

AC/AC frequency converters (speed variators)

Schneider Electric



The variators for 1500W and 3000W machines are frequency converters (at constant V/f) for three-phase asynchronous squirrel-cage induction motors. Converters are supplied ready-to-use for most applications. They include a built-in adjusting terminal (4-digit display, 7 segments, and 4 knobs) to customize your application by modifying the settings as required and extend the functions. A potentiometer on the front is used to adjust the converter's sampling frequency, and thus the motor rotation speed. Dimensions: 360 x 270 x 170 mm. Link jump to choose the rotation's direction, except VAR-BOX.

MAIN COMMON FUNCTIONS

Main configurable functions

- Up to 8 preselected speeds
- Rapid stop, freewheel stop, etc.
- Acceleration/deceleration slope
- Default reset
- Sense of rotation choice

Converter protection and safety systems

- Short-circuit protection: on outputs, between phases
- Internal power supply
- On outputs, between phases and earth
- Overheating and overcurrent protection

Motor protection

- Heat protection built into the converter by calculating I²t
- Phase outage protection

Ref	ACVAR5	ACVAR7	ACVAR6	VAR-BOX
Motor power	up to 1500W	up to 1500W	up to 3000W	up to 1500W
Power supply	200 to 240V single	200 à 240V single	380 à 400V 3-phase	200 à 240V single
Frequency	50/60Hz	50/60Hz	50/60Hz	50/60Hz
Output voltage	220V 3-phase	220V 3-phase	380V 3-phase	220V 3-phase
Constant output current	8A	8A	7.1A	8A
Maximum transient current	12A	12A	10,7A	12A
Transient overtorque (60s)	150% torque rating	150% torque rating	150% torque rating	150% torque rating
Emergency stop push button	no	yes	no	no

TECHNICAL SPECIFICATIONS OF VAR-BOX

All inputs and outputs of the frequency converter are present on safety sockets 4mm on the front panel:

Power terminals

- Mains inputs/outputs to the motor
- Output to a brake resistance (PA/+, PB, PC/-)

Control terminals

- Control inputs: 0-10V, 4-20mA, potentiometer (AI3, COM, AOV, AOC, AI1, 10VAI2)
- Relay contacts outputs (R1A, R1B, R1C, R2A, R2C)
- Logic inputs (24C, LI1, LI2, LI3, LI4, LI5, LI6, CLI)

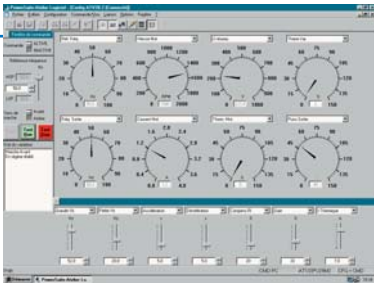
1 potentiometer 5 kΩ, output on 3 sockets

1 On/Off switch, output on 2 sockets

OPTION SOFTWARE

Your computer - using the LOGY-SCH1 option - can controlled these frequency converters by RS232 connection. A complete control panel displayed on your screen is used to monitor and control motor operations. Full software supplied with converter-computer link cables.

ref. LOGY-SCH1



Variable frequency AC/AC speed controllers

NEW

Schneider
Electric

These speed controllers for 1500W and 3000W asynchronous machines are for supplying and programming applications such as belt conveyers, blenders, extruders, pumps, fans and compressors. Putting them into service is rapid and their

programming console makes them very easy to use. Software specific to each make lets you configure and monitor operation of the speed controllers. All speed controller and PLC inputs and outputs are available on the front on Ø4mm safety sockets. A potentiometer lets you adjust the sampling frequency of the speed controller, and the rotation speed of the motor.

Dimensions 390 x 280 x 185mm.

Supplied with operating/programming instructions, software and USB lead.

MAIN FUNCTIONS COMMON TO THE 4 MODELS**Main configurable functions**

- Adjustment of the deceleration/acceleration ramp
- Adjustment of the minimum/maximum speed of rotation
- Quick stop/free wheel
- Input configuration to manage the 2 rotation directions, RUN, stop type, preselected speeds, etc.
- USB lead output for PC link
- Software for speed controller setting

SIEMENS

**Speed controller and motor protection devices**

- Output protection against short-circuits between phases
- Protection against overloads
- Protection against heating
- Protection against phase outages

TECHNICAL CHARACTERISTICS SPECIFIC TO ACVAR325 AND 326

All the speed controller's inputs and outputs are available on safety terminals on the box front:

Power terminals

- Mains input / Output to motor
- Output to braking resistance (PA/+, PB, PC/-)

Ref	ACVAR325	ACVAR326	ACVAR425	ACVAR426
Brand / Type	Schneider / ATV32	Schneider / ATV32	Siemens / G120	Siemens / G120
Motor power	up to 1500W	up to 3000W	up to 1500W	up to 3000W
Power supply	200 to 240V single-phase	380 to 500V 3-phase	380 to 480V 3-phase	380 to 480V 3-phase
Frequency	50/60Hz	50/60Hz	50/60Hz	50/60Hz
Output voltage	3 x 230V	3 x 400V	3 x 400V	3 x 400V
Nominal output current	8A	7.1A	4.1A	7.3A
Software	SoMove	SoMove	Starter	Starter
Bluetooth	Yes	Yes	No	No
Braking resistance output	Yes on terminals	Yes on terminals	Yes on terminals	Yes on terminals
programming console	Yes	Yes	Yes	Yes
Inputs / Outputs Signals on terminals	6 Input binary 1 Input Analogue - 10-10VDC 1 Input Analogue x...y mA 1 safety input STO 3 binary outputs 1 O Analogue 0-10V or 0-20mA 1 O Logic 30V/100mA	6 input binary 1 input Analogue - 10-10VDC 1 input Analogue x...y mA 1 safety input STO 3 binary outputs 1 O Analogue 0-10V or 0-20mA 1 O Logic 30V/100mA	6 input binary 1 input Analogue - 10-10VDC or x...y mA 2 binary outputs 1 O Analogue 0-10V or 0-20mA 1 O Logic 30V/500mA	6 input binary 1 input Analogue - 10-10VDC or x...y mA 2 binary outputs 1 O Analogue 0-10V or 0-20mA 1 O Logic 30V/500mA