

EasyMax 102 Advanced Synthesis Workstation

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Objective

- Workstation for the automated execution of chemical synthesis
- Characterization of chemical synthesis
- Optimization of chemical synthesis
- Automated measurement of solubilities
- Work-up of API by recrystallization

Capabilities

- Controlled temperature profiles
- Controlled stirrer profiles
- Design of defined experiments over several days
- Logging of parameters
- Expandable with FTIR and FBRM analysis probes

Equipment

- Two reaction flasks (50 and 100 ml)
- Temperature Probe
- Heating and cooling jacket
- Stirring devices (magnetic and overhead)
- Dosing unit (external SP-50 unit)
- ATR-FTIR and FBRM probes (optional)

Variable Parameters

- Temperature: -40 to 180 °C (jacket temperature)
- Stirring speed: 50 to 1000 rpm
- Dosing flow: 0.1 to 187.5 mL/min (with different syringes)

Time of Measurement

- Some hours up to several days or weeks



Description

The EasyMax Advanced Synthesis Workstation is a fully automated device for the controlled execution of chemical synthesis and for other applications like solubility-measurements, (re)-crystallization or drug work-up.

The EasyMax can be programmed via the devices touch screen menu or via a PC. This allows to design custom reaction routines with which control the reactors temperature, the dosing of solvent and the stirring speed. The experiments can therefore be fully automated which enables process-times of several day.

The device can also be equipped with the optional ATR-FTIR and FBRM probes for in-situ monitoring of the progress of a chemical reaction or the concentration of solved chemical compound and the particle size distribution of a freshly formed crystal suspension.

Parameters like temperature, stirring speed, FTIR-spectra and particle size distribution can be live-monitored and logged on the computer.