



PvuI (7)
SgfI (6)
MfeI (82) **EcoNI (96)**

1 GGATCTGCATCGCTCCGGTGCCCGTCAGTGGGAGAGCGCACATCGCCACAGTCCCGGAGAAGTTGGGGGAGGGGTGGCAATTGAACGGGTGCCTA
 101 GAGAAGGTGGCGCGGGTAAACTGGAAAGTGATGTCGTGTAAGTGGCTCCGCCTTTTCCCGAGGGTGGGGGAGAACCCTATATAAGTGCAGTAGTCGCC

Psp1406I (203)
HindIII (245) **Bsu36I (291)**

201 GTGAACGTTCTTTTTCGCAACGGGTTTCCGCCAGAACACAGCTGAAGCTTCGAGGGGCTCGCATCTCTCTTACACGCCGCCGCCCTACCTGAGGCC
 301 GCCATCCACGCCGGTTGAGTGCCTGTTGCCGCTCCCGCCTGTGGTGCCTCTGAAGTGCCTCCGCCGTCTAGGTAAGTTTAAAGCTCAGGTCGAGACC

NgoMIV (441)

401 GGGCCTTTGTCCGGCGCTCCCTTGGAGCCTACCTAGACTCAGCCGGCTCTCCACGCTTTGCTGACCCTGCTTGTCAACTCTACGCTTTTGTTCGTTT

AgeI (552)
BspHI (568)

501 TCTGTTCTGCGCCGTTACAGATCCAAGCTGTGACCGGCGCCTACCTGAGATCACCGGTAGGAGGGCCATCATGACTGAATATAAACTTGTGGTAGTTGGA
 601 GCTGGTGGCGTAGCAAGAGTGCCTTGACGATACAGCTAATTCAGAATCATTTTGTGGACGAATATGATCCAACAATAGAGGATTCCTACAGGAAGCAAG
 701 TAGTAATTGATGGAGAACTGTCTCTTGGATATTCTCGACACAGCAGGTCAAGAGGAGTACAGTGAATGAGGGACCAAGTACATGAGGACTGGGGAGGG
 801 CTTTCTTTGTGATTTGCCATAAATAACTAAATCATTGGAAGATATTCACCATATAGAGAACAAATTAAGAGTTAAGGACTCTGAAGATGTACCT
 901 ATGGTCTAGTAGAAATAAATGTGATTTGCCTTCTAGAACAGTAGACACAAAACAGGCTCAGGACTTAGCAAGAAGTTATGGAATTCCTTTTATTGAAA
 1001 CATCAGCAAAGACAAGACAGGGTGTGATGATGCCTTCTATACATTAGTTCGAGAAATTCGAAAACATAAAGAAAAGATGAGCAAAGATGGTAAAAAGAA
 1101 GAAAAAGAAGTCAAAGACAAAGTGTGTAATTATGTAATACAATTTGTACTTTTTTCTTAAGGCATACAGTACAAGTGGCTAGCTGGCCAGACATGATA
 1201 AGATACATTGATGAGTTTGGACAAACCACAAGTGAATGCAGTGAATAAATGCTTTATTTGTGAAATTTGTGATGCTATTGCTTTATTTGTAACATTA

XmnI (840)
EcoRI (982)

1301 TAAGTGCATAAACAAGTTAAACAACAATTCATTTATGTTTCAGGTTCCAGGGGAGGTGTGGGAGGTTTTTAAAGCAAGTAAACCTCTA
 1401 CAAATGTGGTATGGAATCTAAATAACAGCATAGCAAACTTTAACCTCAAATCAAGCCTCTACTTGAATCCTTTTCTGAGGGATGAATAAGGCATAGG
 1501 CATCAGGGGCTGTTGCCAATGTGCATTAGCTGTTTGCAGCCTCACCTTCTTCATGGAGTTAAGATATAGTGTATTTTCCCAAGGTTTGAAGTACTGCTCT

HpaI (1317)
MfeI (1328)

