


• Field Coils

FS Series transverse field coils for measuring the magnetic field strength or flux density (induction)	FS 100/1	FS 100/2	FS 1000	FS Series axial field coil	FS 100A-8220
					
Area turns	100 cm ²	100 cm ²	1000 cm ²	Area turns	100 cm ²
Resistance	110 Ω	220 Ω	1330 Ω	Resistance	100 Ω
Outer diameter of winding	8 mm	6 mm	12 mm		
Dimensions of coil former (without handle)					
Length, min.	80 mm	60 mm	80 mm	Length, min.	200 mm
Width, max.	16 mm	8 mm	16 mm	Diameter, nom.	8.2 mm
Thickness, max.	1 mm	2 mm	2 mm		

PKS Point Coil with exceptionally small dimensions	PKS 3
	
Area turns	3.5 cm ²
Resistance	25 Ω
Outer diameter of winding	2.7 mm
Dimensions of coil former (without handle)	
Length	38 mm
Width	5 mm
Thickness	0.5 mm

DFS Thin Film Coil for measuring in narrow air gaps	DFS
	
Area turns	6.3 cm ²
Resistance	8 Ω
Winding	
Length	10 mm
Width	5 mm
Dimensions of coil former	
Length	100 mm
Width	6 mm
Thickness	0.3 mm

• Moment Coils (Helmholtz Coils)

The coils MS 150, MS 210, MS 237, MS 534, MS 990 x 990 and MS 600-3 can also be used to generate magnetic fields.

MS Series for measuring the magnetic moment and dipole moment of permanent magnets	MS 20	MS 75	MS 150	MS 210	MS 237	MS 534	MS 990 x 990
Measuring constant	0.00022 cm	0.0078 cm	0.015 cm	0.014 cm	0.25 cm	0.42 cm	1.5 cm
Field strength constant	---	---	67 (A/cm)/A	71 (A/cm)/A	4.0 (A/cm)/A	2.4 (A/cm)/A	0.67 (A/cm)/A
Flux density constant	---	---	8.4 mT/A 84 G/A	9.0 mT/A 90 G/A	0.50 mT/A 5.0 G/A	0.30 mT/A 3.0 G/A	0.08 mT/A 0.8 G/A
Resistance	6650 Ω	77 Ω	37 Ω	75 Ω	3 Ω	7 Ω	13 Ω
Free pass-through	18 mm	65 mm	140 mm	200 mm	140 mm	275 mm	984 mm
Limits for 1 % accuracy							
Max. magnet height	5 mm	30 mm	50 mm	70 mm	70 mm	150 mm	220 mm
Max. diameter	10 mm	31 mm	70 mm	94 mm	110 mm	260 mm	160 mm



• 3 Axis Moment Coil

MS Series	MS 600-3
other coil sizes are available on request	
Measuring constant	0.42 cm
Field strength constant	2.4 (A/cm)/A
Flux density constant	0.30 mT/A 3.0 G/A
Resistance	7 Ω - 10 Ω
Free pass-through on top	270 mm
Volume for 1 % accuracy	150 mm dia.

• Potential Coils

PS Series for measuring the magnetic potential (magnetic tension)	PS 2204	PS 3515	PS 250
Measuring constant	3500 kA/Vs	1200 kA/Vs	3300 kA/Vs
Resistance	800 Ω	7300 Ω	950 Ω
Dimensions (without handle)			
Free length	40 mm	150 mm	240 mm
Length of winding	40 mm	150 mm	250 mm
Diameter	2.2 mm	3.5 mm	3.3 mm

• Saturation Coils

JS Series	JS 13	JS 20	JS 30
for measuring the magnetic dipole moment or the magnetic saturation polarization of soft magnetic components			
Measuring constant	0.001 cm	0.0036 cm	0.0042 cm
Resistance	2200 Ω	850 Ω	850 Ω
Flux density	170 mT	150 mT	115 mT
Free diameter	13 mm	20 mm	30 mm
Max. specimen length for 1 % accuracy	17 mm	17 mm	25 mm

• Ordering

All coils are available with a connection plug that contains a data memory to automatically transfer the coil data to electronic fluxmeters EF 5 and EF 14. This feature facilitates automatic configuration of the fluxmeters. Alternatively the coils can be ordered with banana plugs. Please specify the desired plug style at time of order.

The stated numbers are approximate values. The exact values of area turns, constants and resistances are determined for every coil by calibration.

A proprietary calibration certificate containing measured values and uncertainties of measurement can be supplied free of cost on request. A calibration can also be carried out in our ISO/IEC 17025 accredited calibration laboratories in Germany and in the USA for an extra charge (except for PS and JS series coils).

Due to continuous product improvements, specifications are subject to change without notice. Customized coils are possible.



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