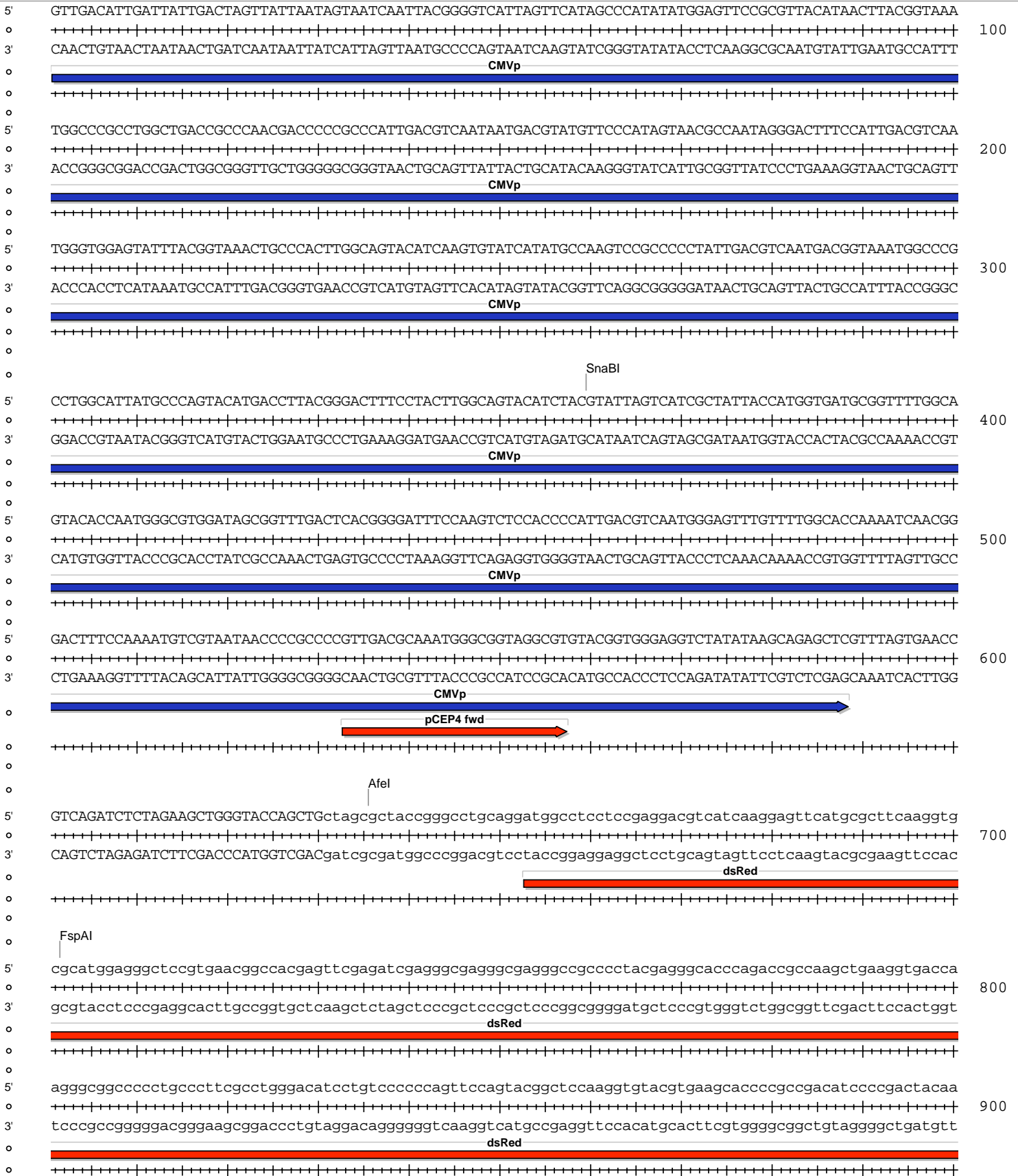
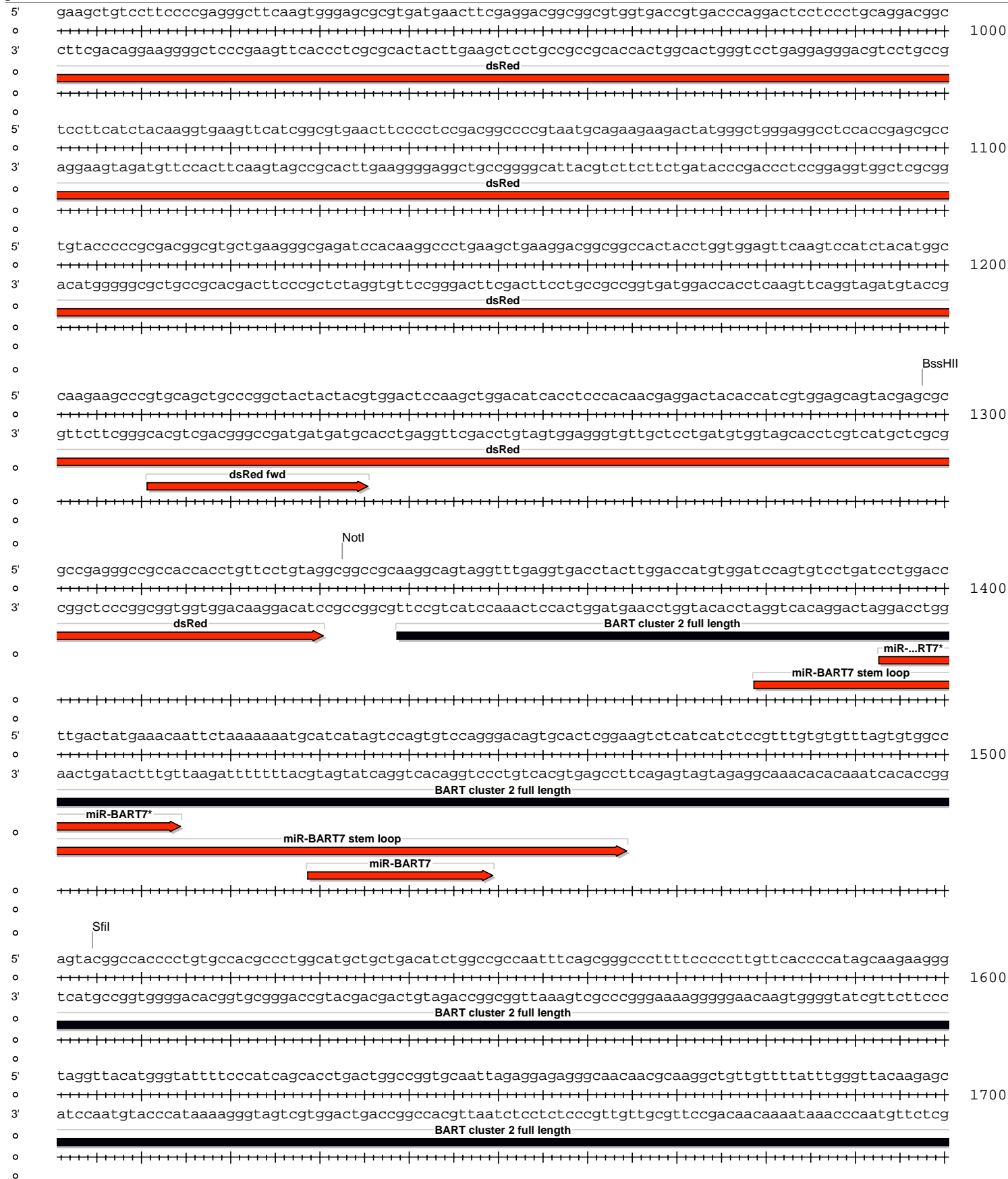


Absent Sites	0	AarI,AbstI,AfIII,Agel,Ascl,BarI,BarI',BsiWI,BstZ17I,FseI,MauBI,MreI,NaeI,NgoMIV,Pacl,PmeI,PmlI,Psrl,Psrl',SapI,SgrDI,SrfI,Swal
