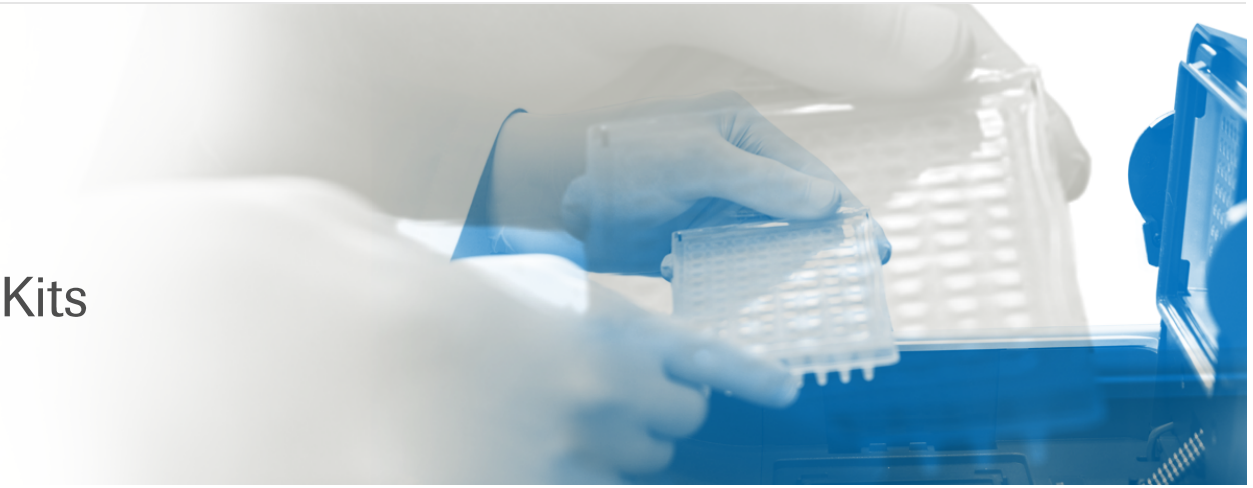
KAPA Library Amplification Kits



Contact Us Technical Support

Overview

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KAPA Library Amplification Kits include KAPA HiFi DNA Polymerase, a novel enzyme engineered using our directed evolution technology for ultra-high fidelity and robustness. KAPA HiFi has become the enzyme of choice for next-generation sequencing (NGS) library amplification due to its ability to amplify complex DNA populations with high fidelity, high efficiency and very low amplification bias. This results in lower duplication rates and improved coverage of GC- and AT-nch regions, promoters, low-complexity and other challenging regions.

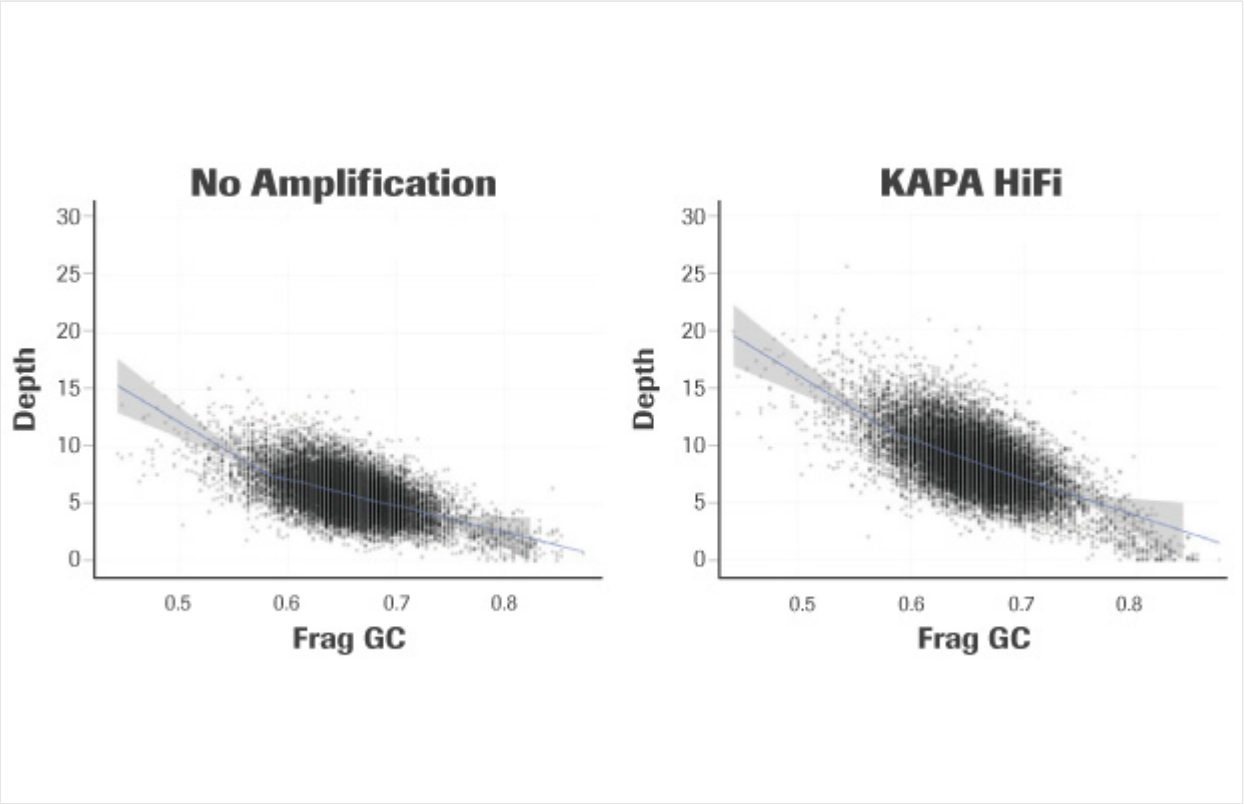
Benefits of KAPA Library Amplification Kits

