

MST410P

Portable pump multi-gas detector



MST410P pump gas detector is a sophisticated device capable of measuring up to 5 different gases. It is equipped with an internal pump for active sampling. When paired with a probe, hose, and float ball, it can effectively measure confined spaces, narrow areas, and water surfaces.

The detector has built-in settings and smart sensors which allows users easily to change sensors to measure different gases. It can operate continuously for over 15 hours on a full charge (At non-alarm state), continuously measuring gas concentrations. It also supports data storage and Bluetooth data transmission.




The color TFT screen provides identifiable content display. The durable shell with anti-static rubber coated makes it in IP66 and meets the explosion-proof level.

The MST410P detector is widely utilized in ferrous metallurgy, petrochemical, emergency rescue, and chemical production industries to enhance life safety.

Features and benefits

- The pump can be turned off and started quickly in order to save electricity during use.
- It has blocking pump detection. The detector alerts the user when the pump is blocked in use.
- It supports up to 5 gases (CO/H₂S must be selected in this case of 5 gases).
- The smart sensor can be inserted in any position and is automatically recognized, it's easy to maintenance.
- Data storage(event recording and datalog) and Bluetooth data transfer.
- Gas concentration units can be setted, LEL%, vol%, ppm and mg/m³.
- The detector can monitor its own working state, alarm and indication when it fails.
- Has temperature compensation.
- With calibration overdue reminder.
- Fall alarm, SOS alarm.
- With rubber antistatic shell, durable, anti-static.Meet IP66.
- Auto Inverted display, the screen is always positive when the meter is turned upside down.
- The color TFT screen, which provides identifiable content display.

Technical parameter

Battery parameters	Rated voltage 3.7V Nominal capacity 5200mAh
Working current	Normal current: ≤150mA (when the screen is off)
	Alarm current: ≤270mA
Explosion-proof grade	 Ex ib IIC T4 Gb  II 1G Ex ia IIC T4 Ga  2014/30/EU (Electromagnetic Compatibility)
Sensor type	Combustible gas: catalytic or NDIR(Non-Dispersive Infrared) CO2: NDIR(Non-Dispersive Infrared) O2: Electrochemistry Toxi gases: CO, H ₂ S, NH ₃ , CL ₂ , NO ₂ , HCN, PH ₃ , O ₂ , HCL, HF, SO ₂: Electrochemistry
Detection method	Pump
Response time	Combustible gas: T90<30s Oxygen: T90<30s Toxic gas: (There is a response within following time) Ammonia, hydrocyanic acid < 120s. Phosphine, Chlorine < 60s. Other toxic gas < 30s
Continuous working time of full charge	≥15 hours
Accuracy	CO: ±10% H ₂ S: ±10% LEL: ±5%FS O ₂ : ±3.0%FS Other toxic gases: ±10% (displayed value) or ±5% (full scale) within the maximum
Datalog & events	1660pcs datalog + 999pcs events
Working environment	Temperature: -20℃ ~ 55℃ Relative humidity: 0% ~ 95%, no condensation
Storage environment	Temperature: -40℃ ~ 55℃ Relative humidity ≤90%, no condensation
Charging temperature range	0℃ ~ 40℃
Implementation standards	GB12358-2006, GB/T3836.1-2021, GB/T3836.4-2021
Shell material	ABS, PC, antistatic TPE
Overall dimension	161mm×76mm×57mm (including back clip thickness)
Weight	About 450g

Gas type and measuring range

NO.	Gas type	Range
1.	carbon monoxide(CO)	0-1000 ppm
2.	hydrogen sulfide(H ₂ S)	0-100 ppm
3.	oxygen(O ₂)	0-30.0%vol
4.	combustible gas(LEL)	0-100%LEL
5.	ammonia(NH ₃)	0-100 ppm
6.	chlorine(CL ₂)	0-10.0 ppm
7.	hydrocyanic acid(HCN)	0-30.0 ppm
8.	nitrogen dioxide(NO ₂)	0-100.0 ppm
9.	phosphine(PH ₃)	0-10.0 ppm
10.	hydrogen(H ₂)	0-1000 ppm
11.	sulfur dioxide(SO ₂)	0-100 ppm
12.	hydrogen fluoride(HF)	0-10.0 ppm
13.	hydrogen chloride(HCL)	0-20.0 ppm
14.	VOC	0-20.0ppm

*We can customize the detection for other gases or ranges not listed in the table. Should you require any further information, please feel free to reach out to us.

Accessories



Packing box



Operation manual



Charger



Calibration certificate



Sampling probe



Hose & Waterproof and dustproof filter



Float



Optional leather bag

* Due to ongoing research and product improvement, specifications are subject to change without notice.