



GROUND TRANSIENT FILTER WITH LINE CORD

BRAVO STOCK CODE: GTFC

Product Specifications

DATE (DDMMYY):	24-1-05		TYPE	10 Amp Line Cord
STATUS:	PRELIMINARY		MODEL	GTFC
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 GTFC, which is assembled as a 10 Amp rated line cord, which also includes common mode filtering on live and neutral lines.

2 Specification

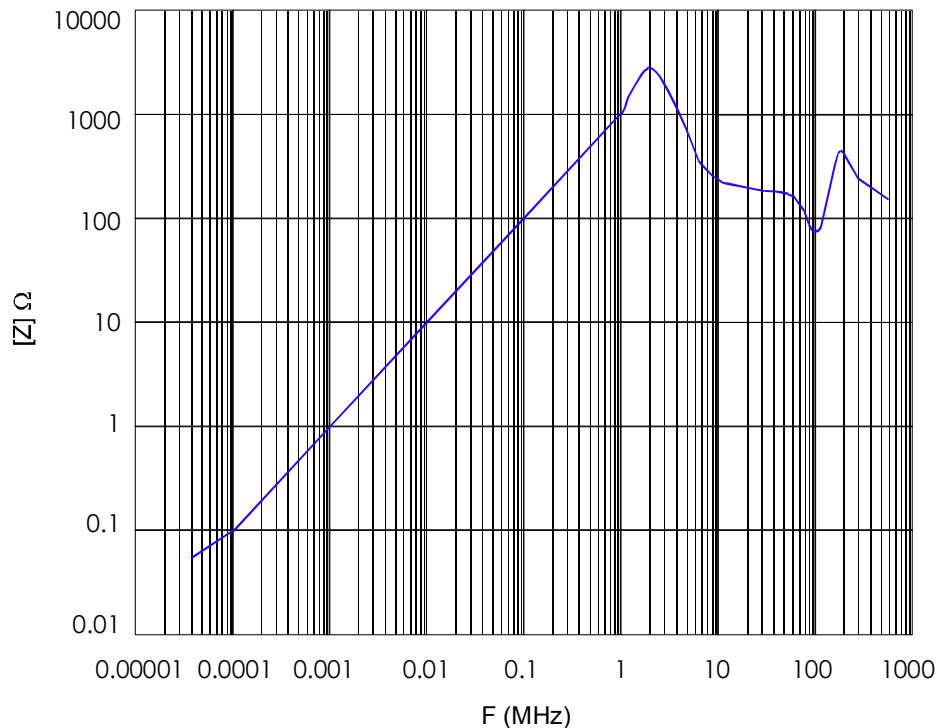
(see drawing, page 4)

3 Performance

3.1 Impedance (GROUND LINE)

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

Bravo Communications, Inc. • 3463 Meadowlands LN, San Jose, CA 95135 U.S.A. • PH: 408-297-8700 • Fax: 408-297-8701
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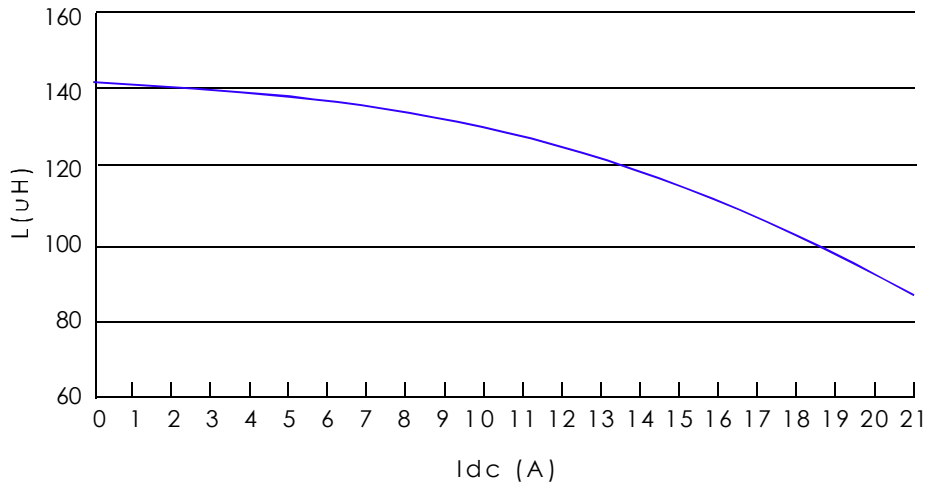
3.2.1 Common Inductance

The common inductance of Live and Neutral line is measured at 200uH. The common inductance will remain higher than the series ground inductance with maximum current applied.

3.2.2 L vs Current

The ground inductance is measured at 140uH. The following progressive plot shows the effect of the current on the inductance value of the assembly. The device should operate safely up to 10 Amps. The inductance should not decrease to less than 100uH with a 10 Amp resistive load.

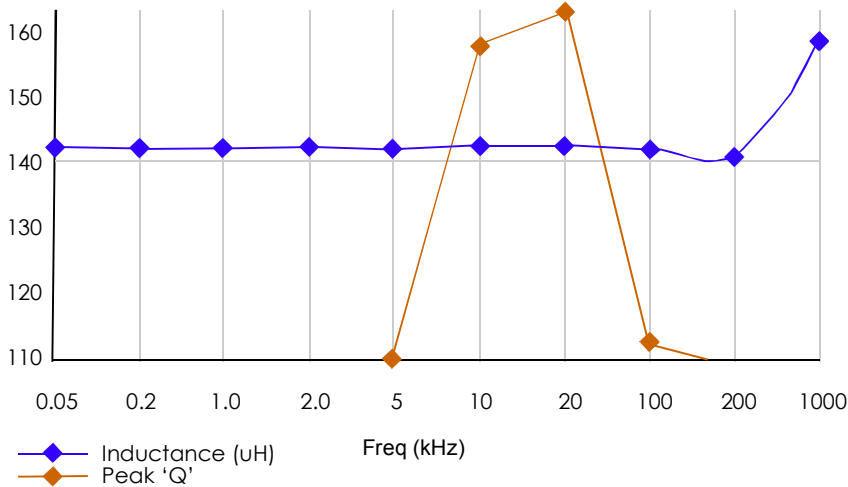
L vs Idc



3.2.2 L vs Frequency (GROUND LINE)

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 14AWG 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.

