



## SCIEX Echo<sup>®</sup> MS+ system

### Specifications

The Echo<sup>®</sup> MS+ system consists of the Echo<sup>®</sup> MS+ module and associated software, and couples with a compatible mass spectrometer, available in the following configurations:

- Echo<sup>®</sup> MS+ system
- Echo<sup>®</sup> MS+ system with SCIEX Triple Quad 6500+ system
- Echo<sup>®</sup> MS+ system with ZenoTOF 7600 system

To meet the needs in your laboratory, the Echo<sup>®</sup> MS+ system brings together three technologies—Acoustic Droplet Ejection, Open Port Interface (OPI) sampling, and high-performance mass spectrometry— and offers uncompromising data quality and sample throughput to streamline high-throughput assays for fast decision making.



#### SCIEX Echo<sup>®</sup> MS+ system

Sampling rate	Up to 1 sample/sec
Ejection repetition rate (Hz)	Wide peak mode: 10, 20, 50, or 100 Standard mode: 400 for 384 AQ
Scheduled port wash	Yes
Full plate peak area CV	< 10%
Single well peak area CV	< 8%
Plate cycle time	< 10 min per 384 microplates at up to 1 sample/sec < 30 min per 1536 microplates at up to 1 sample/sec
Supported mass spectrometers	SCIEX Triple Quad 6500+ system SCIEX ZenoTOF 7600 system
Software	SCIEX OS software v3.3.5 or above
Data processing	For supported acquisition scan types: SCIEX OS software auto-triggered data processing Protein mass reconstruction: SCIEX ZenoTOF 7600 system only
Ionization mode	ESI only
Nebulizer Gas Range	Fixed at 90 psi
Acoustic calibrations for supported fluid classes	384 well plate: AQ, SP, DMSO 1536 well plate: AQ and DMSO

**SCIEX Echo® MS+ system (continued)**

Carrier solvent compatibility	Methanol, acetonitrile, water
Wash solvent compatibility	Methanol, acetonitrile, water (combinations of, with at least 50% aqueous)
Supported plate formats	Echo® MS Qualified 384PP and 1536LDV microplates only
Supported well volumes	384PP microplates: 20–65 µL 1536LDV microplates: 3–5.5 µL
Ejection modes	Standard Mode: single droplet or multiple droplet ejections at default repetition rate (400 Hz) Wide peak mode: multiple droplet ejections at user-defined repetition rates across entire batch
Sample ejection volume	≥ 2.5 nL (in multiples of 2.5 nL)
Coupling fluid	Type 1 ultra-pure water
Coupling fluid temperature	22°C
Carrier solvent operational flow range	400 µL/min to 600 µL/min with 100% methanol as carrier solvent
Robotics scheduling software compatibility	Open software development kit (SDK)

**SCIEX Echo® MS+ system with SCIEX 6500+ Triple Quad system**

Scan types	MRM
Recommended maximum number of MRMs for single droplet ejection	4 MRMs at 1 sample/sec
Fragmentation technique	Collision induced dissociation (CID)
MRM dwell time	≥ 20 msec per transition for CV < 10%
Mass range ( <i>m/z</i> )	5 to 2000
Mass stability	0.1 Da over 24 hours
Polarity switching	Yes
Polarity switching time	5 msec
Sensitivity	LOQ of 1 nM dextromethorphan, with 10 nL ejection volume in standard mode
Linear dynamic range	4 orders of magnitude with dextromethorphan
Source	SCIEX OptiFlow Turbo V Source Micro Bundle

**SCIEX Echo® MS+ system with SCIEX ZenoTOF 7600 system**

Scan types	TOF-MS MRM-HR (with well-based MRM transition switching and Zeno pulsing)
Fragmentation technique	Collision induced dissociation (CID)
MRM dwell time	≥ 20 msec for CV < 10%
Mass range ( <i>m/z</i> )	5 to 2250
TOF mass range ( <i>m/z</i> )	Up to 40,000
Total scan time	Recommend 100 msec for 1 sec wide peak; 10 datapoints for quantitation quality
Polarity switching	No
Source	ZenoToF 7600 OptiFlow Turbo V Source Micro Bundle

Disclaimer:

The SCIEX clinical diagnostic portfolio is For In Vitro Diagnostic Use. Rx Only. Product(s) not available in all countries. For information on availability, please contact your local sales representative or refer to [www.sciex.com/diagnostics](http://www.sciex.com/diagnostics). All other products are For Research Use Only. Not for use in Diagnostic Procedures.

Trademarks and/or registered trademarks mentioned herein, including associated logos, are the property of AB Sciex Pte. Ltd. or their respective owners in the United States and/or certain other countries (see [www.sciex.com/trademarks](http://www.sciex.com/trademarks)).

Echo® and Echo® MS are trademarks or registered trademarks of Labcyte, Inc. in the United States and other countries, and are being used under license.

© 2024 DH Tech. Dev. Pte. Ltd. MKT-30299-A



Headquarters  
500 Old Connecticut Path | Framingham, MA 01701  
USA Phone 508-383-7700  
[sciex.com](http://sciex.com)

International Sales  
For our office locations please call the division  
headquarters or refer to our website at  
[sciex.com/offices](http://sciex.com/offices)