Application Note

Improve Bioanalytical Data Quality on a Unified Solution

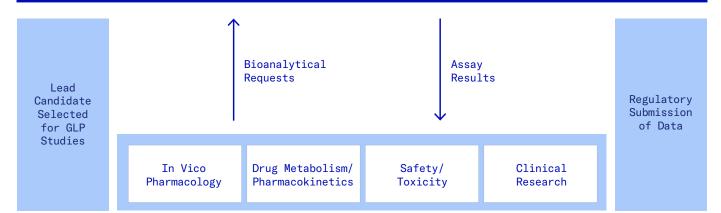
Benchling for Bioanalytical Development



A Digital Solution for Modern Bioanalytical Development

Bioanalytical development and testing is an essential part of product development that generates critical data on analytes such as drugs, metabolites, and biomarkers in biological samples. These data often support key preclinical and clinical milestones of the company. As a result, there is increased emphasis on managing team productivity, ensuring high quality methods and assays, and facilitating the multidimensional exchange of assay samples and results across the organization. Bioanalytical teams require a strong digital foundation to facilitate collaboration, enforce quality systems, and improve productivity.





Bioanalytical Development Teams Need Software That Drives Quality, Productivity, and Collaboration

An optimal solution provides the following tangible benefits to development teams.

Improve data integrity

To improve data integrity, the software should standardize assay data management, help enforce SOPs, and provide complete traceability.

Generate bioanalytical insights

To advance preclinical and clinical studies, the software should improve access to all your bioanalytical data and surface resourcing bottlenecks.

Facilitate team collaboration

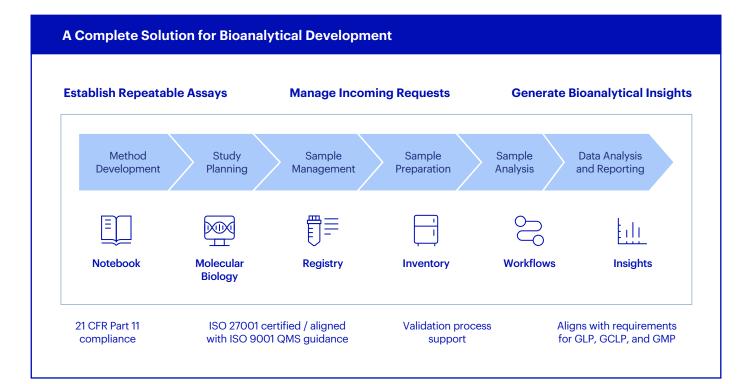
To improve collaboration between teammates, the software should enable role-based assay execution and provide tools to control data access.

Align to quality systems

To support quality systems and controls, the software should have built-in features for 21 CFR Part 11 compliance and provide full validation support.

Benchling's Solution for Bioanalytical Development

Benchling is a modern, unified, and easy-to-use R&D cloud software application that allows scientists to seamlessly move from preclinical research through clinical development within a single system. The R&D cloud is designed to accommodate both the flexibility and speed needed for early preclinical testing, as well as the control and compliance required for bioanalytical work in a validated setting. This digital solution builds on the capabilities typically found in traditional ELN, LIMS, and LES while providing a unified and intuitive solution that maximizes productivity, ensures full traceability, and complies with quality requirements.



Establish repeatable assays

Develop and validate bioanalytical assays consistently across (pre)clinical teams

- Ensure accurate method execution and high quality data with SOPs and templates
- Improve data integrity and assay throughput by integrating directly with instruments
- Standardize assay results capture across teams with results tables

Manage incoming requests

Triage incoming samples, assign responsibilities, and maintain sample traceability

- Centralize tissue samples, reagents, and supplies making it easier to search, find, and share items across teams
- Streamline assay request submissions, resource allocation, and fulfillment with visual dashboards
- View requests in real time and instantly access related assays with full traceability

Generate bioanalytical insights

Aggregate bioanalytical assay results and operational insights across studies

- Improve accuracy of results reporting and decrease the time needed for data aggregation and analysis with Insights
- Share timely experimental results with key stakeholders via custom dashboards
- Have real-time visibility to project status and identify resource bottlenecks faster



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The Benchling R&D cloud is trusted by leading life science companies



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Join over 200,000 scientists using Benchling to power life science R&D.