
Cas12j.1
Cas12j.4
Cas12j.12
Cas12j.18
Cas12j.19
Cas12j.21
Cas12j.22
效应蛋白
Pre-crRNA
Pre-crRNA
成熟crRNA

图 1

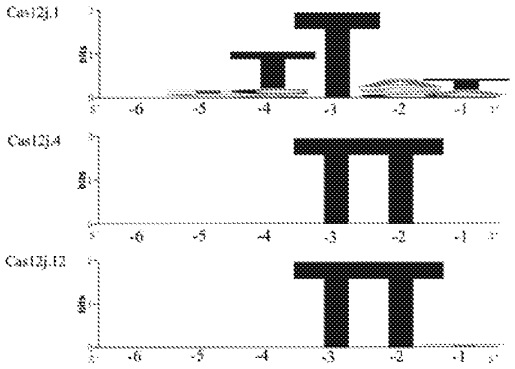

Cas12j.1
Cas12j.4
Cas12j.12

图 2A

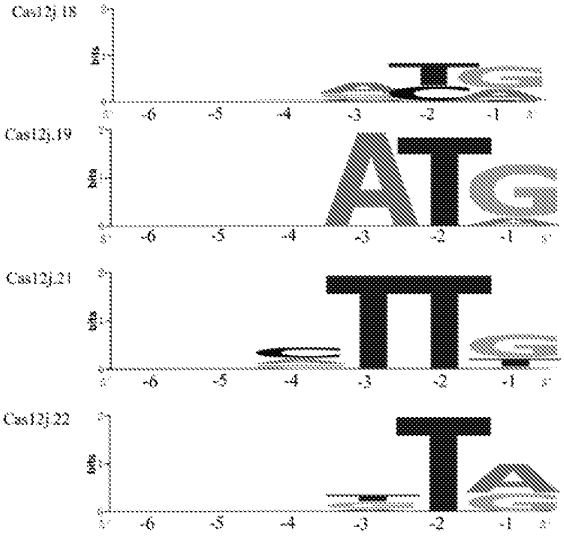

Cas12j.18
Cas12j.19
Cas12j.21
Cas12j.22

图 2B

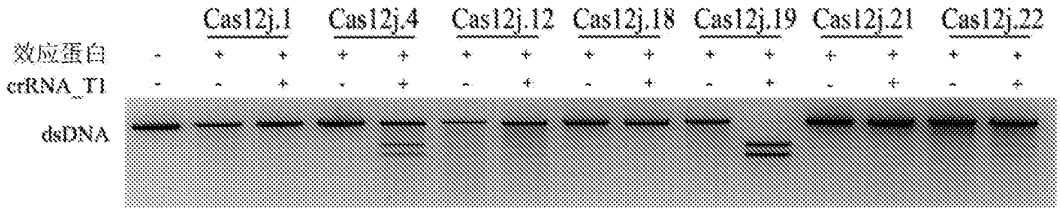

Cas12j.1
Cas12j.4
Cas12j.12
Cas12j.18
Cas12j.19
Cas12j.21
Cas12j.22
效应蛋白
crRNA_T1
dsDNA

图 3

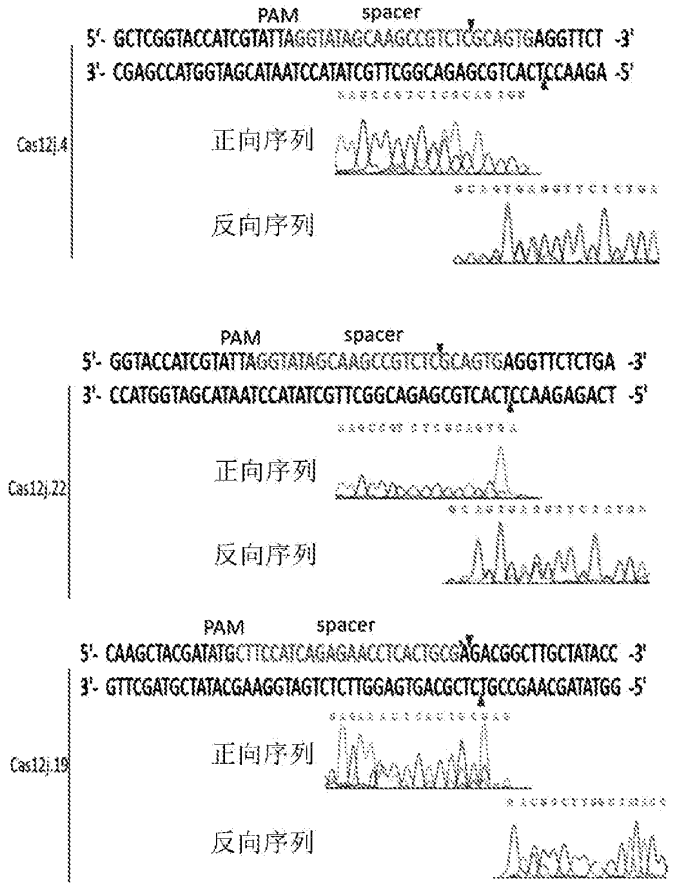

PAM
spacer
5'- GCTCGGTACCATCGTATTAGGTATAGCAAGCCGTCTCGCAGTGAGGTTCT -3'
3'- CGAGCCATGGTAGCATAATCCATATCGTTCGGCAGAGCGTCACTCCAAGA -5'
Cas12j.4
正向序列
反向序列
PAM
spacer
5'- GGTACCATCGTATTAGGTATAGCAAGCCGTCTCGCAGTGAGGTTCTCTGA -3'
3'- CCATGGTAGCATAATCCATATCGTTCGGCAGAGCGTCACTCCAAGAGACT -5'
Cas12j.22
正向序列
反向序列
PAM
spacer
5'- CAAGCTACGATATGCTTCCATCAGAGAACCTCACTGCGAGACGGCTTGCTATACC -3'
3'- GTTCGATGCTATACGAAGGTAGTCTCTTGGAGTGACGCTCTGCCGAACGATATGG -5'
Cas12j.19
正向序列
反向序列

