Software for Automated Speciation Analysis

Elemental Scientific

ICP | ICPMS | AA

Xceleri Software

Software for Automated Speciation Analysis

Xceleri is a simple but powerful tool that makes processing chromatographic data possible for any level of user.

Data Processing

- Data processing for transient signals
- Designed specifically for LC-ICP or LC-ICPMS measurements
- Easy to build methods
- Calibration curve building features

Data Viewing

- Automated or manual peak selection and integration techniques
- Visualization functions for easy comparisons of chromatograms for standards or samples

Advanced Reporting Functions

- Automated read back functions for inline dilutions
- Report function offers a comprehensive overview of the results including calibration curves, raw intensities, calculated concentrations, and chromatograms
- QC exporting to a single Excel file

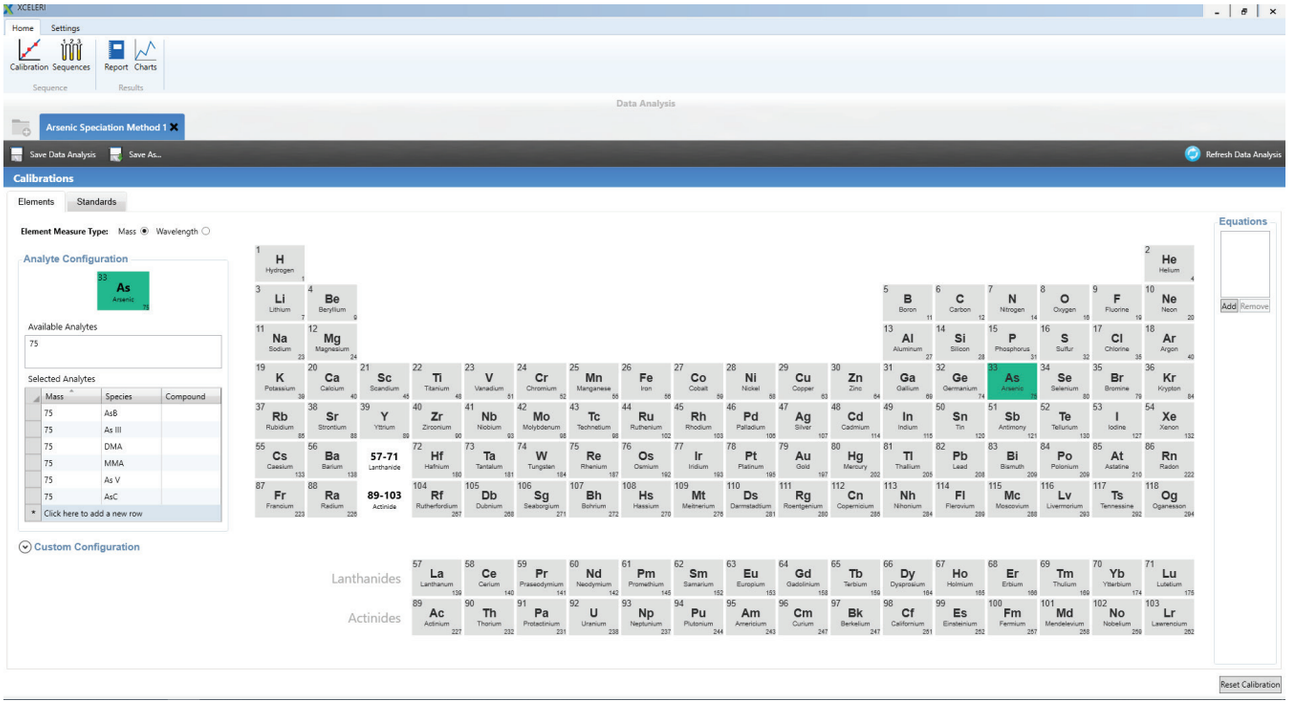

Figure 1. Screen shot example of the arsenic speciation method. Element(s) of interest are selected then assigned the desired species that will be monitored. For example here AsB, As III, DMA, AsC, MMA, and As V have been selected for this method. More than one element can be selected if the method requires monitoring of multiple elements and species simultaneously.

