

pMSCV-neo-GFP-miR 155

Absent Sites	0	AbsI,AjuI,AjuI',AlfI,AlfI',ApaI,AsiSI,AvrII,BarI,BarI',BbsI,BclI,BplI,BplI',BsaBI,BsiWI,BstBI,BstXI,BstZ17I,CspCI,CspCI',DrallI,FseI,FspAI,HpaI,MauBI,MfeI,MluI,MreI,NruI,NsiI,Pacl,PfiMI,PmeI,PmlI,PshAI,PspOMI,PspXI,Psrl,Psrl',SacII,SanDI,SbfI,SfiI,SgrDI,SnaBI,SrfI,Swal,XcmI,XhoI
AarI	1	2211 (7581)
AccI	1	3879 (7581)
AflIII	1	4968 (7581)
ArsI	1	1732 (7581)
ArsI'	1	1700 (7581)
BamHI	1	3872 (7581)
BglIII	1	1411 (7581)
BlnI	1	2826 (7581)
BsaAI	1	3507 (7581)
BspEI	1	2972 (7581)
BstEII	1	1089 (7581)
Clal	1	3899 (7581)
EcoRI	1	2533 (7581)
HincII	1	3880 (7581)
HindIII	1	3892 (7581)
NdeI	1	7032 (7581)
NotI	1	2158 (7581)
PciI	1	4968 (7581)
PsiI	1	2181 (7581)
RsrII	1	3719 (7581)
Sall	1	3878 (7581)
Scal	1	6341 (7581)
SexAI	1	1217 (7581)
SgrAI	1	7404 (7581)
StuI	1	2847 (7581)

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5' TGAAAGACCCACCTGTAGGTTTGGCAAGCTAGCTTAAGTAACGCCATTTTGC AAGGCATGGAAAATACATAACTGAGAATAGAGAAGTTCAGATCAAGG
 100
 3' ACTTCTG GGGTGGACATCCAAACCGTTCGATCGAATTCATTGCGGTA AACCGTTC CGTACCTTTTATGTATTGACTCTTATCTCTTCAAGTCTAGTTCC
 5' pCMV LTR

5' TTAGGAACAGAGAGACAGCAGAATATGGGCCAAACAGGATATCTGTGGTAAGCAGTTCTGCCCCGGCTCAGGGCCAAGAACAGATGGTCCCCAGATGCG
 200
 3' AATCCTTGTCTCTCTGTGCTCTTATACCCGGTTTGTCTTATAGACACCATTTCGTCAAGGACGGGGCCGAGTCCCGGTTCTTGTCTACCAGGGGTCTACGC
 5' pCMV LTR

5' GTCCCGCCCTCAGCAGTTTCTAGAGAACCATCAGATGTTTCCAGGGTGCCCCAAGGACCTGAAATGACCCTGTGCCTTATTTGAACTAACCAATCAGTTC
 300
 3' CAGGGCCGGGAGTCGTCAAAGATCTCTTGGTAGTCTACAAAGTCCACGGGGTTCCTGGACTTTACTGGGACACGGAATAAACTTGATTGGTTAGTCAAG
 5' pCMV LTR

5' GCTTCTCGTCTCTGTTCGCGCCTTCTGCTCCCCGAGCTCAATAAAAAGAGCCACAAACCCCTCACTCGGCGCGCAGTCTCCGATAGACTGCGTCGCCC
 400
 3' CGAAGAGCGAAGACAAGCGCGGAAGACGAGGGGCTCGAGTTAATTTCTCGGGTGTGGGGAGTGAGCCGCGCGGTGAGGAGGCTATCTGACGCAGCGGG
 5' pCMV LTR

5' GGGTACCCGTATTCCCAATAAAGCCTCTTGCTGTTTGCATCCGAATCGTGGACTCGCTGATCCTTGGGAGGGTCTCCTCAGATTGATTGACTGCCACCT
 500
 3' CCCATGGGCATAAGGGTTAATTTGCGGAGAACGACAAACGTAGGCTTAGCACCTGAGCGACTAGGAACCCCTCCAGAGGAGTCTAACTAACTGACGGGTGGA
 5' pCMV LTR

