

EAC/3SP Three-Phase 750 VA - 36.000 VA



OVERVIEW

- Simulation of single- and three-phase networks
- AC and DC operation
- 750 – 36.000 VA power output
- 0 – 700 V AC / 1.000 V DC output voltage per phase
- 1 – 2.000 Hz variable frequency (sine, square, triangle)
- Currents up to 600 A per phase
- Graphical display
- Measuring of: voltage, current, average and peak current, effective power, idle power, apparent power, power factor, crest factor
- Constant voltage and constant current modes
- Free memory space to store user programmed curves via optional SD card slot
- Pre-loaded test procedure according to EN61000-4-11 (adjustable via front panel)
- External oscillator input ± 10 V with adjustable time delay up to 70 mS
- Digital interface IEEE, RS-232/485, USB, LAN
- Galvanically isolated 0 – 5 V or 0 – 10 V analogue interface
- Script control: process programming and booting from memory card
- Creation of user defined waveforms and programming via memory card or digital interface
- Data logging function: output values can be saved at adjustable time intervals to a memory card
- Script operation in combination with data logging function provides and stand-alone testing
- Sync input synchronizes the device with external sources
- Sync output triggers external measurement instruments or similar
- 'Brown-out' simulation where output voltage drops for a determined amount of half periods
- Output voltage for a determined amount of time
- Special versions available on request

PRODUCT EXAMPLES

| Type | Power VA | Voltage V AC / V DC | Effective Current A | Dimensions |
|---------------|------------|-----------------------|---------------------|------------------------|
| EAC/3SP 250 | 3 x 250 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 3 | 3 x 19" x 3U x 620 mm |
| EAC/3SP 500 | 3 x 500 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 6 | 3 x 19" x 3U x 620 mm |
| EAC/3SP 1500 | 3 x 1.500 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 10 | 3 x 19" x 3U x 620 mm |
| EAC/3SP 2000 | 3 x 2.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 16 | 3 x 19" x 6U x 620 mm |
| EAC/3SP 3000 | 3 x 3.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 20 | 3 x 19" x 6U x 620 mm |
| EAC/3SP 4500 | 3 x 4.500 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 30 | 3 x 19" x 9U x 620 mm |
| EAC/3SP 5000 | 3 x 5.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 35 | 3 x 19" x 9U x 620 mm |
| EAC/3SP 6000 | 3 x 6.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 40 | 3 x 19" x 9U x 620 mm |
| EAC/3SP 7500 | 3 x 7.500 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 50 | 3 x 19" x 9U x 620 mm |
| EAC/3SP 8000 | 3 x 8.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 60 | 3 x 19" x 12U x 620 mm |
| EAC/3SP 9000 | 3 x 9.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 70 | 3 x 19" x 12U x 620 mm |
| EAC/3SP 10500 | 3 x 10.500 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 80 | 3 x 19" x 12U x 620 mm |
| EAC/3SP 12000 | 3 x 12.000 | 3 x 0 - 300 / 0 - 425 | 3 x 0 - 90 | 3 x 19" x 18U x 620 mm |

OPTIONS

| Appendix | Description |
|-------------|---|
| ../230 | Input 230 / 207 - 253 V AC |
| ../400 | Input 400 / 360 - 440 V AC |
| ../3P208 | Input 3 x 208 / 187 - 229 V AC |
| ../3P400 | Input 3 x 400 / 360 - 440 V AC |
| ../3P480 | Input 3 x 480 / 432 - 528 V AC |
| ../V500 | Extended voltage range 0 - 500 V AC / 0 - 700 V DC -40 % I _{max} |
| ../V700 | Extended voltage range 0 - 700 V AC / 0 - 1.000 V DC -50 % I _{max} |
| ../F1000 | Extended frequency range 1 - 1.000 Hz |
| ../F2000 | Extended frequency range 1 - 2.000 Hz |
| ../LT | Interface IEEE 488 |
| ../LTRS-485 | Interface RS-485 |
| ../LTRS232 | Interface RS-232 |
| ../LAN | Interface LAN |
| ../USB | Interface USB |
| ../ATI 5 | Galvanically isolated analogue interface 0 - 5 V |
| ../ATI 10 | Galvanically isolated analogue interface 0 - 10 V |
| ../EXT/OSZ | OSZ external oscillator input |
| ../SD | SD card slot |
| ../SYNC A | Sync output for triggering external measurement devices or similar (optinal) |
| ../SYNC E | Sync input for synchronization with external sources (optional) |
| ../INTLOCK | Interlock input / safety shutdown |
| ../DIP | Disengageable output voltage during a specific number of half periods (digital interface required) |
| ../GATE | Engageable output voltage during a specific amount of time (digital interface required) |
| ../APuls | Adjustable puls sequence (digital interface required) |
| ../LoadR | Load reverse energy recovery |
| ../LoadLR | Load energy recovery / regeneration in development |

TECHNICAL DATA

Input Voltage Specification

| | |
|---------------------|---|
| Input voltage range | 230 V AC / 400 V AC / 3 x 208 V AC / 3 x 400 V AC / 3 x 480 V AC \pm 10% |
| Input frequency | 47 - 63 Hz |

Output Specification

| | |
|---|------------------|
| Grid regulation | 0,10% |
| Load control | 0,10% |
| Distortion Pmax | 0,15% |
| Programming accuracy AC voltage | 100 mV |
| Programming accuracy DC voltage | 100 mV |
| Programming accuracy < 10 A | 1 mA |
| Effective constant current \geq 10 A | 10 mA |
| Programming accuracy Activation phase | 0,1° |
| Programming accuracy Frequency | 0,1 Hz |
| Frequency standard | 0 - 500 Hz |
| External oscillator input | 0 - 10 V / 1 kHz |
| Resolution, Measurement, Effective voltage, DC voltage, Peak voltage | 100 mV |
| Resolution , Measurement <10 A | 1 mA |
| Effective current, DC current Peak current \geq 10 A | 10 mA |
| Resolution , Measurement < 10 A | 10 mW |
| Active power \geq 10 A | 100 mW |

Programming & Control

| | |
|-----------------------------|---|
| Output Control & Monitoring | Front panel and/or optional Analog 0 - +5V/+10V isolated/ Digital 12 bit: RS-232, RS-485, IEEE488, LAN, USB, SD card |
|-----------------------------|---|

Ambient Conditions

| | |
|-----------------------|-----------------------------|
| Cooling | Fans |
| Operating temperature | 0 - 50°C |
| Storage temperature | -20 - 70°C |
| Humidity | < 80% |
| Operating height | < 2.000 m |
| Vibration | 10 - 55 Hz / 1 min / 2G XYZ |
| Shock | < 20 G |
| Weight | 30 - 400 kg |