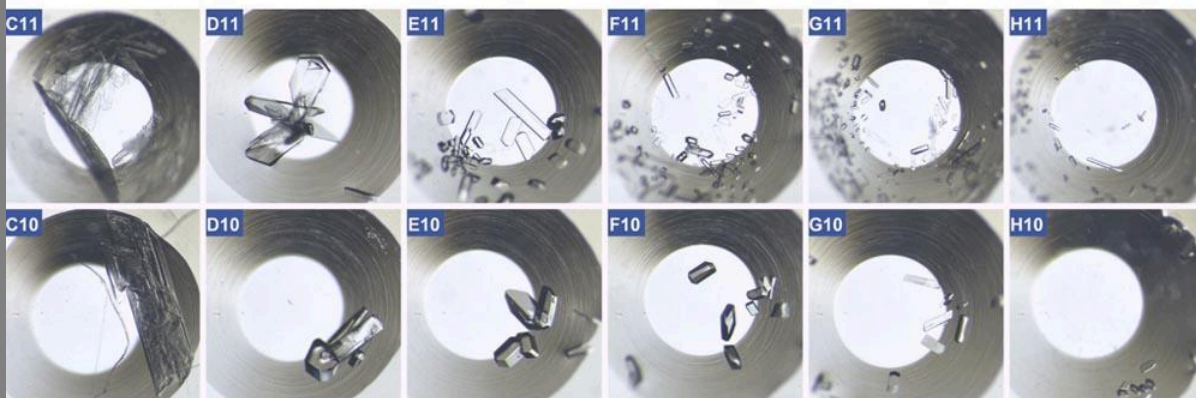




Dear Crystallographer

Originally developed for protein crystallization, **Oryx robots** are increasingly being used to automate **small-molecule and inorganic crystallization** workflows.

The dispensing system and software are flexible, and several features make Oryx particularly useful for chemical crystallization.

If you have an application that you think could be automated, please get in touch. We are happy to help develop methods for screening, optimization or dispensing to unusual plate formats.



96-well experiments using as little as 10 μ L of sample

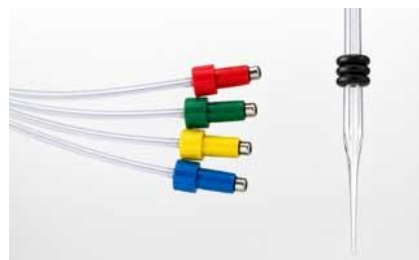
Sample is loaded from a single tube, so very little is wasted. It is loaded in immediately before dispensing, which helps to limit evaporation when volatile solvents are used. This is particularly useful when only a small amount of sample is available.



Solvent-compatible FEP Microtips

Oryx uses chemically inert FEP (fluorinated ethylene propylene) multi-bore Microtips, which have very good solvent compatibility.

Up to four ingredients can be dispensed simultaneously for screening experiments, or up to seven ingredients for optimization.



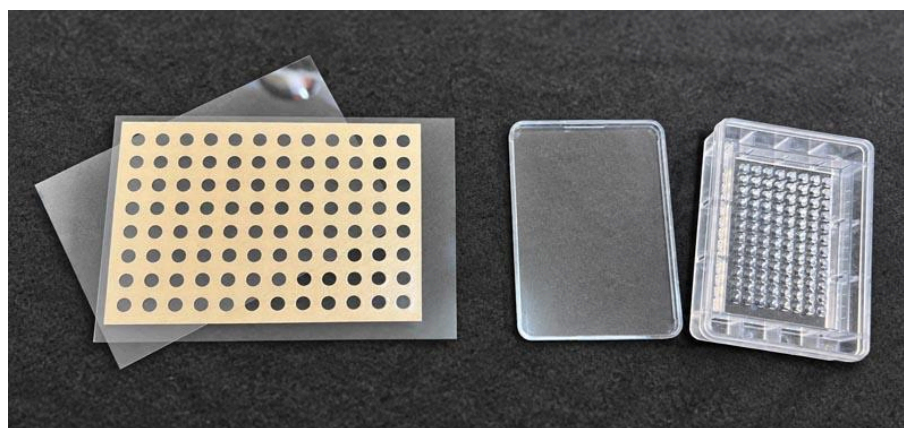
Each solution travels through a separate bore. The solutions do not mix in the Microtip — they mix for the first time in the crystallization drop.

Choice of crystallization plates

Oryx can be used with virtually any crystallization plate, provided it fits on the robot. This includes **microbatch plates** (image below, right), **glass sandwich plates** (image below, left), vapor-diffusion plates and many other plate formats.

For applications involving organic solvents, plates made from glass, polypropylene or cyclic olefin copolymer (COC) can be used to provide suitable solvent compatibility.

New plate formats can also be added using the Oryx Plate Editor program. So if the plate you want to use is not already included, it can easily be added.



96-well screening

Standard 96-well screens can be set up using predefined experiments.

Users can also create their own dispensing routines using the robot's scripting language, allowing novel screening methods to be set up quite easily.

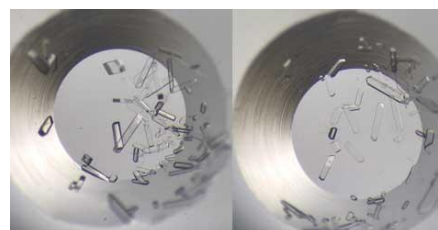


Powerful optimization

Ingredients can be dispensed in different ratios with 5 nL resolution.

This can be used to make concentration gradients or more complicated multivariate experiments involving up to seven ingredients.

For example, several concentrations, ratios or other experimental parameters can be varied on



the same plate rather than changing only one or two variables at a time.

If you think Oryx might be useful for your crystallization work, please [contact us](#). We would be interested to discuss the application and see whether it can be automated.

Meetings, Conferences and Workshops

Visit our booth to learn about our new experiment scripts for phase diagram optimization and other recent developments.

You can also pick up a free toolkit for rMMS microseeding from our booth.

[ACA 2027, San Jose, CA, USA](#)

3 August – 7 August 2027

[ECM 2027, Prague, Czech Republic](#)

23 August – 28 August 2027

We look forward to seeing you there!

Best regards,

Douglas Instruments
newsletter@douglas.co.uk



Douglas Instruments | Douglas House East Garston | Hungerford, RG177HD GB

[Unsubscribe](#) | [Update Profile](#) | [Constant Contact Data Notice](#)