Chromatography-mass Spectrometry


ICP-MS


Portable GC-MS


LC-MS/MS


ICP-MS/MS


GC-MS


OSPE-LC-MS/MS


ICP-QTOF


GC-MS/MS


LC


CI-TOFMS


GC


IC

Spectrometry


Portable FTIR


UV-VIS


Full Spectrum Cytometry


Telemetry FTIR


Infrared Thermal Imaging


ICP-OES


NIR


CS/ONH


AES


FT-NIR


XRF


LIBS

Physical & Chemical


Flow Injection


Permanganate Index


Potentiometric Titration


TPTN


Ammonia Nitrogen


CODcr

Pre-treatment


Ultra-microwave Digestion


Atmospheric Pre-concentration


Fluid Extraction


Ion Exchange


Parallel Enrichment


Solid-phase Extraction

GC 2000

Gas Chromatograph

Customer service hotline

400-700-2658

www.expec-tech.com
sales_expec@fpi-inc.com

Hangzhou EXPEC Technology Development Co., Ltd.

2466 Science and Technology Avenue, Qingshan Lake, Lin'an District, Hangzhou City, Zhejiang Province

PY20220715V1P1

EXPEC TECHNOLOGY 谱育科技
A member of Focused Photonics

About EXPEC

Founded in 2015, and headquartered in Hangzhou, Zhejiang Province, Hangzhou PuYu Technology Development Co., Ltd. (EXPEC Technology) is a national high-tech enterprise focused on the R&D, industrialization, and innovative application of major scientific instruments. Through innovation, we aim to achieve automated and intelligent analysis, detection and monitoring in the field, grow into a world-leading maker of scientific instrument manufacturers and support China's aspiration to become a major player in the field of scientific instruments.

Our R&D team has adhered to "independent R&D, persistent innovation, and deep customization". After investing heavily in the R&D of major scientific instruments for more than 10 years, we have undertaken a large number of projects under the National Key R&D Program of the Ministry of Science and Technology, mastered the technologies for mass spectrum, chromatographic, spectrum, and physico-chemical analysis and detection, as well as technologies of pre-injection gas, liquid and solid processing, developed a series of industry-leading product mixes for laboratory analysis, field analysis (portable, online, mobile) and automated analysis, and provided global customers with all-round specialized scientific analysis solutions in fields such as advanced industry, environmental monitoring, medical diagnosis, life science, food, drugs and emergency safety.

1000+
persons for research and development

60%+
have master's degrees in research and development

10亿+
expenses in research and development , accumulatively

50+
core technology platforms

20%+
percent of revenue for investment on research and development

Qingshan Lake Innovation Base of EXPEC Technology

Research-and-development and industrialization base for high-end scientific instruments (100 mu/130,000 square meters) Mass spectrometry instrument innovation center, key laboratory, post-doctoral research center

Development history of gas chromatography

2010年

Release of portable gas chromatograph-mass spectrometer

2011年

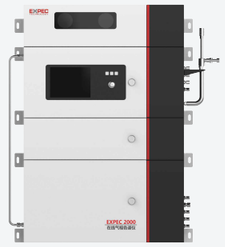
Release of first-generation GC 2000 Gas Chromatograph

2014年

Release of portable gas chromatograph

2018年

Release of domestically produced Explosion-proof-body gas chromatograph



2020年

Release of gas chromatograph-triple quadrupole mass spectrometer

2022年

Release of new-generation GC 2000 Gas Chromatograph

GC 2000 – A best choice for laboratories

A trustworthy partner

The new-generation GC2000 gas chromatograph is benchmarked against international leading brands, and the instrument adopts advanced electronic flow control, microfluidic plate control, high-precision independent temperature control and other technologies to meet the user's requirements for strong analytical capabilities and reliable stability.

A smart application expert near you

The new-generation GC2000 has intelligent functions such as self-diagnosis, self-leak detection, self-saving of carrier gas, automatic reminders, etc., which help you easily grasp the instrument status and solve problems quickly. It can be matched with various pretreatment equipment such as solid phase microextraction, headspace, liquid sampler, etc. to meet your needs for more application expansion.

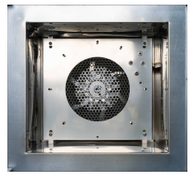
➢ Ultra-stable liquid injection port

- Fully electronic flow control is adopted with a self-diagnostic function and no need for manual soap leak detection, reducing the risk of system contamination.
- Optional injection ports with permanent ultra-deactivated surface treatment are available, which makes it easy for users to deal with the detection of strong adsorption and corrosive samples.

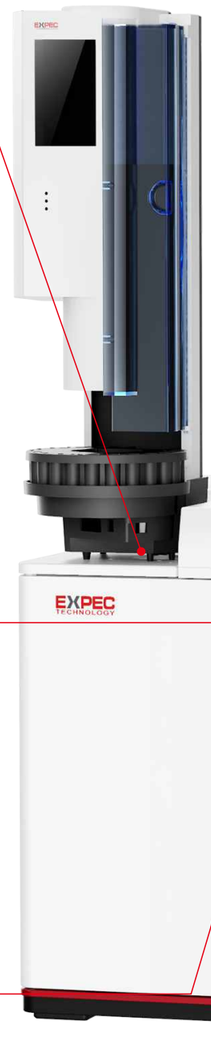
➢ Ultra-high-precision electronic pressure controller (EPC)

- The EPC core is made of the ruby material, and the excellent pressure control performance is consistent all day long.
- The pressure control accuracy of the EPC can reach 0.001 psi.