Chromatogram Viewing

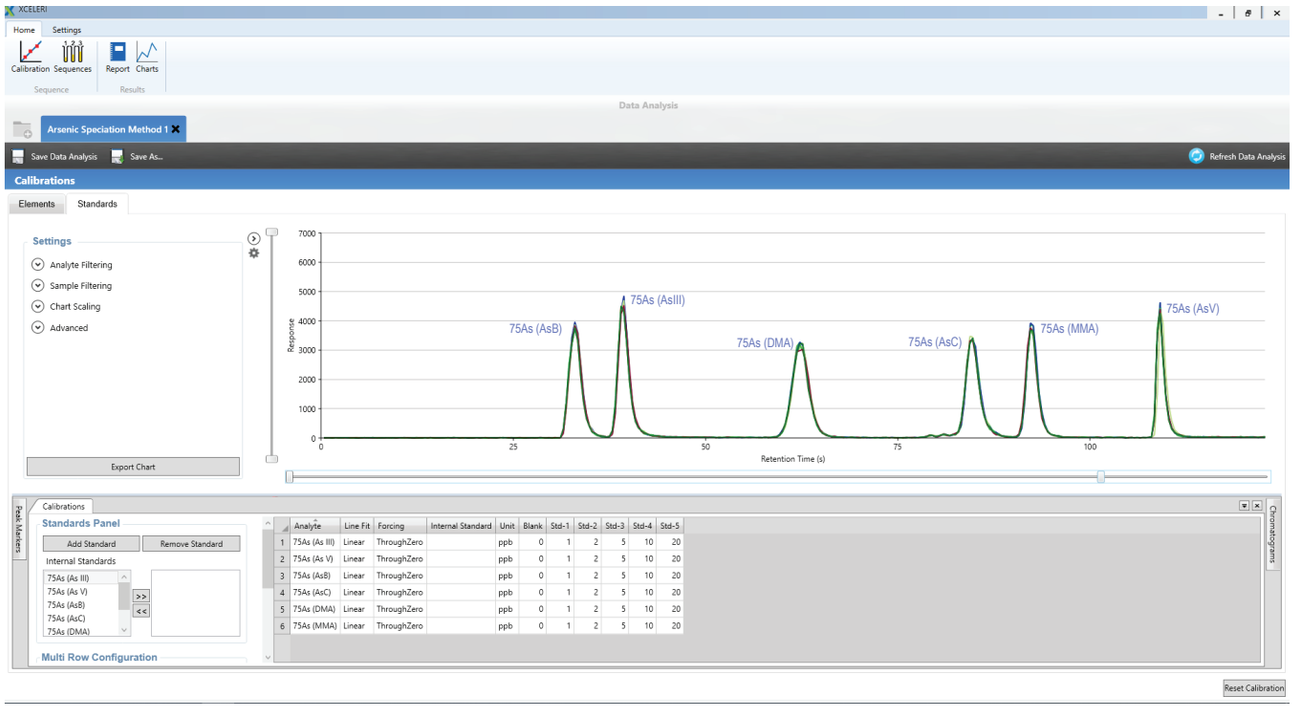

Figure 2. An example arsenic species method (AsB, As III, DMA, AsC, MMA, and As V). Data from standards or samples can be easily overlaid for comparison purposes.

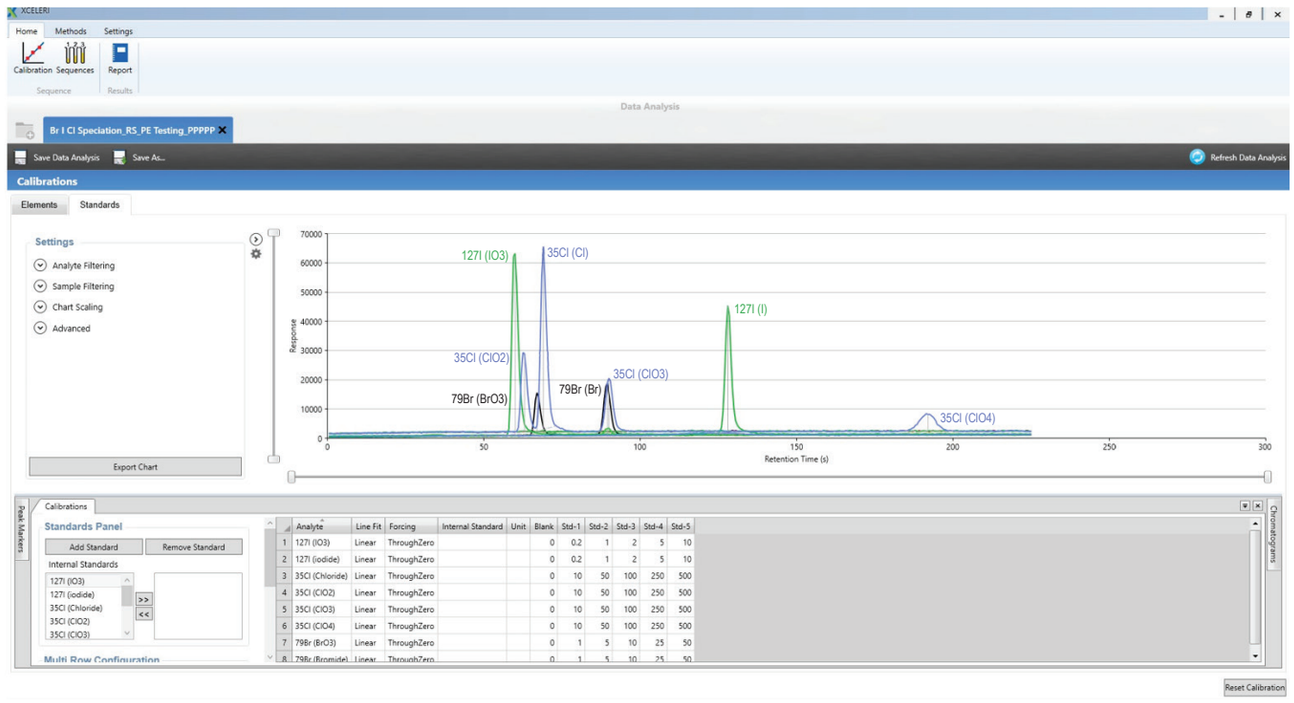

Figure 3. An example halogen species method (Br, BrO_3, I, IO_3, Cl, ClO_2, ClO_3, and ClO_4). The example here shows how multiple elements being monitored can be displayed at one time.

