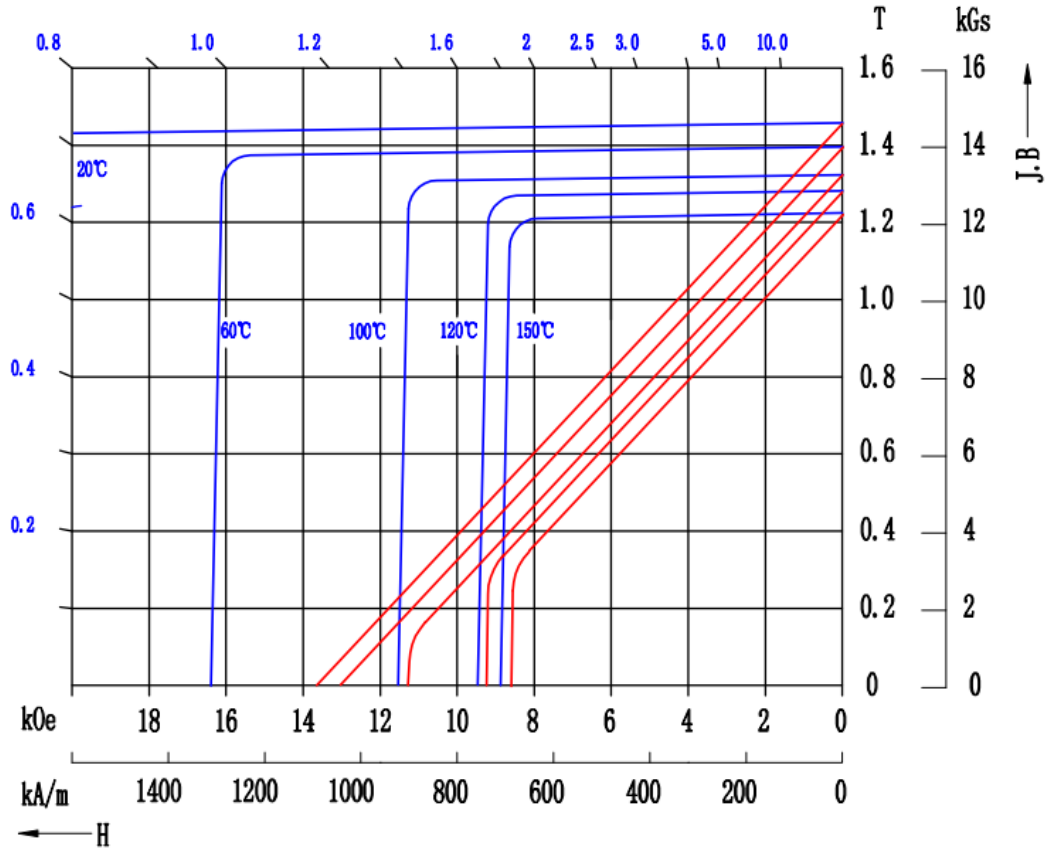




## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G52SH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.42~1.47
$B_r$	(kG)	14.2~14.7
Coercivity	[kA/m]	$\geq 1074$
$H_{cB}$	(kOe)	$\geq 13.5$
Intrinsic Coercivity	[kA/m]	$\geq 1592$
$H_{cJ}$	(kOe)	$\geq 20$
Maximum energy product	[kJ/m <sup>3</sup> ]	390~422
$(BH)_{max}$	(MGOe)	49~53
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.115
(RT - 100 °C)	$\alpha_{Hcj}$ [%/°C]	-0.62
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.125
(RT - 150 °C)	$\alpha_{Hcj}$ [%/°C]	-0.57
Maximum operating temp. *	°C	150
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