5' CGGGGTCTTTTCAATTTGGAGGTTCCACCGAGATTGGAGACCCCTGCCAGGGACCACCGACCCCCCGCGGGAGGTAAGCTGGCCAGCGGTCTGTTTCG
 600
 3' GCCCCAGAAAGTAAACCTCCAAGTGGCTCTAAACCTCTGGGGACGGGTCCCTGGTGGCTGGGGGGCGGCCCTCCATTTCGACCGGTTCGCCAGCAAAGC
 5' pCMV LTR Pack Signal

5' TGTCTGTCTCTGTCTTTGTGCGTGTTTGTGCCGCATCTAATGTTTGC GCCTGCGTCTGTACTAGTTAGCTAACTAGCTCTGTATCTGGCGGACCCGTGG
 700
 3' ACAGACAGAGACAGAAACACGCACAAACACGGCCGTAGATTACAAACCGGACGCAGACATGATCAATCGATTGATCGAGACATAGACCGCTGGGCACC
 Pack Signal

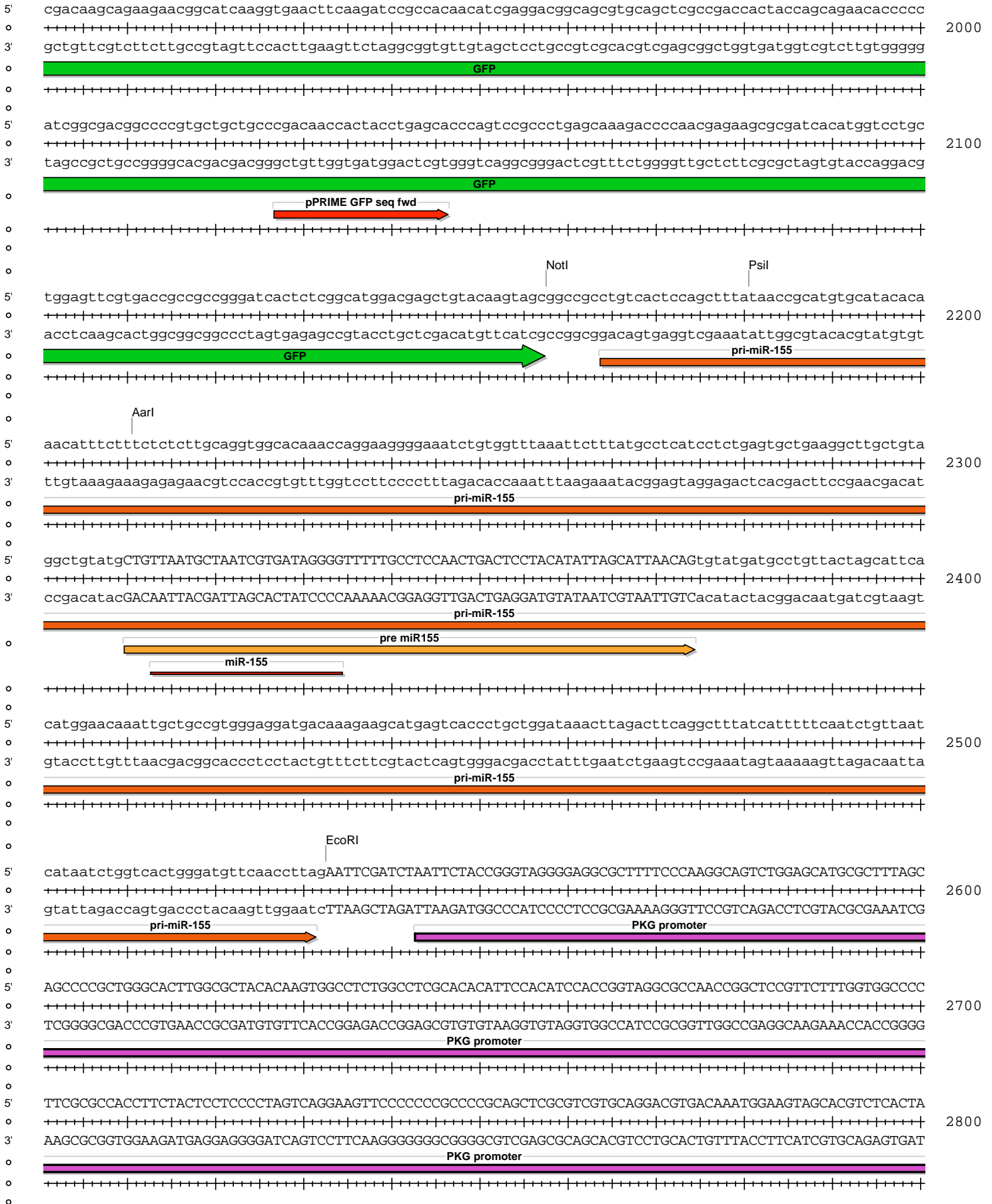
5' TGGAATGACGAGTTCGAACACCCGCGCAACCCCTGGGAGACGTCCCAGGGACTTTGGGGCCGTTTGTGGCCCGACCTGAGGAAGGGAGTTCGATG
 800
 3' ACCTTGACTGCTCAAGACTTGTGGGCCGGCGTTGGGACCCTCTGCAGGGTCCCTGAAACCCCGGCAAAAACACCGGGCTGGACTCCTTCCTCAGCTAC
 Pack Signal

