# Multipurpose SNP Genotyping qPCR MIX

Catalog number: M666092

Storage condition: -20℃, if need to use frequently, can be stored in 2-8℃, try to avoid repeated freezing and thawing.

## Products content

| Component | 1 mL |
|---|---|
| 2×Multipurpose SNP Genotyping qPCR MIX | 1 mL |
| dd H2O | 1 mL |

## Products Introduction

CombiVision Multipurpose SNP Genotyping qPCR MIX is a real-time fluorescence quantitative 2×PCR premix system for SNP typing by probe method, which includes Taq DNA Polymerase, PCR Buffer, dNTPs, $Mg^{2+}$, as well as enhancers and stabilizers, and is easy to operate. The unique PCR buffer system is highly tolerant to complex templates, such as blood and saliva, and can not only efficiently amplify the extracted DNA, but also support direct amplification of buccal swabs and blood with a final concentration of not more than 15%, eliminating the need for complicated extraction and preservation processes. The typing results are fast and accurate.

## Pre-experiment Preparation and Important Notes

1. Before use, mix gently by turning up and down, avoid foaming as much as possible, and use after brief centrifugation.

2. Avoid repeated freezing and thawing of the product, which may degrade the performance of the product. This product can be stored at -20℃ for long term storage and protected from light. If frequent use is required within a short period of time, it can be stored at 2-8℃.

## procedure

Take the primers for initial typing as an example:

**1. PCR reaction system**

| reagents | 25 μL system | final concentration |
|---|---|---|
| 2×Multipurpose SNP Genotyping qPCR MIX | 12.5μL | 1× |
| Forward Primer, 10 μM | 1 μL | 0.2 μM |
| Template DNA | appropriate amount | <500 ng/50 μL |
| ddH2O | up to 25 μL | |

2. Take the standards of different genotypes to be typed as templates and optimize the annealing temperatures respectively, so as to achieve better typing results.

3. Template processing. Blood templates can be directly diluted to different concentrations for amplification using ddH2O, and the recommended final concentration is

2% blood was used as template for typing amplification; for oral swab template, the swab could be used directly as template by gently scraping the inner wall of the oral cavity for about 6 times and placed in 400 μL-1000 μL of ddH2O after shaking and mixing.

4. PCR reaction program:

This product can be used in a two-step PCR reaction program

| move | temp | timing | |
|---|---|---|---|
| premutability | 95°C | 30 s | |
| denaturation | 95°C | 10s | 45 cycles |
| Annealing/Extension | 60°C (depending on primer) | 30s signal acquisition | 45 cycles |

Note: 1) Using the two-step **PCR** reaction program, if the signal is low or the **CT** value is large due to the use of primers with low **Tm** values, etc., try the three-step **PCR amplification**.

2 ) Real-time acquisition of signal curve method of typing and final acquisition of signal endpoint method of typing are both available.