



Laboratorio Elettrofisico  
**LE GROUP**



## MAGNETIZING **FIXTURES**

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We provide magnetizing fixtures for a wide range of applications, offering a broad selection of fixtures with either magnetic or non-magnetic cores, water or air cooled, with panel or cable connections, and with integrated fluxmeter sense coils where required.

# MAGNETIZING FIXTURES

## DESCRIPTION

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Magnetizing fixtures are inductors used for magnetizing, demagnetizing, or magnetically treating permanent magnets or assemblies containing permanent magnets, such as electric machine rotors, speakers, sensors, DC machine stators, wind turbine generators, and various other applications.

They are powered by current pulses generated by capacitor discharge power supplies (magnetizers).

Each model is equipped with recognition electronics for the connected power supply.

# TYPES OF MAGNETIZING FIXTURES

## SOLENOIDS

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- Either with or without magnetic core
- Magnetization, demagnetization, treating for single magnets
- Bitter coil air cooled, or wound solenoid water cooled
- Rectangular or circular magnetization area
- Radial or axial Helmholtz configuration

## ELECTROMAGNETS

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- Magnetic cored electromagnet
- Magnetization, demagnetization, treating, 2-pole, small ferrite rotors, DC motors housings, DC post assembled motors
- Replaceable pole shoes
- Air cooled

## RADIAL ORIENTED MULTIPOLAR

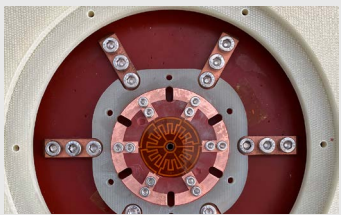
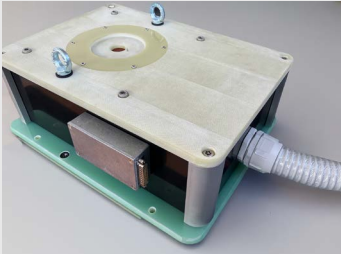
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- Halbach magnetization
- Magnetization, demagnetization, treating for radial rotors
- Surface mounted magnets, Interior permanent magnet, V, U, UU, VV shapes, PMSRM, PMSM, etc.
- Magnetic core
- Straight, step and continuous skew
- Water cooled
- Flux measurement winding embedded

# TYPES OF MAGNETIZING FIXTURES

## AXIAL ORIENTED MULTIPOLAR



- Magnetization, demagnetization, treating for axial rotors
- Straight, Halbach
- Either with or without magnetic core
- Step and continuous skew
- Water cooled
- Fluxmeter sense coil embedded

## FIXTURES FOR SENSORS



- Magnetization, demagnetization, treating for axial and radial magnetic sensor targets
- Straight, Halbach
- Single, multiple trace, uniform or specific polar pitches
- Either with or without magnetic core
- Custom magnetic shapes
- Water or air cooled

## FIXTURES FOR STEP DOWN TRANSFORMERS



- Magnetization, demagnetization, treating for radial and axial rotors
- Magnetic core
- Straight, step and continuous skew
- Air cooled
- Flux measurement winding embedded
- Requires step down transformer, two or multi-terminals

# SPECIAL APPLICATIONS



## SPECIAL FIXTURES

- DC Big Solenoids: for spattering
- Wireless concentrator (patent pending): for randomly disposed variety of small magnets
- SAT fixtures: cross flux fixtures for SPM rotors, torque reduction
- Sintered powder pre-orientation on die heads
- Magnetization of Inverse magnetostrictive effect shafts
- Magnetization of multipolar plastic bonded folios
- Magnetization for linear motors

# ACCESSORIES



## FLUXMETER

Can be directly connected to the magnetizing fixture for measurement of the total flux of the rotor where the measuring is provided.



## COOLING BLOWERS WATER CHILLERS

We can provide different air and water chiller unit, engineered to regulate the temperature of the magnetizing fixture conductors and deliver a consistent flow of cooling fluid at a steady temperature and volume.



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**CONTACT US**

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