The Bioanalytical Shared Resource/Pharmacokinetics Core provides the OHSU research community with access HPLC, GC/MS and LC-MS/MS instrumentation and expertise for the analysis of small molecules from biological sources.

**Service Overview**

The Bioanalytical Shared Resource/Pharmacokinetics Core (BSR/PK Core) provides five essential services:

- **Provide the OHSU research community with access to highly specialized instrumentation for the analysis of small molecules that can include training to operate the instruments.**

- **Provide specialized expertise essential to assay development, sample preparation, training on instrumentation and interpretation of mass spectral data. The Core can function as a service laboratory to provide complete analysis of samples including the development of analytical methods, sample preparation, and data analysis.**

- **Support for experimental design and the interpretation and modeling of pharmacokinetic and pharmacodynamic data can be obtained.**

- **Provide access to equipment needed for sample preparation for analysis in the BSR/PK Core. This includes nitrogen evaporation systems, heating blocks, specialized glassware and fume hoods.**

- **Educate the OHSU research community about the capabilities of the analytical instrumentation and stimulate new research programs.**

**Equipment**

**Liquid Chromatography/Tandem Mass Spectrometry** Systems include:

- Two Applied BioSystems 4000 QTRAP triple-quadrupole, linear ion trap hybrid mass spectrometers provide quantitative and qualitative performance with UPLC capability available from an in-line Shimadzu Prominence system.

- An Applied BioSystems 5500 QTRAP triple-quadrupole, linear ion trap hybrid mass spectrometers provide quantitative and qualitative performance with UPLC capability available from an in-line Shimadzu Prominence system. Offers greater sensitivity than the 4000 QTRAP and the ability to perform MS³ experiments.

**Gas Chromatography**

- An Agilent 7890B/5977A GC/MSD that includes an autosampler, split/spillless and multimode injectors for use with molecules requiring a gas chromatographic interface for separation. The instrument includes electron impact or chemical ionization modes as well as a separate flame ionization detector.

**High Pressure Liquid Chromatography**

- An Agilent 1100 HPLC system with a photodiode array and fluorescence detectors.