



# NATIONAL MAGNETICS GROUP, INC.

MANUFACTURERS OF MAGNETIC AND ADVANCED MATERIALS

AFFILIATE: TCI CERAMICS, INC.

## G3

### Material

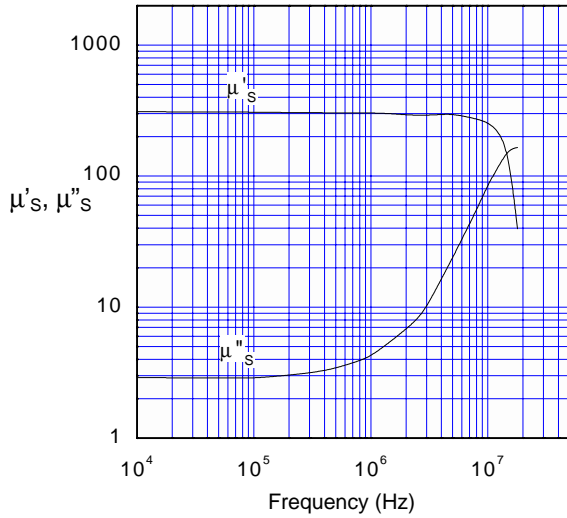
A NiZn ferrite of moderate initial permeability designed for low loss inductive applications for frequencies up to 10 MHz.

### Specifications

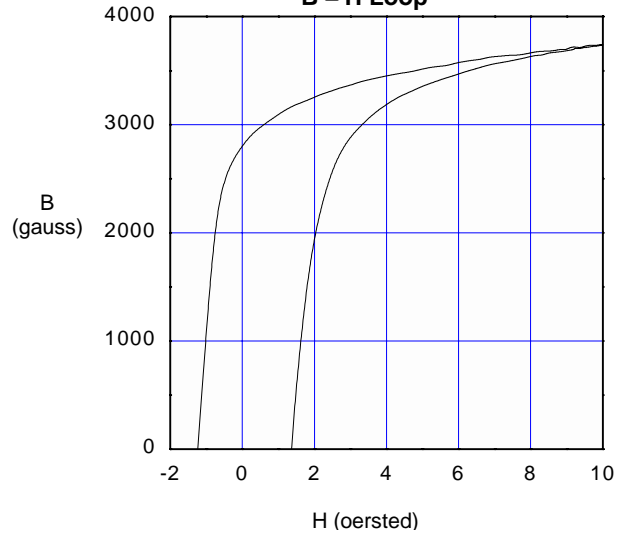
Property	Unit	Symbol	Standard Test Conditions	Value
Initial Permeability		$\mu_i$	Frequency=10 kHz; B<10 gauss	300 ± 20%
Saturation Flux Density	gauss	$B_s$	H =10 oersted	≈ 3750
Residual Flux Density	gauss	$B_r$		≈ 2800
Coercive Force	oersted	$H_c$		≈ 1.30
Loss Factor	$10^{-6}$	$\text{Tan}\delta/\mu_i$	Frequency=2.5 MHz; B=1 gauss	≤ 100
Temperature Coefficient of Initial Permeability (20-70°C)	%/°C			≤ 0.5
Volume Resistivity	$\Omega$ cm	$\rho$		≈ $1 \times 10^8$
Curie Temperature	°C	$T_c$		≥ 250

Note: values are typical and based on measurements of a standard toroid at 25 °C

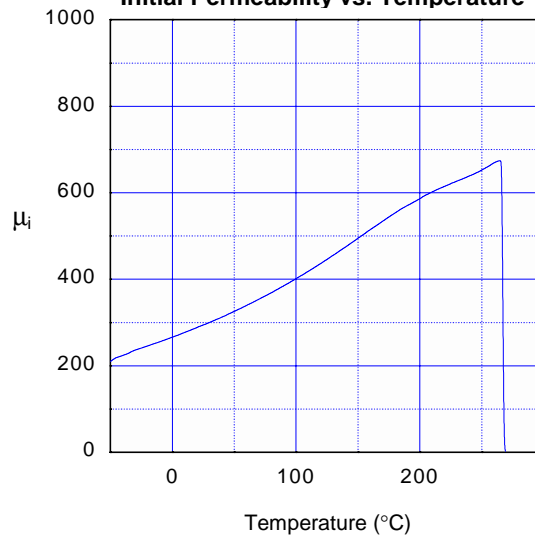
Complex Permeability vs. Frequency



B – H Loop



Initial Permeability vs. Temperature



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