

IndustryNews

Introducing the New Home for Remel, Oxoid, and TREK Technical Resources



ThermoFisher Scientific will incorporate the Oxoid, Remel, and TREK websites. This will provide a single source for technical resources and documentation relating to Thermo Scientific™, Oxoid™, Sensititre™, and VersaTREK™ products. In addition, full access to a range of up-to-date tools, resources, and featured content designed for microbiology laboratories will be provided.

ThermoFisher Scientific
www.thermofisher.com

New App for Portable, Fast Weld Inspection of Complex and Oversized Parts



The new WeldSight™ Remote Connect app for the OmniScan™ X3 phased array flaw detector streamlines the weld inspection workflow by enabling users to perform every step via WeldSight software. Combined with Olympus scanners and probes, this phased array ultrasonic testing (PAUT) solution minimizes manufacturing delays caused by inefficient nondestructive testing (NDT) methods.

Olympus
www.olympus-ims.com

Spectral Instruments Imaging and InVivo Analytics Announce Partnership



Spectral Instruments Imaging has announced a partnership with InVivo Analytics. The combination of InVivo Analytics technology and the Lago X imaging system will provide customers best-in-class sensitivity and automated quantitative analysis of bioluminescence reporter distribution across different animals, entire cohorts, and study time points. The partnership will offer quantitative 3D bioluminescence with the Lago X imaging system.

Spectral Imaging and InVivo Analytics
spectralin vivo.com

Agar Scientific Launches New Copper TEM Lift-Out Grids



Agar Scientific recently launched new copper TEM lift-out grids specifically designed for FIB applications. The grids are a secure way to attach TEM lamellae to the posts of a lift-out grid, which can then be imaged easily in a SEM/FIB or TEM and used for EBSD analysis. The grids are high-quality and have crisp, well-defined edges. They are available in 4 styles: 3-post, 3-post with side access, 4-post, and 5-post.

Agar Scientific
www.agarscientific.com

RPMC Lasers Establishes Exclusive Partnership with Dausinger + Giesen



RPMC Lasers is excited to announce an exclusive distribution agreement with Dausinger + Giesen GmbH, allowing the companies to offer their thin disk lasers and thin disk components. D+G provides leading-edge thin disk laser components, such as thin disk gain media, thin disk pump modules, Pockels cells, and high-power optomechanics. They also provide high-performance, versatile, fast and ultrafast thin disk lasers, as well as regenerative amplifiers, linear amplifiers, demonstrators, prototypes, and designs.

RPMC Lasers
www.rpmclasers.com

New Digital Surf Support Center



The new Digital Surf support center can track support requests and interact with users to easily create and manage support queries, follow support requests via a unique ticket identification, interactively update requests, and provide notifications by email about new activity on a request.

Digital Surf
www.digitalsurf.com

Copia Scientific, Reseller and Service Provider



Copia Scientific is a reseller and service provider of laboratory equipment, providing turnkey solutions for surplus via direct purchase, consignment, and auctions. Formed by industry experts with more than 40 years of combined experience, Copia also specializes in service, method development, maintenance, and refurbishment of liquid handling, laboratory automation, microscopy, flow cytometry, and detection technologies. Headquartered in Massachusetts, with additional operations in Southern California, Copia offers international sales and nationwide service options.

Copia Scientific
www.copiasci.com

Remote Learning Facilitated by MyScope Explore



In response to the COVID-19 pandemic, MyScope Explore and the University of Newcastle have developed a remote learning scanning electron microscopy program with a stimulator and other activities. The virtual program provides educational modules covering the parts of an SEM and how they work, along with several suggested activities and lesson plans for undergraduate students. The program has been highly successful and constitutes a platform that can be used in the future by universities to teach microscopy remotely.

