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News Announcement for Emerald BioSystems' Plug Maker™ winning the 2010 Association for Laboratory Automation New Product Award.

Emerald BioSystems Plug Maker™ wins ALA 2010 New Product Award

Low-volume simple-to-use Microcapillary Protein Crystallization System (MPCS™) recognized at LabAutomation 2010

Bainbridge Island, WA, January 26th 2010 – Emerald BioSystems, Inc. today announced that the Emerald BioSystems Plug Maker™ instrument was recognized by the Association for Lab Automation (ALA) with the organization's New Product Award.

The Plug Maker™ grows Diffraction-Ready protein crystals in CrystalCards™ in just nanovolume drops of protein solution. The MPCS uses microfluidic technology that generates up to 800 experiments in a single CrystalCard using every nanoliter of the protein sample, without losing any precious protein solution in dead volume. Sparse matrix and optimization experiments are generated automatically on-chip without the hassle of pipetting crystallization screens by hand.

Now in its fourth year, ALA's New Product Award recognized the top three outstanding new products showcased at LabAutomation2010, the world's leading conference and Exhibition on Emerging Laboratory Technologies. Celebrating the significant breakthroughs and acknowledge the best new laboratory tools, a team of volunteer experts selects three of the most promising new products launched at LabAutomation for the New Product Award. These independent judges assess extraordinary technical originality, anticipated impact, supporting data and market demand.

"This award confirms that the Plug Maker instrument and its underlying technology are a winner – at the Lab Automation Conference and in protein crystallization laboratories. Our customers value the reduced amounts of required protein sample, and that the protein crystals grown are ready to diffract X-rays", said Peter Nollert, Director of Emerald BioSystems.

Cory Gerdts, Sr. Application Scientist with Emerald BioSystems, receiving the New Product Award at Lab Automation in Palm Springs on 24 January 2010: "It is great to see the Plug Maker instrument awarded here at Lab Automation. This instrument is the result of years of development work at Emerald BioSystems and BioStructures and is based on an excellent collaboration with Dr. Ismagilov at the University of Chicago, from which we have successfully translated plug-based crystallization methods from the lab to a real product."

The development of the MPCS and the CrystalCards was carried out by Emerald BioStructures, Inc. and the Accelerated Technologies Center for Gene to 3D Structure (www.atcg3d.org) a specialized center within Protein Structure Initiative 2. It has been a collaborative effort between Emerald BioStructures and the University of Chicago, where the microfluidic technology was originally conceived of in the laboratory of Prof. Rustem Ismagilov, along with development partners thinXXS Microtechnology (Zweibruecken, Germany) and Dolomite Centre Ltd (Royston, UK). Emerald BioSystems is

commercializing the MPCS technology and holds an exclusive licensed patent portfolio in the field of microfluidic protein crystallization, (US Patents 7,129,091; 6,409,832 and patents pending).

Lance Stewart, CEO of Emerald Cos. and Principal Investigator of the ATCG3D commented: “We’ve seen beta versions of the Plug Maker outperform conventional crystallization technologies within the SSGCID (Seattle Structural Genomics Center for Infectious Disease) structure determination pipeline for difficult protein targets. Plug-based crystallization has enabled our researchers to leapfrog the often tedious and slow crystallization optimization process using only very small amounts of protein sample. The Plug Maker is the ‘iPod’ of crystallography, and is so simple that even non-crystallographers will be able to carry out sophisticated protein crystallization experiments. “

More information on the Plug Maker instrument and the associated CrystalCards is available at <http://www.emeraldbiosystems.com/MPCS>

About Emerald BioSystems, Inc.

Emerald BioSystems is a leading provider of instrument and reagent products to structural biologists. Emerald’s research tools accelerate the gene-to-protein-structure determination process through advanced computer aided gene design, automated cell-free protein expression, protein purification, and crystallization. A high level of efficiency for protein crystal generation can be achieved using Emerald’s novel Microcapillary Protein Crystallization System (MPCS™) Plug Maker™ and CrystalCards™ for nanovolume microfluidic crystallization.

<http://www.emeraldbiosystems.com/>

About Emerald BioStructures, Inc.

Emerald BioStructures is an integrated gene-to-structure collaborative research organization specializing in drug discovery services. Emerald operates an efficient high-throughput platform leveraged for fragment-based lead discovery and structure-based drug design. We provide enabling structural insight for breakthrough drugs that are highly selective and efficacious against chosen targets.

www.emeraldbiostructures.com

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