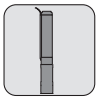
Control panels

PFC-T Control panel for 1 pump with three-phase motor, PF control



Code	Type	Motor 400V - 3~ kW	Setting A	Dimensions HxBxP mm
14058390000	**PFC-T 16/A**	0,37 - 5,5	1 - 16	250x205x105

Construction
Control panel for controlling 1 pump with three-phase motor. Electronic control of the operation and dry-running protection through the power factor (PF) control.
The installation of level probes into the well is not required.
It stops the pump in case of lack of air cushion in the pressure vessel
Displayed operating data and alarms, available in four languages.

Technical data
- Mains three-phase 400V - 3 ~ ±10% 50/60 Hz
- Output current: 16 A
- Ambient temperature from -5 °C to +40 °C.
- Relative humidity: from 20% to 90% without condensation
- Protection IP 55.
- Control through pressure switch (pressure booster set)
- Control through float switch (for filling a tank)
- Alarm output signal
- Constructed in accordance with: IEC/EN 60439-1.

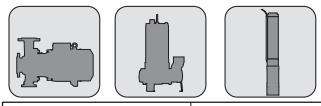
Setting
- Min – Max voltage range
- Motor rated current
- Power factor (PF) value for dry-running protection
- Up to four programmable restarts in case of no water condition

Alarms (with pump stop)
- Phase failure - Wrong phase sequence
- Undervoltage and overvoltage
- Motor overload
- No water
- No air cushion in the pressure vessel

Components
- Thermoplastic case.
- Terminal board.
- Display : 2x16 characters. - 6 button key board.
- In/Out Cable glands.

On request: - RA 100 control panel for remote alarm.

QTL/A 1 D Control panel for 1 pump with three-phase motor, direct starting



Code	Type	Motor 400V - 3~ kW	Setting A	Dimensions HxBxP mm
14054470000	**QTL/A 1 D 12A-FA**	0,25 - 5,5	1 - 12	250x205x105
14054480000	**QTL/A 1 D 7,5 FT**	7,5	13 - 18	400x300x160
14054490000	**QTL/A 1 D 9,2 FT**	9,2	17 - 23	400x300x160
14054500000	**QTL/A 1 D 11 FT**	11	20 - 25	400x300x160

Construction
Control panel for 1 pump with three-phase motor, direct starting for pressure booster sets and submersible drainage pumps.
For pressure booster sets:
- with working time-measuring system that stops the pump in case of lack of air cushion in the pressure vessel.
- dry-running protection with float switch or level control probes.

For submersible drainage pumps:
- automatic operating test of the pump every set hours of inactivity (with pump in the automatic operating mode).
- Pump control with signals coming from:
  - **2 float switches**: one for starting-up and stopping pump, one for the alarm maximum level (optional).
  - **3 float switches**: one for starting-up pump, one for stopping the pump and one for the alarm maximum level (optional).

Pump operation controlled by an electronic board type MPS 3000 with microprocessor which allows different modes of operation of the pump.

Technical data
- Mains 400V 3 ~ ±10% 50/60 Hz (other voltages on request).
- Ambient temperature from -5 °C to +40 °C.
- Protection IP 55.

Components
- Thermoplastic case (metallic for 7,5-9,2-11kW).
- Door lock master switch.
- Fuses for power line. - Fuses for auxiliary circuit.
- Starting contactor and thermal relay (for 7,5-9,2-11kW).
- Electronic board type MPS 3000 with microprocessor.
- Terminals for pressure trasducer / level probes.
- Connection terminals for thermal protector.
- Connection terminals for the RA 100 - RA 100A type.
- Terminals for pressure switch connection.
- Terminals for float switch connection against dry-running.
- Terminals for remote signals
- Cable glands.

ON REQUEST:
- RA 100 - RA 100A control panel for remote alarm.
- Volt free contact control panel Q-MSP 9M.