

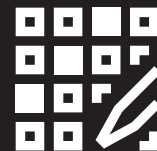


High-Throughput
and Advanced
Technologies to
Streamline Biologics
Discovery

Simplifying Progress

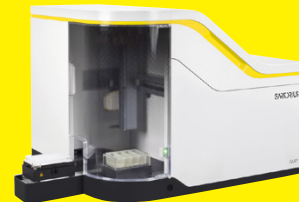
SARTORIUS

Transform Biologics Discovery with Innovative Technologies and Tools



Gain More Insights, Make Better Decisions

Therapeutic antibodies have recently emerged as one of the most successful strategies for the treatment of both hematologic cancers and solid tumors. Because they offer the promise of better specificity and safety than many other cancer treatments, this class of biologics is projected to continue increasing in importance.



Accelerate Your Antibody Development with Peace of Mind

For development of breakthrough therapeutics you need revolutionary technologies providing rapid, multifactorial results to enable deeper insights and ensure the choice, quality, and integrity of your biopharmaceutical product.



Ensure Confidence in Your Biotherapeutic, from Molecule to Market



More Insight Through
Complete Cellular and
Molecular Interaction
Analysis Studies



Better Reproducibility
with Orthogonal Assays
and Integrated Data
Acquisition



Higher Confidence in
Quality, Purity, and
Integrity of Your
Product



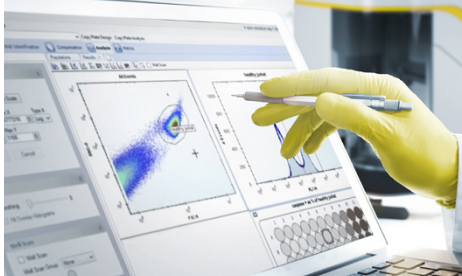
Increase Productivity
by Streamlining the
Discovery and
Development
Workflow

Cell and Protein Analysis Platforms for Tracking Complex Biological Processes

The CellCelector Automated Cell Imaging and Picking Platform, Incucyte® Live-Cell Analysis, iQue® High-Throughput Screening (HTS) by Cytometry, and Octet® Label-Free Analysis systems offer unique, high-capacity cell and protein analysis solutions for characterizing cell phenotype and function and tracking complex biological processes.

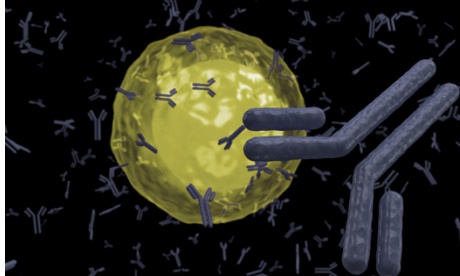
Legend:

 ■ CellCelector
 ■ iQue®
 ■ Incucyte®
 ■ Octet®



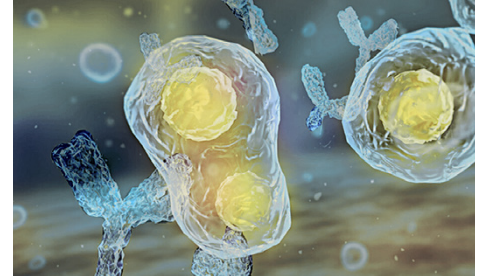
Antibody Library Screening

Increase data throughput and quality by multiplexing antibody binding, specificity, and species cross reactivity.



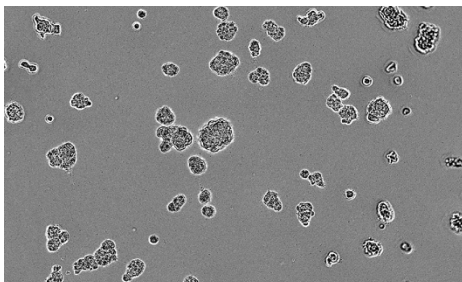
Functional Profiling

Easily go from high-content functional assays to actionable information that helps you select candidates with desirable biological activity.



