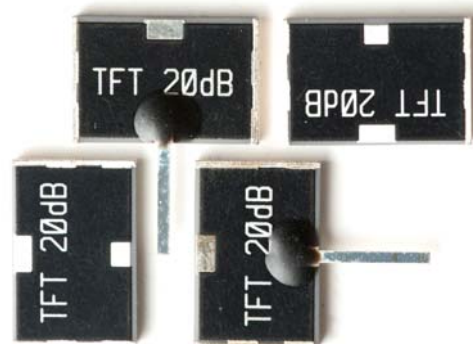




High Power Chip Attenuator - Product Resume

Application:

This high power product attenuates signals by a specific amount while withstanding powers up to hundreds of watts. It offers excellent attenuation and has the capability to dissipate high power while having robust life & reliability performance. These products can be used in base stations, radio links, test instruments, radar systems, etc. One common application is the suppression of reflected signals in isolators. Isolators utilizing this chip attenuator provide excellent decoupling of the load and generator in amplifier stages as well as reducing noise from other adjacent transmitters when multiple transmitters & receivers are connected to one antenna. One enduring feature is the excellent return loss characteristics on RF signals.



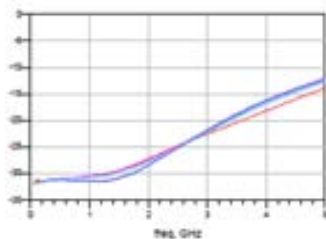
Available with and without tab

Functions:

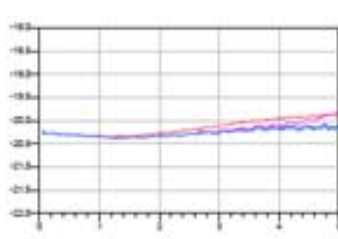
Attenuate signals in radio systems in order to prevent damage to receiver/transmitters devices. Offered with attenuation values of 20dB and 30dB.

Typical 20dB Performance Plots

Return Loss



Insertion Loss



20dB Electrical Characteristics:

Freq (GHz)	0-2.5	2.5-5.0
Impedance (Ω)	50	50
Insertion Loss (dB)	20	19.75
Return Loss (dB)	25	12.50
Max. Power (watts)	100	100

Note:

Transmitted signal through the product is attenuated, return signal is not attenuated but return loss is suppressed.

Significance:

This high power device is ideally suited for isolators as it provides up to 30 dB of attenuation through several GHz of frequency thus protecting active components in radio links.

Product Payback/ROI:

Evolving applications require attenuation of transmitted signals instead of terminating them. This chip power attenuator provides impedance matching to existing components in systems allowing for seamless integration while maintaining the cost performance of typical termination resistors. This product allows you to offer isolators with excellent impedance matching capability for RF signals.

Field Reports:

Thin Film Technology (TFT) has demonstrated very good frequency response performance with tight tolerances on impedance and DC resistance as well as offering high power dissipation. TFT utilizes high thermal conductive materials and design techniques to achieve superior power and attenuation characteristics.