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PRODUCT DATA SHEET	zenCELL owl			



Purpose:

Monitor your cell cultures in real-time with 24 miniature microscopes that observe your assay from inside the incubator

Application examples:

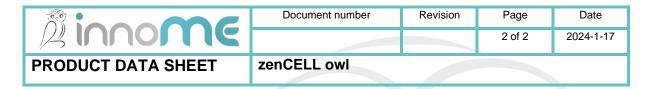
- Documentation and analysis of cell growth
- Continuously determination of cell confluency
- Analysis of component effects on cell cultures (e.g. cytotoxicity or biocompatibility)
- Migration or Scratch assays
- Stem cell observation
- Spheroid growing and monitoring under stable conditions

Features:

The zenCELL owl is designed to capture brightfield images of your cell cultures at a frequency of your preference while simultaneously conducting analyses for cell coverage and cell number. Additionally, it offers the flexibility of digital phase contrast. The acquired dataset can be efficiently organized within the zenCELL owl's software, allowing for sorting and graphing. Alternatively, you have the option to export the dataset for use with other methods, streamlining the data organization process for scientific studies.

By facilitating parallelized experiments and the generation of robust datasets, the zenCELL owl enhances reproducibility in your research endeavors. This innovative approach not only simplifies data management but also ensures that your experimental outcomes are reliable and readily accessible, contributing to the overall efficiency and credibility of your scientific studies. With a compact footprint roughly the size of a standard cell culture plate, the zenCELL owl optimizes incubator space, providing ample room for additional cell culture ware or multiple systems. This feature enables parallel usage with other experiments, enhancing efficiency and flexibility in your laboratory setup. The completely enclosed housing is sterilizable using Isopropanol or other common disinfectants for wipe cleaning, ensuring a sterile environment.

Unlock the potential for a diverse range of applications and enjoy continuous cell monitoring with the zenCELL owl. Its space-saving design and versatile sterilization options make it an ideal choice for seamlessly integrating into your laboratory workflows.



Technical data

General technical data

System Requirements	Windows® 7, 8, 10, or 11 (32/64 Bit, 2.5 GHz 4		
	cores, 8 GB RAM)		
Interface (power supply, data exchange)	1x USB 3.0		
Magnification	10 x		
Field of view	1.2 mm x 0.9 mm		
Image Resolution	5 MP		
Display resolution per microscope	2592 x 1944 pixels		
Software incl. Algorithms	Cell coverage		
	Cell number (fibroblasts)		
Measuring rate / Adjustable recording interval	5 min.* – 24 h.		
Image capture	30 s for 24 wells		
Export Formats	Picture: PNG, BMP, JPEG/JPG		
	Dataset: CSV		
Light Source	LED		
Camera	5 MP CMOS		
Optical Filters	No Filters		
Operating Temperature	20°C - 45°C		
Humidity -operation	20% - 95% rel.		
Storage Temperature	0°C - 50°C		
Protection	IP62		
Sterilization	Isopropanol		
	Ethanol		
Dimension (H x W x D)	105 x 180 x 180 mm		
Weight	1050 g		
Warranty	1 year		
Warranty	1 year		

Equipment

Scope of delivery

Item name	Item No.
zenCELL owl	310100
Incubator microscope	
> USB 3.0 cable	
Universal adapter frame	
> Mini-PC	