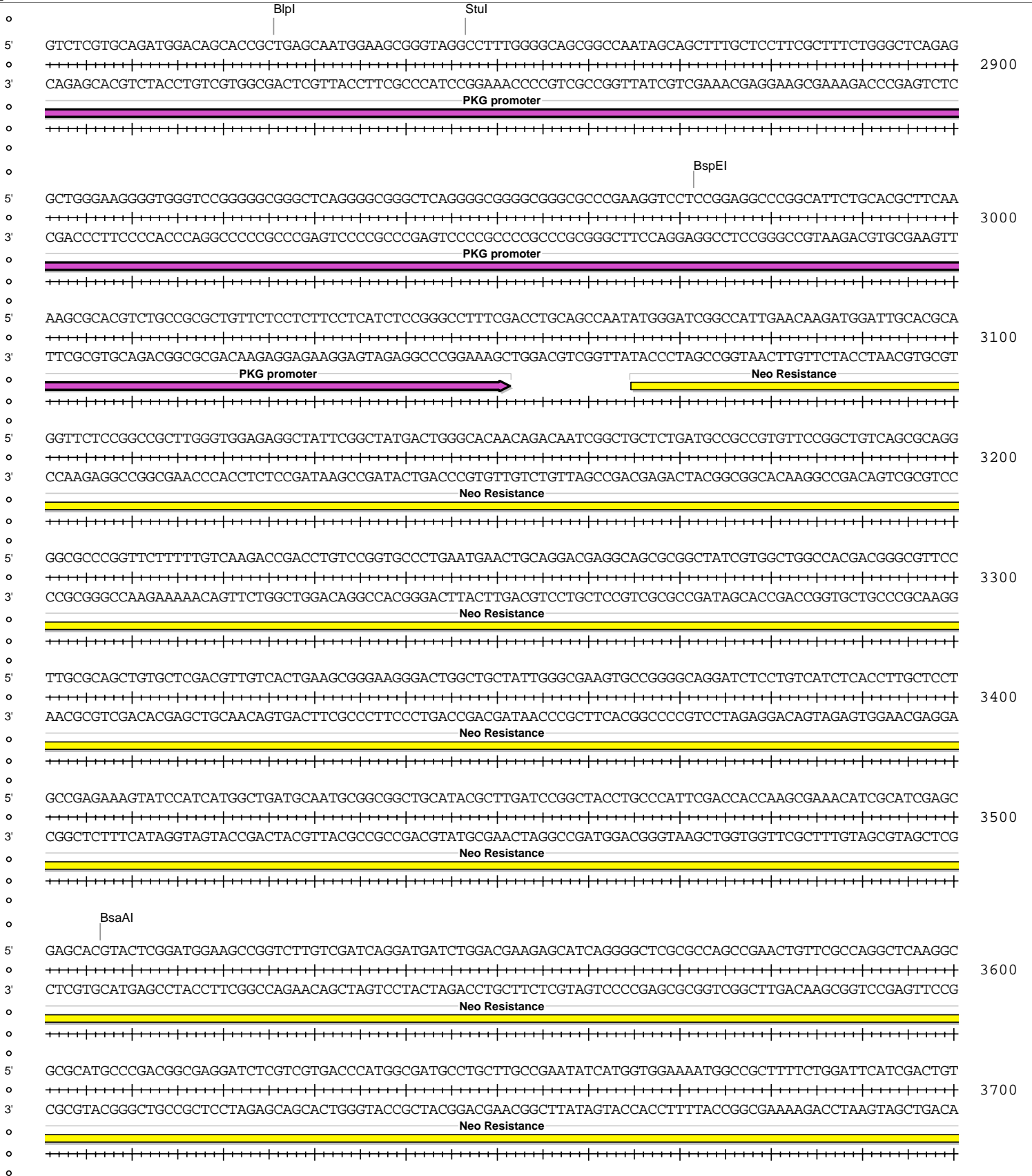
5' TGGAATCCGACCCCGT CAGGATATGTGGTCTGGTAGGAGACGAGAACC TAAAACAGTTC CCGCCTCCGTCTGAATTTTGTCTTCGGTTTGAACCGAA
 900
 3' ACCTTAGGCTGGGGCAGTCTTATACACCAAGACCATCCTCTGCTCTTGGATTTTGTCAAGGGCGGAGGCAGACTTAAAAACGAAAGCCAAACCTTGGCTT
 Pack Signal

