

PA 1000MPF HF Power Amplifier

The PA 1000MPF is a solid state, broadband power amplifier, designed to meet the new standards of software reprogrammable radios to satisfy the performance required in the use of HF radios in modern, digital communication systems.

The PA1000MPF has proven performance used as a standard RF amplification module with built-in pre-amplifier. The RF Amplifier/Power Supply is a self-contained unit suitable for tabletop or 19" rack installation.

Broadband RF amplification with the complete elimination of tunable elements gives the family's components the frequency agility characteristics required by ALE (Automatic Link Establishment) operation over the HF band.

The main features of the amplifier are:

- Built-in controller
- Built-in Pre-amplifier
- LCD monitor
- 2 -levels overheat protection
- Short/open output protection
- Continuous operational cycle at full output power
- High reliability in harsh environment



TECHNICAL SPECIFICATIONS

Frequency range:	1.5-30 MHz	VSWR	2:1 – 4:1
Output Power: in SSB mode	peak - 1000 W	Operation with unmatched load:	Output power is reduced,
in CW mode	average - 1000 W		650W at VSWR=2,
Gain:	42 dB		450W at VSWR =3,
Gain flatness in frequency range	±1 dB	Switching on time	330W at VSWR =4,
Input power level	18±3 dBm	Tx/Rx switching time	260W at VSWR =5, autonomous
Intermodulation	better than -32 dB (ref to any tone)	Rx/Tx switching time	protection at short or open output
Non-harmonic components:	better than - 70dB	Switching between any harmonic filters	3 s
S/n ratio:	more than 140 dB	Cooling system:	10 ms
Harmonic components:	better than - 60dB is provided with 8-bands switchable filter at frequency bands:	Over heat protection:	25 ms
	1,5-2,2 MHz	Primary Power:	2 ms
	2,2-3,2 MHz	Power consumption:	forced air cooling
	3,2-4,6 MHz	Duty cycle:	Cooling system automatic control,
	4,6-6,7 MHz	Operation temperature range	2-level protection.
	6,7-9,8 MHz	Dimensions:	90-250 VAC, 47-63Hz
	9,8-14,2 MHz	Weight:	Less than 3350 W
	14,2-20,6 MHz		Continuous, with forced air cooling
			-10 to +50 °C
			482(W) ×221(H) ×475(D) mm
			29 kg