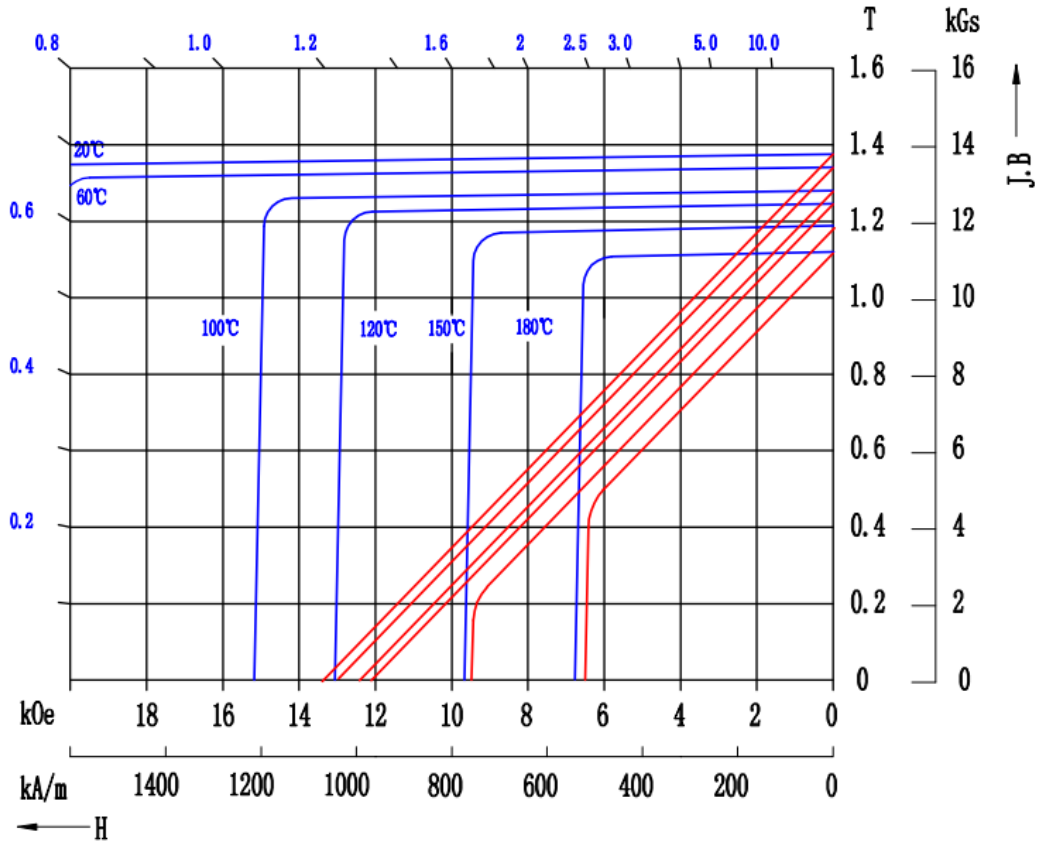
Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	310
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}^2/\text{m}$	1.25~1.55
Vickers Hardness	Hv	460~660
Thermal Expansion	$// (\times 10^{-6}/\text{K})$	6
Coefficient (100°C)	$\perp (\times 10^{-6}/\text{K})$	-1



## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G48UH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.37~1.42
$B_r$	(kG)	13.7~14.2
Coercivity	[kA/m]	$\geq 1035$
$H_{cB}$	(kOe)	$\geq 13$
Intrinsic Coercivity	[kA/m]	$\geq 1990$
$H_{cJ}$	(kOe)	$\geq 25$
Maximum energy product	[kJ/m <sup>3</sup> ]	358~390
$(BH)_{max}$	(MGOe)	45~49
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.10
(RT - 100 °C)	$\alpha_{HcJ}$ [%/°C]	-0.58
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.12
(RT - 180 °C)	$\alpha_{HcJ}$ [%/°C]	-0.52
Maximum operating temp. *	°C	180
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

