



MeCour-Huber ultra-low sample management systems will provide you with a powerful new tool minimizing adverse sample impact while increasing throughput. Whether you require a single or a hundred systems to provide temperature control to a few or dozens of samples, MeCour-Huber will work closely with you to provide the perfect solution(s) to meet your requirements.

Unistat® 705w

Constantly cryogenic sample management

Mecour and Huber have coupled their expertise to offer a new product designed specifically to hold and thermally manage samples at cryogenic temperatures to -100 °C with the ability to freeze and thaw the samples at a user specified strictly controlled rate.

The MeCour-Huber ultra-low temperature sample management systems are perfectly suited to laboratory benchtop or classified environments with a variety of accessories to integrate to existing automated platforms.

MeCour-Huber -60 °C benchtop sample management system.

Setup details

Unistat® 705w & MeCour ultra-low temperature sample management system

Temperature range: -75...250 °C
 Cooling power: 0.6 kW @ 250...100 °C
 0.65 kW @ 0 °C
 0.6 kW @ -20...-40 °C
 0.3 kW @ -60 °C

Heating power: 1.5 kW / 3 kW
 Hoses: 2x1 m; M24x1.5 (#9325)
 HTF: DW-Therm (#6479)
 Application: MeCour ultra-low temperature sample management system

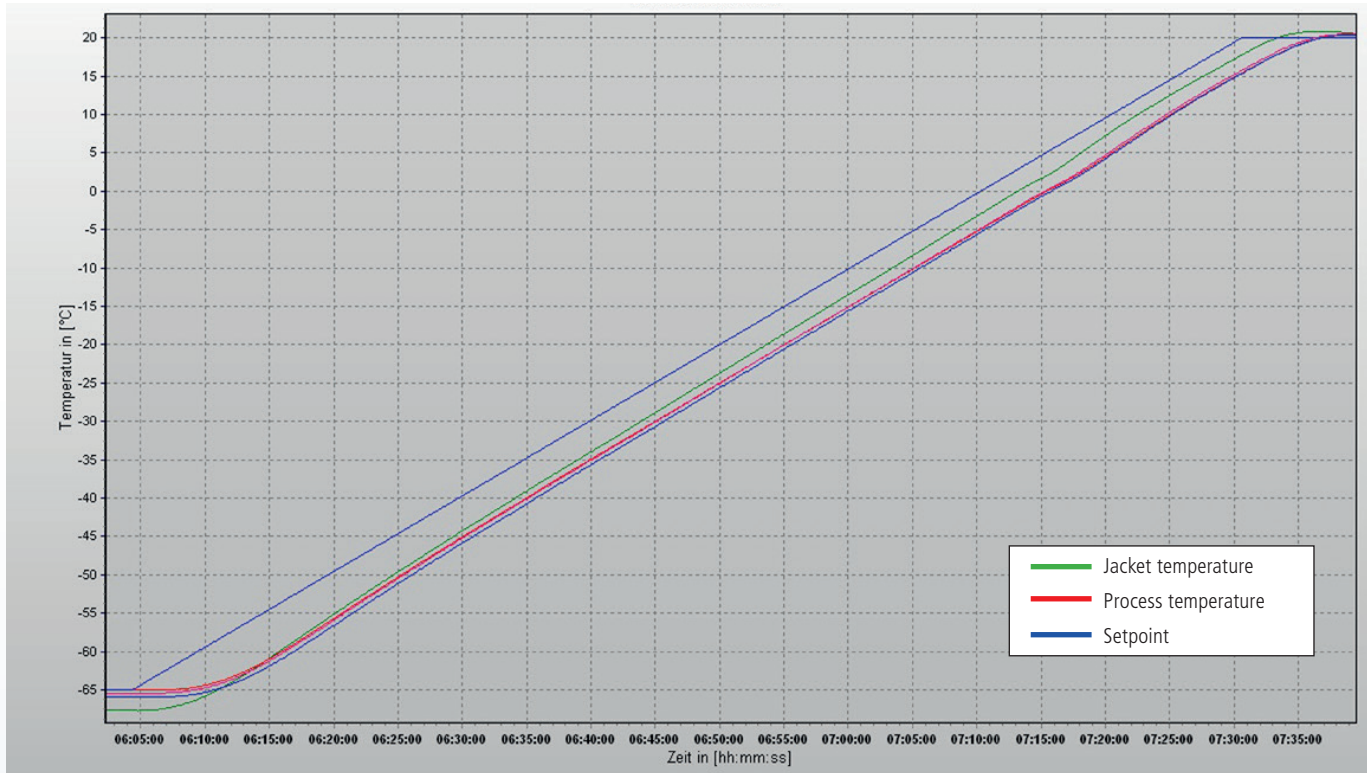
Vials content: 24x1 ml Ethanol
 Control: process



