



Tecdol GmbH

For water and solvent-based

PAINTSHOP
monitoring
Paintshop technology

Experience report:

“Due to the process monitoring integrated in the PCS we no longer have to carry out regular capacity measurements and can be sure at all times that the desired quantity of paint is applied.”

User



Paintshop monitoring system.

for all full and semi-automatic painting systems – regardless of water or solvent based paint



What is PCS?

PCS is a process control system which monitors the flow of paint for fluctuations and breaks during the painting process. By using the PCS you always know exactly how much paint is being conveyed. You can also determine the amount of paint consumed per part and monitor this for reproducibility, thereby ensuring consistently high quality standards. With the measurement function of the PCS you also save on the scales for gauging the paint quantity. As you always know the current throughflow it is usually possible to dispense with capacity gauging altogether and this saves time and paint. All of the registered data can be stored directly on your company network which gives you better traceability.

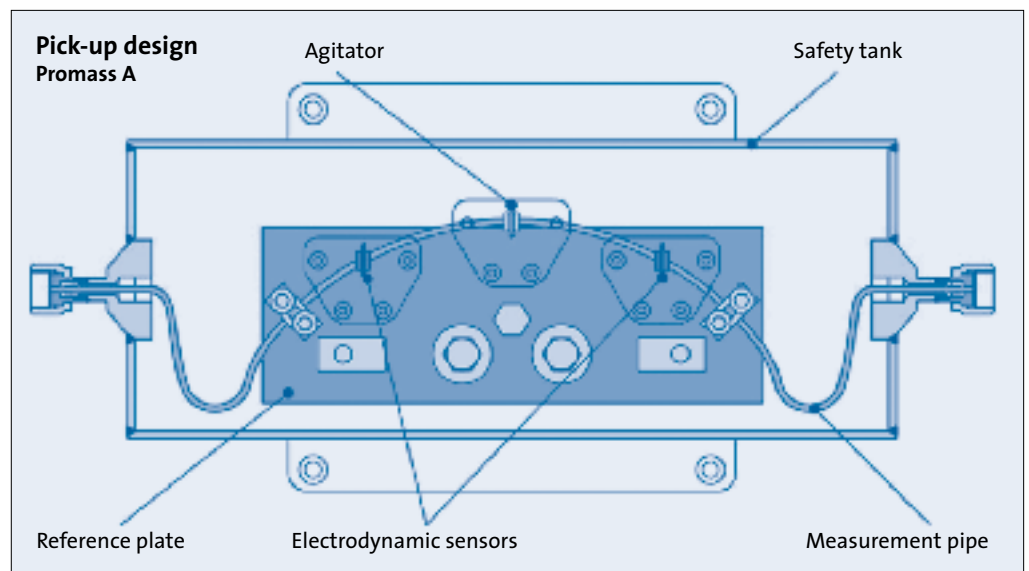
In short:

the PCS saves you time, resources and gives you better process monitoring.

Brief explanation of the

Coriolis measurement principle:

A particle of fluid entering the pipe experiences a lateral acceleration. At the end of the pipe it releases the energy absorbed. The resulting phase difference of the pipe oscillation is directly proportional to the mass flow rate.





Scope of delivery of the PCS

1x control unit

With integrated touch panel for the entry of all specified values, monitoring parameters and recipe administration.

1x Coriolis-measurement unit

(The switch cabinet and the measurement unit are supplied with plug connections and are thus quickly installed and ready for use.)

Technical data

Measurement range:

5 - 1000 ml

Measurement accuracy:

+/- 0,5 %

Adjustable monitoring tolerance:

from 0,1 ml/min

Programs:

128 pre-settable programs with various data can be stored and called up with the program number.

Layer counter:

Maximum value 650 L per layer

Pressure range:

0 - 150 bar

Paint line connection:

As required by the customer

Minimum electrical requirements:

1x earthed socket 230 V, 16 A
1x isolated start signal of the superordinate system

PCS

P R O Z E S S
C O N T R O L
S Y S T E M

YOUR ADVANTAGES + BENEFITS

- Process monitoring
(*you always know what is happening in the process*)
- No more capacity gauging
- Control of your paint consumption
- Quality assurance
- Minimisation of rejects
- Traceability due to process data registration

FUNCTIONS

- Paint throughflow measurement
(*paint flow in ml/min or on request g/min*)
- Indication of the paint consumption per part
- Indication of the paint consumption per layer

MONITORING

- The current throughflow is monitored with a freely definable tolerance window
- The amount of paint applied to the part is compared with the specified value after the process and evaluated.



Tecdot GmbH



PCS

P R O Z E S S
C O N T R O L
S Y S T E M



2K water-based paint supply for decorative lamps. The system has a measurement control loop to fulfil the high quality requirements and ensure reproducibility. The process monitoring in this type of system functions in the same way as in the PCS.



Fully automatic stencil painting system for interior lamps with a gear pump feed monitored by a PCS. The process data from the PCS is simultaneously registered on the system PC and stored in the corporate network.



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PAINTSHOP monitoring