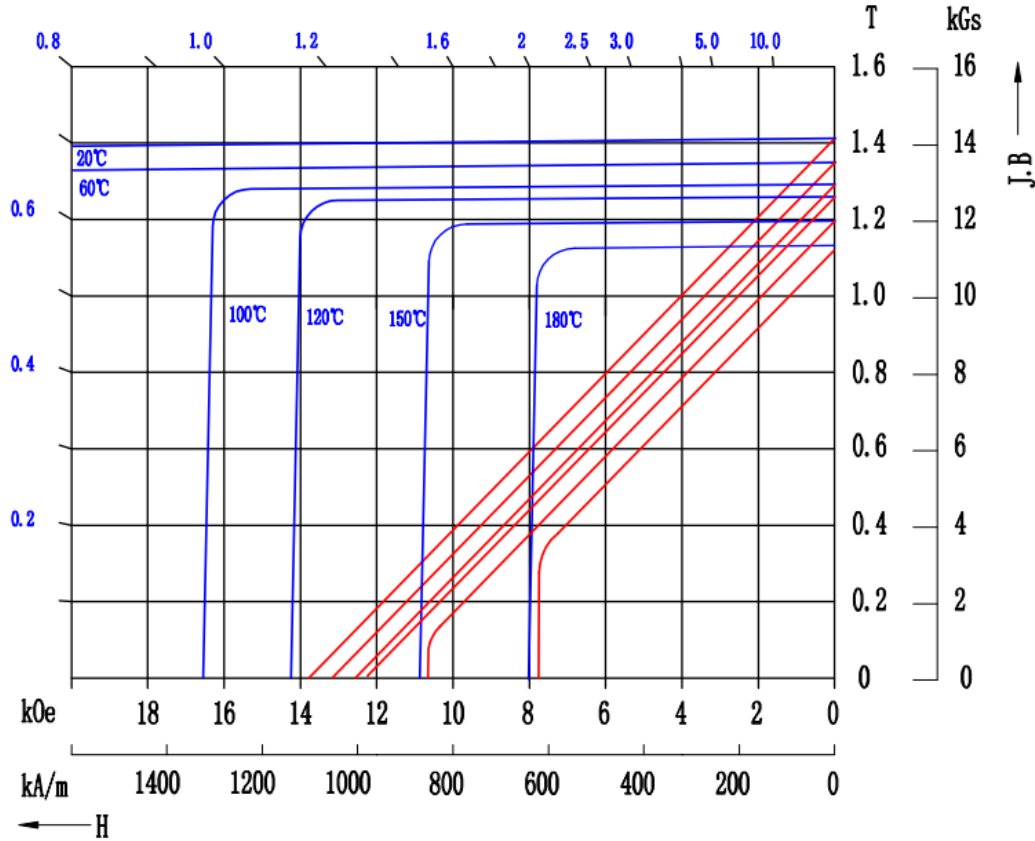
Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	330
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}$	1.25~1.55
Vickers Hardness	Hv	460~660
Thermal Expansion	$//(\times 10^{-6}/K)$	6
Coefficient (100°C)	$\perp(\times 10^{-6}/K)$	-1



## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G50UH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.39~1.44
$B_r$	(kG)	13.9~14.4
Coercivity	[kA/m]	$\geq 1050$
$H_{cB}$	(kOe)	$\geq 13.2$
Intrinsic Coercivity	[kA/m]	$\geq 1990$
$H_{cJ}$	(kOe)	$\geq 25$
Maximum energy product	[kJ/m <sup>3</sup> ]	374~406
$(BH)_{max}$	(MGOe)	47~51
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.115
(RT - 100 °C)	$\alpha_{Hcj}$ [%/°C]	-0.56
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.135
(RT - 180 °C)	$\alpha_{Hcj}$ [%/°C]	-0.48
Maximum operating temp. *	°C	180
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

