ASU Fiber Cable Mini ADSS 12 Core

Variants

9mm 100 SPAN 9mm 150 SPAN 8mm 100SPAN

Details

The **12 Core ASU Outdoor Optical Fiber Cable** is a self-supporting aerial fiber optic cable designed for **FTTH, FTTx, ISP access networks, telecom distribution networks, enterprise backbone, CCTV fiber networks, and rural broadband deployment**.

This cable uses **ITU-T G.652D single mode optical fiber**, dual FRP strength members, PBT loose tube, filling compound water-blocking protection, aramid yarn reinforcement, and black PE outer sheath. It is suitable for **100 meter and 150 meter span outdoor aerial installation**.

Fiber Count	**12 Core**
Fiber Type	**G.652D**

Span

100M / 150M

Cable Diameter

9.0mm

Key Features

? 12 Core ITU-T G.652D Single Mode Fiber

? Self-Supporting ASU Outdoor Aerial Cable Design

? Suitable for 100M / 150M Span Installation

? Dual FRP Strength Member for Mechanical Support

? PBT Loose Tube with Filling Compound

? Aramid Yarn Reinforcement for Tensile Strength

? Black PE Outer Sheath for Outdoor Protection

? Low Attenuation for Long-Distance Optical Transmission

Fiber and Loose Tube Color Code

No.	Color	No.	Color
1	Blue	7	Red

No.	Color	No.	Color
2	Orange	8	Black
3	Green	9	Yellow
4	Brown	10	Violet
5	Grey	11	Pink
6	Natural	12	Aqua

ASU Structure and Specification Details

Parameter	Specification
No. of Fibers	12
Fiber Type	G.652D Single Mode Fiber
Span	100M / 150M
Strength Member	FRP, Diameter: 2.3mm × 2
Loose Tube	PBT, Diameter: 2.1mm
Water Blocking Layer	Filling Compound
Aramid Yarn	14 × 1670 Dtex
Outer Sheath	PE, Black
Cable Diameter	9.0mm ±0.2mm
Attenuation @1310nm	? 0.35 dB/km

Parameter	Specification
Attenuation @1550nm	? 0.21 dB/km
Ice Thickness	10mm
Wind Speed	20 m/s
Crush Resistance	Short / Long: ?1000 / ?300 N/100mm
Minimum Bending Radius	No Tension: 10× Cable Diameter / Max Tension: 20× Cable Diameter
Installation Temperature	-20°C to +60°C
Transport & Storage Temperature	-40°C to +70°C

Note: Mechanical sizes are nominal values and may vary slightly based on production and customer requirements.

Main Technical Specification of Optical Fiber (G.652D)

Category	Description	Before Cable
Attenuation	@1310nm	?0.35 dB/km
Attenuation	@1383nm	?0.35 dB/km
Attenuation	@1550nm	?0.20 dB/km
Attenuation	@1625nm	?0.24 dB/km

Category	Description	Before Cable
Attenuation Discontinuity	-	?0.05 dB
Attenuation vs. Wavelength	@1285–1330nm / @1525–1575nm	?0.05 dB/km
Zero Dispersion Wavelength	-	1300–1324 nm
Zero Dispersion Slope	-	?0.092 ps/(nm
Dispersion	@1310nm / @1550nm	?3.5 / ?18 ps/n
PMD	Polarization Mode Dispersion	?0.2 ps/?km
Cutoff Wavelength	?cc	?1260 nm
Effective Group Index	@1310nm / @1550nm	1.4675 / 1.468
Macro Bend Loss	30mm radius, 100 turns @1625nm	?0.1 dB

Geometrical Specifications

Parameter	Value
Mode Field Diameter @1310nm	9.2 ± 0.6 ?m
Mode Field Diameter @1550nm	10.4 ± 0.8 ?m
Cladding Diameter	125 ± 1 ?m
Cladding Non-Circularity	?1.0%

Parameter	Value
Coating Diameter	245 ± 7 ?m
Coating / Cladding Concentricity Error	?8 ?m
Core / Cladding Concentricity Error	?0.8 ?m

Mechanical Specifications

Proof Test Level	?1.0%
Fiber Curl Radius	?4.0 m
Peak Coating Strip Force	1.3 – 8.9 N

Packing and Marking

Item	Description
Standard Packing Length	5km per wooden drum
Packing Length Option	As per customer requirement
Drum Marking	As per customer requirement / standard drum marking

Applications

FTTH Outdoor Network

ISP Access Network

Telecom Distribution Network

Aerial Fiber Deployment

Enterprise Fiber Backbone

CCTV Fiber Network

Rural Broadband Network

Utility Fiber Communication

Why Choose D-TECH ASU Fiber Cable?

D-TECH supplies high-quality outdoor optical fiber cables for ISPs, telecom operators, government projects, hydropower projects, CCTV networks, and enterprise fiber deployments across Nepal. Our ASU cables are selected for low transmission loss, stable outdoor performance, and reliable aerial installation.