molecular designs

PRODUCT INFORMATION

Catalog No.: D911-Mix 2

Product Name: **Conquest™ PCR Master Mix 2**

Size: 5 x 1000µl

Description: These are the individual **Conquest™ PCR Master Mixes** from the **Conquest™ PCR Master Mix Pack.** The **Conquest™ PCR Master Mix Pack** are specifically developed for genotyping, genomic cloning, and other various PCR applications, which cover regular PCR and difficult PCR including arbitrary primers, high GC templates, inhibitory raw samples, and other difficult PCR scenarios. When starting a new PCR experiment, all four **2X Master Mixes** within the pack should be used to easily and swiftly determine which PCR mix gives the best PCR results for the new template. Afterwards, the master mix giving the most satisfactory PCR result can be used for the same template. Whenever there is difficult PCR situation, the **Conquest™ PCR Master Mix Pack** should be used to quickly determine the best PCR condition.

The PCR product can be directly loaded to the wells of a gel for electrophoresis for viewing the PCR results, as there is no need to add DNA loading buffer.

Applications:
- Genotyping
- Genomic cloning
- High GC PCR
- Large fragment PCR
- Low template PCR
- Other hardship PCR

Storage: Store at 4°C for up to a month. Store at -20°C for long-term. Do not freeze-and-thaw more than three times.

Note: This Product Is For Research Use Only.

Reorder Information:

Product	Size	Catalog No.
Conquest™ PCR Master Mix Pack	4 x 1000µl	D911-Mix1234
Conquest™ PCR Master Mix 1	5 x 1000µl	D911-Mix1
Conquest™ PCR Master Mix 2	5 x 1000µl	D911-Mix2
Conquest™ PCR Master Mix 3	5 x 1000µl	D911-Mix3
Conquest™ PCR Master Mix 4	5 x 1000µl	D911-Mix4

General Protocol

I. DNA Template Preparation:

DNA templates can be prepared with different methods by using your own method or with Lamda Biotech's products; such as, Cat. No. D109 (Classic™ Genomic DNA Isolation Kit) or Cat. No. BS427 (Column-Pure™ Animal Genomic DNA Kit).

II. PCR Amplification:

1. Add the following reagents to a PCR tube or plate, and mix:

2X PCR Master Mix:	10 µl
Primers:	y µl
Sample:	1 µl
Water:	x µl
Total volume:	**20 µl**

Note:

- Adjust your PCR volume according to your specific case, such as, using 25 µl or 50 µl PCR as the final reaction volume; however, for the **2X PCR Master Mix**, always use half of the final volume of your PCR reaction.
- When multiple samples are processed with the same primers, the **2X PCR Master Mix**, water and primers can be premixed and aliquoted.

2. Perform the thermal cycling. The following table is a typical example of PCR. Use your own favorite PCR profile; or, a touchdown PCR cycle profile can be used for many PCR reactions.

Step	Temperature	Time	Cycles
Initial Denature	95°C	1-3 min	1
Denature	95°C	0.5-1 min	30-35
Annealing	50-65°C	0.5-1 min	
Extension	72°C	1 min/kb	
Final Extension	72°C	5-7 min	1
Hold	4°C	∞	

3. The amplified products can be directly loaded onto an agarose gel for checking PCR results.