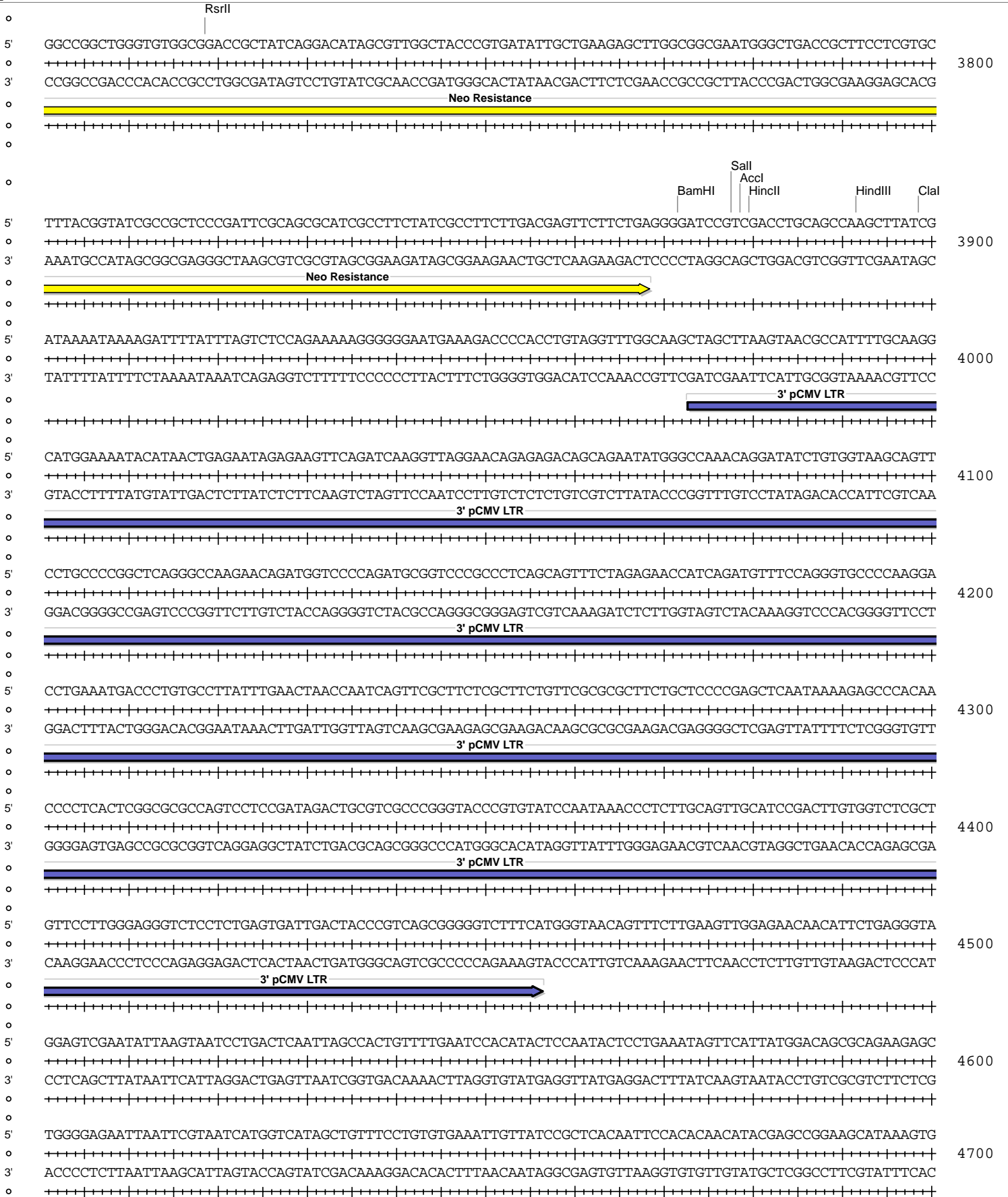
5' GCCGCGCTCTGTCTGCTGCAGCGCTGCAGCATCGTTCTGTGTTGTCTCTGTCTGACTGTGTTTCTGTATTTGTCTGAAAATTAGGGCCAGACTGTTAC
 1000
 3' CGGCGCGCAGAACAGACGACGTCGCGACGTCGTAGCAAGACACAACAGAGACAGACTGACACAAAGACATAAACAGACTTTTAATCCCGGTCTGACAATG
 Pack Signal