- Higher and more uniform coverage with lower dropout of difficult regions
- Higher yields, low duplication rates and fewer wasted sequencing reads
- Higher success rates with different sample types/applications
- Convenience with the consistency of one core enzyme
- Trusted as shown through over 10 years in the industry as well as thousands of peer-reviewed publications

Product Highlights

Reduced bias and efficient amplification of GC- and AT-rich genomes

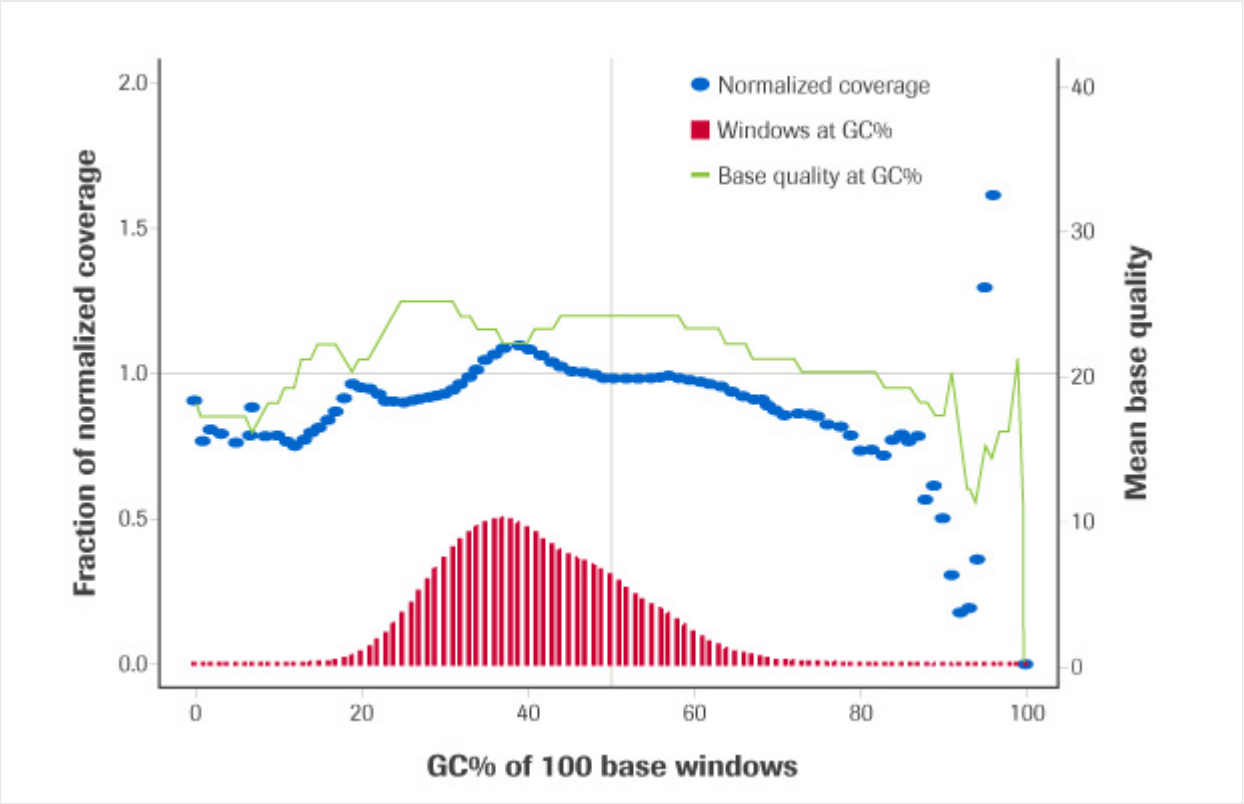
- Improved representation of all library fragments and sequence regions
- Fewer cycles to achieve equivalent yields due to higher amplification efficiency



