

 **QUAKELOGIC**

# QL-SpectraTrace 1000

ADVANCED LC-MS ANALYTICAL SYSTEM



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## ADVANCED LC-MS ANALYTICAL SYSTEM

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- The QL-SpectraTrace 1000 LC-MS System is a compact, fully integrated Liquid Chromatography–Mass Spectrometry solution designed to deliver reliable qualitative and quantitative analysis for routine laboratory applications. The system combines efficient chromatographic separation with robust mass detection, enabling accurate identification and measurement of compounds across a wide range of sample types. Engineered for ease of use, stable performance, and high operational efficiency, the system supports automated workflows and user-friendly data processing. The QL-SpectraTrace platform is suitable for environmental testing, food safety analysis, pharmaceutical applications, and general analytical laboratory use, meeting the performance expectations of LCMS-2050 class instruments.



# ✓ Technical Specifications:

- Fully integrated Liquid Chromatography (LC) and Mass Spectrometry (MS) system
- Compact benchtop design for standard laboratory environments

## Liquid Chromatography (LC)

- High-pressure gradient LC pump system

Flow Rate Range: • 0.001 – 4.0 mL/min

Maximum Operating Pressure: •  $\geq 15,000$  psi

Flow Rate Accuracy: •  $\pm 1\%$  or better

Autosampler Capacity: •  $\geq 90$  vials

Injection Precision: •  $\leq 0.5\%$  RSD

Column Oven Temperature Range: • Ambient  $+5^{\circ}\text{C}$  to  $\geq 80^{\circ}\text{C}$

## Mass Spectrometry (MS)

Mass Analyzer Type: • Single Quadrupole Mass Spectrometer

Ionization Source: • Electrospray Ionization (ESI), positive and negative modes

Optional Ionization Support: • APCI (optional configuration)

Mass Range: •  $M/z$  5 – 1000 or wider

Scan Speed: •  $\geq 10,000$  amu/s

Resolution: • Unit mass resolution or better

Polarity Switching: • Fast switching capability ( $\leq 100$  ms)

Sensitivity: • High sensitivity for trace-level detection

# ✓ Technical Specifications:

## Software & Data System

- Fully integrated LC-MS control and data acquisition software
- Quantitative analysis with calibration curve generation
- Batch processing and automated sequence operation
- Data processing, reporting, and method development tools
- Data integrity features including audit trail functionality
- Compatible with modern laboratory workflows and quality standards

## System Components & Accessories

- Computer workstation with pre-installed software
- Nitrogen supply system (generator or equivalent)
- Uninterruptible Power Supply (UPS)
- Required starter consumables and installation kit



# Advanced LC-MS Analytical & Detection Solutions

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## Corporate Headquarters

QUAKELOGIC INC.  
2008 Opportunity Dr. Suite 130  
Roseville, CA 95678, USA

## Executive Support Line

**+1 (916) 899-0391**

Direct support for LC-MS systems, analytical workflows, and laboratory-based detection applications.

Available Monday - Friday, 9 AM - 5 PM PST

## Strategic Inquiries

**[sales@quakelogic.net](mailto:sales@quakelogic.net)**

For LC-MS systems, analytical instrumentation, and laboratory-based detection solutions.

## Our Commitment to Advanced Analytical & Detection Solutions

### High-Sensitivity Analytical Performance

Delivering precise and reliable detection and quantification for trace-level compounds across complex analytical matrices.

### High-Throughput Analytical Processing

Providing efficient LC-MS analysis with reliable scan acquisition and optimized workflows for streamlined sample processing.

### Dedicated Client Support

Ensuring reliable laboratory operation with advanced data systems, automated workflows, and responsive technical support for analytical environments.

## Scan to Explore LC-MS Analytical Solutions



### Explore LC-MS Capabilities and Analytical Applications

Discover how QL-SpectraTrace 1000 delivers reliable sensitivity, accuracy, and consistent performance across environmental, food safety, and laboratory-based analytical workflows.

**[www.quakelogic.net](http://www.quakelogic.net)**