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5' TAAAGCCTGGGGTGCCTAATGAGTGAGCTAACTCACATTAATTGCGTTGCGCTCACTGCCCGCTTTCCAGTCGGGAAACCTGTCTGTCAGCTGCATTAA 4800
 3' ATTTTCGGACCCACGGATTACTCACTCGATTGAGTGTAATTAACGCAACGCGAGTGACGGGGCAAAGGTCAGCCCTTTGGACAGCACGGTCGACGTAATT

5' TGAATCGGCCAACGCGCGGGGAGAGGCGGTTTGCCTATTGGGCGCTCTTCCGCTTCCCTCGCTCACTGACTCGCTGCGCTCGGTCTGTCGGTGCAGCGAG 4900
 3' ACTTAGCCGGTTGCGCGCCCTCTCCGCAAACGCATAACCCGCGAGAAGGCGAAGGAGCGAGTGACTGAGCGACGCGAGCCAGCAAGCCGACGCCGCTC

CGGTATCAGCTCACTCAAAGGCGGTAATACGGTTATCCACAGAATCAGGGGATAACGCAGGAAAGAATGTGAGCAAAGGCCAGCAAAGGCCAGGAA 5000
 3' GCCATAGTCGAGTGAGTTTCCGCCATTATGCCAATAGGTGTCTTAGTCCCTATTGCGTCCCTTCTTGTACTCGTTTTCCGGTCGTTTTCCGGTCCTT

5' CCGTAAAAGGCCGCGTTGCTGGCGTTTTTCCATAGGCTCCGCCCCCTGACGAGCATCACAAAATCGACGCTCAAGTCAGAGGTGGCGAAACCCGACA 5100
 3' GGCATTTTTCCGGCGCAACGACCGCAAAAAGGTATCCGAGGCGGGGGACTGCTCGTAGTGTTTTTAGCTGCGAGTTCAGTCTCCACCGCTTTGGGCTGT

