New surface imaging and metrology software for LMI Technologies' MikroCAD optical 3D precision measuring systems

Delta, BC Canada and Besançon, France 11 May 2015 – LMI Technologies and Digital Surf announced that new MikroCAD software based on Digital Surf’s industry standard Mountains Technology® has been integrated into LMI’s MikroCAD optical 3D precision measuring systems. Available in two versions, MikroCAD Standard and MikroCAD Professional, the new integrated software brings state-of-the-art surface imaging, analysis and metrology tools in a smart multi-language user environment, making it possible to produce comprehensive and visual surface metrology reports faster than ever. MikroCAD sub-micron 3D scanners plus the new software provide a complete solution for metrology and quality control of functional surfaces and small parts, including shiny, hard, soft and deformable surfaces (for example paper, rubber and textiles), road surfaces, laser engraving, spot welding, gears and cutting tools.

Providing a generous set of features for all typical applications, MikroCAD Standard software comes with cutting-edge surface imaging and the latest tools for analyzing surface texture and geometry. 3D surface topography is viewed in real-time at any zoom level and angle, with near perfect lighting, optimized color palettes and straightforward image enhancement tools. Intelligent filters remove outliers and prepare the surface for analysis. Surface roughness and waviness are separated using advanced ISO 16610 filtering techniques, and surface texture is characterized by the latest 3D parameters defined in the ISO 25178 standard, together with ISO 12781 flatness parameters and ISO 4287 2D profile parameters. Tribology studies are facilitated by friction, core and lubrication zone graphics and tools for evaluating wear. Distances, areas, volumes and step heights are selected interactively for calculation, and geometric dimensioning of vertical profile cuts and horizontal profiles is carried out with ease.

/continued
There are many more MikroCAD Standard features - for example the extraction and analysis of regions of interest and the analysis of furrows, isotropy, directionality and periodicity – which are complemented by numerous optional modules including grains and particles analysis, 3D Fourier and wavelets analysis, statistics and others.

Furthermore MikroCAD software provides powerful traceability and automation features to speed up analysis. Each step in a surface metrology report is recorded in a hierarchical analysis workflow for full metrological traceability. Reports can be fine-tuned at any time because steps in a workflow can be modified on the fly. New surfaces can be analyzed automatically by applying existing workflows as templates, and new workflows can be created quickly by inserting common sequences of analysis steps (Minidocs or macros) that have been saved for reuse.

MikroCAD is easily integrated into research and production environments. All numerical results can be exported in an Excel-compatible text file for further processing by third party tools including quality management systems. Multi-page surface metrology reports can be published in standard PDF and Word-compatible RTF formats. All images and tables can be output in standard image formats at up to 1200 dpi for integration into posters and presentations.

Top end MikroCAD Professional software is for users with advanced requirements. It includes features in MikroCAD Standard modules and makes it possible to correlate MikroCAD surface data with data obtained by third party microscopes and other surface metrology instruments.

“The new MikroCAD software empowers users of MikroCAD measuring systems by providing them with a comprehensive set of state-of-the-art surface imaging and metrology tools,” stated Chi Ho Ng, Director of Product Management at LMI Technologies. “The integrated software not only incorporates the very latest standards and methods but also makes it quick and easy to create surface metrology reports.”

“LMI’s integration of MikroCAD software reinforces the status of Mountains Technology® software as an industry standard for surface metrology,” stated François Blateyron, COO of Digital Surf. “LMI’s users will benefit from its continuous evolution.”

* * * * *

About LMI Technologies
As the OEM-focused 3D scanning and inspection leader, LMI Technologies is dedicated to developing easy-to-use solutions that increase productivity and profitability for our customers. LMI is shaping the industry with world-class 3D scanning and inspection solutions. Our globally recognized product line includes Gocator All-In-One 3D Smart Sensors, HDI 3D Scanning Systems, MikroCAD 3D Surface Metrology Systems and chroma+scan 3D Log and Board Sensors. For more information, visit www.lmi3d.com.

Digital Surf, founded in 1989, specializes in providing surface imaging, analysis and metrology software for all types of surface metrology instrument including 2D and 3D profilers, optical microscopes, scanning probe microscopes, scanning electron microscopes and hyperspectral instruments. Imaging and analysis software based on Digital Surf’s Mountains Technology® is integrated by leading instrument manufacturers and is used in thousands of laboratories and industrial facilities working in numerous sectors including aerospace, automotive manufacturing, biotechnology, cosmetics, energy, MEMS, materials research, medical, metallurgy, nanotechnology, optics, paper, PCB, plastics, polymers, printing, semiconductor, etc. For more information, visit www.digitalsurf.com.

* * * * *

LMI Technologies
1673 Cliveden Avenue
Delta, British Columbia, V3M 6V5
Canada
Tel: +1 604 636 1011
Contact: Achim Klor
Email: aklor@lmi3d.com

Digital Surf
16, rue Lavoisier
25000 Besançon
France
Tel: +33 3 81 50 48 00
Contact: Clare Jamet
Email: cjamet@digitalsurf.fr