

## 2× Super Canace® II High-Fidelity Mix for Library Amplification

### Product description

2× Super Canace® II High-Fidelity Mix for Library Amplification is a ready-to-use 2× pre-mixed solution. Including high-fidelity DNA Polymerase (6 times the Fidelity of ordinary pfu DNA polymerase, amplification speed of 15 sec/kb), dNTP and optimized buffer system for high-throughput sequencing library amplification. This mix offers advantages such as quick and easy operation, high sensitivity, strong specificity, and good stability. During library amplification, the system only requires the addition of primers and templates, simplifying the experimental steps, reducing the human error, and improving experimental throughput and result reproducibility. Additionally, the mix contains specific protective agents that maintain stable activity even after repeated freeze-thaw cycles.

This product has been validated for DNA library construction in conjunction with Hieff NGS® Fast-Pace End Repair/dA-Tailing Module (Cat#12608) and Hieff NGS® Fast-Pace DNA Ligation Module (Cat#12607), Its effectiveness has been verified through sequencing on Illumina high-throughput platform. All reagent components provided in this product undergo rigorous quality control to ensure excellent performance and batch-to-batch stability.

### Specifications

Cat.No.	12621ES24 / 12621ES96
Size	24 T / 96 T

### Components

Components No.	Name	12621ES24	12621ES96
12621	( ) 2× Super Canace® II High-Fidelity Mix for Library Amplification	600 μL	2×1.2 mL

### Storage

This product should be stored at -25~-15°C for 18 months.

### Notes

1. This product is for research use only.
2. Please operate with lab coats and disposable gloves, for your safety.

### Instructions

1. Thaw the reagents list in Table 1. Invert and mix thoroughly, and place them on ice for later use.
2. Prepare the reactions on ice according to Table 1.

Table 1 PCR reaction system

Components	Volume ( $\mu\text{L}$ )
2× Super Canace® II High-Fidelity Mix	25
Primer 1	2.5
Primer 2	2.5
Adapter Ligated DNA	20
Total	50

3. Gently mix by pipetting or shaking, and centrifuge briefly to get the solution down.

4. Put the tube into a thermocycler and set up the program according to table 2 to start the amplification.

Table 2 PCR amplification reaction program

Temperature	Time	Cycle
98°C	1 min	1
98°C	10 sec	1~15 (According to the experimental requirement)
60°C	30 sec	
72°C	30 sec	
72°C	5 min	1
4°C	Hold	-