

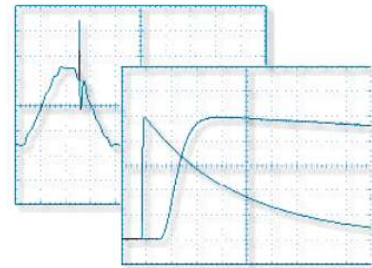
# PSURGE 4010

Combination Wave Surge Generator



PSURGE 4010 - the compact IEC combination wave generator

Surge voltage transients are caused by switching and lightning effects. The PSURGE 4010 allows evaluation of the performance of equipment when subject to high-energy disturbances on power and interconnection lines.



Combination wave detail (front) and impulse on AC power frequency (rear)

## ONE SOLUTION FOR

- ☑ IEC / EN 61000-4-5 Edition 1 & 2
- ☑ EN 61000-6-1
- ☑ EN 61000-6-2

## FEATURES

- Combination wave  
Voltage: 1,2/50us  
Current: 8/20us
- Impulse voltage: 200V ... 4.2kV
- Impulse current: 100A ... 2,1kA
- Maximum impulse repetition rate 12 per minute
- Positive, negative and user definable alternating polarity
- Integrated CDN for 16A at 264Vac and 110Vdc
- Impulse voltage, current and EUT current measurement
- Test parameter ramp functions
- Phase angle synchronization
- 18 test and 18 program memory locations
- Remote control using WinFEAT&R©

## BENEFITS

- Totally reproducible test results
- Consistent pulse parameters
- Fully automatic execution of complex test routines and sequences
- Cost effective solution
- Expandable to 3 phase testing with FP-SURGE 32.1
- Expandable to impulse magnetic field testing (IEC 61000-4-9) with MSURGE

## CONTROL

The internal microprocessor, and intelligent user interface making use of main function hard-keys, makes this device very user friendly. The following points further increase user flexibility :

- Programmable and variable parameters make PSURGE 4010 ideal for development and quality engineers.
- Permanent storage of tests and programs
- Alphanumeric input
- Multi-mode LCD display
- Test report generated directly to a printer without using an external computer
- Easy remote control programming with an external computer and WinFEAT&R software

## QUALITY ENHANCING

The **PSURGE 4010** generator is fully compliant to the IEC requirements.

A solid state high voltage switch provides very accurate reproducible tests, long life expectancy and accurate phase synchronisation. Product quality is enhanced by:

- An integrated current protected coupling-decoupling network
- decoupling inductors that maintain the impulse waveform
- Integrated high performance peak measurements of impulse voltage and current
- Safety circuit and emergency stop circuit provide high personnel protection

## EFFICIENT TESTING

High flexibility and operation of tests is achieved through:

- Fully automatic test sequences
- EUT failure detection and protection by programmable current limits
- EUT failure detection with integrated "EUT Failed" input connector
- Centronix interface for printer
- A serial RS-232 interface enable operation from a computer
- Expansion into an automatic 3-phase system
- Possibility to fulfil IEC 61000-4-9 with an optional coil antenna

## TECHNICAL SPECIFICATION

Waveshape	1,2/50us and 8/20us according to IEC 61000-4-5	Internal single-phase CDN
Impulse Voltage	200V ... 4,2kV	• max. AC power 264V / 16A, 50-60Hz on Schuko plug
Impulse Current	100A ... 2,1kA	• max. DC power 110V / 16A
Impulse Repetition	Up to 12 per minute	• Coupling mode 18uF and 9uF+10Ω acc. to IEC 61000-4-5
Impulse Polarity	Positive, Negative, Alternating	Size 19" / 3 units
Power supply	85V ... 264V, 50/60Hz	Weight 18 kg

## ORDERING INFORMATION

PSURGE 4010	249600
MSURGE coil antenna	249559
Stand for coil antenna	249003
FP-SURGE 32.1 3-phase CDN	249944
WinFEAT&R software	249970

Headquarters  
**Haefely Test AG**  
Lehenmattstrasse 353  
CH-4052, Basel  
Switzerland

☎ + 41 61 373 41 11  
☎ + 41 61 373 45 99  
✉ [EMC-sales@haefely.com](mailto:EMC-sales@haefely.com)

Locate your local sales representative at  
[www.haefelyEMC.com](http://www.haefelyEMC.com)



**HAEFELY** EMC  
TECHNOLOGY

North American Office  
**Hipotronics Inc.**  
**Haefely EMC Division**  
1650 Route 22  
Brewster, NY 10509

☎ ++1 845 279 3644 x262  
☎ ++1 845 279 2467  
✉ [EMCsales@hubbell-haefely.com](mailto:EMCsales@hubbell-haefely.com)