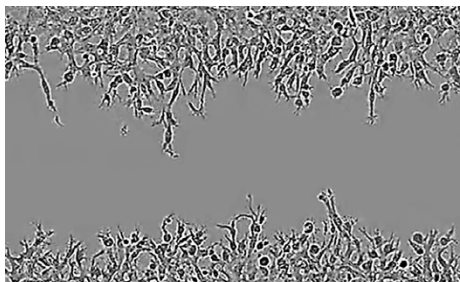
Cell Line Development

Select antibody producing clones upstream of cell line development by simultaneously detecting IgG titer, cell health, and viability.



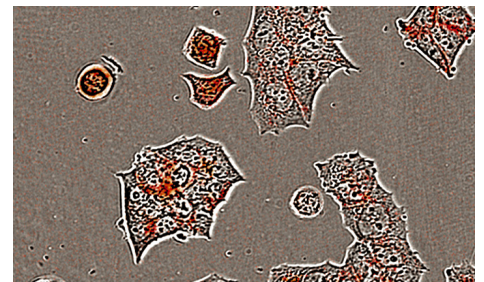
3D Tumor Spheroid Assays

Track and quantify tumor spheroid formation, growth, and death in real time.



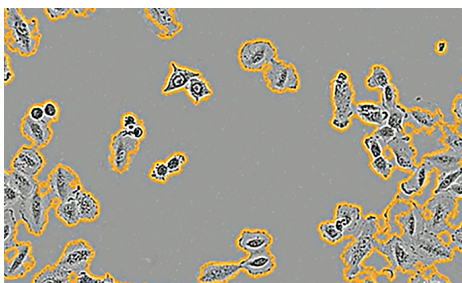
Cell Migration and Invasion

Monitor and analyze migration and invasion with or without a chemotactic gradient.



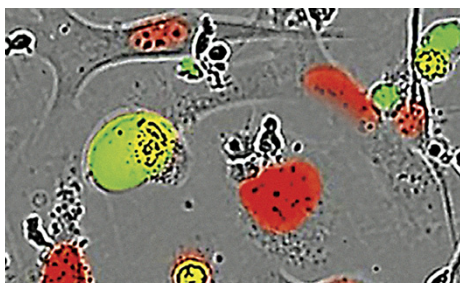
Antibody Internalization

Quantify antibody internalization in 96- or 384-well formats.



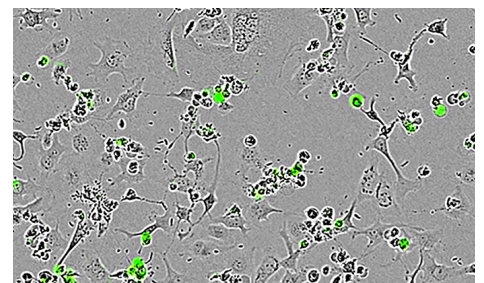
Proliferation

Measure cell proliferation in mono- or co-cultures, with or without labels.



Apoptosis


Investigate aberrations in apoptotic pathways in intact, living cells.



Cytotoxicity

Detect real-time measurements of cell death based on cell membrane integrity.



 **Find out more**
 For more information, please visit
www.sartorius.com/biologics

Complete with comprehensive analysis and visualization capabilities, our platforms will empower you with actionable results, faster!

Solutions and Services for Molecule Development

iQue® 3 High-Throughput Cytometry Platform – Truly Fast. Simply Effortless. HTS by Cytometry

A high-throughput, suspension cell and bead-based analysis platform for antibody screening and functional profiling. The fastest way to generate high content data from small sample volumes.

- Screen your libraries in days, not months
- Sample volumes as low as 1 μL , reduce reagent costs
- Screen cells in suspension and targets in their natural conformation

See specific applications in “Cell and Protein Analysis Platforms” section.



Incucyte® Live-Cell Analysis System – See What Your Cells Are Doing and When

Enable real-time, live-cell imaging and analysis directly inside your incubator.

- Use with non-perturbing Incucyte® reagents to detect dynamic biological changes
- Measure kinetic effects of your antibody treatment on target cells
- Accommodates multiple users and applications in parallel

See specific applications in “Cell and Protein Analysis Platforms” section.



