

96 F SM G657 A1 ARMOURED OPTICAL FIBRE CABLE

1. FIBRE PROPERTIES

A. FIBRE TYPE	:	Single Mode G657A1
B. ATTENUATION @ 1310 nm	:	≤ 0.34 dB/Km
@ 1550 nm	:	≤ 0.20 dB/Km
@ 1625 nm	:	≤ 0.22 dB/Km
C. CABLE CUT-OFF WAVELENGTH	:	≤ 1260 nm
D. MODE FIELD DIAMETER @ 1310 nm	:	9.2 ± 0.4 μm
@ 1550 nm	:	10.3 ± 0.5 μm
E. CLAD DIAMETER	:	125 ± 0.7 μm
F. CORE CLAD CONCENTRICITY ERROR	:	≤ 0.50 μm
G. CLAD NON-CIRCULARITY	:	≤ 0.7%
H. COATING DIAMETER- Uncoloured	:	245 ± 5 μm
I. CHROMATIC DISPERSION	:	
Between 1270-1340 nm	:	≤ 5.3 ps/nm.km
1285-1330 nm	:	≤ 3.5 ps/nm.km
@ 1550 nm	:	≤ 18.0 ps/nm.km
@ 1625 nm	:	≤ 22.0 ps/nm.km
J. ZERO DISPERSION WAVELENGTH	:	1300-1324 nm
K. ZERO DISPERSION SLOPE	:	≤ 0.092 ps/nm ² .Km
L. POLARISATION MODE DISPERSION	:	≤ 0.1 ps/root km

2. MECHANICAL & ENVIRONMENTAL PROPERTIES

A. TENSILE STRENGTH	:	9.81 X 1.3 X W at 0.25% fiber strain
B. CRUSH RESISTANCE	:	4000 Newton/100 mm
C. MINIMUM BENDING RADIUS	:	20 x D
D. TORSION	:	+/- 180 Degree
E. IMPACT	:	50 N, Height 0.5 Meter
D. MAX. OPERATING/ INSTALLATION TEMPERATURE	:	- 30 °C to + 70 °C

3. PHYSICAL & DIMENSIONS PROPERTIES

NO. OF FIBRES	96F
FIBRE COLOUR IN LOOSE TUBE	BLUE, ORANGE, GREEN, BROWN, GREY, WHITE, RED, BLACK, YELLOW, VIOLET, PINK & AQUA
LOOSE TUBE COLUR & SEQUENCE	BLUE, ORANGE, GREEN, BROWN, GREY, WHITE, RED & BLACK
DIAMETER OF FRP ROD	2.5 ± 0.1 mm
PE COATED ROD DIAMETER	3.5 mm
DIAMETER OF LOOSE TUBE	1.5/ 2.1 ± 0.1 mm
OUTER SHEATH THICKNESS	1.6 mm Minimum
MATERIAL & COLOUR	BLACK UV STABILISED HDPE
MARKING ON OUTER SHEATH	HDPE- WHITE-1 STRIPE
IDENTIFICATION	TAPE
MOISTURE BARRIER	WATER SWELLABLE YARN
CORE WRAPPING	WATER SWELLABLE TAPE
ARMOURING	CORRUGATED STEEL TAPE ARMOUR- ECCS TAPE
RIP CORDS	2 NOS POLYESTER
CABLE DIAMETER	13.2 ± 0.5 mm
WEIGHT OF CABLE	160 ± 10%
PRINTING ON CABLE	AS PER CUSTOMER REQUIREMENT
STANDARD LENGTH	2 Km ± 10% & 10% non standard length more than 500 meters

CROSS SECTIONAL DIAGRAM

