

Your Premier Service and Instrument Provider in the Biotech and Life Science Sector

## **Looking for a new PCR machine?**

Kyratec's new 96 well gradient thermal cycler, smaller, lighter, quieter and cheaper than ever!



## **Kyratec Super Cycler Key Points**

The SuperCycler Trinity is a high performance thermal cycling system configured and optimised for industry standard 200ul individual or strip tube (domed or flat-capped) or 96-well plates (low or high skirt) with strip caps or adhesive film seals. It incorporates state of the art electronics, precision quality peltier devices and a flexible user interface.

## Heated Lid Evaporation Control

The SuperCycler employs an applied pressure heated lid design to keep the air contained within the tube hotter than the reaction volume. This causes any evaporation to condense back into the cooler reaction liquid, thereby eliminating the need for an oil or wax condensation overlay.

#### **Touch Screen**

A high performance graphical processor with large 7 inch, vivid color touch screen display allows for easy run setup and monitoring. The powerful yet intuitive software makes creation of even the most complex of thermal profiles a breeze. Free software upgrades are provided on our website keeping your instrument up to date with the latest features and developments.

#### **Small Footprint**

Boasting a footprint of only 180 x 285 x 190 mm (WxDxH), the SuperCycler is designed to save valuable bench space within the laboratory. Weighing in at just 5.5kg, this machine is also highly portable for the ever-changing laboratory environment.



### Powerful Thermal Engine

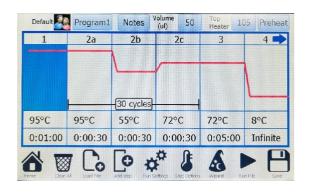
At the heart of the Trinity series instruments lies 3 fully independent sets of peltiers, temperature sensors and control electronics. This powerful and reliable thermal engine is capable of delivering high ramp rates in excess of 5 °C per second with our standard low thermal mass alloy block whilst maintaining a long peltier life and low well to well temperature variation.

#### **USB** Connectivity

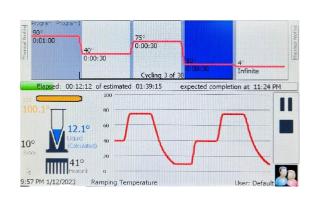
A front USB port allows for fast, easy file transfer to USB memory stick enabling the sharing of thermal profiles between instruments and users. The use of a USB mouse is also supported.

## Interface and Usability

The SuperCycler software implements a powerful thermal profile engine. A profile may contain up to 100 events. Each 'event' can be either a hold at temperature, pause, ramp or 2 to 5 step cycling with up to 100 repeats. Any event or step can contain touchdown or long range features. An almost unlimited number of profiles may be stored on the device for rerunning. Despite its high level of capabilities profile setup is straightforward.



**Run Reporting** 



Live Graphing	Gives vivid feedback of the thermal activity
Manual Control	Enables the user to set the block to a specific temperature quickly without creating a thermal profile. This function is useful for incubating reactions such as DNA digestion or ligation
Auto Restart	If a power interruption should occur the instrument can automatically restart from the point at which interruption occurred
QuickStart Wizard	Enables the user to configure easy to moderate complexity profiles in just moments
USB Connectivity	Front access USB host port enables file transfer between units using an ordinary USB memory stick. Also supports the use of a mouse. USB PC interface port available on machine rear
User Accounts	Enables easy separation and organization of user thermal run profiles. Many thousands of profiles may be stored in the large internal 256mb+ memory
Pause	The 'Pause' feature allows the user to pause the profile at any number of pre- programmed points while emitting an alert beep
Long Range	Enables the time of a particular cycling step to be automatically increased or decreased by a preset amount over a specified range of cycle repeats
Touch Down/Up	Enables the temperature of a step to be automatically increased or decreased by a preset amount over a range of successive cycle repeats
On Screen Help	User manual is inbuilt into the software ensuring that help is never more than a click away

stick for inclusion into your run documentation

Post run report is generated on run completion and may be saved to USB memory

# Gallery and Footprint Comparison



The Kyratec next to a leading PCR machine better emphasizes the small and compact footprint which is a must in busy laboratories.





## **Specifications**

Thermal Cycling Technology High performance active heating and cooling using 6 quality

peltier elements with 3 temperature sensors

Temperature Range 4 °C to 99 °C

Temperature Accuracy  $\pm 0.5$  °C over full range, typically <  $\pm 0.1$  °C at 60 °C

Temperature Uniformity ±0.3 °C, 30 seconds after target (range 40 °C to 90 °C),

typically < ±0.1 °C at 60 °C

Temperature Resolution 0.1 °C increments

Heating/Cooling rate 5 °C/sec typical heat & cool between denat & aneal (block),

7 °C/sec Peak (block)

Well Configuration 96-well block supporting: 0.2 mL tubes or strip tubes with flat or

domed caps

96-well high-or low skirt plates with strip caps, adhesive cover or

oil overlay

Condensation Control Automatic utilising applied pressure heated lid

Heated Lid Temperature Range 60 °C to 115 °C

Dimensions 180 x 285 x 190 mm (W x D x H)

Weight 5.5 kg

Electrical 100 to 240V, 50/60 Hz

External Connectivity Interface USB interface to Windows based PC

USB host port – file transfer to and from USB memory stick –

mouse/ keyboard connection

Display 7-inch widescreen touch sensitive colour backlit display

Software Supplied with unlimited user licenses, Free upgrades available

Internal memory 256 MB, enough for 10,000+ saved profiles

Functionality Touch Down/Up, Long Range, Program Pauses, Temperature

Graphing, On-screen Help, User Accounts, Profile Load and Saving, Manual Mode, USB File Transfer, Post run reporting,

Auto restart and more

Included Accessories Power Cable, User Manual (downloadable PDF) and Touch Screen

Stylus

# **Pricing and Additional Information**

The Kyratec Super Cycler is competitively priced and includes discounts when additional units are purchased at a time, for more than 1 unit required, please contact us.

Single Unit List Price	£3,600
More Than 1 Unit	POA

Pricing as of 2024.



To ensure confidence each unit comes UKAS temperature calibrated with certification when purchased through Labcare.

#### Service Contracts and Aftercare

Each Super Cycler comes with 2 year's warranty and lifetime technical support when purchased through Labcare, in addition to this annual service contracts are available and are offered with a 10% discount\* when purchased in conjunction with a Super Cycler, this includes priority response to breakdowns, an annual service visit where the unit is inspected and tested to ensure your Super Cycler is preforming as expected and a temperature calibration.

Please enquire for more details and to discuss what options may suit you.

\*Excludes travel cost