5' GGACTATAAAGATACCAGGCGTTTCCCTGGAAGCTCCCTCGTGCCTCTCCTGTTCGACCTGCGCTTACCGGATACCTGTCCGCTTCTCCCTT 5200
 3' CCTGATATTTCTATGTTCCGCAAAGGGGACCTTCGAGGAGCACGCGAGAGGACAAGGCTGGGACGCGAATGGCCTATGGACAGGCGGAAAGAGGGAA

5' CGGGAAGCGTGGCGCTTCTCATAGCTCACGCTGTAGGTATCTCAGTTCGGTGTAGGTGTTTCGCTCCAAGCTGGGCTGTGTGCACGAACCCCGTTCA 5300
 3' GCCCTTCGCACCGCAAAGAGTATCGAGTGCAGATCCATAGAGTCAAGCCACATCCAGCAAGCGAGGTTTCGACCCGACACACGTGCTTGGGGGCAAGT

5' GCCCACCGCTGCGCCTTATCCGGTAACTATCGTCTTGAGTCCAACCCGTAAGACACGACTTATCGCCACTGGCAGCAGCCACTGGTAACAGGATTAGC 5400
 3' CGGGCTGGCGACGCGGAATAGCCATTGATAGCAGAACTCAGGTTGGGCCATTCTGTGCTGAATAGCGGTGACCGTTCGTCGGTGACCATTGTCTAATCG

5' AGAGCGAGGTATGTAGGCGGTGCTACAGAGTCTTGAAGTGGTGGCCTAACTACGGTACACTAGAAGGACAGTATTTGGTATCTGCGCTCTGCTGAAGC 5500
 3' TCTCGCTCCATACATCCGCCAGATGTCTCAAGAACTTACCACCGGATTGATGCCGATGTGATCTTCTGTCTATAAACCATAGACGCGAGACGACTTCG

5' CAGTTACCTTCGAAAAAGAGTTGGTAGCTCTTGATCCGCAAACAACCCCGCTGGTAGCGGTGGTTTTTTTGTGTTGCAAGCAGCAGATTACGCGCAG 5600
 3' GTCAATGGAAGCCTTTTTCTCAACCATCGAGAACTAGGCCGTTTGTGTTGGTGGCGACCATCGCCACCAAAAAACAACGTTTCGTCGTCTAATGCGCGTC

5' AAAAAAGGATCTCAAGAAGATCCTTTGATCTTTCTACGGGTCTGACGCTCAGTGAACGAAAACCTACGTTAAGGGATTTGGTTCATGAGATTATCA 5700
 3' TTTTTTCTTAGAGTTCTTCTAGGAACTAGAAAAGATGCCCCAGACTGCGAGTCACCTTGCTTTTGTAGTGCAATTCCCTAAAACAGTACTCTAATAGT

5' AAAAGGATCTTACCTAGATCCTTTTAAATTAATAAATGAAGTTTTAAATCAATCTAAAGTATATATGAGTAAACTTGGTCTGACAGTTACCAATGCTTAA 5800
 3' TTTTCTTAGAAGTGGATCTAGGAAAATTAATTTTACTTCAAAAATTTAGTTAGATTTTCATATATACTCATTGTAACCAGACTGTCAATGGTTACGAATT

5' TCAGTGAGGCACCTATCTCAGCGATCTGTCTATTTCTGTTTCATCCATAGTTGCCTGACTCCCCGTCGTGTAGATAACTACGATACGGGAGGGCTTACCATC 5900
 3' AGTCACTCCGTGGATAGAGTCGCTAGACAGATAAAGCAAGTAGGTATCAACGGACTGAGGGGACGACATCTATTGATGCTATGCCCTCCCGAATGGTAG

