

# Control Panel Type ABS CP 116 & CP 216

**SULZER**

Compact control panel for one or two pumps conforming to ATEX. Direct connect pumps up to 5.5 kW (10 A). Optional GSM/GPRS modem, allows communication with AquaWeb or SCADA system using Comli or Modbus RTU/TCP protocol.

## Specification

- Graphic colour display
- Intuitive menu navigation with arrow buttons
- Multiple choice of level control
  - Float switches
  - Analogue (4-20 mA) sensor
  - Built in pressure sensor for closed or open air systems
- Advanced pump capacity and flow calculation (analogue level sensor required)
- 8 channel analogue data logger (2 weeks capacity)
- Time-date stamp on up to 4000 pump and alarm events
- One week history on counters and accumulators (run time, start count, flow)
- Fused terminal for operation of optional air compressor CA 641
- Built in charger for optional backup battery
- Built in alarm buzzer
- Switching potential free alarm-relay contact
- Closing potential free alarm-relay contacts for individual pump fail indication
- One free run contact on each contactor
- Hard wired pump interlock input (Ex)
- Dry run protection on low power factor
- Complete with 1.5 m power cable and CEE 16 plug with phase shift possibility
- Two pump versions complete with 3 phase pump fuses
- 9 pin RS 232 port for PC interface (AquaProg tool)
- Pulse input for rain, energy or flow sensor
- Support for register and IO cross reference table

## Analogue values

- Level
- Inflow
- Outflow
- Overflow
- Pump capacity
- Motor current on all 3 phases
- Cos fi (power factor)
- Back pressure (optional sensor for pressurized systems)

## Pump counters

- No of starts per pump
- Running hours per pump



## Settings

- Start/stop level per pump
- Start/stop delay per pump
- Max no of pumps running
- Various alternation options
- Cyclic pump motion timer (exercise run)
- Emergency pump run on high float with run on time
- Amp rating (nominal motor current) for motor protection
- Number of pump runs and extra run on time for venting the air tube
- High back pressure
- Display language
- Pit shape and area at shape forming levels (flow setup)

## Features for pump protection

- Thermal failure (Klixon or PTC)
- Overload failure
- Phase order
- Phase missing
- Leakage (DI)
- Dry run protection (low power factor)

## Approved standards

- EMC emission standard EN 61000-6-3:2001
- EMC immunity standard EN 61000-6-2:2003
- LVD electrical safety EN 61010-1
- Safety of Machinery- Electrical Equipment of Machines EN 60204-1

## Technical specifications

Description	
Ambient operating temperature	-20 to +50 °C (-4 to +122 °F)
Ambient storage temperature	-30 to +80 °C (-22 to +176 °F)
Cabinet and mounting	DIN rail, IP65 Mounting holes: see figure
Dimensions (HxWxD)	370 x 250 x 123 mm
Weight	< 5 kg, with battery
Humidity	0-95 % RH non-condensing
Power supply	230/400 VAC, maximum 16 A fused
Power consumption	< 16 VA
Contactors, max load	ABB B7-30-10, 5.5 kW, 12 A, coil 24 VAC
Fuses (only CP 216)	3x10 A 3-pole type D circuit breakers
Fuse for external air pump	500 mA slow blow
Max load on alarm relays	250 VAC, 4 A, 100 VA resistive load
Max current from 12 VDC out	50 mA
Input voltage at Digital In and Block Pump	5-24 VDC
Resistance at Digital In and Block Pump	5 kohm
Analogue sensor	4-20 mA
Analogue input resistance	110 ohm
Temperature sensor	PTC, limit: 3 kohm
Leakage sensor	Limit: 50 kohm
Maximum length of I/O cables	30 meters
Charge for lead-acid battery	Max 80 mA, 13.7 VDC

