

## GENOME-ENGINEERING SERVICES

PROFESSIONAL | OPTIMISED | FLEXIBLE

### WHAT WE OFFER

- Knock-outs/Knock-ins
- Gene tagging
- SNP/mutation insertion & correction
- Larger knock-ins

We offer highly flexible services from project consultancy to scale-up and banking of your master cell bank. Our team of experienced cell scientists possesses several years of in-depth and hands-on knowledge to accelerate your iPSC genome-engineering projects.

From initial project consultancy to eventual scale-up and banking of your master cell bank, our team delivers high-quality results. With several dozen cell-line engineering projects under our belt, we have established and operate a cell-engineering pipeline exceptionally adapted to genome-editing projects utilizing iPSCs.

Our pipeline covers the entire workflow – from project planning to master cell bank. Alternatively, we offer various entry points into our pipeline that can benefit your projects.

Start your project with us today!



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Stay in touch



# Handling and delivering the single cells that matter!



# Effortless single-cell cloning with high-quality outcome



- Cutting-edge technologies
- Innovative products
- Flexible services



## isoCell

**Isolate, feed and harvest your cells**

Automatically isolate, feed and harvest your cells for consistent results in every experiment, e.g. cell-line development.

The **isoCell** manages all tedious pipetting steps for you: isolating single-cells, feeding at any interval you choose and then harvesting your culture for downstream analysis. Automated wireless data-transfer between **isoCell** and **isoHub** guarantees a seamless and efficient workflow.



## isoPick

**Isolate and pick single cells**

Automatically isolate and pick single cells - gently! The **isoPick** manages all tedious pipetting steps for you: dispensing cells into **GRID** chambers, and transferring selected single cells flexibly into different formats compatible with your downstream applications! Wireless communication between **isoPick** and **isoHub** guarantees a seamless and efficient single-cell isolation process.

Cooling packs as accessories



## GRIDTechnology

**What are GRIDs?**

- 256 cell-culture chambers
- 1.8 mm x 1.8 mm area per chamber
- < 1  $\mu$ l working volume per chamber

Single-cell cloning in optically clear chambers and small volumes GRIDs comprise the core of an automated and streamlined single-cell isolation and cloning workflow developed by **iotaSciences**. The chambers' small size and optical clarity allows highly reliable in-chamber verification of clonality with the **isoHub** directly after plating, while the **isoCell** or **isoPick** automate all tedious liquid handling steps.



## isoHub

**Verify monoclonality and track your clones**

After single cells are plated into **GRID** chambers, cells are imaged using **isoHub**. Entire **GRID** chambers can be viewed in the absence of optical edge effects typically associated with conventional culture plasticware, allowing absolute confidence in identifying chambers that contain a single cell. The **isoHub** automates navigation through **GRIDs** and allows tracking of your clones, either using brightfield or fluorescent mode.



## isoHub Imaging

**Document clonality with whole-chamber images**

The **isoHub** imaging system allows users to document monoclonality and clonal outgrowth at a click of a button. Simply select **GRID** chambers that contain a single cell and the imaging system will record and document your selection with a whole-chamber image. Users can easily take follow-up images of relevant chambers throughout the process and document clonal outgrowth. Image files are auto-named and sorted according to the chamber's details, providing a history for each selected single cell - from start to finish - for a fully transparent process record.

## isoHub Fluorescence

**4-channels & 16 LED wavelengths – any fluorophore**

The Cloning Platform features a pE-4000 illumination system for fluorescence microscopy. The system is controlled via a highly user-friendly touchpad and allows the detection of all commonly used fluorescent molecules, including GFP, RFP, DAPI and many others.