PciI
AflIII

Amp res

Amp res

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5' TGGCCCCAGTGTGCAATGATACCGCGAGACCCAGCTCACCGGCTCCAGATTTATCAGCAATAAACAGCCAGCCGGAAGGGCCGAGCGCAGAAGTGGT
 6000
 3' ACCGGGGTCACGACGTTACTATGGCGCTCTGGGTGCGAGTGGCCGAGGTCTAAATAGTCGTATTGGTTCGGCTCCCGGCTCGCGTCTTACCA
 Amp res

5' CCTGCAACTTTATCCGCCTCCATCCAGTCTATTAATTGTTGCCGGAAGCTAGAGTAAGTAGTTCGCCAGTTAATAGTTGCGCAACGTTGTTGCCATTG
 6100
 3' GGACGTTGAAATAGGCGGAGGTAGGTACAGATAATTAACAACGGCCCTTCGATCTCATTTCATCAAGCGGTCAATTATCAAACGCGTTGCAACAACGGTAAC
 Amp res

5' CTACAGGCATCGTGGTGTACGCTCGTCTGTTGGTATGGCTTCATTCAGCTCCGGTTCCTAACGATCAAGGCGAGTTACATGATCCCCATGTTGTGCAA
 6200
 3' GATGTCCGTAGCACACAGTGCAGCAGCAAACCATAACGAAGTAAGTCGAGGCCAAGGGTTGCTAGTTCGGCTCAATGTACTAGGGGGTACAACACGTT
 Amp res

5' AAAAGCGGTTAGTCTCTTCGGTCTCCGATCGTTGTGAGAAGTAAGTTGGCCGAGTGTATCACTCATGGTTATGGCAGCACTGCATAATTCTCTTACT
 6300
 3' TTTTCGCCAATCGAGGAAGCCAGGAGGTAGCAACAGTCTTCATTCAACCGCGTCAACAATAGTGAGTACCAATACCGTCTGACGTATTAAGAGAATGA
 Amp res

5' GTCATGCCATCCGTAAGATGCTTTTCTGTGACTGGTGTGAGTACTCAACCAAGTCATTTCTGAGAATAGTGTATGCGGGGACCGAGTTGCTCTTGCCCGGCGT
 Scal
 6400
 3' CAGTACGGTAGGCATTTCTACGAAAAGACTGACCACTCATGAGTTGGTTGAGTAAAGTCTTATCACATACGCGCTGCTCAACGAGAACGGGCGCA
 Amp res

5' CAATACGGGATAATACCGGCCACATAGCAGAACTTTAAAAGTGTCTATCATTTGAAAACGTTCTTCGGGGCGAAAACCTCAAGGATCTTACCGCTGTT
 6500
 3' GTTATGCCCTATTATGGCGCGGTGTATCGTCTTGAAATTTTACAGAGTAGTAACCTTTTGCAAGAAGCCCCGCTTTTGAGAGTCTTAGAATGGCGACAA
 Amp res

5' GAGATCCAGTTCGATGTAACCACTCGTGCACCAACTGATCTTCAGCATCTTTACTTTTACCAGCGTTCTGGGTGAGCAAAAACAGGAAGGCAAAAT
 6600
 3' CTCTAGGTCAAGCTACATTGGGTGAGCAGTGGGTTGACTAGAAGTCGTAGAAAATGAAAGTGGTCGAAAGACCCACTCGTCTTTGTCTCCGTTTAA
 Amp res

5' GCCGCAAAAAGGGAATAAGGGCGACACGGAATGTTGAATACTCATACTCTTCCCTTTTCAATATTATTGAAGCATTTATCAGGGTTATTGTCTCATGA
 6700
 3' CGGCGTTTTTCCCTTATTCCCGCTGTGCCTTTTACAACCTATGAGTATGAGAAGGAAAAGTTATAATAACTTCGTAATAGTCCCAATAACAGAGTACT
 Amp res

5' GCGGATACATATTGAATGTATTAGAAAAATAACAATAAGGGGTTCCGCGCACATTTCCCGAAAAGTGCCACCTGACGTCTAAGAAACCATTATTAT
 6800
 3' CGCCTATGTATAAACTTACATAAATCTTTTATTGTTTATCCCCAAGGCGCGTGTAAAGGGGCTTTTACGGTGGACTGCAGATTCTTTGGTAATAATA
 Amp res

