

XLESS SAMPLE TRANSPORT SYSTEM

Delivery of μ L-samples in ultra-trace analysis without loss



SAMPLE TRANSPORT TO ICP INSTRUMENT

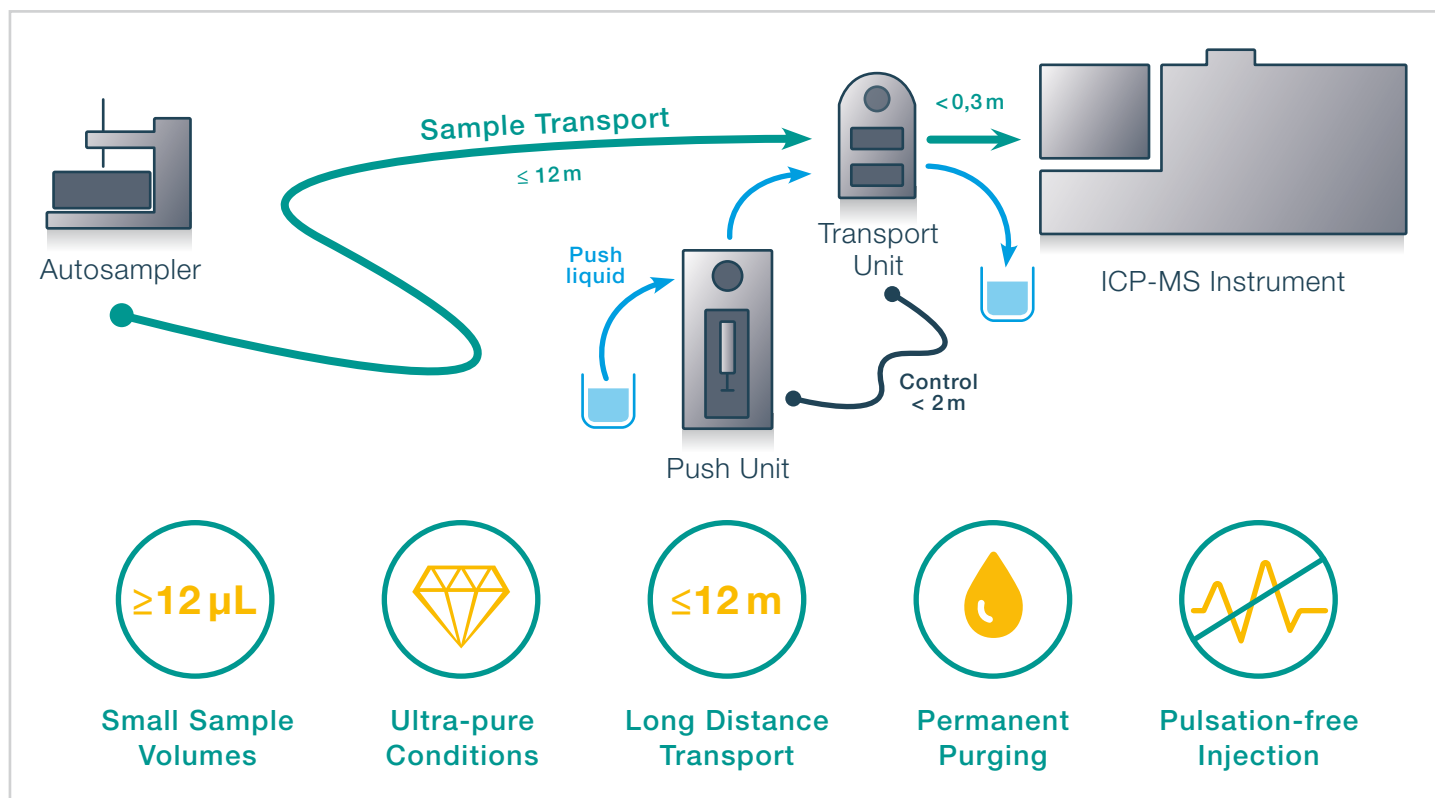
The xLess system enhances the transport of samples into ICP-MS instruments! It is capable to transport small liquid sample volumes without losses pulsation-free into the ICP, up to 12 m distances to autosampler.

The system is purged continuously and all sample contacting parts are made of ultra-pure materials which makes it ideal for ultra-trace analysis.

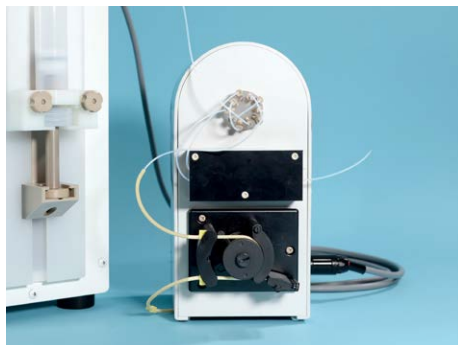
MORE BENEFITS

- ✓ Automatic 24/7 operation mode.
- ✓ Precise flow-rate allows monitoring of samples over minutes to achieve highest accuracy of element concentration.

WORKING PRINCIPLE & FEATURES

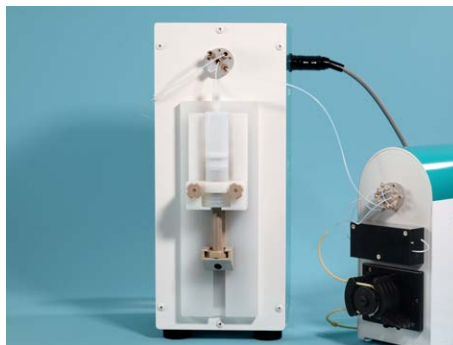


SYSTEM OVERVIEW



Transport Unit

Pulls the sample from Autosampler to the ICP-MS instrument by using a peristaltic pump. Sensors control the position of the sample. The transport tube is purged continuously with cleaning solution to ensure an absolute clean environment.



Push Unit

Contains the electronic controls and is equipped with a syringe pump. It helps to push the sample pulsation-free into the ICP. The outer components are completely free of metal and glass. The modular design allows to exchange easily the syringe volume (standard: 50 mL).

The syringe speed can be tuned in a wide range from $< 4\text{ }\mu\text{L/min}$ up to several mL/min.

The xLess can communicate with the autosampler and the ICP-MS via TCP/IP protocol and RS-232 port. The system saves all relevant sensor data in a time-tagged logfile to support the user in long-term stability studies.

Supported by:



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