Octet® Biolayer Interferometry (BLI) and Surface Plasmon Resonance (SPR) Systems for Label-Free Detection – Perform Protein Quantitation, Screening and Kinetic Characterization Assays

Measure molecular interactions in real-time without the need for detection reagents and enable advanced, fast, and direct detection of specific biomolecules. Rapidly determine binding kinetics, product titer, screen for specific glycosylation content and other critical quality attributes (CQAs) perform off-rate analysis to select optimal clones using both purified and unpurified samples.



CellCelector Automated Cell Imaging and Retrieval Platform – Select and Screen Single Cells for Antibody Discovery

- High-throughput single plasma B-Cell and Hybridoma clone screening for antibody discovery
- Massively parallel co-cultivation of different cell types for functional studies
- Rare single cell detection and isolation



Molecule Development Workflow



Target Identification
Multiparametric and actionable results for more insight and better decisions



Library Screening
Screen whole-cell binding hybridoma, single B-Cells or phage library to identify positive hits



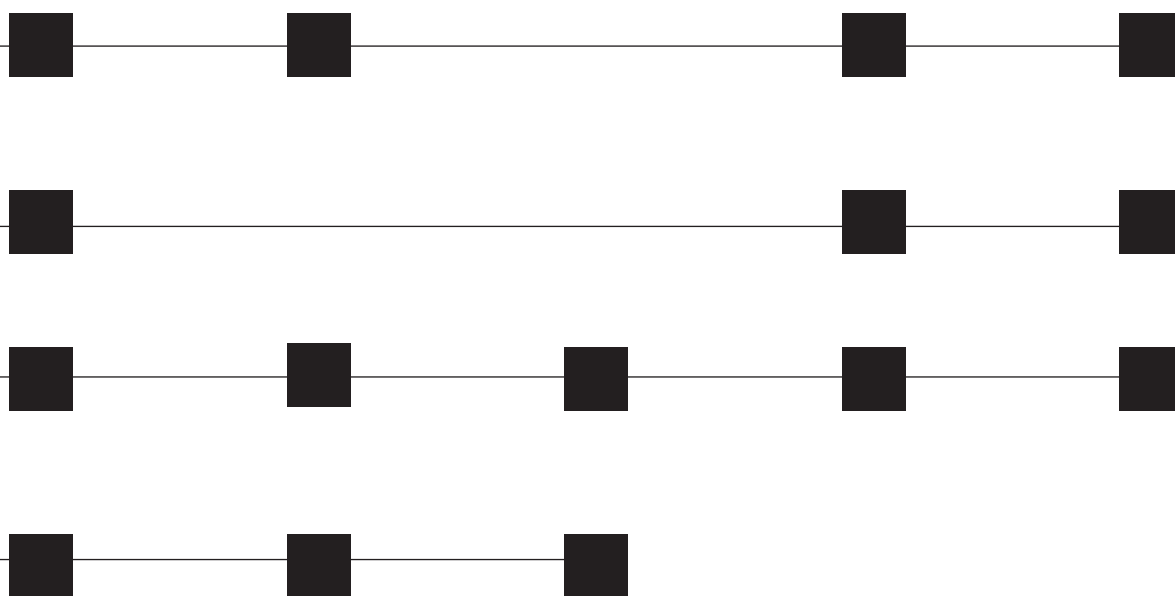
Hit Confirmation
Confirm hits in kinetic binding assays



Lead Optimization
Assess and optimize the properties of lead antibodies



Candidate Characterization
Analyze the structural properties of the lead antibodies as well as binding and functional properties



Find out more

For more information, please visit
www.sartorius.com/biologics

Everyday Lab Essentials

Sartorius' lab essentials help streamline routine and repetitive tasks and achieve more accurate results by:



Increasing reproducibility of your results

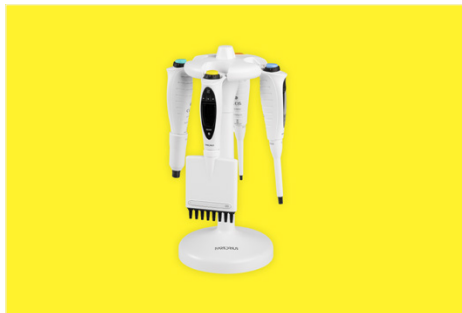


Avoiding contamination in your processes



Increasing safety and reduce fatigue with ergonomic and easy-to-use products

Pipetting



Picus® 2 Electronic Pipettes

The next generation of Bluetooth connectivity, unbeatable ergonomics, a variety of pipetting modes, and repeatable results.



