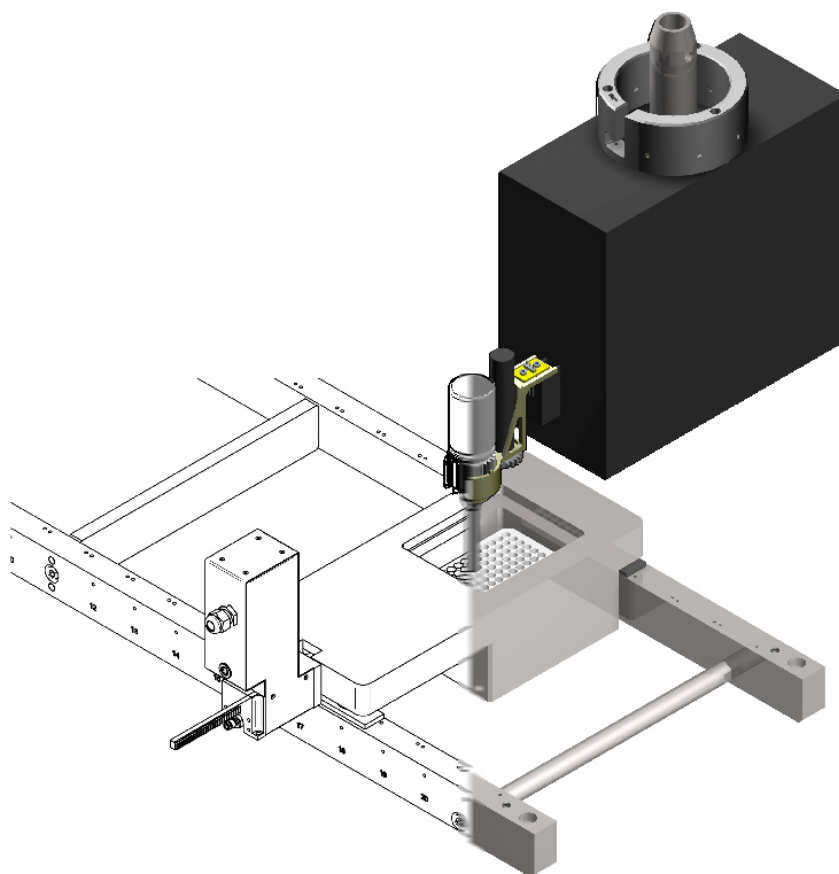


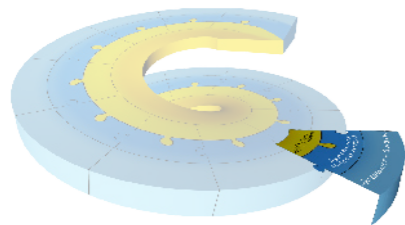
CATSCREEN 96

from concepts to success

- Unattended Catalyst Screening at Ambient and Elevated Pressure in 96-Well Plates -



