

ACEQuick ligation Kit

Cat# EC1203, 20 rxn, 50 rxn

Storage at -20 °C

INTRODUCTION

ACEQuick ligation Kit contain 5x Quick ligation buffer and T4 DNA ligase that catalyzes the formation of a phosphodiester bond between adjacent 5'-phosphate and 3'-hydroxyl termini in double-strand DNA or RNA. This kit is suitable for sticky end ligation, blunt end DNA ligation and TA ligation. Buffer with optimized ligation enhancer make the reaction more efficient and convenient. **Ligation can be completed in 10 min at 25°C for sticky end ligation and 20 min at 25°C for blunt end DNA ligation .** The product can be used directly to transform many chemically competent cells.

CONTENTS

Component

5xQuick Ligase Buffer

T4 DNA Quick Ligase (1 U/μl)

APPLICATION

- Sticky end ligation
- Blunt end ligation
- TA ligation

PROTOCOL :

1. Prepare the ligation reaction mixture in a microcentrifuge tube.

5xQuick Ligase Buffer	2 μl
Insert ^a	X ng
Vector ^b	~50 ng
T4 DNA Quick Ligase (1 U/μl)	1 μl
Sterile distilled Water	To 10 μl

- a. The molar ratio of the insert and vector should be among 3:1 to 8:1.
- b. For vector with blunt terminal, please perform the dephosphorylation of vector to prevent cyclization.

2. Incubate the reaction mixture 10-15 min at 25°C for sticky end ligation and 20-40 min at 25°C for blunt end ligation.
3. The reaction mixture can be used directly to transform.

PRODUCT USE LIMITATION

These products are intended for research use only.