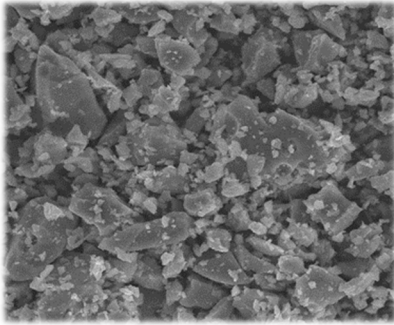


Soft magnetic ferrite material



Soft Ferrite Powder for Resin Compounding [FEROTOP™]

FEATURES

Soft ferrite powders for resin compounding “FEROTOP™” exhibit characteristics suitable for compounding with resins. They can be used to produce molded products with complex shapes.

CHARACTERISTICS

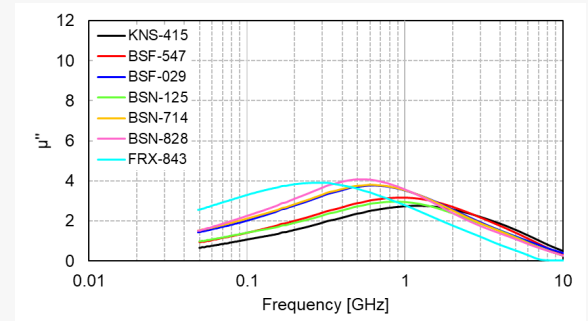
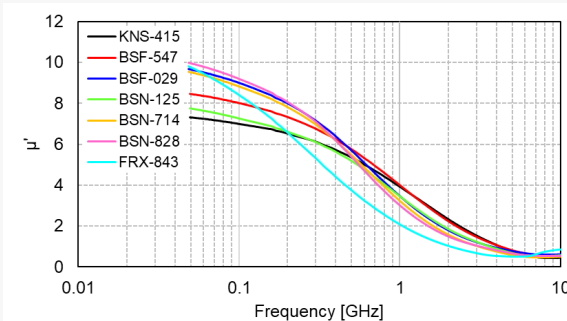
- 1 **Excellent resin kneading property**
These powders are filler materials with suitable properties for compounding.
- 2 **Various magnetic properties**
We supply soft ferrite powders with requested magnetic properties.

SPECIFICATIONS

[Typical specifications]

Type of soft ferrite				Mn-Zn ferrite			Ni-Zn ferrite			Mn-Mg-Zn ferrite
Product name				KNS-415	BSF-547	BSF-029	BSN-125	BSN-714	BSN-828	FRX-843
				Development	Released	Development	Development	Released	Released	Released
Powder properties	Compressed density	CD	g/cm ³	3.32	3.27	3.56	3.61	3.69	3.79	3.45
	Average particle size	Ps	μm	1.90	3.20	7.60	3.25	5.90	7.60	4.30
	Particle distribution	D10		0.9	1.9	9.8	1.6	3.3	11.5	4.6
		D50		4.9	9.6	71.5	10.0	29.7	80.9	108.7
	D90		16.6	30.8	183.7	34.0	83.1	201.3	256.5	
	Specific surface area	BET	m ² /g	1.38	0.68	0.14	0.76	0.42	0.26	0.31
	Water content	Fast method		0.12	0.11	0.09	0.09	0.03	0.05	0.09
JIS method		%	0.06	0.02	0.03	0.06	0.01	0.07	0.06	
Sieve residue	45μm		0.03	0.25	-	0.32	17.87	-	-	
	105μm	%	-	0.01	10.81	-	-	13.15	23.31	
Curie temperature	Tc	°C	-	238	-	-	230	222	154	
Electromagnetic properties	Saturation magnetization	4πIs	mT	332.0	336.0	358.0	293.0	301.0	312.0	205.0
			(G)	(3320)	(3360)	(3580)	(2930)	(3010)	(3120)	(2050)
	Coercivity	Hc	A/m	2870	1750	1270	2670	1970	1500	1370
			(Oe)	(36.1)	(22.0)	(16.0)	(33.6)	(24.8)	(18.8)	(17.2)
	Permeability	μ'	at 1MHz	10.7	13.3	26.8	13.3	19.8	26.1	25.9
Permittivity*	ε'	at 100MHz	22.6	24.6	25.9	6.9	6.8	6.6	6.4	
Electrical resistance	ρ	Ω · cm	10 ⁵	10 ³	10 ²	10 ⁹	10 ⁹	10 ⁸	10 ¹⁰	

※ Permittivity was measured at a sample of 60vol% magnetic powder kneaded with SEBS resin.



【Frequency dependance of permeability μ' and μ''】
(Measured at a sample of 60vol% magnetic powder kneaded with SEBS resin)

APPLICATIONS

- Magnetic shielding parts
- Electromagnetic wave absorber

