SIELC

ALLTESTA™ AUTOMATED ANALYZER

Liquid Chromatography
Made Simple

Alltesta Gradient & Isocratic Automated Analyzers

Introduction

The Alltesta™ Automated Analyzer, developed by SIELC Technologies, provides a sophisticated solution for high-performance liquid chromatography (HPLC). Its compact size allows for installation even in space-constrained environments, and its high-performance capabilities make it invaluable in labs that demand rapid and accurate results. The Alltesta™ Automated Analyzer utilizes HPLC.cloud for anywhere data management and cloud-based analytics, enhancing workflow efficiency, accessibility, and data safety. This integration simplifies remote access, real-time monitoring, and data sharing, making it an even more powerful tool for laboratory operations.

Key Features:

Compact Design: Space-saving, ideal to free space in a lab

Ease of Use: User-friendly interface simplifies complex HPLC processes, requiring minimal training

Rapid Turnaround: Results in under 5 minutes, improving workflow efficiency

Flexible Operation: Handles various liquid and soluble samples

Web-Based HPLC Software: Innovative HPLC.Cloud software, offers secure data collection, real-time view and data manipulation, data sharing, remote access, automatic software update, and cloud data storage enhancing efficiency and minimizing manual intervention

Comprehensive Columns Line: Over 30 column stationary phases for all types of molecules providing optimal separation in addition we offer free custom method development for challenging analyses

Key Features of HPLC.cloud:

Cloud Platform: Access data from anywhere in the world

Method Management: Remotely develop, store, apply and share analysis methods

Collaboration: Ability to share data and methods with colleagues

Data Processing: Includes powerful tools for interpreting and visualizing results

Secure: Secure storage of methods and results.

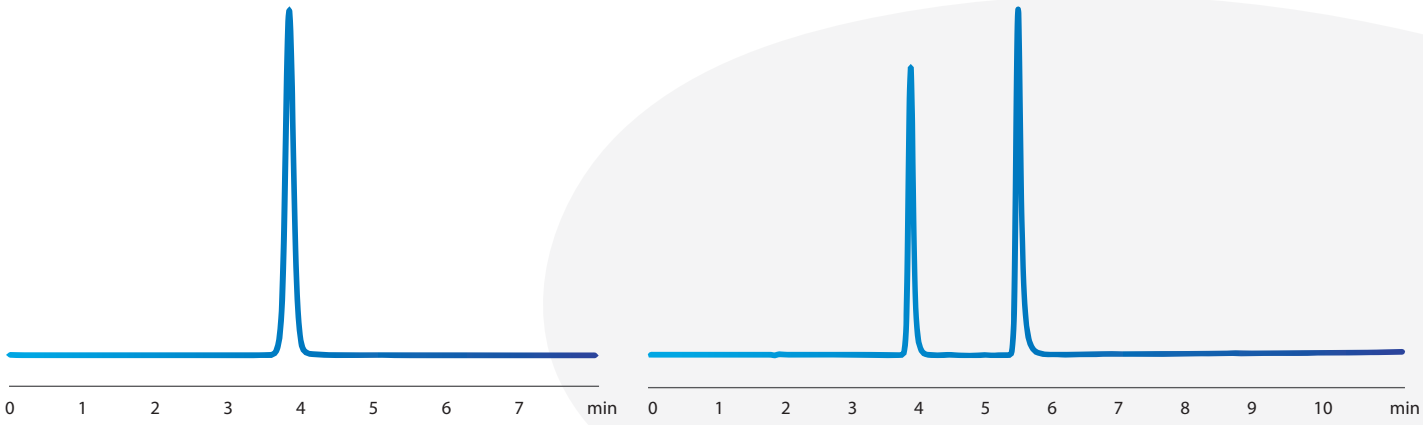
HPLC.cloud Software

The HPLC.Cloud is a software platform that streamlines high-performance liquid chromatography (HPLC) workflows. By connecting instruments directly to a secure cloud server, the software provides a centralized and flexible solution for managing HPLC operations.

