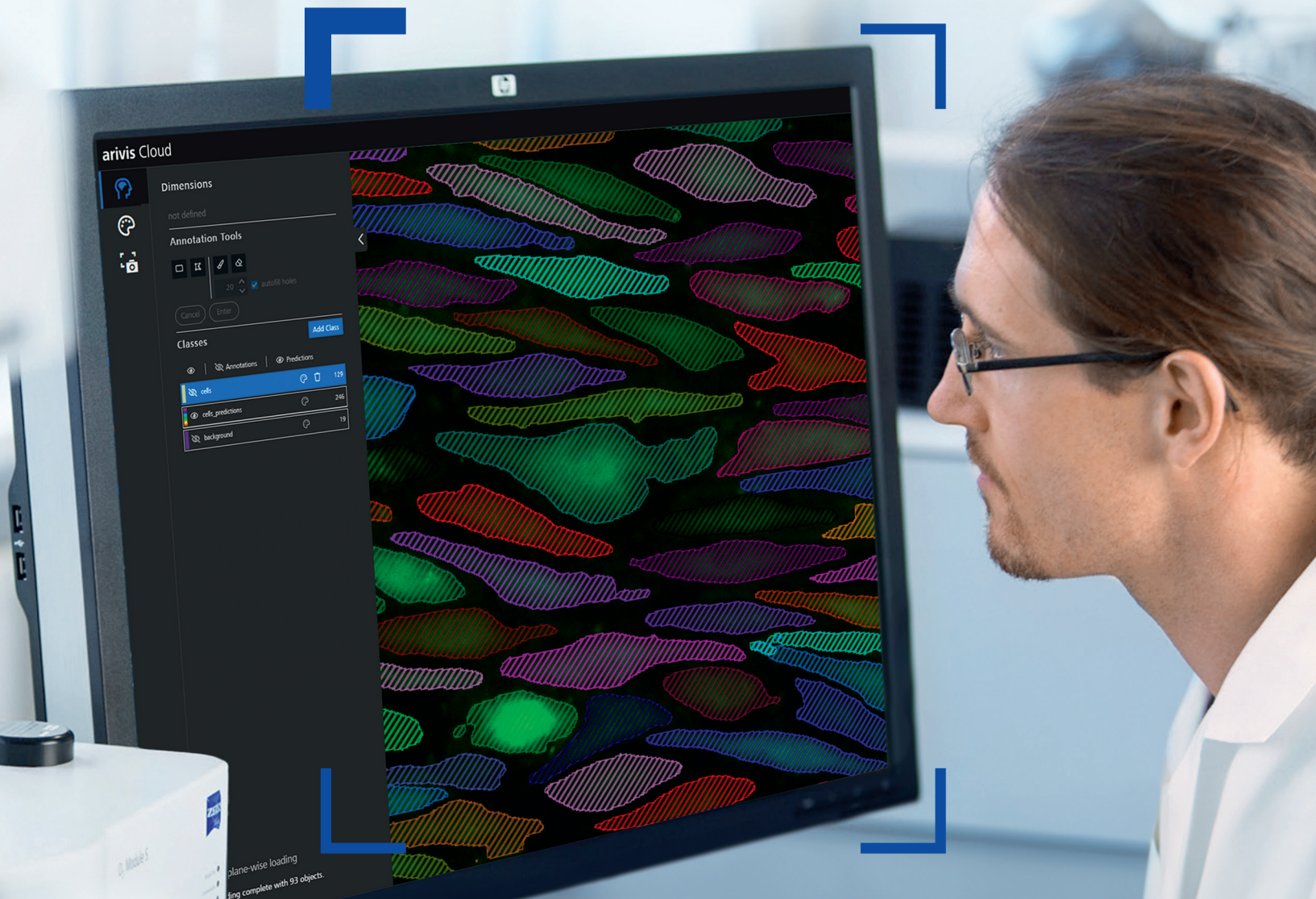


Making AI for Image Analysis Accessible with No Coding.



ZEISS arivis Cloud

Cloud platform for training AI models focusing on image segmentation and analysis

www.zeiss.com/arivis-cloud



Seeing beyond

Image Analysis Boosted by AI.

For higher throughput, reliable, and reproducible results.

Enhance image analysis with AI-powered automation

Unlock the full potential of AI for your image analysis. Train AI models for image segmentation on your data in the cloud, whether in the lab or on the go.

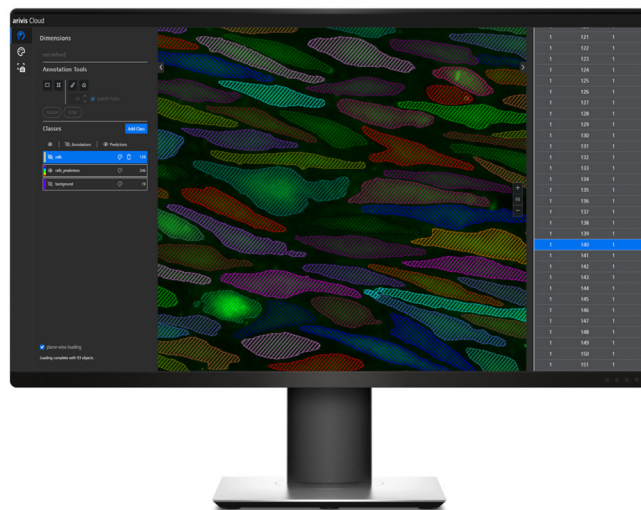
Adapting a model to match your specific image analysis task is easy. Make the most of both experimental flexibility and standardized ready-to-use pipelines.

