

New inverter series IV



SAER introduces the new speed converters series IV for use inboard the motor.

The series IV is available in the following versions:

- ✓ IVM3-10 A: with single phase feeding, to be coupled to motors with absorbed current up to 10 A, maximum power 2,2 Kw.
- ✓ IVT3-6 A: with three phase feeding, to be coupled to motors with absorbed current up to 6 A, maximum power 2,2 Kw.
- ✓ IVT75-14 A: with three phase feeding, to be coupled to motors with absorbed current up to 14 A, maximum power until 5,5 Kw.

Converters can be regulated to allow an easy adjustment of the operating frequency on the basis of the requested performances. They are equipped with the main protections (current, tension, dry running, etc...). Moreover, they can be used in group (up to a maximum of 8 nos.), because they are already regulated in order to operate in master modality (that is, as main units piloting the secondary units) or in slave modality (that is, as secondary units piloted by the master unit) and therefore they are the ideal solution to build pressurizing groups at variable speed. In this case it is sufficient to connect each pump's inverter to one another by means of a normal serial cable and then recall the settings for functioning in group from the display.

SAER offers a wide range of pumps equipped with frequency converter, as listed in the attached table (chart 1).

The inverters can also be supplied in single kits (chart 2): as in the case of pumps, the kit also includes pressure transducer K-16 (or transducer K-25 upon request).

To conclude, two versions are available for wall mounting, ideal solution for example with submersible pumps:

- ✓ IVMP3-10 A: with single phase feeding, to be coupled to motors with absorbed current up to 10 A, maximum power 2,2 Kw.
- ✓ IVTP75-14 A: with three phase feeding, to be coupled to motors with absorbed current up to 14 A, maximum power 5,5 Kw.

Please contact our offices for whatever request and explanation.

SAER Elettropompe

Responsible for Quality Assurance

Eng. Marco Favella

Characteristics of the pumps it can be coupled to				Pump feeding	Inverter type	Inverter feeding	Pricelist surcharge* for mounted kit €
Series	Max current A	Max power kW HP					
MK-32 / MK-32R	10	2,2	3	230 V - 3~ 50 Hz	IVM3-10A	230 V - 1~ 50 Hz	1.008
MK-40 / MK-40R							
OP-32 / OP-32R							
OP-40 / OP-40R							
IR							
MG							
NCBZ							
FC							
MK-32 / 32R	6	2,2	3	400 V - 3~ 50 Hz	IVT3-6A	400 V - 3~ 50 Hz	1.120
MK-40 / 40R							
OP-32 / 32R							
OP-40 / 40R							
IR							
MG							
NCBZ							
FC							
MK-32 / 32R	13	5,5	7,5	400 V - 3~ 50 Hz	IVT75-14A	400 V - 3~ 50Hz	1.835
MK-40 / 40R							
MK-50							
MK-65R							
OP65							
IR							
MG							
NCBZ							
FC							

* surcharge to be added to the price of the pump, including:

Inverter directly mounted and cabled on the pump motor

Pressure transducer K-16 (max 16 bar, precision 1,5% FS) in stainless steel, IP67 with cable L=2 m



With pressure transducer K-25 (max 25 bar): please add pricelist surcharge 12 EUR

PUMP INVERTERS IVM-IVT

	Symbol	Meas. Unit	IVM3-10A	IVT3-6A	IVT75-14A	IVMP3-10A	IVTP3-6A	IVTP75-14A
Inverter voltage supply	V_{1n}	V	1x(100-244)V	3x(200-440)V	3x(200-440)V	1x(100-244)V	3x(200-440)V	3x(200-440)V
Frequency supply Inverter	f_1	Hz	50-60	50-60	50-60	50-60	50-60	50-60
Maximum motor-pump power	P_{2n}	W Hp	2200 3	2200 3	5500 7.5	2200 3	2200 3	5500 7.5
Inverter Voltage output	V_2	V	3x(100-244)V	3x(200-440)V	3x(200-440)V	3x(100-244)V	3x(200-440)V	3x(200-440)V
Inverter Frequency output	f_2	Hz	0..55	0..55	0..55	0..55	0..55	0..55
Nominal input current	I_{1n}	A	11	6.5	15	11	6.5	15
Maximum output current (ED 100%)	I_2	A	10	6	14	10	6	14
Maximum output current for one second	I_2	A	$2.5 \times I_{2n}$	$2.5 \times I_{2n}$	$2 \times I_{2n}$	$2.5 \times I_{2n}$	$2.5 \times I_{2n}$	$2 \times I_{2n}$
Control type			V/f	V/f	Vectorial	V/f	V/f	Vectorial
User interface			Display 2x16	Display 2x16	Display 2x16	Display 2x16	Display 2x16	Display 2x16
Communication with others Inverters			RS485	RS485	RS485	RS485	RS485	RS485
Pressure measure range	ΔP	Bar	0 - 30	0 - 30	0 - 30	0 - 30	0 - 30	0 - 30
Pressure transducer included - standard			K16	K16	K16	K16	K16	K16
Pressure transducers compatibles			In: 0-5V / 15V Out: 0-5V / 4-20 mA	In: 0-5V / 15V Out: 0-5V / 4-20 mA	In: 0-5V / 15V Out: 0-5V / 4-20 mA	In: 0-5V / 15V Out: 0-5V / 4-20 mA	In: 0-5V / 15V Out: 0-5V / 4-20 mA	In: 0-5V / 15V Out: 0-5V / 4-20 mA
Mounting type			On motor	On motor	On motor	Wall fixing	Wall fixing	Wall fixing
Cooling type			Motor vent	Motor vent	Motor vent	Natural convection	Natural convection	Natural convection
Protection grade			IP55	IP55	IP55	IP51	IP51	IP51
Ambient temperature	T_{amb}	°C	0..+40	0..+40	0..+40	0..+40	0..+40	0..+40
Storage temperature	T_{stock}	°C	-20..+60	-20..+60	-20..+60	-20..+60	-20..+60	-20..+60
Price list – Mounted on motor			1.008,00 *	1.120,00 *	1.835,00 *	/	/	/
Price list – Separate kit			879,00	992,00	1.707,00	1.295,00	1.481,00	2.003,00

* price surcharge to be added to the price of the pump for inverter mounted and cabled on the motor / sovrapprezzo da aggiungere la prezzo della pompa per inverter montato e cablato sul motore

PRESSURE TRANSDUCERS

	Symbol	Meas. Unit	 K16	 K25
Measure range	ΔP	Bar	0 - 16	0 - 25
Voltage supply	V_i	V_{dc}	8 - 28	8 - 28
Output			4 – 20 mA	4 – 20 mA
Material			INOX	INOX
Standard electric connection			2 mt lenght - 2 wires cable	2 mt length - 2 wires cable
Maximum cable lenght	L_{cs}	mt	200 (shielded)	200 (shielded)
Protection grade			IP67	IP67
Standard hydraulic connection			¼" GAS M	¼" GAS M