图 4

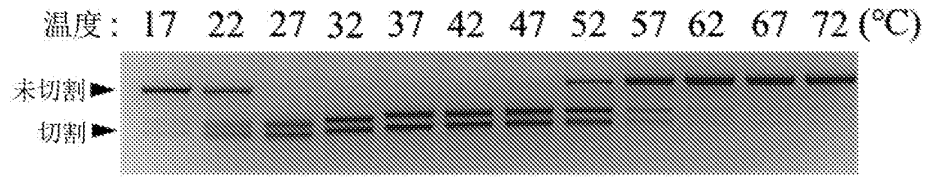

温度： 17 22 27 32 37 42 47 52 57 62 67 72 (℃)
未切割
切割

图 5

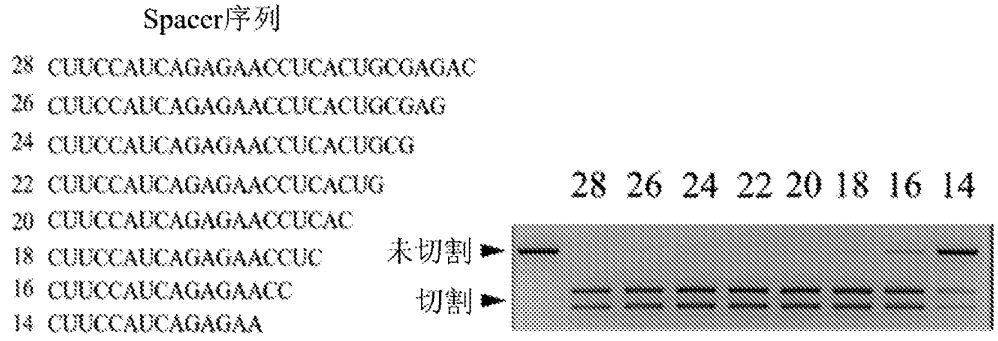

Spacer序列
28 CUUCCAUCAGAGAACCUCACUGCGAGAC
26 CUUCCAUCAGAGAACCUCACUGCGAG
24 CUUCCAUCAGAGAACCUCACUGCG
22 CUUCCAUCAGAGAACCUCACUG
20 CUUCCAUCAGAGAACCUCAC
18 CUUCCAUCAGAGAACCUC
16 CUUCCAUCAGAGAACC
14 CUUCCAUCAGAGAA
28 26 24 22 20 18 16 14
未切割
切割

图 6

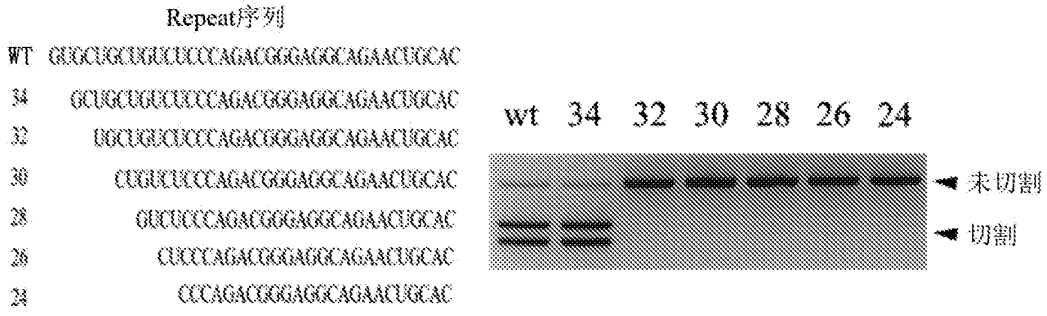

Repeat序列
WT GUGCUGCUGUCUCCCAGACGGGAGGCAGAACUGCAC
34 GCUGCUGUCUCCCAGACGGGAGGCAGAACUGCAC
32 UGCUGUCUCCCAGACGGGAGGCAGAACUGCAC
30 CUGUCUCCCAGACGGGAGGCAGAACUGCAC
28 GUCUCCCAGACGGGAGGCAGAACUGCAC
26 CUCCCAGACGGGAGGCAGAACUGCAC
24 CCCAGACGGGAGGCAGAACUGCAC
wt 34 32 30 28 26 24
未切割
切割

图 7

	Spacer序列
WT	5' CUUCCAUCAGAGAACCUCACUGCG3'
C1A	5' AUUCCAUCAGAGAACCUCACUGCG3'
U3A	5' CUACCAUCAGAGAACCUCACUGCG3'
C5A	5' CUUCAAUCAGAGAACCUCACUGCG3'
U7G	5' CUUCCAGCAGAGAACCUCACUGCG3'
A9G	5' CUUCCAUCGGAGAACCUCACUGCG3'
A11U	5' CUUCCAUCAGUGAACCUCACUGCG3'
A13G	5' CUUCCAUCAGAGGACCUCACUGCG3'
C15U	5' CUUCCAUCAGAGAAUCUCACUGCG3'
U17A	5' CUUCCAUCAGAGAACCACACUGCG3'

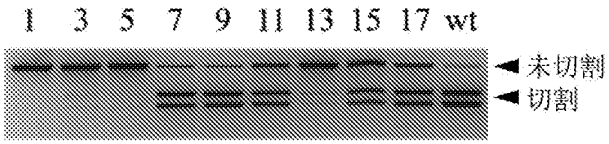


图 8