5' CATGACATTAACCTATAAAAATAGGCGTATCACGAGGCCCTTTCGCTCGCGCGTTCGGTGTGACGGTGAAAACCTCTGACACATGCAGCTCCCGGAG
 6900
 3' GTACTGTAATTGGATATTTTTATCCGCATAGTGTCCGGGAAAGCAGAGCGCGCAAAGCCACTACTGCCACTTTTGGAGACTGTGTACGTGAGGGGCTC
 Amp res

5' ACGGTCACAGCTTGTCTGTAAGCGGATGCCGGGAGCAGACAAGCCCGTCAGGGCGCGTCAGCGGGTGTGGCGGGTGTCCGGGCTGGCTTAACTATGCCG
 7000
 3' TGCCAGTGTGAAACAGACATTCGCCCTACGGCCCTCGTCTGTTCCGGCAGTCCCGCGAGTCGCCACAAACCGCCACAGCCCCGACCGAATTGATACGCC
 Amp res

NdeI

o
5' CATCAGAGCAGATTGTACTGAGAGTGCACCATATGCGGTGTGAAATACCGCACAGATGCGTAAGGAGAAAATACCGCATCAGGCGCCATTGCCATTGAG 7100
o ++++++
3' GTAGTCTCGTCTAACATGACTCTCACGTGGTATACGCCACACTTTATGGCGTGTCTACGCATTCTCTTTTATGGCGTAGTCCGCGGTAAGCGGTAAGTC
o ++++++
o
5' GCTGCGCAACTGTTGGGAAGGGCGATCGGTGCGGGCCTCTTCGCTATTACGCCAGCTGGCGAAAGGGGGATGTGCTGCAAGGCGATTAAGTTGGGTAACG 7200
o ++++++
3' CGACGCGTTGACAACCCTTCCCGCTAGCCACGCCCGGAGAAGCGATAATGCGGTGACCGCTTTCCTTACACGACGTTCCGCTAATTCAACCCATTGC
o ++++++
o
5' CCAGGGTTTTCCAGTCACGACGTTGTAAAACGACGGCGCAAGGAATGGTGCATGCAAGGAGATGGCGCCCAACAGTCCCCGGCCACGGGGCCTGCCAC 7300
o ++++++
3' GGTCCAAAAGGGTCAGTGTGCAACATTTTGCTGCCGCTTCTTACCACGTACGTTCTTACCGCGGGTTGTCAGGGGGCCGGTGCCCGGACGGTG
o ++++++
o
5' CATACCACGCCGAAACAAGCGCTCATGAGCCCGAAGTGGCGAGCCCGATCTTCCCATCGGTGATGTGCGGATATAGGCGCCAGCAACCGCACCTGTG 7400
o ++++++
3' GTATGGGTGCGGCTTTGTTTCGCGAGTACTCGGGCTTACCCTCGGGCTAGAAGGGGTAGCCACTACAGCCGCTATATCCGCGGTCGTTGGCGTGGACAC
o ++++++
o
SgrAI
o
5' GCGCCGGTGTGCGCGCCACGATGCGTCCGGCGTAGAGGCGATTAGTCCAATTTGTTAAAGACAGGATATCAGTGGTCCAGGCTCTAGTTTTGACTCAAC 7500
o ++++++
3' CGCGCCACTACGGCCGGTGCTACGCAGGCCGATCTCCGCTAATCAGGTTAAACAATTTCTGTCTATAGTACCAGTCCGAGATCAAACTGAGTTG
o ++++++
o
5' AATATCACCAGCTGAAGCCTATAGAGTACGAGCCATAGATAAAATAAAAGATTTTATTTAGTCTCCAGAAAAAGGGGGAA 7581
o ++++++
3' TTATAGTGGTCGACTTCGGATATCTCATGCTCGGTATCTATTTTATTTTCTAAAATAAATCAGAGGCTTTTTTCCCCCTT
o ++++++
o