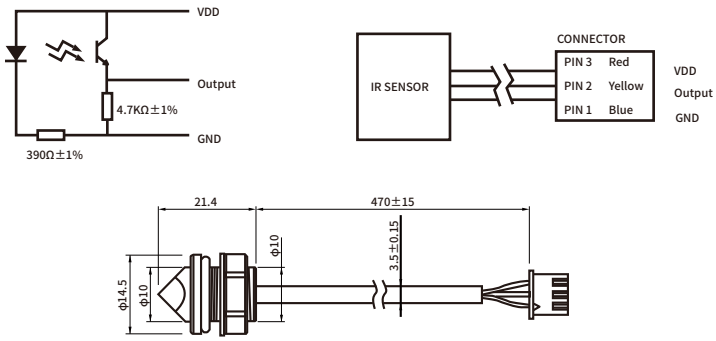
General Specification

InfraRed Liquid Level Sensor

NO: IR-8001

Dimensions (mm)



Product characteristics

- **Advanced infrared optical sensing technology**
  Accurate, contactless detection with consistent switching performance.
- **Fast response time with high repeatability**
  Supports real-time door status monitoring and safety control logic.
- **High durability, maintenance-free operation**
  No mechanical components subject to wear, ensuring extended service life.
- **Compact and integration-friendly design**
  Optimized for space-constrained equipment architectures.
- **Stable performance under frequent cycling**
  Suitable for high-usage office automation and industrial printing environments.
- **Low power consumption and efficient signal output**
  Designed for modern embedded control systems.
- **Custom engineering support**
  Configurable sensing distance, housing design, connectors, and cable assemblies available upon request.

Applications

- **Sewage and Wastewater Treatment Systems**
  Oil layer detection, phase interface monitoring, and overflow prevention in separation tanks and collection systems.
- **Beverage and Fluid Dispensing Equipment**
  Liquid presence verification, flow confirmation, and dry-run protection within enclosed fluid modules and dispensing assemblies.
- **Washing and Laundry Systems**
  Drain status confirmation and empty-tank detection to ensure complete water evacuation prior to high-speed spin cycles or subsequent operation stages.

Product performance characteristics

	Parameter	Symbol	Condition	Min	Type	MAX	Units
Direct-current Characteristic	Working Voltage	V_{DD}	—	4.5	5	5.5	V
	Current	I_{DD}	V_{DD}=5V IN WATER	10	15	20	mA
			V_{DD}=5V IN AIR	15	20	25	mA
	Power Consumption	P_D	V_{DD}=5V IN WATER	50	75	100	mW
			V_{DD}=5V IN AIR	75	100	125	mW
Output Characteristic	Output Voltage In Water	V_{out1}	V_{DD}=5V	0	0.3	0.8	V
	Output Voltage In Air	V_{out2}	V_{DD}=5V	2.0	4.8	5	V
	Output Current	I_{OL}	V_{DD}=5V	15	20	25	μA
	Output Current	I_{OH}	V_{DD}=5V	—	10	—	mA
	Response Time	T_r	V_{DD}=5V	—	100	—	μs

Please contact sales@xintec.hk for latest product details