On-Board Type (DC) EMI Suppression Filters (EMIFIL®)

Block Type EMIFIL® BNX Series

BNX Series

The block type "EMIFIL" BNX series incorporates through-type capacitor, monolithic chip capacitors and bead. The BNX is high performance for use in DC power circuits.

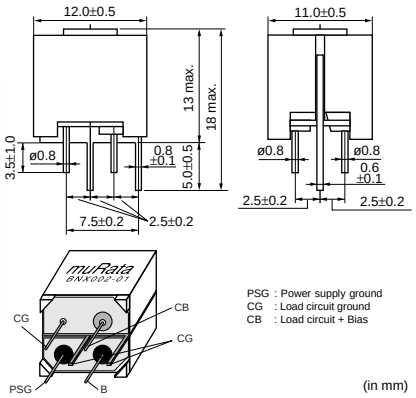
■ Features

1. The filter enables obtaining high insertion loss in wide frequency ranges from 0.5MHz to 1GHz.
2. The only one filter block enable noise suppression of both the positive and negative lines.
3. There are no connection routes in the current circuits, thus ensuring highly reliable performance.

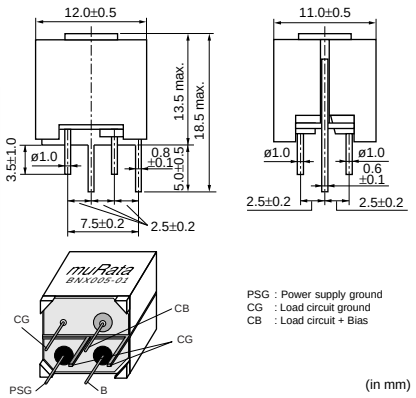
■ Applications

Noise elimination from DC power sources in a variety of switching power sources, engine control units, digital equipment and computer terminals.

BNX002/BNX003



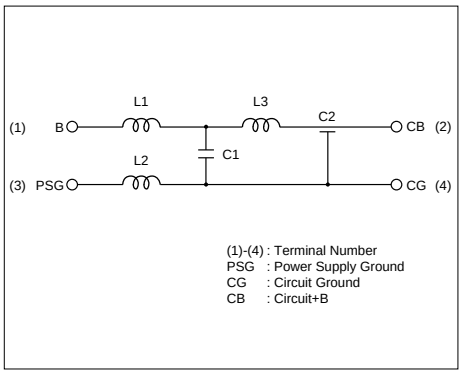
BNX005



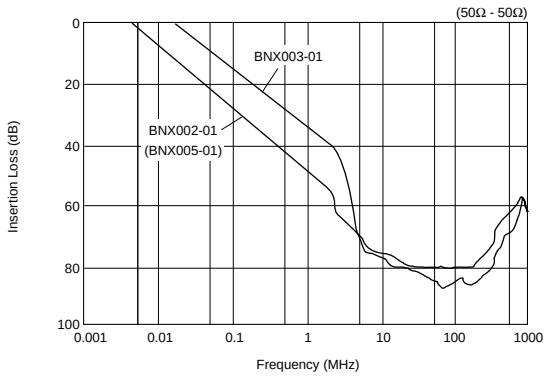
Part Number	Rated Voltage (Vdc)	Withstand Voltage (Vdc)	Rated Current (A)	Insulation Resistance (min.) (M ohm)	Insertion Loss
BNX002-01	50	125	10	100	1MHz to 1GHz:40dB min.(20 to 25°C line impedance=50 ohm)
BNX003-01	150	375	10	100	5MHz to 1GHz:40dB min.(20 to 25°C line impedance=50 ohm)
BNX005-01	50	125	15	100	1MHz to 1GHz:40dB min.(20 to 25°C line impedance=50 ohm)

Operating Temperature Range : -30°C to 85°C

■ Equivalent Circuit



■ Insertion Loss Characteristics (Typical)

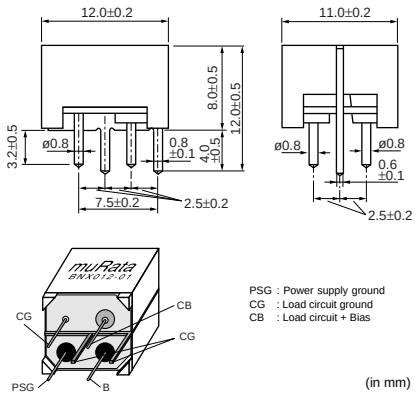


4

BNX Series Low Profile for Large Current

The block type "EMIFIL" BNX010 series is high performance and BNX series provide excellent noise suppression on DC power line.

BNX012



■ Features

1. High insertion loss characteristic over a wide frequency band range of 1MHz to 1GHz
2. Large rated current (15A) and Low Rdc (0.8m ohm-typ.)
3. Low profile (height: 8.0mm except lead terminal)

■ Application

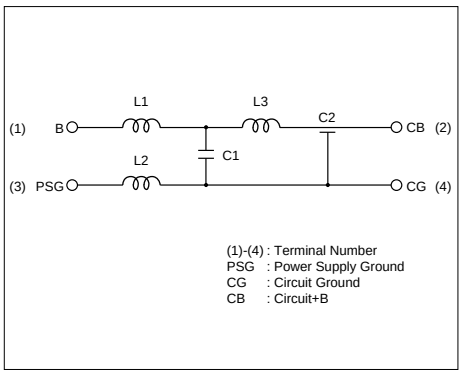
Noise suppression for DC power line of large screen display

1. PDP
2. LCD-TV

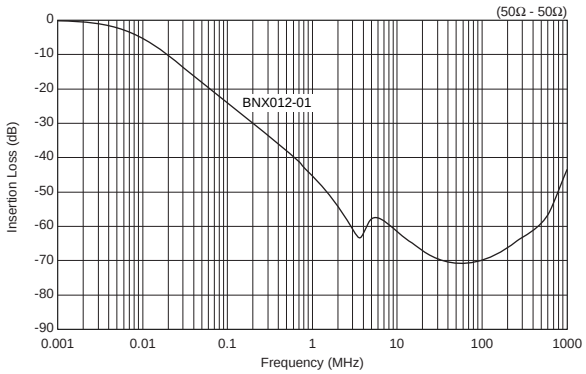
Part Number	Rated Voltage (Vdc)	Withstand Voltage (Vdc)	Rated Current (A)	Insulation Resistance (min.) (M ohm)	Insertion Loss
BNX012-01	50	125	15	500	1MHz to 1GHz:40dB min.(20 to 25°C line impedance=50 ohm)

Operating Temperature Range : -40°C to 125°C

■ Equivalent Circuit



■ Insertion Loss Characteristics (Typical)



■ Notice (Rating)

In operating temperatures exceeding +85°C, derating of current is necessary for BNX010 series. Please apply the derating curve shown below according to the operating temperature.