View data showing broader coverage distribution across the range of GC-content using KAPA HiFi DNA polymerase compared to Phusion DNA Polymerase (Thermo Scientific) or the TruSeq PCR Master Mix (Illumina). See data showing more uniform coverage of GC-rich regions and higher amplification efficiency with the KAPA HiFi Kits compared to NEB Q5.

Improved sequencing coverage

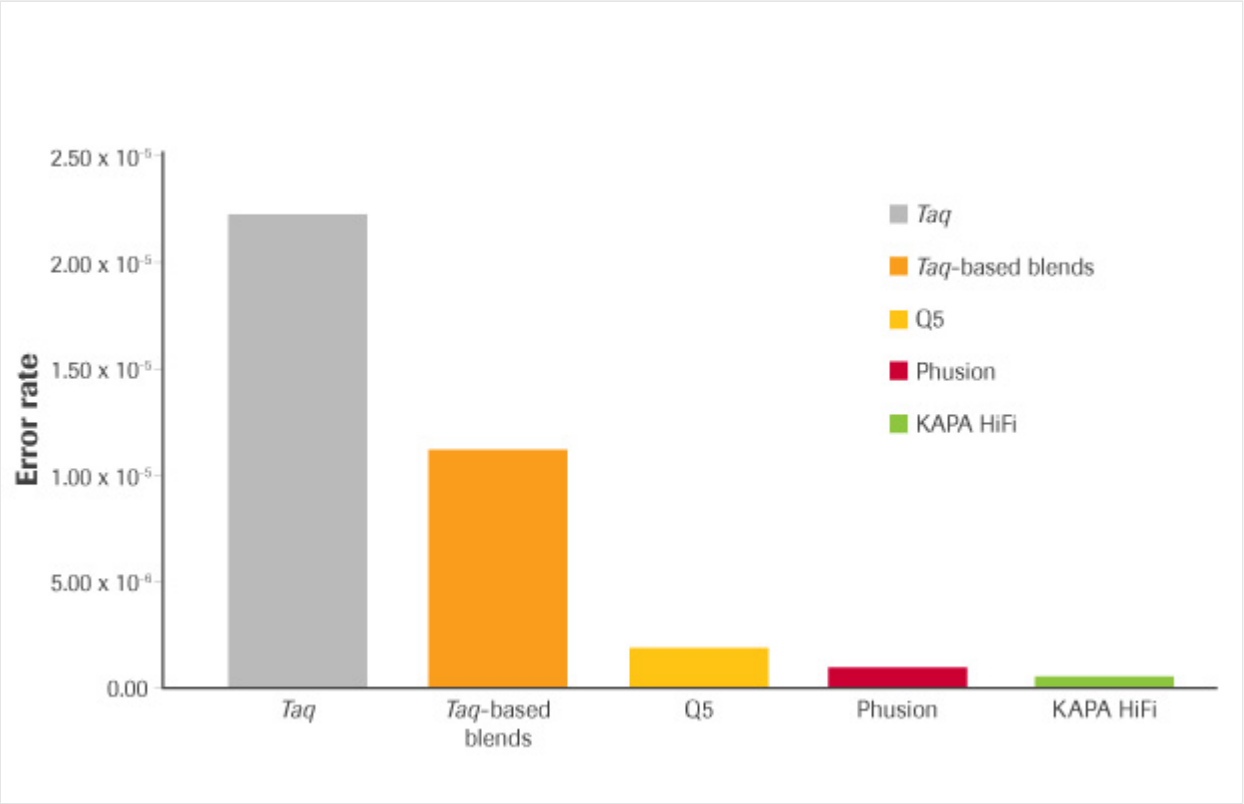
- Improved coverage uniformity of GC- and AT-rich regions, promoters, and other challenging regions
- Increased coverage depth of difficult regions in targeted capture workflows, where two amplification steps are performed



View comparative data on more uniform coverage across the GC windows using KAPA HiFi enzyme compared to a competitor kit.

Amplification of NGS libraries with ultra-high fidelity

- Enhanced proofreading (3′-5′ exonuclease) activity using KAPA HiFi enzyme
- Ultra-high fidelity for NGS applications



View data showing the least amount of error rates during NGC library amplification using KAPA HiFi DNA polymerase compared to Taq, Taq - based blends, Q5 and Phusion.

*Data on file.