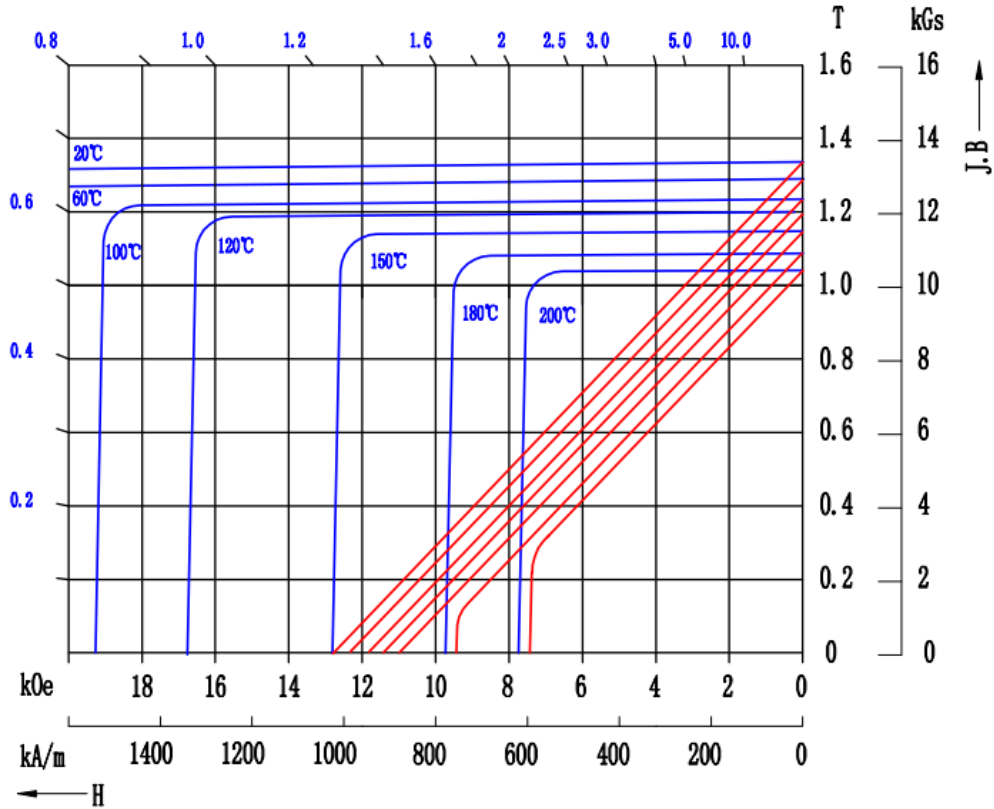
Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	330
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}$	1.25~1.55
Vickers Hardness	Hv	460~660
Thermal Expansion	$//(\times 10^{-6}/K)$	6
Coefficient (100°C)	$\perp(\times 10^{-6}/K)$	-1



## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G45EH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.32~1.36
$B_r$	(kG)	13.2~13.6
Coercivity	[kA/m]	$\geq 1003$
$H_{cB}$	(kOe)	$\geq 12.6$
Intrinsic Coercivity	[kA/m]	$\geq 2388$
$H_{cJ}$	(kOe)	$\geq 30$
Maximum energy product	[kJ/m <sup>3</sup> ]	342~366
$(BH)_{max}$	(MGOe)	43~46
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.11
(RT - 100 °C)	$\alpha_{Hcj}$ [%/°C]	-0.55
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.135
(RT - 200 °C)	$\alpha_{Hcj}$ [%/°C]	-0.46
Maximum operating temp. *	°C	200
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