➢ World-class column oven

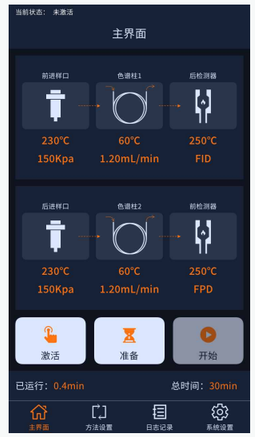


- Supporting up to 32-stage/33-platform temperature programs, and adapted to the most complex analysis methods
- Rapid equilibration of column temperature for minimal waiting time between analyses



➢ User-friendly workstation software

- The workstation software inherits the classic operation interface, and the users do not need to change their usage habits.
- The core adopts the Chinese language and is specially defined for Chinese users.
- The batch function can automatically perform statistical analysis on the sample data and draw sample trend charts.



➢ Excellent human-computer interaction experience

- The Human-computer interaction APP is based on Android intelligent operating system, the interface is in Chinese, skeuomorphic graphic UI design is incorporated, and the monitoring content is clear at a glance.
- The 8-inch color screen display is ultra-large, the resolution is 1280*720 (RGB), and the capacitive screen provides full touch operation.

➢ Supporting multiple detector options (up to four at the same time)

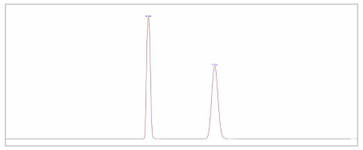
- Flame Ionization Detector (FID)
- Electron Capture Detector (ECD)
- Flame Photometric Detector (FPD)
- Thermal Conductivity Detector (TCD)
- Mass Selective Detector (MS)
- Triple Quadrupole Mass Spectrometer (MS/MS)

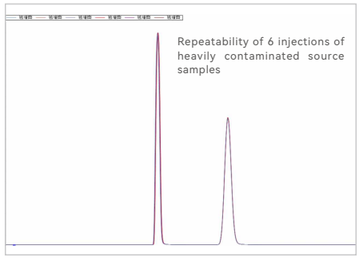
Actual application example

Environment and health

NMTH analysis solutions

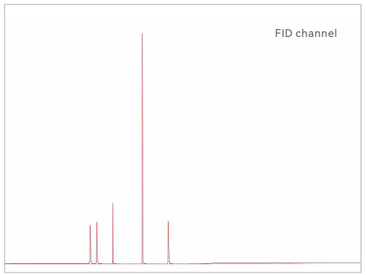
According to the HJ 604 and HJ 38 standards of the Ministry of Environmental Protection, a unique built-in self-priming sampling system, dual-channel single-FID detection, and post-run automatic reverse pipeline cleaning are adopted for the instrument, which is suitable for the determination of NMTHs in ambient air and waste gas from stationary pollution sources.

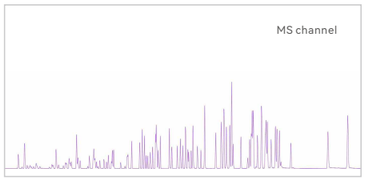




VOC analysis solutions

According to HJ 759 of the Ministry of Environmental Protection and related standards, 116 volatile organic compounds in the ambient air are determined using the atmospheric pre-concentration system for injection, double columns and heart cutting, and FID and MS dual channels for detection. This solution can achieve perfect cutting of low carbon components without oven cooling.

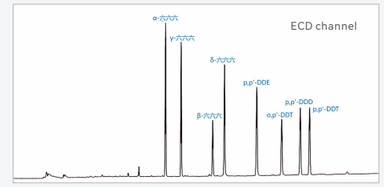


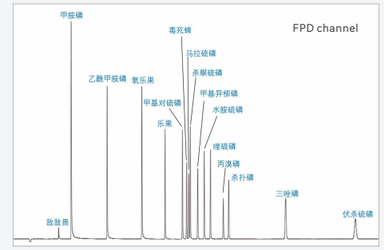


Food safety

Multi-residue analysis solutions for pesticides in vegetables and fruits

According to NY/T761 of the Ministry of Agriculture and related standards, the dual-tower liquid autosampler is used for sample injection, and FPD and ECD dual-column dual-channel detection is used to determine the multiple residues of organochlorine and organophosphorus pesticides in vegetables and fruits, which is an efficient solution to truly realize multiple purposes with a single instrument.





Multiple pesticide residue analysis solutions for food

According to GB 23200.113, a triple quadrupole tandem mass spectrometer is used to analyze 208 pesticide residues and their metabolites in plant-derived foods. Ultra-deactivated flow paths, especially injection ports with ultra-deactivated surface treatment, keep chromatographic peaks of highly active organophosphorus pesticides still sharp and sensitive, and greatly reduce matrix effects of samples.