from concepts to success



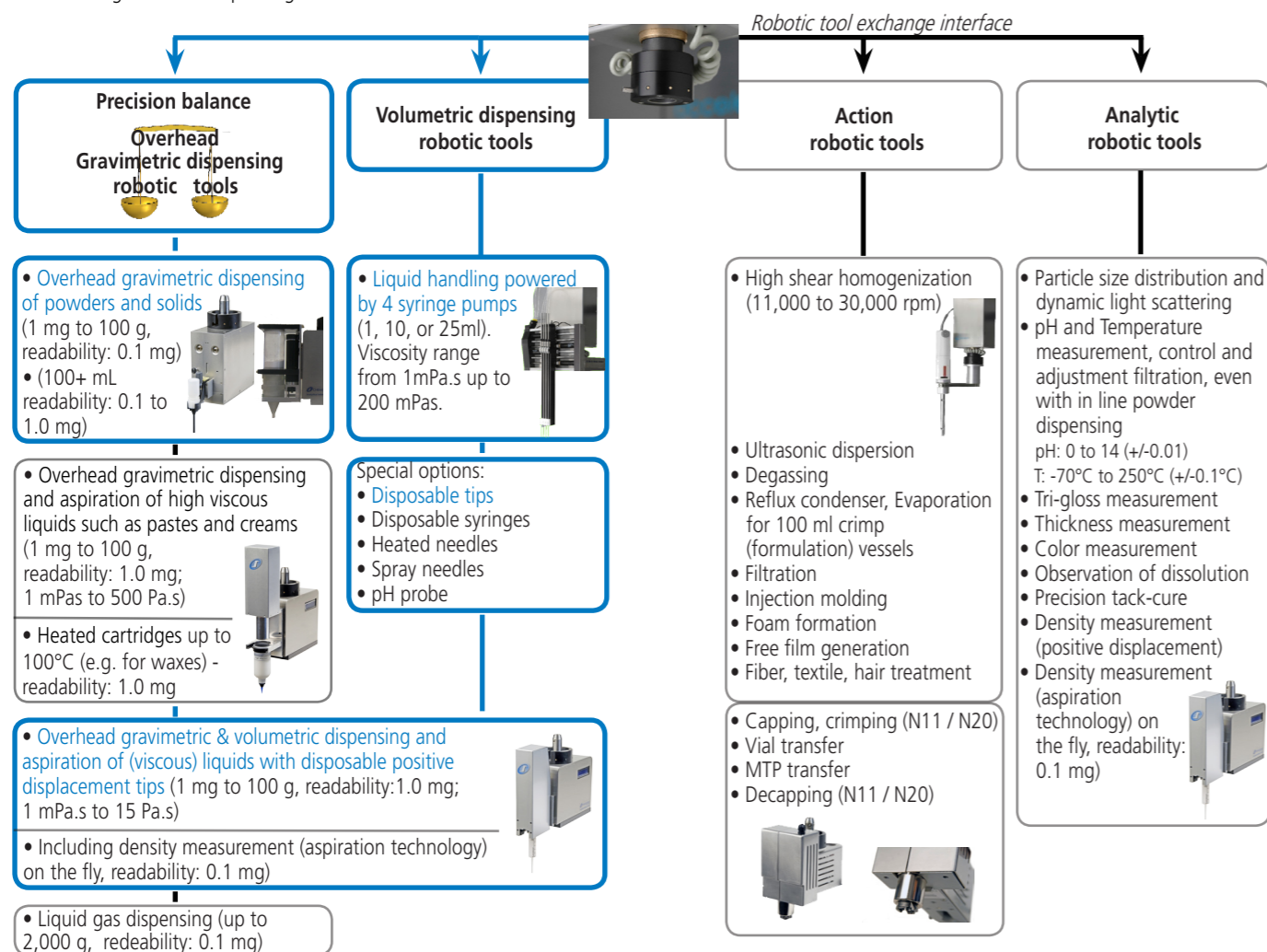
CATSCREEN 96, a modular robotic platform enabling automated catalyst screening at ambient and elevated pressure in 96-well plates

CATSCREEN 96, is Chemspeed's software-driven robotic platform for fast and flexible screening in chemocatalysis in the Pharmaceutical, Agrochemical, and Fine and Specialty Chemicals industries.

- **CATSCREEN 96** brings paradigm shifting modularity enabling an easy to use workflow task driven software
- Exchangeable robotic tools
- Unrivaled gravimetric dispensing technology
- High quality, flexible, and modular disposable reactors
- A large choice of hardware and software tools allow fine tuned adaptation to your workflow

Exchangeable robotic tools & unrivaled gravimetric dispensing technology

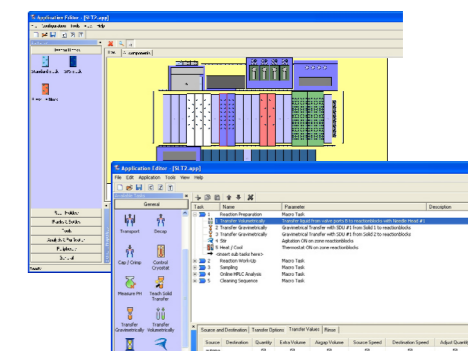
More than 30 features can be delivered with Chemspeed's unique robotic tool exchange technology, including unrivaled overhead gravimetric dispensing tools.



Powered by **AutoSuite CATSCREEN 96** user interface

AutoSuite CATSCREEN 96 is an intuitive user interface software which allows easy workflow orientated programming. Many features such as the gravimetric dispensing steps are automatically calibrated, eliminating tedious optimisation steps.

- The **AutoTeaching** tool simplifies the use of the solids and powders (as well for viscous liquids, waxes, etc.) dispensing task, eliminating the need for manual optimization
- Easy programming: drag-and-drop of formulation workflow steps
- Barcode tracking
- Smooth integration into Chemspeed's workflow management software (see reverse)
- AutoSuite Application Programming Interface (API): for 3rd party software and hardware integration, and standard integration of Spotfire, JMP, VirtualLab etc.

