

# **Flash Tank**



The flash tank is generally used as a collection system for various condensate drainage pipes. The flash tank receives high-pressure condensate and then exposes it to a low-pressure steam source. When this happens, a certain percentage of condensate will "flash" into steam at a lower pressure. This steam can be "recovered" on other low-pressure steam heat transfer devices. The flash separator is smaller than the traditional flash tank and uses cyclonic flow to immediately separate steam and condensate.

# Challenges

Level measurement is very necessary to control the level of the flash tank. At the same time, the instrument must adapt to the harsh working conditions of high temperature and high pressure.

# **Products**

## • UQK-400 Float Level Controller

UQK400 float level controller is composed of float, connecting rod, magnetic sensor and magnetic switch and signal conversion mechanism. The change of the medium level in the container causes the relative displacement of the float, which drives the connecting rod and the iron core to move up and down to change the relative position of the magnetic sensor. Through the magnetic coupling, the micro switch or the reed switch is



operated to achieve level control and alarm.

#### Features

- 1. The float is made of 304, 316, TA2 material. A heat insulation mechanism is designed between the wetted part and the output part, which can be used for a long time under 450 °C working conditions.
- 2. The wetted part is completely isolated from the magnetic coupling system. CoMPared with other mechanical seal types, the product has higher safety and durability.
- 3. The product has passed SIL2 functional safety certification and explosion-proof certification, and can be used in a variety of working conditions to effectively avoid the occurrence of accidents.
- 4. The product has bi-stable memory function and it can continue to maintain the alarm signal when the liquid level is ultra-high or ultra-low.

## • UTK Displacer Level Controller (High Pressure)

The high-pressure level switch is a displacer drive unit, which uses a single switch assembly for level alarm or control. These devices are designed for liquids with working pressures up to 250 bar and specific gravities of 0.40 and above. A permanent magnetic sensor is attached to the rotary switch drive. When the float/displacer rises correspondingly with the rise of the liquid, the corresponding sleeve will move into the range of the magnetic sensor and cause the switch to act accordingly.

#### Features

- 1. Chamber material can choose 304 or 316 stainless steel.
- 2. The pressure can be up to 16Mpa.
- 3. Temperature can be up to +300° C.
- 4. The lowest specific gravity is 0.40.

## • TRG802X Guided Wave Radar Level Transmitter

The latest generation of TRG802X series guided wave radar level transmitter is a two-wire 24VDC powered level transmitter, which adopts advanced microprocessor and unique echo processing technology.

TRG802X series guided wave radar level transmitter can be applied to various complex working conditions and applications. Whether it is a light hydrocarbon or water-based solution, it is suitable.



#### Features

- 1. Multi-variable 2-wire system and 24VDC loop-powered level transmitter can be used to measure level, interface, volume or flow.
- 2. The level measurement results are not affected by the change of medium properties.
- 3. It is no need to calibrate by adjusting the actual level.
- 4. Select the probe with function of "anti-overflow ", the true level to the process connection seal can be measured directly without special algorithm.
- 5. 4 buttons and graphical LCD display can easily observe the instrument configuration information and signal waveform diagram
- 6. Use split structure, the electronic device can be replaced without opening the storage tank.

# • UHC Magnetic Level Gauge

UHC magnetic level gauge provides a safer, more reliable and more visible option than conventional glass level gauge. The float moves up and down with the change of level, and the float transmits the level signal through the coupling magnetic field, which divides into the local indication type and the remote transmission output type.

Chamber and float have a variety of materials and pressure-grade options and are suitable for complex process applications of current major operating devices.

#### Features

- 1. The float adopts 304,316 L, TA2 and TC4 material. It has good temperature resistance and can reach to 450°C.
- 2. The welding process meets the requirements of PED welding process. The chamber is made of 304,316 L. The maximum pressure can reach to 26 MPa.
- 3. Local indicator type and remote output type with level alarm are optional.
- 4. According to customer requirements, through a variety of production types, the products can be applied to a variety of working conditions.