BioSpectrum
the business of Bio & Health Sciences
ASIA EDITION

Thermo Fisher Launches Next-Gen, Compressor-Free Plate Sealer

January 27, 2020 | News

Next-Generation, Compressor-Free Plate Sealer Provides Superior Flexibility and Process Efficiency to Researchers



Thermo Fisher Scientific announces the launch of a next-generation, compressor-free plate sealer, designed to alleviate the maintenance burden on operators while offering unparalleled process customization capabilities, intuitive operation and significant work efficiencies. Biotechnology, pharmaceutical and academic research laboratories can now benefit from a system capable of simplifying the plate sealing process and enabling improved reliability and productivity for both stand-alone, as well as, integrated robotic projects.

The new Thermo Scientific ALPS 5000 Plate Sealer will be showcased during the SLAS 2020 International Conference and Exhibition, being held on January 27–29, at Booth #1105 at the San Diego Convention Center, San Diego, California.

As a fully electrically operated system, the Thermo Scientific ALPS 5000 has been developed to increase the efficiency of the heat plate sealing process and offers maximum flexibility to support high throughput applications. The system eliminates the need for tedious and costly replacement of expensive vacuum cups, onboard compressors and compressed air lines, typically required when using conventional pneumatically driven equipment. As a result, maintenance costs are minimized and quieter operation is enabled ensuring minimal disruption to the working environment. Designed as one of the most user-friendly units available on the market, the ALPS 5000 facilitates easy, tool-free foil loading and does not require the use of adapters to change between different plates. The system is operated via a large intuitive touchscreen with a modern user interface, which allows for precise control over sealing parameters to ensure repeatability while including programming parameters for integration into automation or robotic workflows.

The ALPS 5000 offers superior process customization capabilities to address varying application needs, from polymerase chain reaction and high-performance liquid chromatography to next-generation sequencing, compound storage and flow cytometry. Users can program the sealing time, temperature and pressure parameters to suit their specific requirements. They can also choose the most appropriate sealing foil length, opting for a longer foil to improve pealing or a shorter one to reduce

foil usage by up to 10%. Moreover, the ALPS 5000 offers the flexibility to use either a traditional force sealing or a distance sealing to maximize the number of times a plate can be resealed.

"Reliable plate sealing is essential to researchers who wish to avoid unnecessary experiment repeats and data inconsistency due to sample contamination and evaporation," explains Sung Dae Hong, vice president and general manager for laboratory plastics essentials at Thermo Fisher Scientific. "With storage requirements and laboratory processes becoming increasingly complicated, scientists and researchers are looking for solutions that can simplify their day-to-day operations and meet their specific application needs. Our new ALPS 5000 Plate Sealer has been developed to do just that, streamlining the plate sealing process, improving reproducibility and minimizing maintenance requirements, while preserving precious research."

The ALPS 5000 offers fast sealing times, being able to seal up to four plates per minute. It also features a compact footprint to save valuable bench space. Furthermore, the ALPS 5000 has been equipped with an Eco Mode, which triggers a temperature reduction down to 30C° when the system has been inactive for a pre-specified amount of time, allowing for considerable energy savings.