm		≤ 1.0 dB
1 turn, mandrel radius 10 mm at 1550 nm	≤ 0.75 dB	≤ 0.1 dB
1 turn, mandrel radius 10 mm at 1625 nm	≤ 1.5 dB	≤ 0.2 dB
Mechanical Characteristics		
Proof test level	≥ 100 kpsi (1.0% strain)	
Coating strip force	0.5 ~ 8.9 N	1.3 ~ 8.9 N
Dynamic fatigue resistance parameter		≥ 20

(1) Unless stated otherwise directly in the cable specification

(2) Cabled fibre

- Typical attenuation is the value measured for at least 90% of the fibers in the cable.
- OTDR measurement values can only be guaranteed for cable lengths of 1000 m and more.
- Cable on the reel may show a discontinuity of the OTDR curve caused by winding of the cable on the reel.
- The above values apply, unless otherwise stated directly in the cable specification