

IMPULSE MAGNETIZER U-SERIES IM-U-1420-A-NC



IM-U-1420-A-NC

● Description

Our standard bench top magnetizer. Designed to magnetize and demagnetize AlNiCo, Ferrite and small rare earth magnets. This unit is ideally suited to process magnets in both the laboratory and production environment.

Equipped with a simple solenoid, this machine easily handles AlNiCo or Ferrite magnets. A 25 mm solenoid will magnetize most rare earth magnets. Equipped with a laminated yoke, this machine can magnetize your motor assemblies. Multipole magnetization of AlNiCo, Ferrite can be done quickly. Please contact us to discuss your magnetizing needs.

In the laboratory, the compact bench top unit saves space. It can be used universally for testing series. The internal protection of the unit against short circuits keeps it running if it is short-circuited by accident.

On the production floor, the high cycle speed keeps your line running. The interface is easy to use, both from the front panel instruments as well as from your PLC via simple 24 Volt interface. Small cabinet size and machine simplicity keeps this machine out of your way and out of mind.

This model is operated via display and keyboard. A peak current comparator measures the impulse current and compares the peak with a rated value. It ensures continuous monitoring of the magnetizing equipment.

The new U-series can be operated in mode „charged“ and „discharged“.

● Technical data

Type of discharge: (combinations possible)	Aperiodically damped Aperiodically damped commutated (optional) Damped oscillation (optional)	
Maximum energy*:	1400 Ws	2800 Ws
Maximum voltage:	2000 V	
Voltage setting:	1 V resolution	
Maximum current:	approx. 25000 A (depending on magnetization fixture connected)	
Cycle time*:	4 s (at maximum energy)	6 s
High current outputs:	1	
Operation:	Display with keyboard, „Start“-key External operation via 24 V interface	
Current monitoring:	Measurement and control of impulse current	
Supply:	1-phase: 230 V AC \pm 10 %, 50/60 Hz, 16 A other supplies possible	
Weight	approx. 90 kg	approx. 120 kg
Dimensions		
- Width:	500 mm	510 mm
- Height:	400 mm	570 mm
- Depth:	700 mm	650 mm

*The U-series now is also available in the energy class of 2800 Ws. The technical data which differ from the data of the standard model IM-U-1420-A-NC are indicated in grey

● Safety functions

Safety is a key area for Magnet-Physik. Operation without interruption and protection of the operator is a primary concern.

All basic functions are controlled continuously by the PLC. The voltage at the capacitor banks are monitored by the PLC and additionally by a separate circuit. In case of a fault or interruption from mains the capacitors are discharged automatically. The magnetizers are equipped with two of these circuits. The PLC also monitors the charging unit and in case of a failure it separates it from the mains and controls the automatic capacitor discharge.

Magnet-Physik fixtures are equipped with thermocouples that allow monitoring of the fixture heat. A second internal switch also will open should excessive heat build up.

For further information contact our sales.