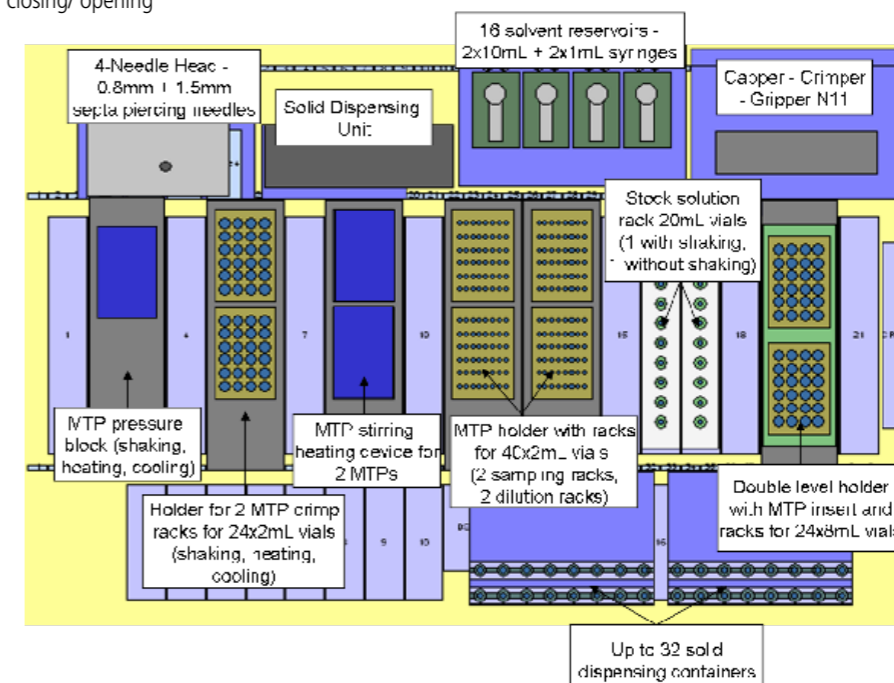


High-quality, flexible, and modular disposable reactors for ambient pressure and pressure ChemoCatalysis

Chemspeed is able to dispense any type of compound into any type of container (vial, microtiter plates, bottles, reactors, formulation vessels etc.) (Please refer to other Workflow Brochures)

Example of a tray configuration with 96-well MTP pressure block, shakable / heatable / coolable rack for MTP formats, MTP stirring, heating device, sampling / dilution racks, overhead gravimetric solid dispensing, 4-channel liquid handling, and much more.

- Glove-box with air-lock
- O₂ and H₂O monitored for controlled inert gas conditions
- Flexible MTP format (24, 48, 96)
- MTP pressure block, 100bar
 - Flexible reactive gas supply (e.g. H₂, CO, O₂, NH₃)
 - Shakable, heatable, coolable
 - Automated closing/ opening
- Flexible vial and MTP transfer tool for e.g. automated transfer to / from MTP pressure block
- Integrated MTP stirrer
- Inertized stock solutions
- Inertized and shaken catalyst suspensions
- Large choice of disposable reactors
- Sampling for online analytics





Accessories

All tools and accessories of Chemspeed's Swing, Sweigher, Swave, Synthesizer SLT II, AutoPlant, Formax, Applicator and Investigator are fully compatible with the **CATSCREEN 96** robotic platform and vice versa (see the high output product development spiral below). Please refer to Chemspeed's other workflow brochures for modularity examples.

- Double-jacket glass and stainless steel reactors for early process development (e.g. 2nd stage screening on the same platform)
- Large choice of sample, reagent and customized racks
- Integrated solid phase extraction and thin layer chromatography
- Tailor-made customer care package



High output product development spiral

Chemspeed's AutoSuite workflow management software integrates with:

1. Chemspeed's robotic platforms such as

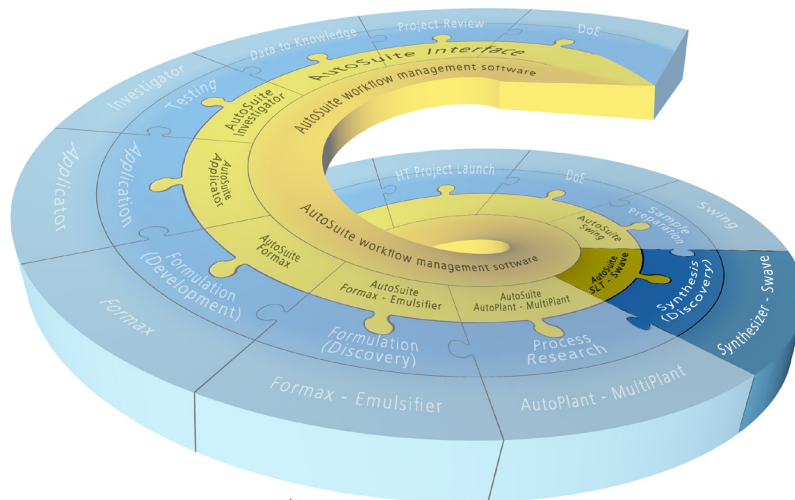
- Sample preparation instruments
- Synthesis instruments
- Process research instruments
- Formulation instruments
- Application instruments
- Testing instruments

2. Third party instruments

Chemspeed integrates a vast number of 3rd party components (e.g. in robotic tools) and 3rd party instruments. Please refer to other Chemspeed brochures or contact your Chemspeed representative.

3. Third party software such as

- SpotFire (data visualization and selection)
- JMP (design of experiments - DoE)
- VirtualLab (lab journal, workflow management, instrument control)
- and many other laboratory software through industry standard languages (SQL, .net, C#, etc)



Hardware - Software - Logistics
Chemspeed Technologies offers all.

