

CBA250M-2500

10 KHz to 250 MHz 2500 Watt Class A Solid State Amplifier



This low frequency amplifier can be used in conjunction with other amplifiers from the Teseq range to cover the entire frequency range from 10 kHz to 40 GHz with convenient frequency break points allowing you to optimise the power level in each range.

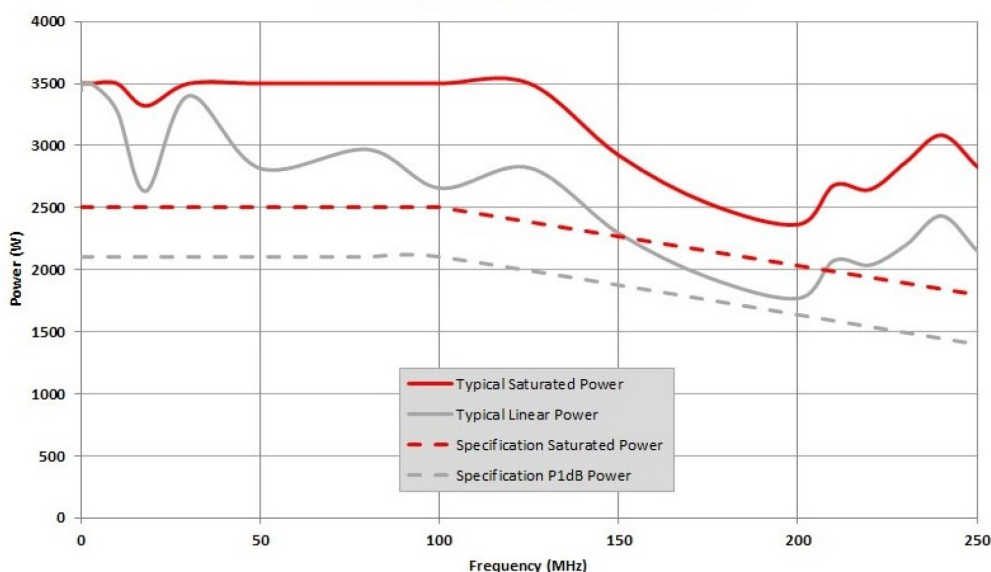
The Class A design ensures a high reliability, low distortion linear performance across the frequency range and is 100% mismatch tolerant without foldback up to 50% reflected power.

The unit is powered from a switched mode power supply for high efficiency, high power factor and wide voltage range operation. The unit is air-cooled with integral fans, and is protected against faulty cooling by excess temperature sensing. A safety interlock connector is provided, which the user can short circuit to ground, to put the amplifier into standby mode. Front panel indicators are provided to indicate over-temperature and rf interlock operation.

MAIN FEATURES

- Class A Operation
- Ideal for Low Frequency Tests Using Strip Line Devices
- Mismatch Tolerant & Unconditionally Stable
- USB, Ethernet and GPIB interface
- 3 Year Warranty

CBA 250-2500 Performance Data



Technical Specifications

Frequency Bands	Single Band
Frequency (min.) kHz	10 kHz
Frequency (max.) MHz	250 MHz
Psat	2500W (min), (10KHz-100MHz) de-rating from 2500W to 1900W (min) (100-250MHz)
P1dB	2100W (min), (10KHz-100MHz) de-rating from 2100W to 1400W (min) (100-250MHz)
Small Signal Gain	64 dB
Gain Variation (max) ±	+/- 3.0 dB
Harmonics @ 1000W	-20 dBc
Spurious (min.)	-70 dBc
3rd Order Intercept Point	10 dB > P1dB
Modulation Formats	AM, FM, Pulse
Maximum Input Power (no damage)	10 dBm
Output VSWR Tolerance	Infinite any phase (foldback @ 50% Reflected Power)
Stability	Unconditional
Output Impedance	50 Ohm
Input VSWR	2:1 (max)
Output VSWR	2:1 (typical)

General Specifications

Safety Interlock	2 x BNC, S/C and O/C to Mute
Supply Voltage	See, "Available Variants" chart below
Supply Frequency	47 to 63
Supply Power (typ.)	11 kVA
RF Input Connector	Type N female
RF Output Connector	Type 7/16 female
Com. Interface	GPIO, Ethernet & USB
Weight kg	291 kg
Dimensions	19 inch, 34U, 800mm (WxHxD)
Cooling System	Air Cooled, Self-contained

Available Variants

Product	Configuration	Item #
CBA250M-2500-004	Rear Panel RF Connectors, 3 Phase STAR, 5 Wire 380 to 415 VAC Line to Line + N	3-342421
CBA250M-2500-006	Rear Panel RF Connector, 3 Phase DELTA, 4 Wire 208 to 240 VAC Line to Line	3-342423