University of Newcastle
myscope-explore.org

Cameca Announces Strategic Partnership with Polytechnique Montréal



In a partnership with Polytechnique Montréal University, CAMECA will provide its latest atom probe tomography (APT) instrument for research. The Invizo 6000 provides a patented electrostatic design enabling a simultaneous increased field-of-view and enhanced mass resolving power, a deep UV laser to promote enhanced ion emission, advanced dual-beam delivery optics improving specimen symmetry, and a new extraction electrode design. These new features enhance specimen yield, increase data quality and analysis volumes, and expand the analytical capabilities of the APT method.

CAMECA
www.cameca.com

DECTRIS CEO Change Doesn't Shift the Company's Direction



Matthias Schneebeli became the DECTRIS CEO at the beginning of the year, giving board chairman Christian Brönnimann a chance to focus on coaching and advising the team. The company is going through internal changes, but the strategy and customer support will stay on the plotted course.

DECTRIS
www.dectris.com

GATAN's WhatsCL.info Website Elevates the Cathodoluminescence Experience



The WhatsCL.info website continues to enhance the cathodoluminescence (CL) experience with a major upgrade. Many experimental briefs, application notes, and webinars that dig deeper into the many applications of CL microscopy have been added. Some highlights are: 1) major, minor, and trace element distributions in a meteorite revealed by energy dispersive spectroscopy and cathodoluminescence spectroscopy; 2) cathodoluminescence as a technique for inspection, metrology, and failure analysis of micro-LED processing; and 3) spectroscopic analysis of ultra-wide bandgap semiconductors.

Gatan
www.gatan.com

Linkam Updates its Humidity Control Range of Instruments



Linkam Scientific Instruments, an expert in sample characterization, has launched the latest update to its range of humidity control systems. The new RHGen Relative Humidity (RH) Controller offers humidity control between 3% and 95%, at temperatures from ambient to 85°C, with an upgraded RH sensor and improved connectors. This provides environmental control to a variety of Linkam temperature control stages and third-party chambers.

Linkam Scientific Instruments
www.linkam.co.uk

New Semiconductor Tool by Park Systems Combines Atomic Force Microscopy with White Light Interferometry



Park Systems has launched the Park NX-Hybrid WLI, an integrated system that combines atomic force microscopy (AFM) with white light interferometer (WLI) profilometry. WLI is a non-destructive, non-contact, optical technique used to generate 2D and 3D models of surfaces widely used for semiconductor production quality assurance. The Park NX-Hybrid WLI is a powerful semiconductor metrology tool that incorporates the best of AFM and WLI technologies into one seamless system.

Park Systems
www.parksystems.com

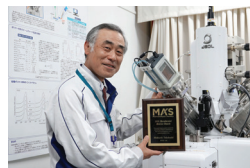
COXEM Partners with JH Technologies for North American Distribution



Coxem has announced JH Technologies as their new distributor for North America. JHT is a leading distributor of optical and digital imaging systems and recently acquired the rights to distribute, market, and service the COXEM product line. JHT microscopy customers often need higher magnification and resolution. The ability to offer SEM imaging will help achieve this next important step.

JH Technologies and COXEM
www.jhtechnologies.com
www.coxem.com

Congratulations to Dr. Hideyuki Takahashi of JEOL



Dr. Hideyuki Takahashi of JEOL recently received the MAS Presidential Science Award. He is known for his work in novel chemical mapping techniques in electron probe microanalysis (EPMA). Recently, he has been at the forefront of soft X-ray emission spectroscopy (SXES) in EPMA development. Dr. Takahashi has authored and co-authored over 80 papers and has been an invited speaker at many international conferences.

JEOL
www.jeolusa.com

Fastest FE-SEM by FBT



Focus e-Beam Technology has produced the world's highest-throughput scanning electron microscope (SEM), Navigator-100 (field emission), with imaging speeds more than 10 times the throughput of a conventional SEM. The direct electron detection methodology overcomes traditional SEM limitations in terms of sample damage, speed, and precision, essentially upgrading an SEM to a sub-nanometer camera. At the same time, the system provides ease of operation, is fully automatic, and provides 24/7 unattended operation capability to improve efficiency of scientific research.