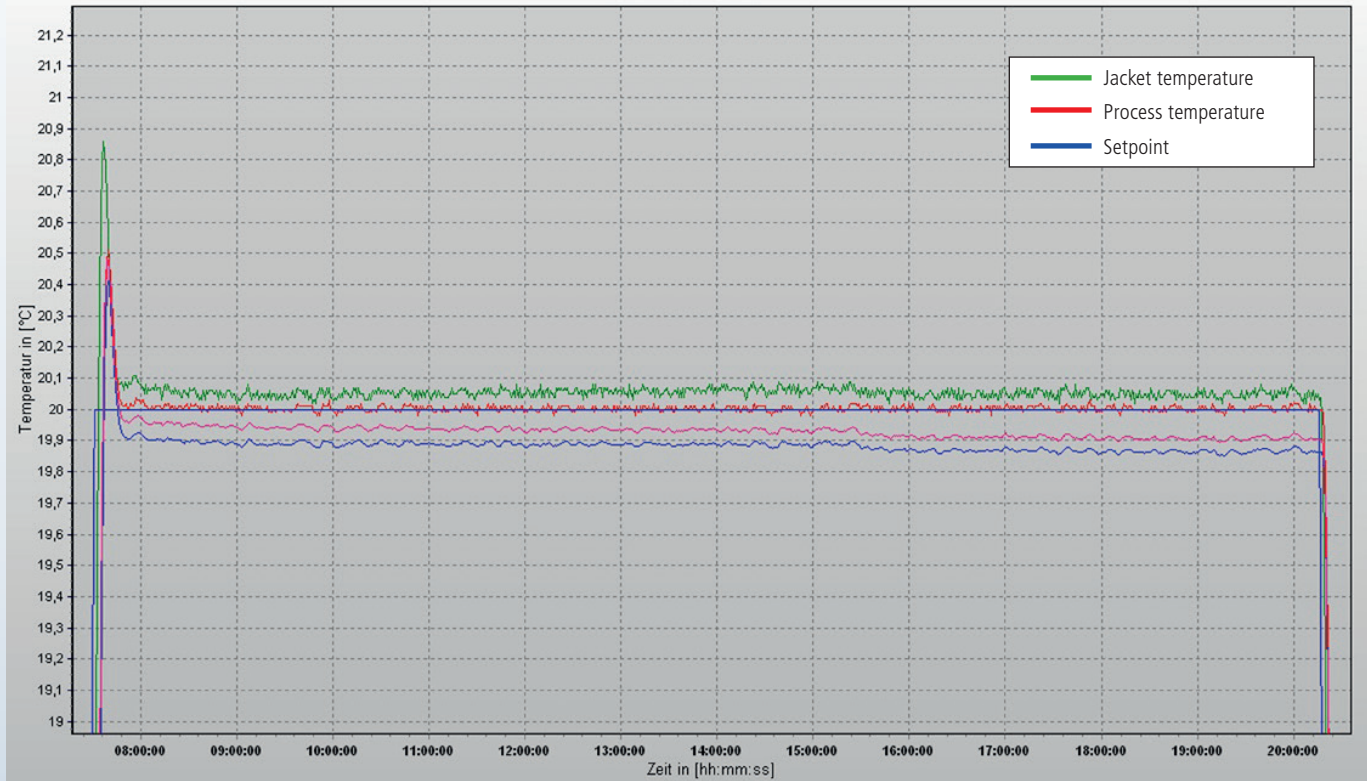
MeCour-Huber has designed systems with tolerances as tight as ± 0.1 °C. The MeCour-Huber ultra-low temperature cryostats are specifically designed to eliminate "edge-effect" and hot/cold spots ensuring precise and accurate temperature distribution across the working areas of the system. The superior performance of these thermal systems has been validated through a number of thermal mapping studies. Results of this testing under both static and ramping conditions are presented in the following figures.



The following thermal mapping data demonstrates the superior precision and stability of the MeCour-Huber ultra-low thermal management systems. More data is available on request.



Thermal mapping study on MeCour-Huber ultra-low sample management system with a specified tolerance of $\pm 1\text{ }^\circ\text{C}$ under controlled ramping conditions, ambient to $-65\text{ }^\circ\text{C}$



Thermal mapping study on MeCour-Huber ultra-low sample management system with a specified tolerance of $\pm 0.1\text{ }^\circ\text{C}$ under static conditions at $20\text{ }^\circ\text{C}$