# Automatic Hydrocarbon Tank Dewatering System (AHTDS-V02)





### **Model: AHTDS-V02**

In the oil, gas, and petrochemical industries, storage tanks are used to store crude oil and petroleum products. In most cases, a significant amount of water enters the tanks along with hydrocarbon materials and settles at the bottom of the tank due to its high density compared to hydrocarbon materials. Before transporting petroleum products to the next destination, the water collected at the bottom of the tanks must be drained and removed. In most cases, the water draining operation is done manually by the operator. Draining water manually is a repetitive and time-consuming process, and the interface of water and oil materials is not easy to detect. This reason causes error and waste of a significant amount of valuable oil materials and in addition causes serious environmental pollution.

The AHTDS-V02 equipment has completely solved the problem by using an innovative method and automatically draining the water of tank. Using this device causes the complete draining of the water without wasting the valuable materials inside the tank. the key features of this equipment is the use of non-contact ECT sensors in its structure. And there is no physical contact between the sensors and the hydrocarbon passing through the pipe, and there is no obstacle in the discharge path. This prevents the sensors from corroding or changing their sensitivity, and extends their lifespan.

Another main feature is almost no need to recalibration for different material.

#### **Features and Benefits:**

- High technology: Utilizing non-contact and non-invasive sensors and unobstructed flow path are the exclusive features of this solution!
- Minimizes Oil Loss: Reduces valuable oil loss to nearly zero.
- Reduces Costs: Significantly lowers water treatment expenses.
- Eliminates fines: Eliminates fines associated with environmental contamination.
- Environmental Protection: Resolves issues related to tank dewatering.
- Increases safety: By keeping the operator away from hazardous gases.
- Increases Tank capacity: With effectively draining of water inside the tank.
- Easy to Installation: It is as easy as Installing a single valve in the pipe line!!
- Easy to use: Can be controlled both locally and remotely from a control room.

#### And has:

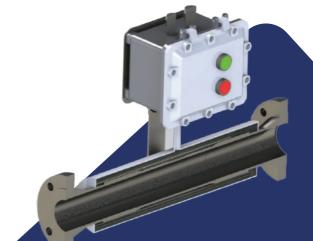
- Patent Protection
- Competitive Pricing

#### **Application:**

This product can be used for draining water from the bottom of storage tanks or Roof

Draining in the following industries:

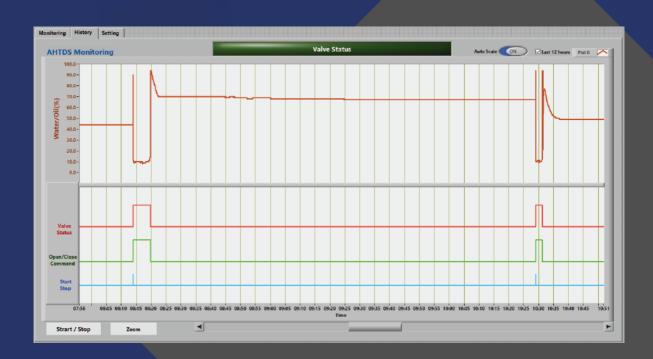
- refineries
- Export terminals
- Petrochemical industries
- Storage Tanks of Distribution network
- Fuel tanks of power plants
- Oil Extraction industry



## **Technical Specification**

Measurement Performance	
Measurement Principle	ECT (Electrical Capacitance Tomography)
Accuracy & Range (Water & Oil Detection	) ±2.5% @ 0-100%
Resolution	0.5%
Operating Conditions	
Process Pressure	1-20 bar g
Ambient Temperature	-40°C to +80°C
Operational Temperature	o°C to +70°C
Power Input	
Power Supply	24 VDC @ Max 150 mA
Weight & Dimensions	
Weight	45 Kg
Dimensions (L*W*HI)	70 * 24* 45 Cm
Outputs	
Digital	24VDC or Dry Contact (Relay) For Valve Control
	Dry Contact (Relay) for Buzzer
	Dry Contact (Relay) Optional
Analogue	4-20 mA or 0-20 mA
Communication	RS 422, RS 485
Certification	
EX Specification	II 2 G EX db mb IIB T5 Gb
Nominal Size	3 inch (80mm)
Certificate Code	
Box EX Certification	II2 G EX d IIB T6 Gb IP 66







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