Focus e-Beam Technology
www.focus-ebeam.com/en

ProductNews

Direct Electron Detectors and Readout Systems



For optimum results, TEM and synchrotron research requires reliable, high-performance, easy-to-use direct electron detection

and readout solutions. Quantum Detectors' direct electron detectors and readout systems provide high sensitivity, resolution, acquisition speed, and efficiency, without compromise.

Quantum Detectors
quantumdetectors.com

Acid Storage Cabinet



The HEMCO Acid Storage Cabinet is specifically designed for the storage of corrosive chemicals and is available in 12", 18", 24", 30", 36", 42", and 48" widths. The standard size is 35" high and 22" deep. The molded one-piece fiberglass liner inserts directly in the cabinet and

is sealed on all edges for ease of cleaning. The interior features a containment lip on the front bottom edge to hold spills. The front doors have air vents, and edges are sealed.

HEMCO
www.HEMCOcorp.com/labfurn.html

Bruker Introduces Fast BioAFM for Automated Mechanobiology



The NanoWizard V BioScience AFM is a very fast novel system with new automation and ease of use for life science atomic force microscopy research. The NanoWizard V can be fully integrated

with advanced optical microscopes and enables rapid, quantitative mechanical measurements and analysis of dynamics on samples ranging in size from sub-molecular to cells and tissues. Automated setup, alignment, and re-adjustment of system parameters opens possibilities for long-term, self-regulating experiments on mechanobiological dynamics.

Bruker
www.bruker.com

Vision Engineering Launches VE Cam Compact Digital Microscope



The VE Cam is available in two variants with differing fields-of-view (FOV). VE Cam 50 (50mm FOV) and VE Cam 80 (80mm FOV) both offer the power and efficiency of digital imaging in a compact package. Packed with new and established features, VE

Cams enable users to do more with maximum space efficiency and are ideal for many routine inspection tasks. Suitable applications include electronics, mechanical engineering, plastics, additive manufacturing, and ceramics.

Vision Engineering Ltd
www.visioneng.com

Dragonfly High-Speed Confocal Microscope System



Dragonfly, the most complete imaging solution, just got better and provides a game-changer in confocal microscopy. Andor Dragonfly allows imaging at an unrivalled combination of speed, sensitivity, confocality, and resolution beyond the diffraction limit. Now available in the 200 and 500 series, New Fusion 2.0 software provides a workflow from nm to mm in a single solution.

Oxford/Andor
andor.oxinst.com

Olympus scanR High-Content Screening Station Version 3.3 Adds Improved Deep-Learning Capabilities for Fast, Efficient Image Analysis



The scanR high-content screening (HCS) station provides fully automated image acquisition and data analy-

sis. Version 3.3 improves the deep-learning capability of the system to reliably separate objects in biological samples using instance segmentation, and it provides the ability to detect and delineate distinct objects of interest in an image. Image segmentation enables the software to reliably distinguish cells, nuclei, and other objects.

Olympus
www.olympusamerica.com

Gatan's Comprehensive *In Situ* TEM Ecosystem



The latest Gatan TEM products and DigitalMicrograph software make the entire *in situ* experiment workflow easier and more powerful and flexible than ever before. The products allow *in situ* imaging, diffraction, 4D STEM, EELS, EFTEM, and EDS data collection while controlling the detectors and *in situ* holders with DigitalMicrograph. Software allows measurement of beam dose using counting

cameras, correlation of data with *in situ* conditions via automatic synchronization, data processing, and export to video with the *In Situ* Player and *In Situ* Editor tools.

Gatan
www.gatan.com

ZEISS Introduces an Integrated Solution for Multi-Modal *In Situ* Experiments with Field Emission Scanning Electron Microscopes



ZEISS has introduced the ZEN core ecosystem, giving users access to ZEN Connect, ZEN Intellesis, and ZEN's analytical modules. The integrated solution offers automated *in situ* workflows for highly reproducible, precise, and reliable operator-independent data collection, and high-throughput data acquisition with

high resolution, creating statistically representative results, high-quality data for reliable post-processing, and easy data management.

