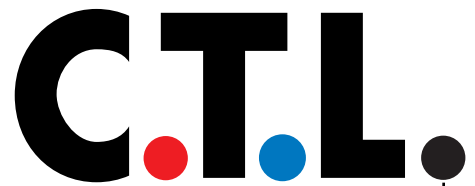


# CTL-ImmunoSpot<sup>®</sup> Analyzers

Elevating ELISPOT to an Exact Science



## Unmatched expertise Quality products Comprehensive solutions

Cellular Technology Limited is the world's leader in ELISPOT expertise and technology. As the pioneer in its field, CTL is the only entity that specializes in developing ELISPOT instrumentation and assays as well as their implementation in GLP-compliant contract research.

The Series 5 line of ImmunoSpot<sup>®</sup> Analyzers has evolved out of CTL's world-class expertise and years of scientific experience. ImmunoSpot<sup>®</sup> Analyzers combine accuracy, flexibility, and scientific methodology, making them invaluable research tools.

The Series 5 Analyzers come in a variety of models that accommodate a wide range of budgets and scientific needs. Every model incorporates the highest quality components and CTL's advanced analysis tools, thereby ensuring that accuracy and precision are not compromised.

Series 5 Analyzers are not just for ELISPOT assays! Thanks to their quality engineering and versatile designs, they can also be used for analyzing other microtiter plate-based bioassays. These include bacterial, yeast, stem cell, and tumor colonies, as well as viral plaque assays and more.

Each Series 5 model employs CTL's proprietary *SmartLux*<sup>™</sup> or *SmartLux*<sup>™</sup> 3D illumination systems. These technologies allow the user to customize the illumination techniques, thereby optimizing them for a wide range of assay types.

CTL will gladly assist you in selecting the instrument that best meets your specific need and budget. No matter

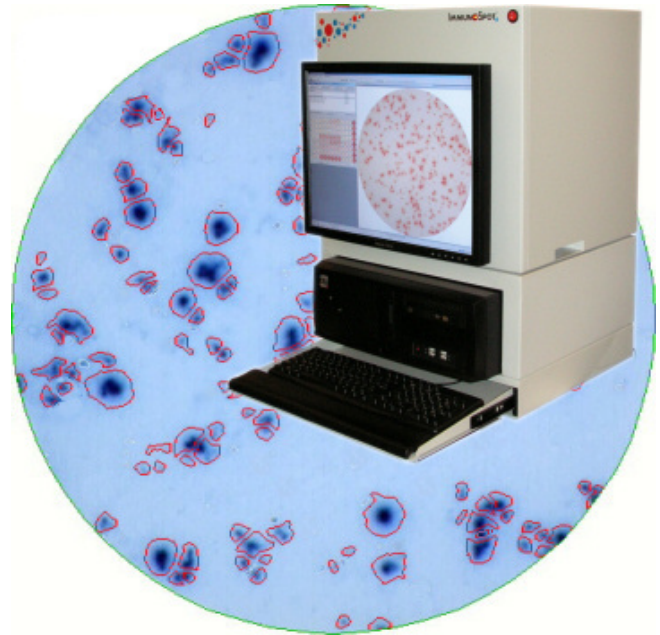
what you need—versatility, resolution, or affordability—CTL has a solution for you.

### CTL-ImmunoSpot<sup>®</sup> S5 Core

The S5 Core Analyzer is ideally suited for dealing with limited plate formats. The S5 Core is typically configured for use with 96-well plates; however, it can be customized to provide fixed magnification for 6-, 12-, or 24-well plates with superior image quality. Its high-performance backlight makes it an ideal choice for scanning ELISPOT plates, viral plaque assays, yeast or bacterial colonies, and more.

### CTL-ImmunoSpot<sup>®</sup> S5 Macro

When you need versatility, the S5 Macro Analyzer is the instrument of choice. This model is ideally suited for counting objects under 100  $\mu\text{m}$  in diameter, and it is designed to handle 6- to 96-well plates with optional support for Petri dishes as well. It is the best choice for customers who work with different assay types and want the ultimate in plate scanning versatility.



### CTL-ImmunoSpot<sup>®</sup> S5 Micro

By miniaturizing classic bioassays, one can dramatically increase throughput, cut analysis time, and reduce costs. Such miniaturized assays require microscopic image analysis though, thereby requiring the use of specialized hardware.