1601 TCATTTCTTTATGTTTTAAATGCACTGACCTCCACATTCCCTTTTGTAGTAAATATTCAGAAATAATTTAAATACATCATTGCAATGAAAATAAATGTT
 1701 TTTTATTAGGCAGAATCCAGATGCTCAAGGCCCTCATAATATCCCCAGTTTGTAGTGTGACTTAGGGAACAAAGGAACCTTTAATAGAAATTGGACA
 1801 GCAAGAAAGCGAGCTTCTAGCTTTAGTTCCTGGTGTACTTGAGGGGATGAGTTCCTCAATGGTGGTTTTGACCAGTTGCCATTCTCATCTCAATGAGCAC
 1901 AAAGCAGTCAGGAGCATAGTCAGAGATGAGCTCTGACATGCCACAGGGGCTGACCACCTGATGGATCTGTCCACCTCATCAGAGTAGGGGTGCCTG
 2001 ACAGCCACAATGGTGTCAAAGTCTTCTGCCGTTGCTCACAGCAGACCAATGGCAATGGCTTCAGCACAGACAGTACCCTGCCAATGTAGGCCTCAA
 2101 TGTGGACAGCAGAGATGATCTCCCAAGTCTTGGTCTGATGGCCGCCGACATGGTGTCTTGTGCTCATAGAGCATGGTGTCTTCTCAGTGGCGAC
 2201 CTCCACCAGCTCCAGATCCTGCTGAGAGATGTTGAAGGCTTCTATGGTGGCCCTCTATAGTGTGCTATTATACTATGCGGATATACTATGCGGATGA
 2301 TTAATTGTCAAACAGCGTGGATGGCGTCTCCAGCTTATCTGACGGTTCACTAAACGAGCTCTGCTTATATAGACCTCCACCGTACACGCCTACCGCCC
 2401 ATTTGCGTCAATGGGGCGGAGTTGTTACGACATTTTGGAAAGTCCCGTTGATTTACTAGTCAAACAAACTCCCATGACGTCAATGGGGTGGAGACTTG
 2501 GAAATCCCCGTGAGTCAAACCGCTATCCACGCCATTGATGTAAGTCCAAAACCGCATCATCATGGTAATAGCGATGACTAATACGTAGATGTAAGTCCCA

BstBI (1057)
MscI (1185)

177▶ K K K S K T K C V I M •
 44▶ V V I D G E T C L L D I L D T A G Q E E Y S A M R D Q Y M R T G E G

XbaI (933)
EcoRI (982)

77▶ F L C V F A I N N T K S F E D I H H Y R E Q I K R V K D S E D V P
 111▶ M V L V G N K C D L P S R T V D T K Q A Q D L A R S Y G I P F I E

EcoRI (1413)
SapI (1595)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

SspI (1652)
Swal (1666)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

EcoO109I (1727)
BstXI (1956)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

SacI (1927)
StuI (2091)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

BbsI (2237)
XmnI (2233)
AseI (2299)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

SacI (2356)
SpeI (2454)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

SnaBI (2582)

141▶ • N R T Y K L P I L E E I T T K V L K G N M E I L V
 115▶ F C D P A Y D S I L E R C M G C P S V V R I S R D V E D S Y P H R

NdeI (2687)

2601 AGTAGGAAAGTCCATAAGGTCATGTA
2701 TGATGTA

PacI (2873)

PstI (2866)

SdaI (2865)

BspLU11I (2883)

2801 ACGTCAATGGGCGGGGTCGTTGGGCGGTCAGCCAGGCGGGCCATTTACCGTAAGTTATGTAACGCTGCAGGTTAAITTAAGAACATGTGAGCAAAAGGC
2901 CAGCAAAAGGCCAGGAACCGTAAAAAGGCCGCGTTGCTGGCGTTTTTCCATAGGCTCCGCCCCCTGACGAGCATCACAAAATCGACGCTCAAGTCAGA
3001 GGTGGCGAAACCCGACAGGACTATAAAGATACCAGGCGTTTTCCCCTGGAAGCTCCCTCGTGCCTCTCCTGTTCCGACCCTGCCGCTTACCGGATACCT

ApaLI (3197)

3101 GTCCGCCTTTCTCCCTTCGGAAGCGTGGCGCTTTCTCATAGCTCACGCTGTAGGTATCTCAGTTCGGTGTAGGTCGTTCCGCTCCAAGCTGGGCTGTGTG
3201 CACGAACCCCGTTAGCCCGACCGCTGCGCCTTATCCGGTAACTATCGTCTTGAGTCCAACCCGGTAAGACACGACTTATCGCCACTGGCAGCAGCCA
3301 CTGGTAACAGGATTAGCAGAGCGAGGTATGTAGCGGTGCTACAGAGTTCTTGAAGTGGTGGCCTAACACGGCTACACTAGAAGAACAGTATTTGGTAT
3401 CTGCGCTCTGCTGAAGCCAGTTACCTTCGAAAAAGAGTTGGTAGCTCTTGATCCGGCAAACAACACCGCTGGTAGCGGTGGTTTTTTGTTTGAAG
3501 CAGCAGATTACGCGCAGAAAAAAGGATCTCAAGAAGATCCTTTGATCTTTTACGGGGTCTGACGCTCAGTGAACGAAAACCTCACGTTAAGGGATTT

EagI (3633)

PacI (3613)

SwaI (3622)

NotI (3632)

3601 TGGTCATGGCTAGTTAATTAACATTTAAATCAGCGGCCGCAATAAAATATCTTTATTTTCATTACATCTGTGTGTTGGTTTTTTGTGTAATCGTAACTA
3701 ACATACGCTCTCCATCAAAACAAAACGAAACAAAACAACTAGCAAATAGGCTGTCCCCAGTGCAAGTGACAGGTGCCAGAACATTTCTCTATCGAA