Report Function

Calibration curves can be easily created and viewed using the Xceleri software. After transient peaks are identified, the software uses the integrated peak data along with the defined standards concentrations to create calibration curves for each species.

The report option has the ability to view each chromatogram individually, the integrated peak intensities, the calculated concentrations, and the calibration curves.

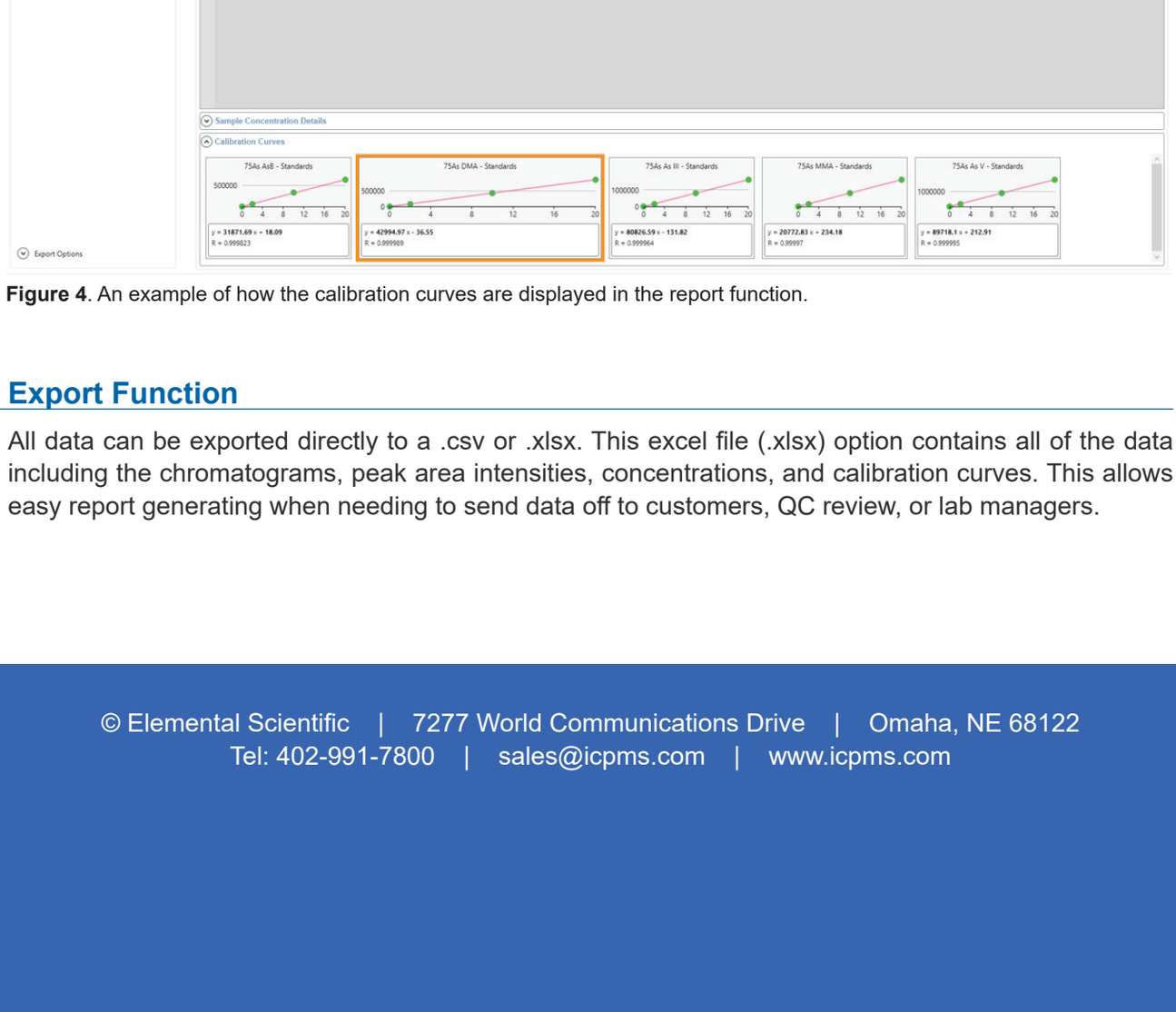

Figure 4. An example of how the calibration curves are displayed in the report function.

Export Function

All data can be exported directly to a .csv or .xlsx. This excel file (.xlsx) option contains all of the data including the chromatograms, peak area intensities, concentrations, and calibration curves. This allows easy report generating when needing to send data off to customers, QC review, or lab managers.