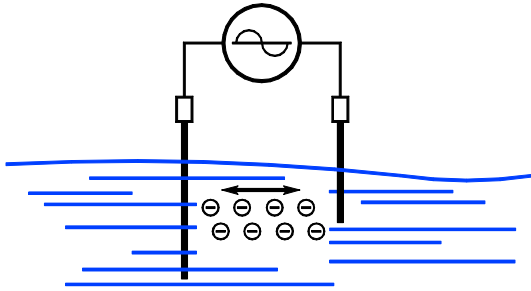
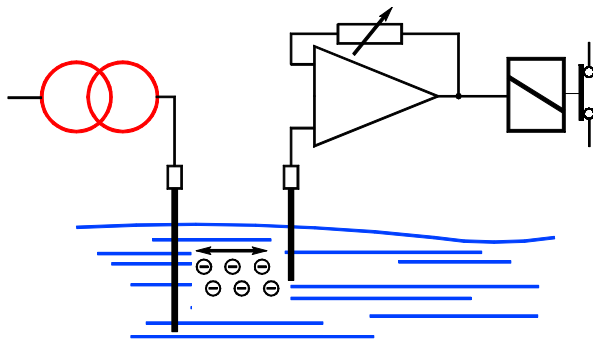


## TECHNOLOGY



### Electrode

One or more electrodes made of stainless steel, properly coated in order to prevent malfunctions due to incrustation, when immersed in a conductive liquid and electrically powered, close an electrical circuit through the liquid itself.



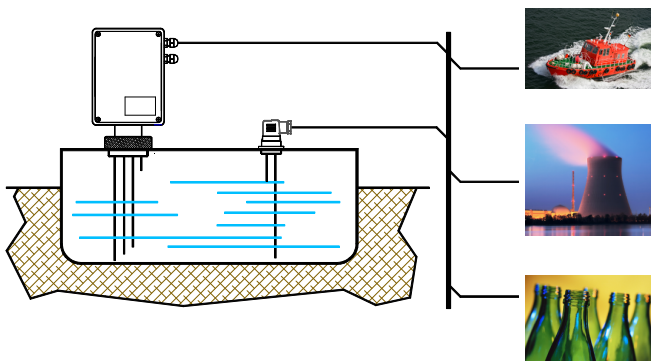
### Electronics

A galvanically insulated power supply, provides an **AC voltage** to the electrodes for sensing the level.

An electronic circuit closes one or more electrical contacts through the actuation of a relay. The system measures the conductivity of the liquid to be controlled with low voltage alternating currents, in order to prevent the incrustation of the electrodes and the perforation of the tank caused by the use of direct currents that cause galvanic action on the materials.

The electronics can be either remote or integrated in the probe.

## FIELDS OF APPLICATION

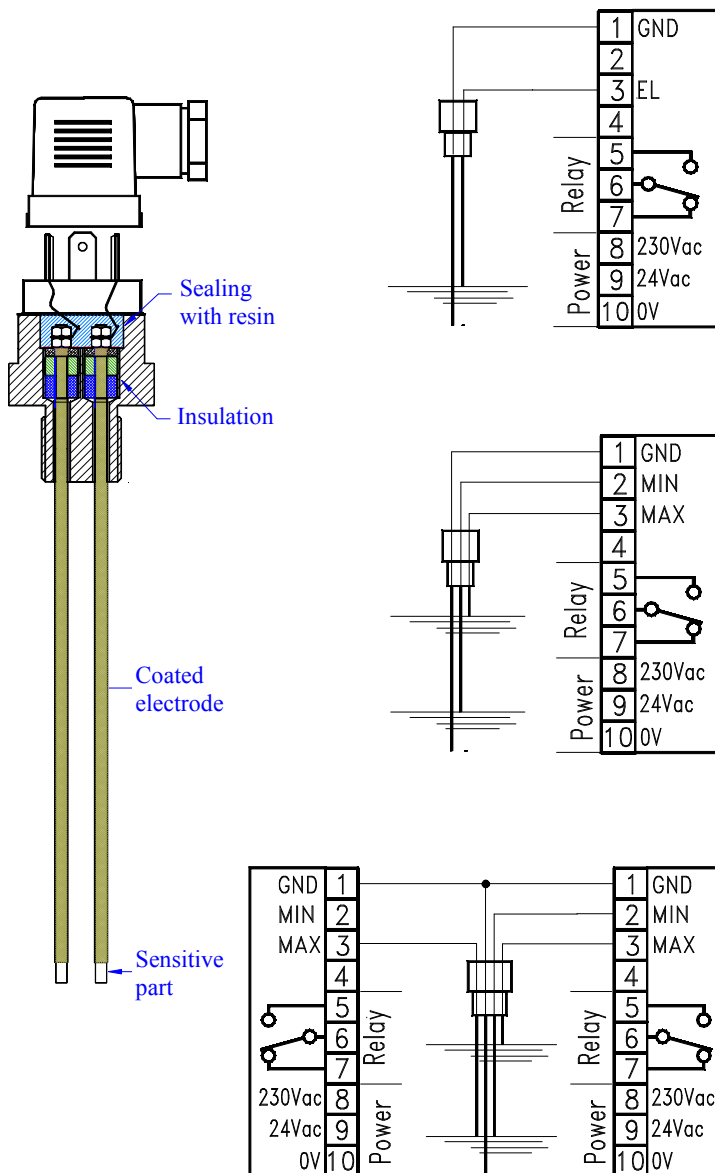


- Monitoring of liquid levels in storage tanks.
- Activation of audible or visible alarms.
- Starting and stopping pumps.
- Dosing and mixing.
- Control of drinking water on boats.
- Milk, beer and beverage industry.
- Water treatment plants.

## ADVANTAGES

- Simple structure devices.
- Sizing the electrodes to individual needs.
- Long service life.
- Low maintenance.
- Remote or built-in electronics.

## SYSTEM DESCRIPTION



### Minimum or maximum level alarm.

Use of a 2-electrode probe.

The longer electrode is maintained constantly immersed in the liquid and acts as a ground (GND) reference. The second electrode is cut to the level of alarm wanted.

The power supply and control unit relay is activated when the liquid wets both electrodes. The relay is deactivated lowering of the level.

### Automatic filling or dosing.

Use of a 3-electrode probe.

The longer electrode is maintained constantly immersed in the liquid and acts as a ground (GND) reference. The second and third electrodes are cut to the minimum and maximum level wanted.

The power supply and control unit relay is activated when the liquid does not wet most the minimum level electrode and is deactivated when the level reaches the upper electrode.

### Start / Stop pump and min-max level alarm.

Use of a 4-electrode probe.

Is used for this configuration a 2-channel unit with both channels galvanically isolated from each other. The first channel is used to manage the alarm, while the second realizes automatic filling.

## TECHNICAL DATA

Concept	Electrical conduction through the liquid
Process connection	1/4" ÷ 2" DN08 ÷ DN50
Type of connection	Threaded Flanged on request
PN	PN6
Max. temperature	100 °C 200 °C on request
Output signal	Relay – SPDT contact
Switch points	as per electrodes length
Materials	Brass – Stainless steel – PP

## EXECUTIONS

■ **IP65 protection**  
DIN 43650A Plug.

■ **IP65 protection**  
Cast aluminum housing epoxy painted on request.

■ **IP65 protection**  
ABS housing with PG7 cable gland.  
1 electrode probe with integrated electronics.

■ **IP56 protection**  
ABS housing with PG7 cable gland.  
4 electrodes probe with integrated electronics.