

BRAVO

COMMUNICATIONS, INC.

GROUND TRANSIENT FILTER

BRAVO STOCK CODE: GTFB20

Product Specifications

DATE (DDMMYY):	28-1-05		TYPE	20 Amp Hard Wire
STATUS:	PRELIMINARY		MODEL	GTFB20
ENGINEER:	D WEAVER		REV.	01
MANAGER:	D WEAVER		PAGES	4

1 Introduction

This specification defines the performance characteristics of a ground transient filter designated as GTFB20.

2 Specification

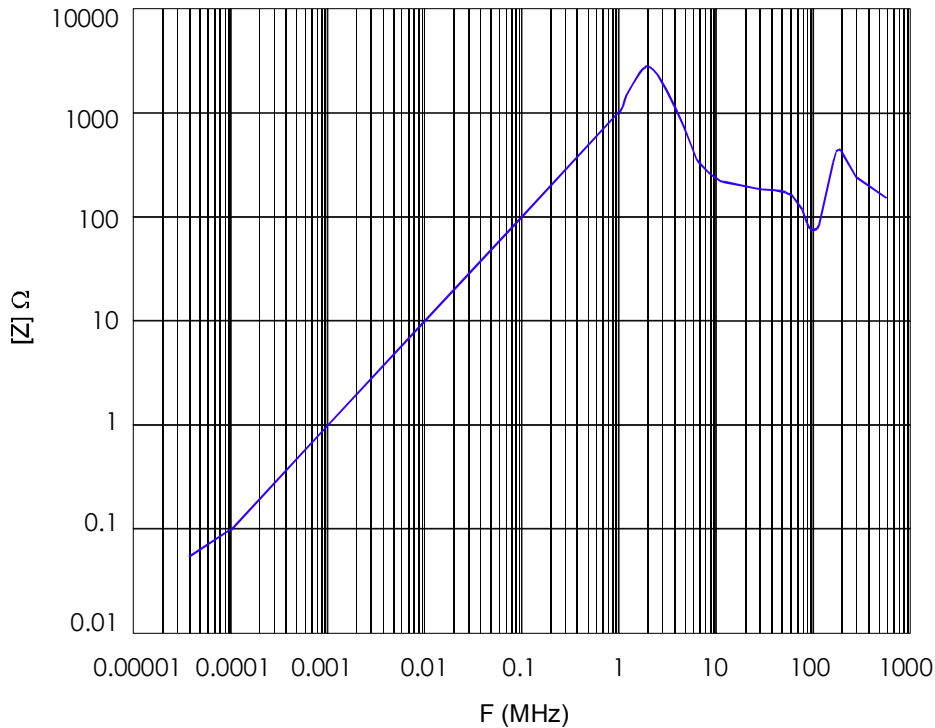
(see drawing, page 4)

3 Performance

3.1 Impedance

The following graph shows impedance measured over a frequency range from 40Hz to 600MHz. The Impedance should be less than 0.1 Ohm at the 60 Hz mains cycle and peak above 1MHz.

[Z] vs Freq.

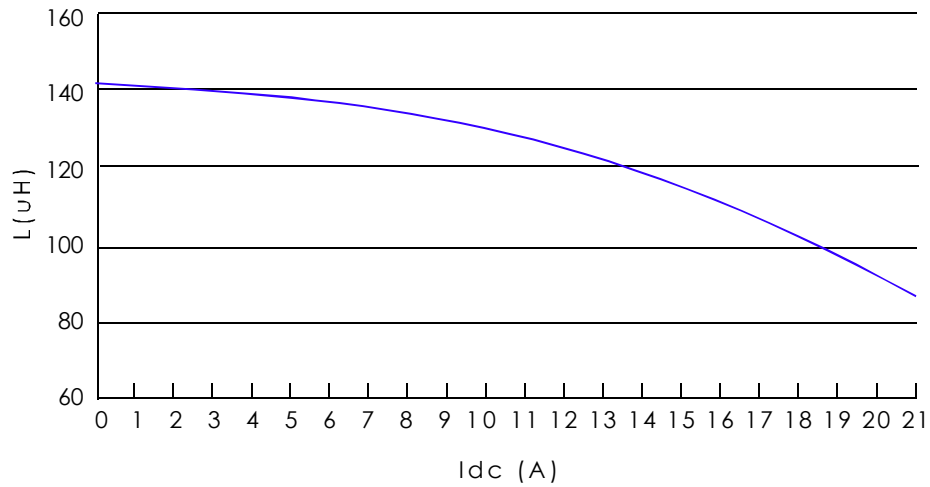


3.2 Inductance

3.2.1 L vs Current

The following progressive plot shows the effect of the current on the inductance value of the assembly. The device should operate safely up to 20A. The inductance should not decrease to less than 100uH with a 15A resistive load.

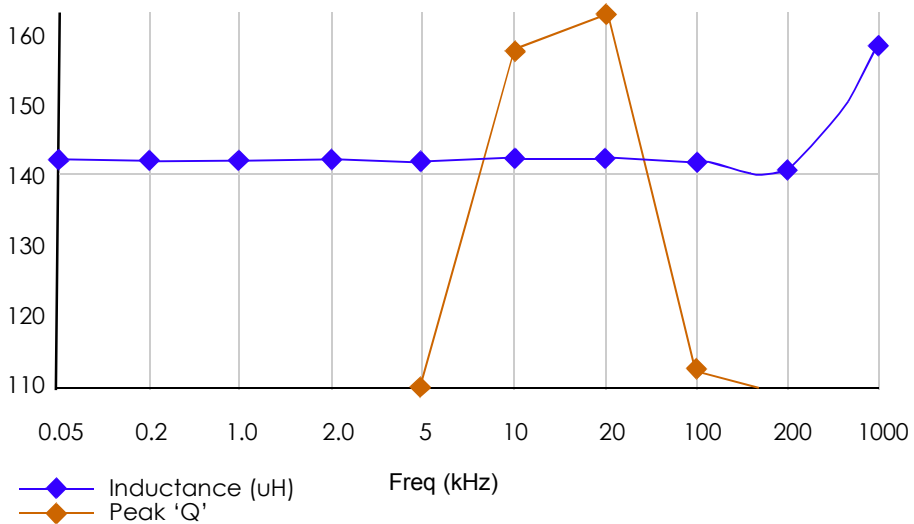
L vs I_{dc}



3.2.2 L vs Frequency

The following plot shows the effect of frequency on L and Q. A peak Q of >150 should be recorded between 20~100kHz.

L and Q vs Freq.



3.3 Construction

The continuous attenuator circuit is wound and configured using a 1.8mm solid copper conductor. The lead wires are 12AWG UL1015. All joins in the wire are made by mechanical in-line splices. Splice points are covered with Mylar tape prior to final assembly. When ground circuit is inserted into the case the whole assembly is potted using an epoxy 9001 A+B compound. The finished product is shown.

