

## Flyaway 1.9m

### FLY-190-M/F-xx-E

The **Temix FLY-190-M/F-xx-E 1.9m Flyaway Antenna** is designed for the lightest portable worldwide transmit operations in **Single, Dual, Tri or Quad-Bands**.

This antenna system, with Manual or Full Motion drive system, consists of a Segmented Carbon Fiber reflector and a robust aluminium tripod base mount that results in a high performance rigid antenna especially suited for hard environmental conditions.



- **Assembling "100% Tools Free".**
- **Set-up Time in less than 10 minutes.**

The unique shape and the accurate reflector surface provide good sidelobe and cross polarization performance. Repeatability is maintained with precision registration of the 9 reflector segments and the feed support structure. All the models are provided with a 2-Port Feed as a standard. In Dual and Tri-Band configuration the Feeds are interchangeable on field, fast and No-Tools.

#### Fully 3-Axes Autopointing System:

the 190cm Full Motion Flyaway is fully motorized and together with the Antenna Control Unit can automatically perform the satellite Autopointing including Stow & Deploy, Peaking and Tracking (Step-Track), Inclined Orbit satellites Tracking; includes GPS & Inclinometer, Angle Transducers and Hardware Limit Switches.



#### Manual Drive System:

a pointing support tool allows a reliable and secure pointing in any condition, with simple operations through an handheld touch screen terminal (ASAC200). It integrates built-in GPS, Compass, Inclinometer, DVB-S Receiver and a Processor Module providing all the necessary instruction to drive manually the Flyaway Antenna to acquire the selected satellite with no need of supplementary equipment.



#### Transit Cases:

all devices are packed into **three hardcases** (or four cases depending on additional feeds) constructed for aircraft transportation. The cases are lined with closed cell high density foam and the parts are custom fit and supported with the foam for extra protection.



Military or Standard HardCases

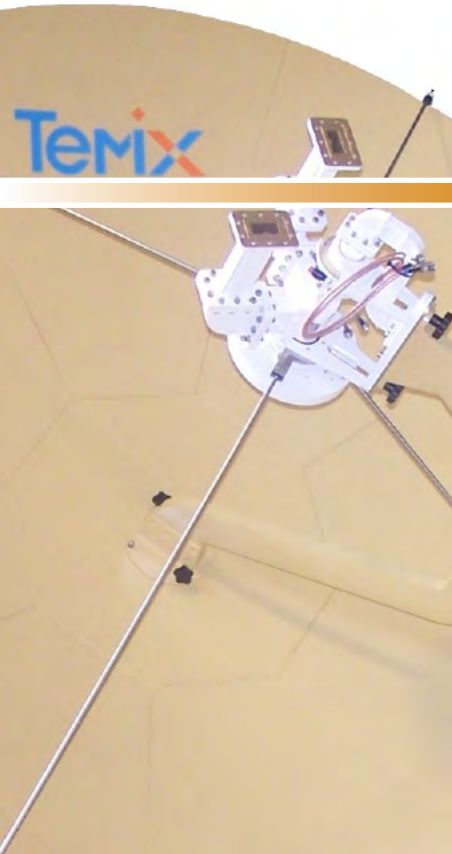
#### Main Features

- **Carbon Fiber Reflector**
  - Precision Surface
  - High Stiffness
- **Easy Deployment**
  - Optimized Weight matching best strength
  - Captive Hardware
  - Precision Alignment
- **High Performance**
  - Low Sidelobes
  - High E.I.R.P. Capability
- **Compliances:**
  - EESS-502, IESS-601E,
  - MIL-STD-188-164B
  - MIL-STD-810G

\*The Information included in this data sheet may be changed without advise. rev\_01/14