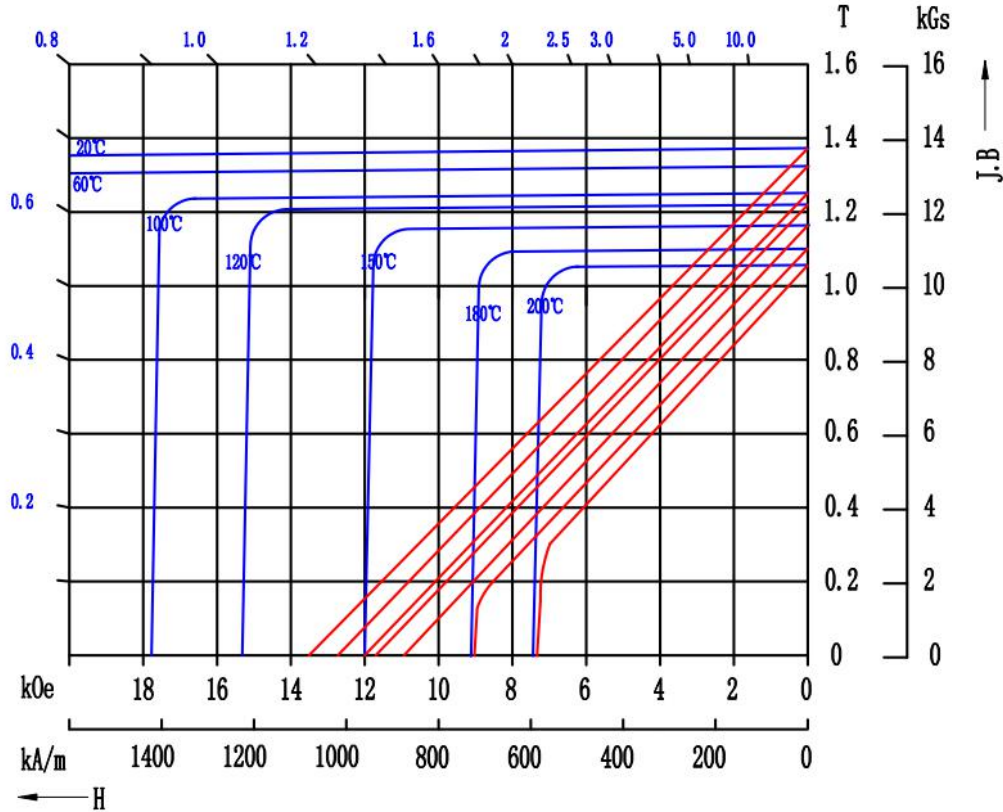
Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	330
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}^2/\text{m}$	1.25~1.55
Vickers Hardness	Hv	600~800
Thermal Expansion	$// (\times 10^{-6}/\text{K})$	6
Coefficient (100°C)	$\perp (\times 10^{-6}/\text{K})$	-1



## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G48EH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.37~1.42
$B_r$	(kG)	13.7~14.2
Coercivity	[kA/m]	$\geq 1035$
$H_{cB}$	(kOe)	$\geq 13$
Intrinsic Coercivity	[kA/m]	$\geq 2388$
$H_{cJ}$	(kOe)	$\geq 30$
Maximum energy product	[kJ/m <sup>3</sup> ]	358~390
$(BH)_{max}$	(MGOe)	45~49
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.109
(RT - 100°C)	$\alpha_{HcJ}$ [%/°C]	-0.5
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.125
(RT - 180°C)	$\alpha_{HcJ}$ [%/°C]	-0.44
Maximum operating temp. *	°C	200
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