ZEISS
www.zeiss.com

SubAngstrom Large-Format Cryo-Oven



The SubAngstrom cryo-oven provides a small footprint, allowing integration into any lab space. The 3-row design allows extensive storage space for cryo-EM equipment and accessories, and the optional third row can be removed to

allow storage for up to four Dewars without sacrificing the ability to store tools and clipping stations on the bottom level. The auto-regulated internal temperature ensures tools are dry when needed and not at risk of overheating.

SubAngstrom
subangstrom.com

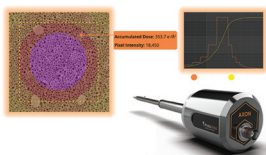
Nanosoft Introduces New Cryo-EM Tools



Nanosoft has introduced new tools and services to improve cryo-EM sample preparation, including a Hybrid Grid Box that has individual pockets for unclipped and clipped grids, a foam vitrification Dewar that is compatible with the ThermoFisher Vitrobot, a Quick Lid that protects frozen grids in their grid boxes during vitrification sessions, and repair services for Vitrobot Tweezers and Clipping Tools/Pens.

Nanosoft
www.nanosoftmaterials.com

Dose from Protochips



Dose is the only system in the world for complete management of electron dose in a TEM. The software provides heat maps for colorful quantitative visualization of beam exposure, dose level indicators that provide an alert when approaching a set level of

cumulative electron dose in a particular area, and spot fading tools to identify sample degradation and contamination build-up. AXON Studio provides integration of all Dose information for organized post-processing of data.

Protochips
www.protochips.com

EDAX Introduces the Clarity Super EBSD Analysis System



The Clarity EBSD Detector Series is the first commercially available direct detector system designed for EBSD applications. The series includes the original Clarity, now called the Clarity Plus, and the new Clarity Super. By

using innovative new technology, both Clarity Detectors provide single-electron detection, zero noise, superior signal-to-noise, and high dynamic range performance. These revolutionary systems provide high-fidelity EBSD pattern quality and unparalleled sensitivity.

Ametek/EDAX
www.edax.com

Norcada Silicon and Silicon Nitride Devices



Norcada has launched a new family of MEMS *in situ* heating devices and their respective *in situ* holders. Nineteen different heating chip combinations cover various sample types, sample preparation processes, and analysis techniques. With dedicated FIB-ready, heating in gas, and extreme high-temperature heater configurations, Norcada devices are designed

to fit many applications. The array of *in situ* holders can be used in any SEM, X-ray microscopy, spectroscopy, and beamline equipment.

Norcada
www.norcada.com

Nanosurf Launches WaveMode, a New AFM Imaging Mode



WaveMode is the fastest force curve-based AFM imaging mode with application to all samples and environments. It represents the first commercially available off-resonance mode that can take advantage of photothermal actuation of the cantilever (CleanDrive), instead of the traditional piezoacoustic actuation, to enable fast, stable, and gentle imaging.

NanoSurf
www.nanosurf.com/en

Seal'N Freeze Cryotray and Box



Seal'N Freeze[®] cryomolds were developed to address common challenges in frozen tissue sample processing and storage. The Seal'N Freeze[®] Cryotray[®] consists of four cryomolds designed for easy separation and batch processing of multiple tissue samples in the Seal'N Freeze[®] Box. Sealable lids provide optimal protection for storage and ensure the uniform shape of each frozen sample.

Electron Microscopy Sciences (EMS)
www.emsdiasum.com

Understand Nature's Complexity with Cutting-Edge Light Sheet Fluorescence Microscopy



Miltenyi Biotec

The state-of-the-art UltraMicroscope Blaze[™] is the only fully automated light sheet microscope for imaging large or multiple-cleared samples, ranging from entire mice to multiple organs and organoids with subcellular resolution. The system provides full automation for ease of

use, imaging of large or multiple samples, and innovative optics for superior subcellular resolution.

Miltenyi Biotec
miltenyibiotec.com