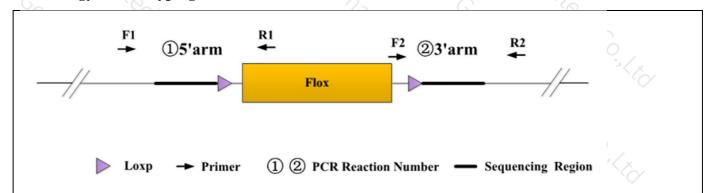
# **Genotyping Report**

Strain ID	T051924	Strain Type	CKO(Cas9)	Genetic Background	C57BL/6JGpt
Designer	Zifan Lin	Gene Name	·5 </td <td>1117Ь</td> <td>0)</td>	1117Ь	0)

## 1. Strategy of Genotyping



Wild type: ①PCR reaction obtains a single WT band; ②PCR reaction obtains none band.

Heterozygote: ①PCR reaction obtains a WT band and a Targeted band; ②PCR reaction obtains a Targeted band.

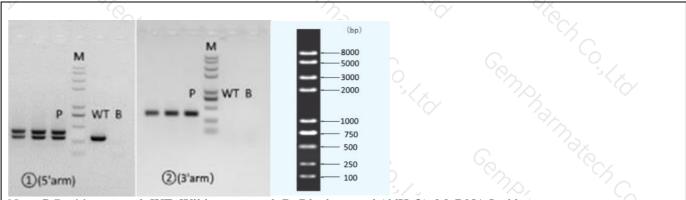
Homozygote: ①PCR reaction obtains a single Targeted band; ②PCR reaction obtains a Targeted band.

Note: The sizes of WT and Targeted band are shown below.

#### 2. Primer Information

PCR No.	Primer No.	Sequence	Band Size
①(5'arm)	T051924-F1	GCAGCCAAGAGGATACCAAAGTATC	WT:316bp
	T051924-R1 TGAGAAGCGTGTCTGTCCACATC		Targeted:421bp
②(3'arm)	T051924-F2	GCATCGCATTGTCTGAGTAGGTG	WT:0bp Targeted:372bp
	T051924-R2	TAGAGCAGATGACCCAAGATGG	

## 3. Gel Image & Conclusion



Note: P:Positive control; WT: Wildtype control; B: Blank control (ddH<sub>2</sub>O); M: DNA Ladder

① Control (WT): It is an important reference mark for whether the PCR reaction is successful and whether the



product band position and size meet the theoretical requirements.

② Control (B): PCR amplification was performed without template in the PCR reagent to monitor whether the reagent was contaminated.

## 4. PCR Condition

PCR Reaction C	omponent	722	73.		
Seg.	rea	reaction component			
1 70,	2 × Rapid Taq Master Mix	2 × Rapid Taq Master Mix (Vazyme P222)			
2	ddH2O	%,	9.5		
3	Primer A(10pmol/μl)	3/x	12		
4	Primer B(10pmol/μl)	Primer B(10pmol/μl)			
5	Template(≈100ng/μl)	Template(≈100ng/μl)			
PCR program ①	priority selection	o <sub>2</sub>	G, 3,/x		
Seg.	Temp.	Time	Cycle		
1	95℃	5min	19/7		
2	98℃	30s	20×		
3	65℃* (-0.5℃/cycle)	30s	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~		
4	<b>72℃</b>	45s*			
5	98℃	30s	20×		
6	55℃*	30s	Co You		
7	<b>72℃</b>	45s*	7/2 YC		
8	<b>72℃</b>	5min	192 3/x		
9	10℃	hold	- 1,0×		
PCR program ②	the second choice	79×			
Seg.	Temp.	Time	Cycle		
1	95℃	5min	1973 345 A		
2	98℃	30s	35×		
3	58℃*	58°C* 30s			
4	72℃ /	45s*			
5	<b>72℃</b>	5min			
6	10°C	hold	200		

Note\*: Annealing temperature and extension time can be determined according to the actual amplification situation and amplification enzyme efficiency.