The S5 Micro's optics permit seamless switching between the 24-, 48-, and 96-well plate formats. They also allow the user to zoom in for even higher magnification, counting objects less than 10  $\mu\text{m}$  wide... including individual cells!

The S5 Micro can be upgraded with the *BioLux*<sup>™</sup> lighting system for even better illumination. In addition, CTL provides motorized zoom and GLP support packages for enhanced repeatability.

Want to get the best possible performance out of this machine? A few simple upgrades are all that's required!

## CTL-ImmunoSpot® S5 UV

The S5 UV Analyzer is CTL's most advanced model. In addition to providing high-resolution visible light analysis, it also incorporates a UV light source for fluorescent applications—FluoroSpot, cell cycle analysis, cell viability tests, apoptosis tests, and much more.

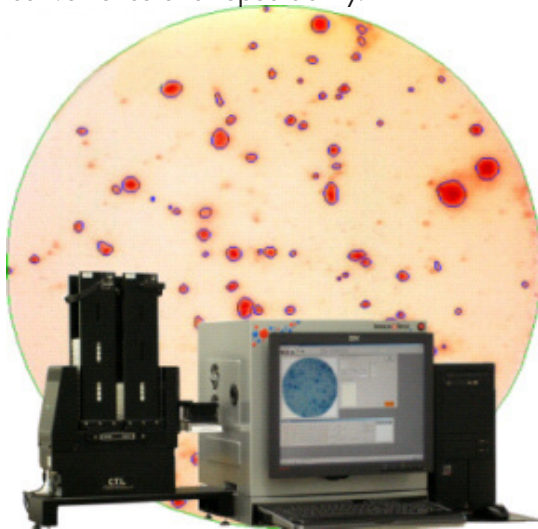
The automated filter changer allows up to six wavelengths of fluorescent analysis. Its high-magnification lens lets the user view the the entire well bottom within 96-well plates, zooming in for further detail as needed. It also provides exceptional speed for rare event, single-cell analysis applications—generating results up to 120 times faster than flow cytometry. Finally, there's the motorized lens option, which provides increased convenience and repeatability.

Key features	Series 5 Analyzer model			
	S5 Core	S5 Macro	S5 Micro	S5 UV
Camera resolution	2048 × 1536	2048 × 1536	2048 × 1536	1388 × 1038
Lens type	Fixed but customizable to customer needs	Manually adjustable	Manually adjustable. (Motorized version also available.)	Manually adjustable. (Motorized version also available.)
Plate formats supported				
96-well plates	Customizable	✓	✓	✓
48-well plates		✓	✓	✓
24-well plates		✓	✓	✗
12-well plates		✓	✗	✗
6-well plates		✓	✗	✗
60mm Petri dishes		Customizable	✗	✗
100mm Petri dishes		Customizable	✗	✗
High resolution & magnification	✗	✗	✓	✓
Lighting system	SmartLux™	SmartLux™	SmartLux™ Upgradable to BioLux™	SmartLux™ 3D



### What is SmartLux™? SmartLux™ 3D? BioLux™?

SmartLux™ is CTL's intelligent lighting system. SmartLux™ incorporates proprietary upper and lower lighting sources to provide even illumination and enhanced image quality. BioLux™ integrates an additional light source for darkfield imaging of small objects, whereas SmartLux™ 3D integrates upper, lower, and coaxial light sources for versatile analysis of both fluorescent and visible light assays.



For customers who perform regulated, high-throughput work, GLP/CFR-21 Part 11 and plate stacker upgrades are available for most models. Please inquire for details.

### GLP Compliance

All ImmunoSpot® Analyzers can be used in GLP-compliant environments. CTL supports customers in establishing a validated status for their devices. In addition to offering installation qualification (IQ) for the instrument, CTL can also assist with performance qualification (PQ) and with configuring it for 21 CFR Part 11 compliance in the customer's environment.

**Unparalleled sensitivity.**  
**Unparalleled accuracy.**  
**Unparalleled quality.**

**For when scientific accuracy matters the most.**

For further information, please contact us at (216) 791-5084 or at [info@immunospot.com](mailto:info@immunospot.com).  
You can also visit us at [www.immunospot.com](http://www.immunospot.com).