Achieve high-quality segmentation for any structure. Even for tasks previously impossible with conventional methods, Deep Learning does the trick.

AI-driven image analysis sets a new standard for reproducibility and throughput. Step into a new era of streamlined image analysis with **ZEISS arivis Cloud**.



arivis Cloud



Making Deep Learning accessible

No need for coding. Easily train and customize your AI models using the **arivis AI toolkit**, hosted on **ZEISS arivis Cloud**.

Intuitive user interface

Supports novice users and experts in all the steps of training a Deep Learning model.

Annotate, train, apply

Only annotate enough objects to get the model off the ground, and tweak only when needed. Let AI do the rest.

Cutting-edge software

The cloud-based solution is always up to date, featuring the latest image analysis algorithms. No more manual downloads or installations required.

Rapid results

Accelerate time-to-market by automating routine and repeatable image analysis tasks. Quickly review results in the cloud.

Analyze anything from anywhere

Log into the cloud platform from the lab or remotely.

Work together

Collaborate with your colleagues and peers to refine and expand shared models and training datasets, for increased model robustness, and reproducible results.

Integration and scalability

AI models can be used directly in the cloud or integrated into pipelines in **ZEISS arivis Pro** or **ZEN** and **ZEN core**. Scale up your analysis with **ZEISS arivis Hub**.

Analyze images from any system or manufacturer

- Confocal Microscopy
 - Widefield Microscopy
 - Lightsheet Microscopy
 - Electron Microscopy
 - Computer Tomography/MRT
 - X-Ray Microscopy
 - Multiphoton Microscopy
- Vendor-agnostic image analysis; no matter the source, no matter the image format.

Image analysis software for various applications

- Cell Biology
 - Developmental Biology
 - Cancer Research
 - Neuroscience
 - Immunology
 - Translational Research
 - Physiology
- And many other fields, including materials and geological sciences.

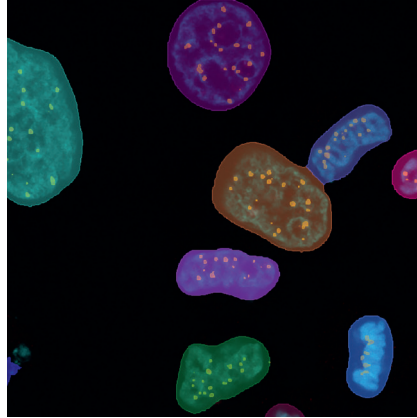
AI-powered, Automated Solutions.

Free up your time with automated image analysis.



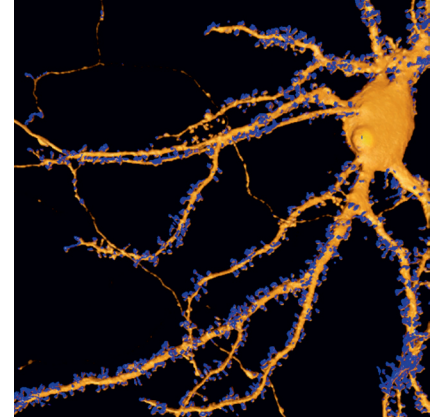
Cell Tracking

Accurately segment individual cells with instance (object-based) segmentation to track movement with high fidelity. Improved cell segmentation accuracy with AI opens doors for further downstream analysis, not possible with traditional segmentation methods.



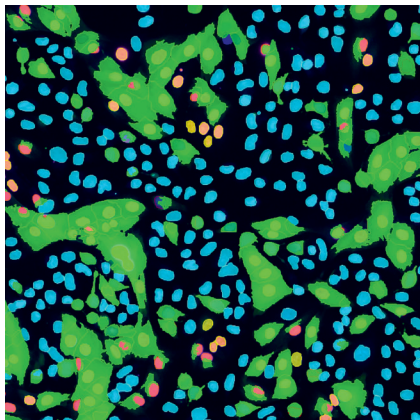
DNA Foci Assay

Segment foci and nuclei separately in 3D with either pre-trained or customized AI models. Once accurately segmented, define and quantify relationships for comparison across diverse genetic backgrounds, drug treatments, or other conditions.



Neural Circuit Study

Leverage semantic (pixel-based) Deep Learning models for segmentation of neuronal projections and dendritic spines in 3D. Downstream quantification allows for an understanding of neural circuit biology in health and disease.



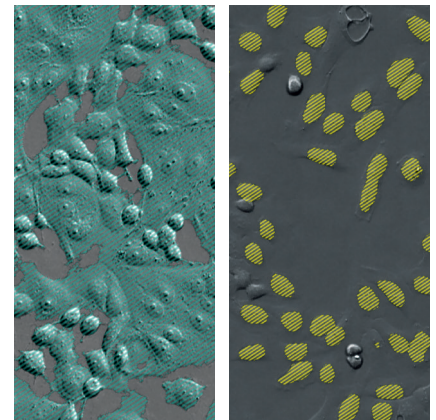
Phenotypic Screening

Easily monitor changes in cell phenotypes across various drug treatment conditions at single-cell and well-plate level. The use of AI in the processing workflow ensures reproducible and reliable results across your full screening experiment.



Organoid Volume Quantification

Analyze your organoids for changes in cell layer formation and single-cell effects with AI. Reliable segmentation allows for improved downstream quantification of how organoid growth and differentiation are affected in toxicity assays, drug screens, and disease models.



Cell Confluency

Cell or nuclei counting

Quantify the confluency of cells, and count cells or nuclei easily with AI. Apply the model to time series and/or multi-well plate data.

Did you find these examples inspiring, but perhaps not a perfect fit to your needs?

ZEISS arivis Cloud can do a lot more. Contact us, our team would love to help you find a solution.



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