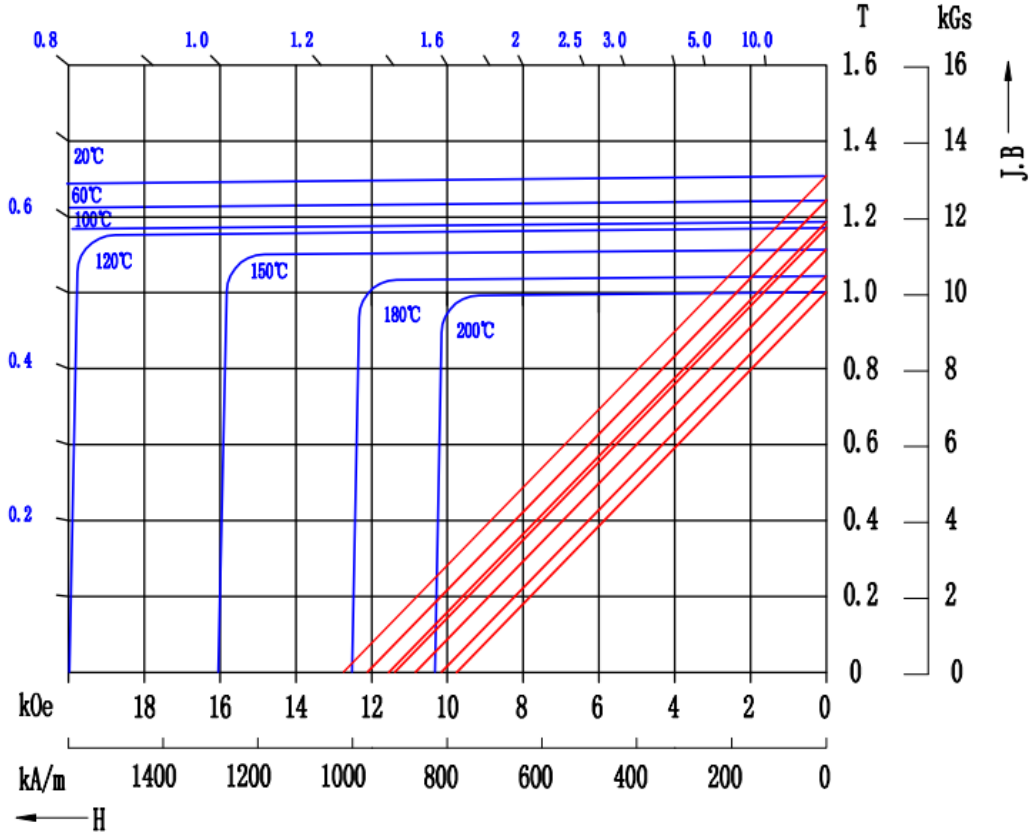
Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	330
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}^2/\text{m}$	1.25~1.55
Vickers Hardness	Hv	460~660
Thermal Expansion	$// (\times 10^{-6}/\text{K})$	6
Coefficient (100°C)	$\perp (\times 10^{-6}/\text{K})$	-1



## DEMAGNETIZATION CURVES/MAGNETIC CHARACTERISTICS

### G42AH

#### DEMAGNETIZATION CURVE



#### MAGNETIC CHARACTERISTICS

Remanent flux density	[T]	1.28~1.32
$B_r$	(kG)	12.8~13.2
Coercivity	[kA/m]	$\geq 971$
$H_{cB}$	(kOe)	$\geq 12.2$
Intrinsic Coercivity	[kA/m]	$\geq 2786$
$H_{cJ}$	(kOe)	$\geq 35$
Maximum energy product	[kJ/m <sup>3</sup> ]	310~342
$(BH)_{max}$	(MGOe)	39~43
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.10
(RT - 100 °C)	$\alpha_{Hcj}$ [%/°C]	-0.51
Temperature Coefficient	$\alpha_{Br}$ [%/°C]	-0.125
(RT - 200 °C)	$\alpha_{Hcj}$ [%/°C]	-0.43
Maximum operating temp. *	°C	240
Relative recoil permeability	$\mu_{rec}$	1.05

\*[ ]: in the unit of SI

( ): in the unit of CGS

\*: The specification of the test sample is  $\phi 10 \times 7$  column

#### PHYSICAL PROPERTIES

Density	g/cm <sup>3</sup>	7.6
$\rho$		
Curie Temperature	°C	330
$T_c$		
Bending Strength	MPa	150~380
Compressive Strength	MPa	600~1200
Electrical Resistivity	$\Omega \cdot \text{mm}$	1.25~1.55
Vickers Hardness	Hv	600~800
Thermal Expansion	$//(\times 10^{-6}/K)$	6
Coefficient (100°C)	$\perp(\times 10^{-6}/K)$	-1