

Fresh Look, Same Trusted Performance: KAPA® Library Quantification Kit on epMotion® 5073

Introduction

The quantification of NGS libraries prior to sequencing is essential to obtain reliable results and optimal sequencing performance. With the epMotion® liquid handling system you can automate a complete quantitative real-time PCR setup with high accuracy and precision.

Here we show as a proof-of-principle, the migration of the KAPA® Library Quantification Kit method from an epMotion 5075t of the 2022 generation to the improved epMotion 5073t of the 2023 generation. Transferring the method to the new system generation does not affect the outstanding performance of the automated method.



Product features

- > Automatic exchange of up to 3 dispensing tools (1-channel and 8-channel) and gripper, supporting volume ranges from 0.2 – 1000 µL
- > Optical sensor for touch-free detection of liquids, labware, and tips
- > Intuitive drag-and-drop-based software
- > Integrated LED status display

Your advantages

- > Ensure reproducibility: calibrated dispensing tools providing highest accuracy
- > Minimize Cross-contamination: Free-jet dispensing, autoclavable dispensing tools and additional CleanCap option guarantee sample/user safety
- > Stay flexible: Fast and easy adjustments of the protocol

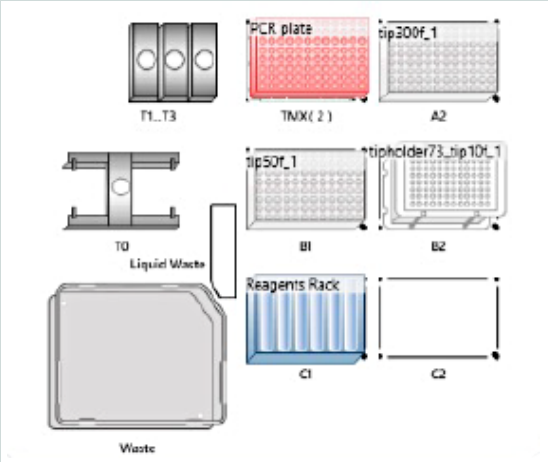


Figure 1 – Worktable layout for KAPA Library Quantification Kit optimized on epMotion 5073t

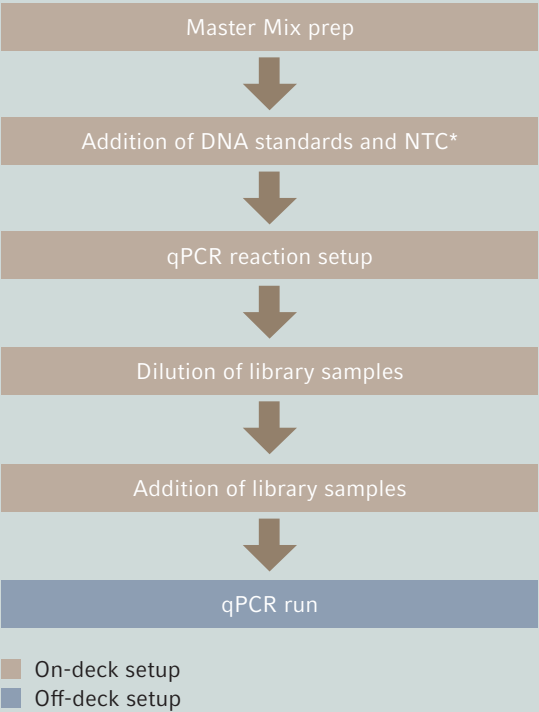
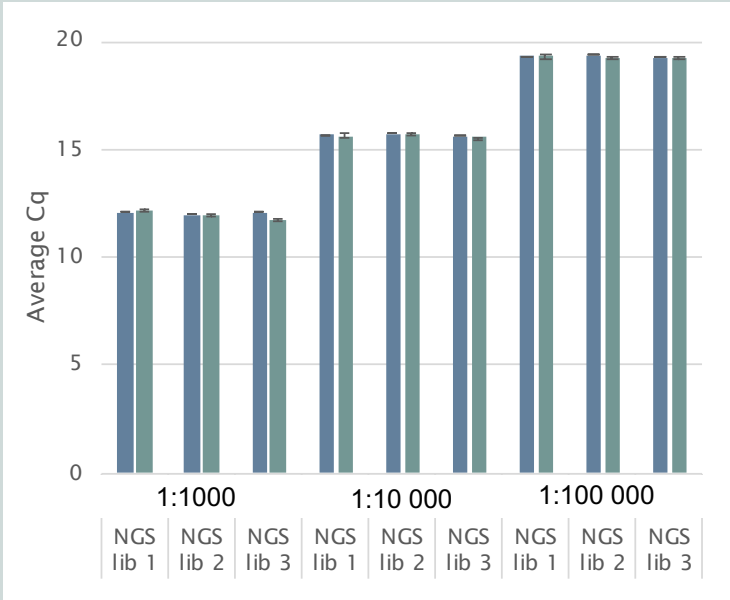


Figure 2 – Method overview: Automated preparation of qPCR for KAPA library quantification on epMotion. (*NTC = no template control)



epMotion 5075t (2022 generation)

epMotion 5073t (2023 generation)

Figure 3 – Performance data: Automated serial dilutions for three NGS library samples



[Read the original Application Note](#)

Ordering information

Ordering information	
Description	Order no.
epMotion® configuration	
epMotion® 5073t	5073 000 111
Required Tools/Accessories	
TS 10 single channel dispensing tool, 0.2 – 10 µL	5280 000 100
TS 50 single channel dispensing tool, 1 – 50 µL	5280 000 010
TS 300 single channel dispensing tool, 20 – 300 µL	5280 000 037
Thermoblock for PCR	5075 766 000
Reservoir Rack	5075 754 002
Reservoir Rack Module TC for Safe-Lock Tubes	5075 799 081
TipHolder 73	5075 751 879
Gripper	5282 000 018
Gripper Tower	5075 751 895
Required Consumables	
epT.I.P.S.® Motion, 10 µL, filtered	0030 015 193
epT.I.P.S.® Motion, 50 µL, filtered	0030 014 413
epT.I.P.S.® Motion, 300 µL, filtered	0030 014 456
epT.I.P.S.® Motion as Reload System	0030 014 553
epMotion® Reservoir, 30 mL	0030 126 505
Eppendorf twin.tec® PCR Plate 96, skirted	0030 128 648
Eppendorf Deepwell Plate 96/500 µL, PCR clean	0030 501 101
Eppendorf DNA LoBind Tubes, 1.5 mL	0030 108 051
Waste Bags	5075 751 780
Reagents	
KAPA Library Quantification Kit for Illumina® platforms	07960336001 (KAPA Biosystems)
KAPA Library Quantification Dilution Control Kit for Illumina® platforms	07960417001 (KAPA Biosystems)

For more information about Roche sequencing solutions, please visit: sequencing.roche.com

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