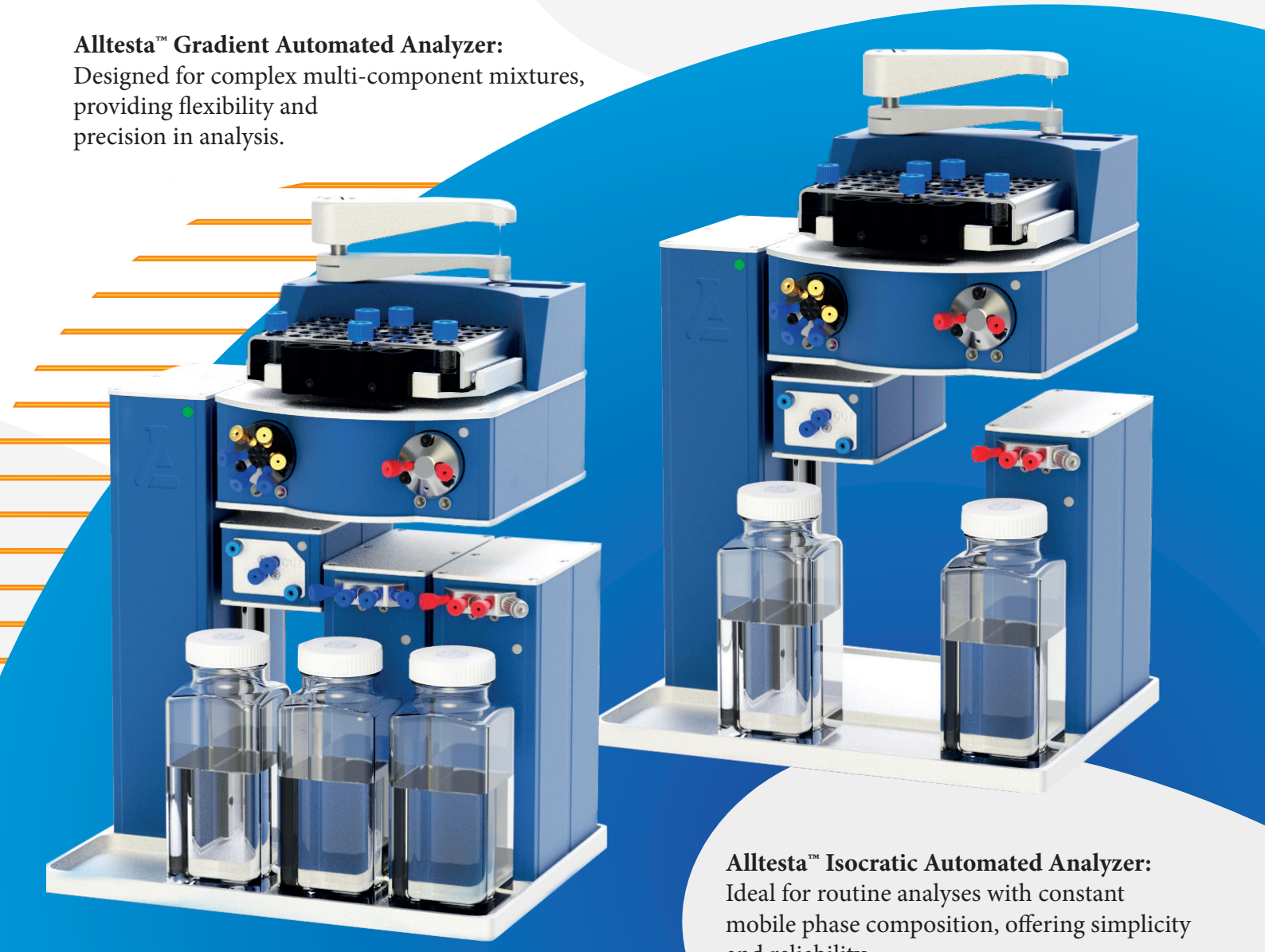
Alltesta Gradient & Isocratic Automated Analyzers

Features from Sielc Technologies:

We offer free method development for your specific compounds to fully tailor the instrument to your needs.



