Vacuum-Box Gas-Bag Sampler

YQ-1110H

Overview

The YQ-1110H uses gas bags to collect volatile organic compounds (VOCs) from stationary-source waste gas and ambient air, as well as other toxic or harmful gases suitable for gas-bag sampling. It supports unattended timed, quantitative and fixed-volume sampling. Under vacuum-box negative pressure, the bag passively collects external gas; the sample enters the bag without passing through the sampling pump. The brochure lists waste-gas sampling applications in environmental protection, health, labor, security, military, research and education.



Technical specifications

Parameter	Value
Suitable gas-bag volume	1L/2L/3L/4L
Sampling flow	0.1-1.0L/min
Sampling time	1min-99h59min
Load capacity	>-15kPa
Operating temperature	-20-60°C
Data storage	9999 records
Discharge duration	>3 hours
Unit weight	2.75kg

Technical features

• Portable aluminum carrying case, small and lightweight.
• High-brightness 7-inch color touchscreen for outdoor use.
• Negative-pressure vacuum-box sampling separates the sample path from the pumping path to prevent cross-contamination.
• Inert inlet-path materials reduce contamination and adsorption.
• Airtightness testing and automatic gas-bag cleaning.
• High-flow sampling pump with rapid sampling and strong load capacity.
• Real-time vacuum-box pressure monitoring; sampling stops automatically when the bag is full.
• Very-low-flow mode for continuous collection of 1L/2L/3L/4L over one hour.
• Low-flow range 0.1-1.0L/min, adjustable.
• Constant-flow, timed, interval and continuous sampling modes.
• Built-in lithium battery, more than 3 hours of sampling.
• Power-loss memory records sampling progress and resumes sampling when power returns.
• Bluetooth printer for rapid printing of instrument data.
• Optional positioning, time synchronization, logging and anti-tampering functions.
• Optional preprocessing control unit can coordinate with a preprocessor and display, record and store heating and cooling functions when needed.

Standards listed in the brochure

• HJ 732-202 - Stationary source waste gas: sampling volatile organic compounds by gas-bag method
• HJ 38-2017 - Stationary source waste gas: total hydrocarbons, methane and non-methane hydrocarbons by direct-injection gas chromatography
• HJ 604-2017 - Ambient air: total hydrocarbons, methane and non-methane hydrocarbons by direct-injection gas chromatography
• HJ1261-2022 - Stationary source waste gas: benzene-series compounds by gas-bag sampling and direct-injection gas chromatography
• HJ 194-2017 - Technical specification for manual ambient air quality monitoring
• HJ/T 55-2000 - Technical guidelines for monitoring unorganized emissions of air pollutants

Standard accessories

• Main unit
• Vacuum box
• Telescopic rod
• Charger

Optional accessories

• Flue-gas preprocessor
• Heated tube
• Bluetooth printer

Source and review notes

• The first standard number is printed as HJ 732-202 in the brochure; its year is incomplete and has not been filled in.
• The Bluetooth printer is mentioned in the features but listed as optional in the accessory section.
• Specifications and standards have not been independently verified.
• English translation has not received native-speaker technical review.