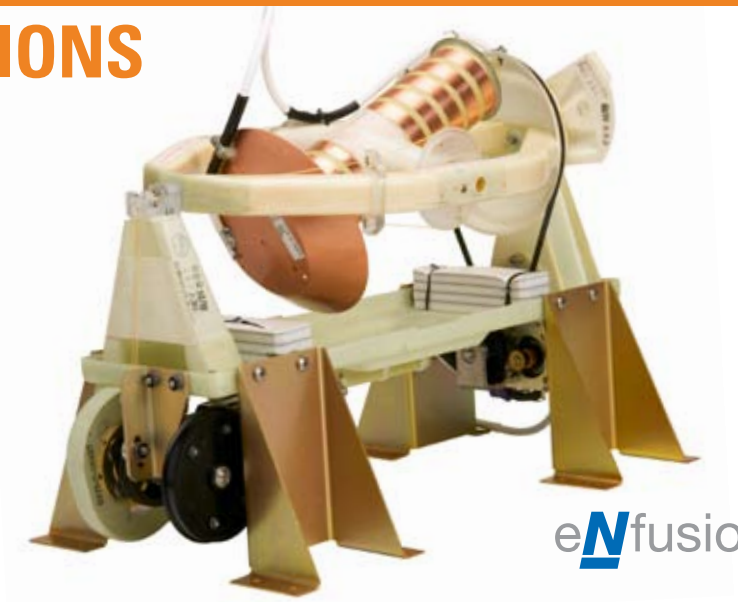
SPECIFICATIONS



THE ONLY ANTENNA
Meets Inmarsat PIM requirements for SwiftBroadband Today
ALREADY ASSESSED

eNfusion® **AMT-50**
Inmarsat high-gain antenna

Function

The eNfusion™ AMT-50 is a high-gain antenna used to receive and transmit voice and data from a moving aircraft via the Inmarsat satellite network. The antenna is Inmarsat **SwiftBroadband Class 6 assessed** and compatible with all ARINC 741 compliant satellite communications avionics.

Form Factor

The antenna receives and transmits signals to and from Inmarsat satellites—**from up to 10 degrees below horizon**.

An ARINC Type F Diplexer/Low Noise Amplifier (DLNA) provides an RF interface between the avionics and the antenna.

An Antenna Control Unit (ACU) steers the antenna using ARINC 741 antenna-pointing vectors received from avionics.

Aircraft specific radomes protect the antenna assembly and minimize drag forces.

Interfaces

Antenna Power/Control to ACU	EMS SATCOM Proprietary
Antenna RF Interface to DLNA	ARINC 741
DLNA Power/Control Interface	ARINC 741
Rx interface to/from avionics	ARINC 741
Tx interface from avionics	ARINC 741
ACU Power/Control Interface	EMS SATCOM Proprietary
Transmit Multi-Control (avionics)	ARINC 429
Receive BITE (avionics)	ARINC 429

Certification and Approvals

FAA Technical STD Order	TSO-C132
	Several aircraft specific STCs
RTCA	DO-160 Version C
	DO-160E (Environmental)
	DO-178B Level D (Software)
Inmarsat	SwiftBroadband Class 6 assessed
	Aero H/H+, Swift 64

Operation

Receive Frequency	1525.0 – 1559.0MHz
Transmit Frequency	1626.5 – 1660.5MHz
Power Supply	+28 Vdc
Low Angle RF Coverage	12 dBic min gain, 100% of coverage

Durability, Environmental Characteristics (DO-160)

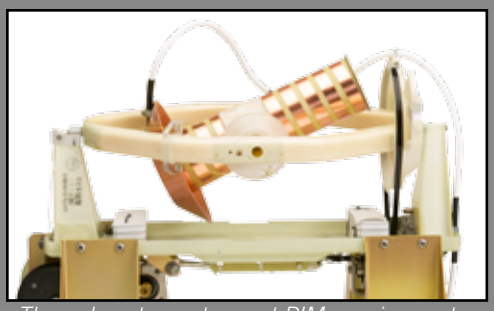
Maximum Altitude	Cat. F2 (70,000 Ft 21,336 M)
Minimum Altitude	none
Operational Temperature	Cat. F2 (-63°C to +71°C)
Cooling Requirements	none
Temperature Variation	Cat. B
Operational Shock	Cat. G
Vibration	Cat. E
Explosion Proofness	Cat. E1
RF Susceptibility	Cat. W
Lightning	Cat. A3 E3
Icing	Cat. B

Dimensions

Antenna Length	17.1"	43.43 cm
Antenna Height	13.5"	34.29 cm
Antenna Width	10.0"	25.40 cm
Antenna Weight	5.1 lbs.	2.31 kg
ACU Length	14.0"	35.56 cm
ACU Height	2.5"	6.35 cm
ACU Width	7.5"	19.05 cm
ACU Weight	6.8 lbs.	3.10 kg
Diplexer Length	11.1"	28.2 cm
Diplexer Height	2.0"	5.1 cm
Diplexer Width	7.8"	19.8 cm
Diplexer Weight	6.0 lbs.	2.7 kg

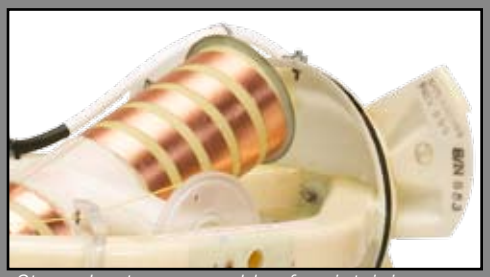
Mounting

In the vertical stabilizer or on the top of the fuselage
No special tools needed for installation



The only antenna to meet PIM requirements for Inmarsat Class 6 assessment

ARINC Type F control and interface to and from satellite communication avionics



Steered antenna capable of maintaining connection at 10° below horizon

ORDER

Call or email for prices and details regarding system capabilities and installations.
+1 800.600.9759 or +1 613.591.1043
or **getbroadband@emssatcom.com**

Part Numbers

AMT-50 HGA System Kit	0811-A-0010
Antenna Control Unit (ACU)	0811-A-0001
Type F DLNA	1242-A-0006
Antenna Assembly	0476-A-00377
Installation Kit	0811-K-0057
Radome	(Aircraft specific)

LEARN MORE

Additional Documents

Additional documents related to installation, maintenance, satellite network hardware and software—can be requested via email (getbroadband@emssatcom.com) or by phone.
+1 800.600.9759 or +1 613.591.1043

EMS SATCOM

ISO AS-9100

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