BioSpectrum
the business of Bio & Health Sciences
ASIA EDITION

PHCNA, On-chip bring world's first damage-free microfluidic chip cell sorter

October 28, 2020 | News

This unique technology is an outstanding partner for the PHCbi portfolio of incubators



PHC Corporation of North America (hereafter PHCNA) has announced a new partnership with On-chip Biotechnologies (USA) Co., Ltd. The partnership will drive the delivery of total cell culturing solutions for researchers and organizations across a wide range of critical applications. Their flagship product is the On-chip Sort, the world's first cell sorter that uses a disposable microfluidic chip for sterile, damage-free, contamination-free sorting.

On-chip Biotechnologies (USA) Co., Ltd., located in Los Angeles, is a subsidiary of On-chip Biotechnologies Tokyo, Japan, the first company in the world to launch a microfluidic chip-based cell sorter on the market

The On-chip Sort delivers highly precise cell sorting while avoiding contamination and offers user-friendly maintenance. The microfluidic cell sorter not only resolves the inherent issues of conventional sorters, but also enables analysis and sorting of cells suspended in the users' choice of culture medium. This unique technology is an outstanding partner for the PHCbi portfolio of incubators.

PHCbi brand incubators are expressly designed to maintain optimal temperature, humidity, CO_2 and oxygen levels critical to mammalian cell growth. The safety of cells processed in On-chip Sort and cultured in the stable conditions available in PHCbi brand incubators will enable researchers to focus on their work, rather than worry about the equipment executing the processing.

The On-chip Sort is transforming the standard approach to flow cytometry. The instrument eliminates the need for sheath tanks and as such, has enabled the miniaturization of the system. Cells are gently moved through the microchannel by air pressure and analyzed at the laser interrogation point. Only the target cells are then pushed into the reservoir.