#### TEMIX Communication Engineering

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## FLY-190-M/F-xx-E

	C-Band	X-Band	Ku-Band	Ka-Band
Polarization	Circular / Linear	Circular	Linear	Circular / Linear
Frequency Range (GHz) - standard	Rx: 3.625-4.200 Tx: 5.850-6.425	Rx: 7.250-7.750 Tx: 7.900-8.400	Rx: 10.95-12.75 Tx: 13.75-14.50	Rx: 19.20-21.20 Tx: 29.00-31.00
Frequency Range (GHz) - optional	Rx: 4.500-4.800 Tx: 6.725-7.025 INSAT	////	Rx: 10.95-12.25 Tx: 12.75-14.50	Rx: 17.70-20.20 Tx: 27.50-30.00
Gain (mid band)	Rx: 36.0 dBi Tx: 40.0 dBi	Rx: 41.2 dBi Tx: 42.1 dBi	Rx: 45.1 dBi Tx: 46.6 dBi	Rx: 50.5 dBi Tx: 53.5 dBi
G/T (10° EL, Clear Sky)	17.6 dB/K (20°K LNB NT)	21.4 dB/K (55°K LNB NT)	25.4 dB/K (50°K LNB NT)	27.1 dB/K (100°K LNB)
Cross Pol Isolation	>30dB 1dB Contour	////	>35dB 1dB Contour	>35dB 1dB Contour
Axial Ration	< 1.3 standard < 1.09 optional	< 2dB	////	<0.75dB Commercial <0.50dB Military
Isolation Tx/Rx	85/35 dB	90/110 dB	90/35 dB	85/85 dB
Insertion Loss Tx/Rx	0.6/0.25 dB	0.9/0.45 dB	0.9/0.25 dB	0.9/0.4 dB
Return Loss Tx/Rx	> 17.0 dB typ (Rx/Tx)			
Physical:				
Feed Interfaces	Rx: WR229 Tx: WR137	Rx: WR112 Tx: CPR112	Rx: WR75 Tx: WR75	Rx: WR42 Tx: WR28
Optic Geometry	Center prime focus			
Mount Geometry	Elevation over Azimuth Tripod			
Travel Range				
Manual & Full Motion Drive	AZ: 360°; EL: 5° to 90°; POL: +/-110° (Linear Polarization) Continuous			
Drive Speed	2°/sec deploy; 0.2°/sec peaking (Adjustable)			
Controller	Advanced Satellite Acquisition Controller (for manual drive system) for pointing supporting or Antenna Control Unit for Fully Automatic Autopointing; Beacon Receiver optional.			
Environmental:				
Wind	Operational 60km/h (with ballasts or anchors) gusting to 80km/h; Survival 100km/h deployed (with ballasts or anchors); 130km/h stowed (EL 90°)			
Temperature	Operational -20°/50°C; Storage -30°/60°C; (optional: -32°/55°C Operational, -40°/70°C Storage)			
Humidity	100% Condensing			
Altitude	up to 5000m			
Colors	White RAL9010 gloss 5 (standard); Green, Desert or other colors optional			

### Other Features:

#### Transit Cases:

#### Weight & Dimensions

#1: 120x55x51cm, 55Kg (mount)

#2: 100x80x100cm, 48Kg (dish)

#3: 107x50x75cm, 44Kg (\*)

#4: 100x48x50cm, 32Kg (\*\*)

(\*) up to two feeds/feedarms

(\*\*) additional feeds (Tri/Quad-band)

#### Models Legenda:

xx=CC "C-Band Circ. Pol"

xx=CL "C-Band Lin. Pol"

xx=IC "INSAT Circ. Pol"

xx=IL "INSAT Lin. Pol"

xx=XC "X-Band Circ. Pol"

xx=KU "Ku-Band"

xx=AC "Ka-Band Circ. Pol"

xx=AL "Ka-Band Lin. Pol"

xx=EU "Extended Ku-Band"

M= Manual Drive

F= Full Motion Drive

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Option: Military or Standard Equipment FlightCases with shock absorbers, Rear I/O Interface Panel, Power Distribution Unit.



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