Alltesta™ Gradient Automated Analyzer:
Designed for complex multi-component mixtures, providing flexibility and precision in analysis.



Alltesta™ Isocratic Automated Analyzer:
Ideal for routine analyses with constant mobile phase composition, offering simplicity and reliability.

Alltesta Gradient & Isocratic Automated Analyzers

The Alltesta™ Automated Analyzer includes:

Alltesta™ Power Tower – communication and power distribution module

Alltesta™ Mini-Autosampler with 48 vials capacity

Alltesta™ UV-Vis Detector

Alltesta™ Ultra High Pressure Mini Syringe Pumps.
One unit for Alltesta™ Isocratic Automated Analyzer
Two units for Alltesta™ Gradient Automated Analyzer

Alltesta Gradient & Isocratic Automated Analyzers

Technical Specifications

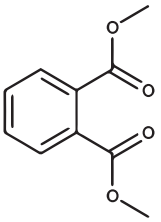
	Alltesta™ Isocratic Automated Analyzer	Alltesta™ Gradient Automated Analyzer
Autosampler type	Random access	Random access
Sample capacity	Automatic, 48/96 Vials	Automatic, 48/96 Vials
Injection type	High pressure	High pressure
Injection Range	1-75 µL	1-75 µL
Injection volume accuracy	±1 µL	±1 µL
Pump operation	Isocratic	Isocratic, Gradient
Pump type	Syringe	Syringe, Gradient
Flow Rate Range	0.001 to 8.0 mL/min	0.001 to 8.0 mL/min
Flow rate accuracy	1% of full-scale	1% of full-scale
Pressure limit	up to 3000 psi (206 bar)	up to 3000 psi (206 bar)
Pressure precision measurement	±1 psi (0.07 bar)	±1 psi (0.07 bar)
Detector noise Level	< 0.05 mAU	< 0.05 mAU
Detection sample rate	20Hz	20Hz
Detector wavelengths, standard	275, 470, 520, 630 nm	275, 470, 520, 630 nm
Detector wavelengths, custom	Any 4 starting from 235 nm	Any 4 starting from 235 nm
Supported columns	3.2 and 2.1 mm ID	3.2 and 2.1 mm ID
Column Length	Any	Any
Connectivity	Wi-Fi, Ethernet land line, Mobile cell network	Wi-Fi, Ethernet land line, Mobile cell network
Power Supply	100-240V, 50-60Hz	100-240V, 50-60Hz
Liquid connection type	10-32 UNF compression type	10-32 UNF compression type
Materials in contact with liquid	SS316, PTFE, PEEK, UHMW PE, SiO2, EPDM, Viton, Silicon, Glass	SS316, PTFE, PEEK, UHMW PE, SiO2, EPDM, Viton, Silicon, Glass
Operating Temperature	0 to 40° C, non-condensing	0 to 40° C, non-condensing

Alltesta Gradient & Isocratic Automated Analyzers

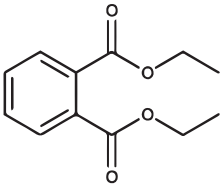
Demonstrating Practical Benefits

Legend for method: Gradient HPLC Separation of Phthalates on Alltesta™ Gradient Automated Analyzer

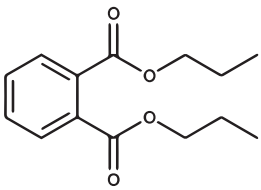
1. Dimethylphthalate (DMP)



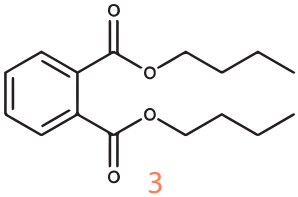
2. Diethylphthalate (DEP)



3. Dipropylphthalate (DPP)



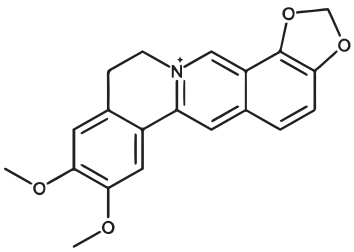
4. Dibutylphthalate (DBP)