Midi Plus Pipette Controllers

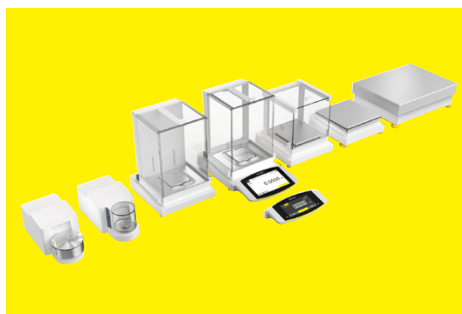
Lightweight, easy-to-use pipette controllers for large volumes applications.



Cubis® Dosing System

Semi-automatic preparation and documentation of highly reproducible calibration standards for chromatography and spectroscopy.

Lab Weighing



Cubis® II Laboratory Balances

With 100% configurable hardware, software and connectivity, Cubis® II offers a high-performance balance that will align with your unique demands.

Lab Water Systems



Arium® Type 1 Ultrapure Water Systems

ASTM Type 1 water, as well as RNase/ DNase and endotoxin-free water, to ensure consistent, high-quality results.

Mycoplasma Detection



Microsart® Mycoplasma qPCR kits

Keep your cell cultures contaminant-free and compliant.

Clarification, Concentration and Purification of Proteins



Sartoclear Dynamics® Lab
and Sartolab® RF | BT Vacuum
Filtration Units



Vivaspin® and Vivaflow® Ultrafiltration
Devices



Vivapure® and Sartobind® Membrane
Adsorbers



Minisart® Syringe Filters

High Performance Cell Culture Media, Reagents, and Supplements

Classical Cell Culture Media and Reagents

Ensure quality cell culture with a wide range of classical media and reagents to support the growth and maintenance of a variety of cells and cell lines. From establishing and maintaining basic cell cultures to more advanced cell models, Sartorius offers a range of optimized ready-to-use products designed to meet your research needs. Each lot is manufactured under a strictly controlled process according to a Product Master Record to provide lot-to-lot consistency. Our excellence and expertise provide you with the safest, most dependable, and consistent cell culture media products.

- Manufactured with the highest-grade raw materials, sourced from qualified and approved suppliers
- Ready-to-use media in concentrated liquid formulations
- Varied packaging options



Transfection Reagents for Life Science Research

Our extensive range of ready-to-use transfection reagents are suitable for research involving most mammalian primary cells and cell lines. These best-in-class transfection products allow scientists to study the function of a protein of interest, its role in a signaling pathway, perform genome editing using plasmid-based or RNA-based proven methods, and to conduct cost-effective RNA interference to transfect guide RNA and express Cas9 protein in mammalian cells.

- Ready-to-use transfection reagents suitable for most mammalian primary cells and cell lines
- Specialized reagents for targeted gene expression, genome editing, and RNA interference studies



Lab Instrument Services

Sartorius' certified and accredited services ensure the quality of results, guarantee equipment longevity, and reduce downtime.

- Installation and Commissioning
- Qualification IQ | OQ
- Training
- Software Updates | Upgrades
- Maintenance and Service Agreements
- Calibration



Germany

Sartorius Lab Instruments
GmbH & Co. KG
Otto-Brenner-Strasse 20
37079 Goettingen
Phone +49 551 308 0

USA

Sartorius Corporation
565 Johnson Avenue
Bohemia, NY 11716
Phone +1 631 254 4249
Toll-free +1 800 635 2906

 For further information, visit
www.sartorius.com/biologics