Real-Time PCR System - 6-Channel qPCR Thermal Cycler - 96 Well - 8 °C/s Ramp

Model **MSPCR-Q96-6PSWISS** | Brand **Master Science**





The Master Science 6-Channel Real-Time PCR runs quantitative PCR on 96 wells with six fluorescence channels read at the same time. A side-scan optical design collects all channels together and scans a full plate in 5 seconds, giving strong signals with low background.

KEY HIGHLIGHTS

- Six targets per well
- Fast plates
- Assay optimisation
- Automation ready
- Flexible control

AT A GLANCE

0 to 100 °C, 0.1 °C resolution
TEMPERATURE RANGE

1 to 10^{10} copies
DYNAMIC RANGE

±0.1 °C
CONTROL ACCURACY

built-in gradient.
ANNEALING TEMPERATURE GUESSWORK

Request a Quotation
Contact us for pricing, configuration options and delivery details.

support@themsci.com
www.themsci.com

Scan to view online

Overview

Fast block ramping up to 8 °C/s, a 0.1 to 42 °C gradient and an automatic hot lid support qualitative and absolute quantification, relative quantification, genotyping, allele identification, HRM and melting curve analysis.

Overview

- 8 °C/s ramp
- ±0.1 °C control
- 0.1 to 42 °C gradient

Key Benefits

Six targets per well
the Master Science 6-Channel Real-Time PCR reads six dyes together.

Fast plates
5-second scans and 8 °C/s ramping.

Assay optimisation
gradient across 0.1 to 42 °C.

Automation ready
automatic hot lid for workstations.

Flexible control
touch screen or one PC for several units.

Prepare templates with the Master Science automatic nucleic acid extractor.

Technical Specifications

GENERAL

Brand	Master Science
Model Number	MSPCR-Q96-6PSWISS
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SKU	MSPCR-Q96-6PSWISS
Sample Capacity	**96-well plate, 12 × 8-tube strips or 96 × 0.2 mL tubes**
Consumables	0.1/0.2 mL tubes, 8-tube strips, skirtless and semi-skirted 96-well plates (0.2 mL recommended)
Reaction Volume	10 to 100 µL
Temperature Range	**0 to 100 °C, 0.1 °C resolution**
Maximum Ramp Rate	8.0 °C/s
Control Accuracy	**±0.1 °C**
Uniformity / Accuracy	**±0.2 °C / ±0.2 °C**
Gradient Span	0.1 to 42 °C
Hot Lid	Automatic, 30 to 115 °C (105 °C default)
Temperature Control Mode	Block or tube
Detection Channels	6, scanned simultaneously
Excitation / Emission	300 to 810 nm / 500 to 810 nm
Scan Time	5 s for 96 wells
Calibrated Dyes	FAM/SYBR Green/EvaGreen; HEX/VIC/JOE/TET/Yellow; ROX/Texas Red; Cy5; Cy5.5; Cy3 (custom)
Dynamic Range	**1 to 10^{10} copies**
Sensitivity	1 copy
Control	12.1-inch colour touch screen or PC
Light Source / Detector	Long-life LED / high-sensitivity photodetector
Power Supply	100 to 240 V AC, 50/60 Hz, 1500 W

DISPLAY & DATA

Data Export	Excel, CSV, TXT, PDF; direct report printing; LIMS connection
Interfaces	USB 2.0, RS232

DIMENSIONS & WEIGHT

Dimensions (L × W × H)	520 × 350 × 330 mm
Weight	32 kg

HOW THE MASTER SCIENCE 6-CHANNEL REAL-TIME PCR IMPROVES QPCR WORK	
Too few channels for multiplex assays	six detection channels.
Slow runs	fast ramping and 5 s scans.
Annealing temperature guesswork	built-in gradient.
Manual lid handling in automated labs	automatic hot lid.

Applications

The Master Science 6-Channel Real-Time PCR is used for

Qualitative and absolute quantification Relative gene expression Genotyping and allele identification High-resolution melting (HRM) Melting curve analysis

Optics

- 6-channel simultaneous side scanning
- LED excitation
- 1-copy sensitivity

Software and Control

- Quantification, HRM, genotyping
- 12.1-inch touch screen or PC
- LIMS and automation connectivity