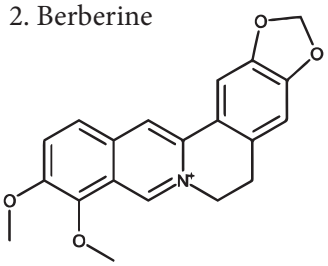
Column:	Newcrom R1
Column size:	3.2 x 50 mm, 3 pm
Column part number:	NR1-32.050.0310
Mobile phase:	Gradient MeCN 50% to 90% in 6 min, hold at 90% for 2 min
Buffer:	Formic Acid - 0.1%
Flow rate:	0.5 mL/min
Detection:	UV 275 nm

Legend for method: Isocratic HPLC Separation of Berberine and Epiberberine on Alltesta™ Isocratic Automated Analyzer

1. Epiberberine



2. Berberine



Column:	Primesep B
Column size:	3.2 x 150 mm, 5 pm
Column part number:	B-32.150.0510
Mobile phase:	MeCN/H2O - 20/80%
Buffer:	H2SO4-0.1%
Flow rate:	0.5 mL/min
Detection:	UV 275 nm

Alltesta Gradient & Isocratic Automated Analyzers

Applications

Our analyzers are changing labs worldwide:

Pharmaceutical Industry:
Ensures compliance by assessing APIs, excipients, and drug purity.

Environmental Testing:
Detects pollutants in water, air, and soil to monitor their environmental impact.

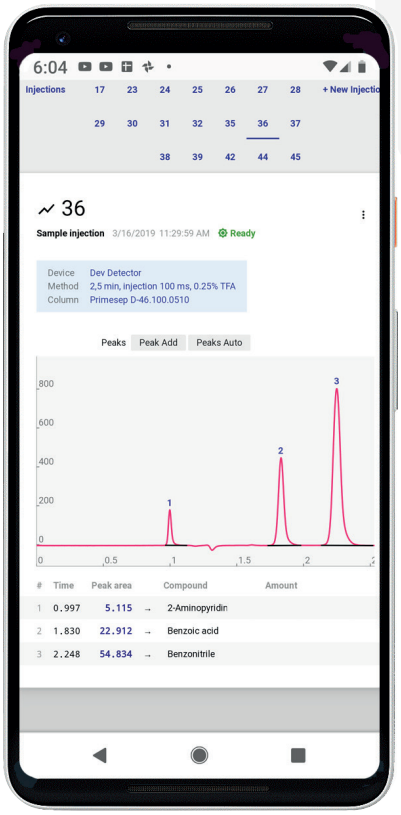
Food and Beverage Industry:
Detects contaminants and natural ingredients including preservatives, vitamins, flavors, dyes, and other components to ensure product safety and quality.

Chemical and Petrochemical Industries:
Analyzes compounds in different chemical processes to monitor reactions, product purity, cross-contaminations, cleaning validation and other analytical tasks typical for chemical manufacturing.

Cosmetics Industry:
Measures active ingredients and excipients for product safety and quality compliance.

Educational Institutions:
Most affordable and simple to operate instrument for teaching chromatography techniques in academic labs.

Research and Development:
Unparallel separation tool for academic and corporate R&D labs.



Alltesta™ Automated Analyzer:

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Call to Action

Unlock the potential of Alltesta Analyzers for your lab today:

- Contact us to place an order or ask questions.
- Request a free method development consultation.
- Schedule a demonstration to see our analyzers in action.
- Visit our website or scan the QR code below for more details.

Conclusion

The Alltesta™ Gradient Automated Analyzer and Alltesta™ Isocratic Automated Analyzer are high-quality solutions for laboratory research, delivering precision, convenience, and reliability. We offer free method customization tailored to your substances, live support, and seamless integration with the powerful HPLC.cloud software.

Learn more on our website or contact us for consultations and demonstrations.

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