

The **SM3436-47** is a 3.4 to 3.6 GHz solid state GaAs FET amplifier designed for the 3.5 GHz Fixed Broadcast Wireless market. The amplifier provides 56 dB of linear gain and +47 dBm of output power at P1dB. The design provides linear performance for rigorous system requirements. The unit is available in modular form (standard), or as a rack mountable amplifier.

Features

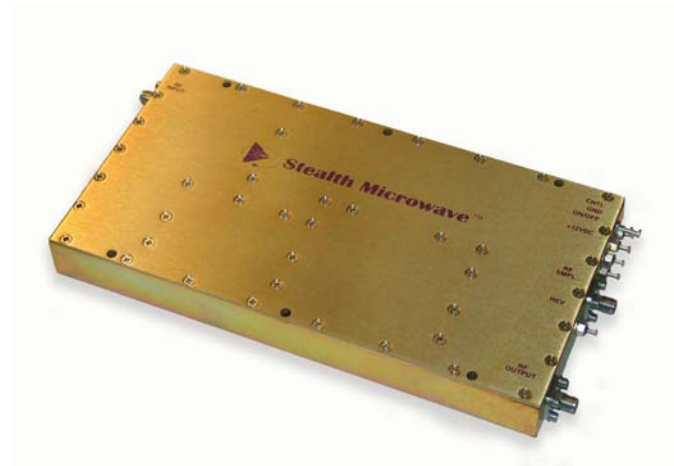
- Mis-Match Protected
- Single Power Supply
- Over Voltage Protection
- Thermal Protection with Auto Reset
- Temperature Compensation
- Integral Output Isolator

Options

- Forward/Reverse Power Detection
- RF Sampling
- Pulse Control up to 10μs for TDD with RF Isolation
- Logic On/Off Control
- Integral Heatsink

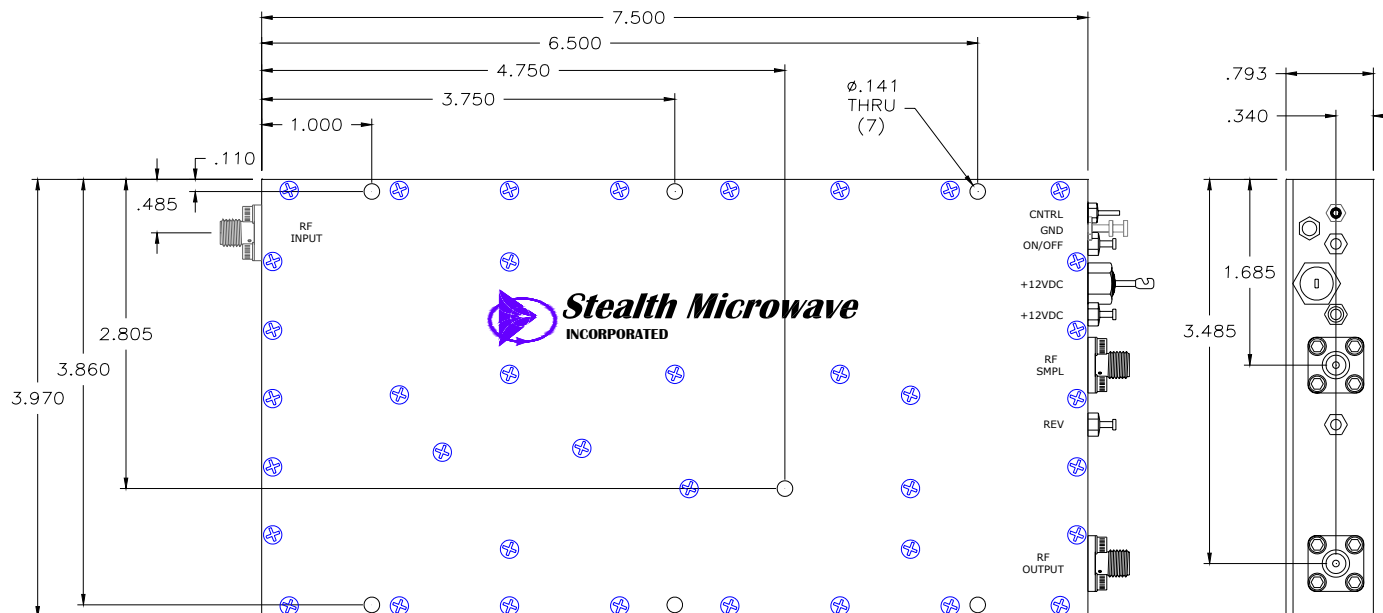
Configurations

- Module
- 19" Rack



Parameter	Specification
Frequency Range	3.4 – 3.6 GHz
Pout (P1dB)	+ 47 dBm (typ.)
Third Order Intercept Point	+ 58 dBm (typ.)
Linear Gain	56 dB ± 1 dB
Gain Flatness over Full Band	± .5 dB
Gain Change over Temperature	± .5 dB
Input/Output Return Loss	-14 dB /-18 dB (Output isolator available)
Power Supply	+ 12 Volts @ 15 Amperes (Varies per application)
Mechanical Dimensions (Without Heatsink) (With Heatsink)	7.5 x 4.0 x .79 inches 7.5 x 5.0 x 3.3 inches
RF Connectors	SMA Female
Operating Temperature	0°C to +55°C
Operating Humidity	95% Non-condensing
Operating Altitude	Up to 10,000 feet above Sea Level

DIMENSIONS IN INCHES



Pin	Description	Values
RF IN	Input Connector (SMA Female)	- 6 dBm, typical
RF OUT	Output Connector (SMA Female)	+47 dBm @P1dB
RF SAMPLE	Sample RF Port (SMA Female)	30 dBr
GND	Ground Turret	---
REV	Reverse Power Detector	∞ VSWR @ + 41 dBm \approx + 3.0 Volts
FWD	Forward Power Detector	+ 41 dBm Output Power \approx + 2.5 Volts
+12V	DC Input Voltage	+ 12 Volts @ 15 Amperes (typ.)
I/O	TTL Logic On/Off	0 Volts = Off, + 5 Volts = On
CNTL	Pulse Control	Switching Speed up to 100 kHz
THML ALRM	Thermal Alarm (Over Temperature)	0 Volts = No alarm, + 5 Volts = Alarm

Specifications subject to change without notice.