AfeI	1	636
AjuI	1	12257
AjuI'	1	12225
AsiSI	1	11908
BaeI	1	5276
BaeI'	1	5243
BbeI	1	3433
BbvCI	1	6962
BclI	1	2451
BlpI	1	2520
BssHII	1	1298
BstBI	1	11395
EcoNI	1	8997
EcoRV	1	4796
FspAI	1	702
HindIII	1	3242
KasI	1	3429
NarI	1	3430
NotI	1	1333
NruI	1	11094
PshAI	1	11571
PspXI	1	2631
SfiI	1	1505
SfoI	1	3431
SgrAI	1	7163
SnaBI	1	360
XhoI	1	2631

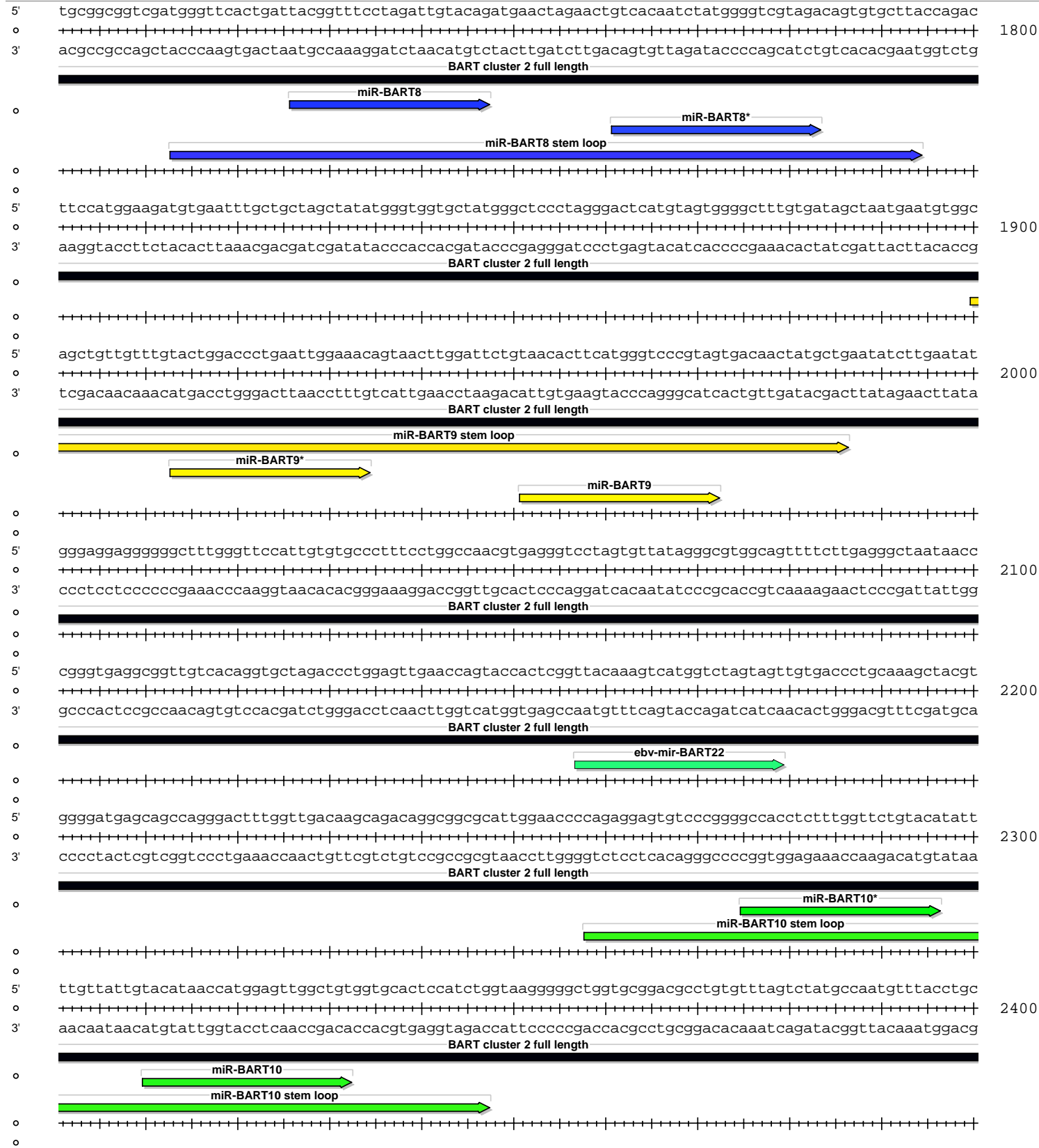
pCEP4-dsRed-BART7-14

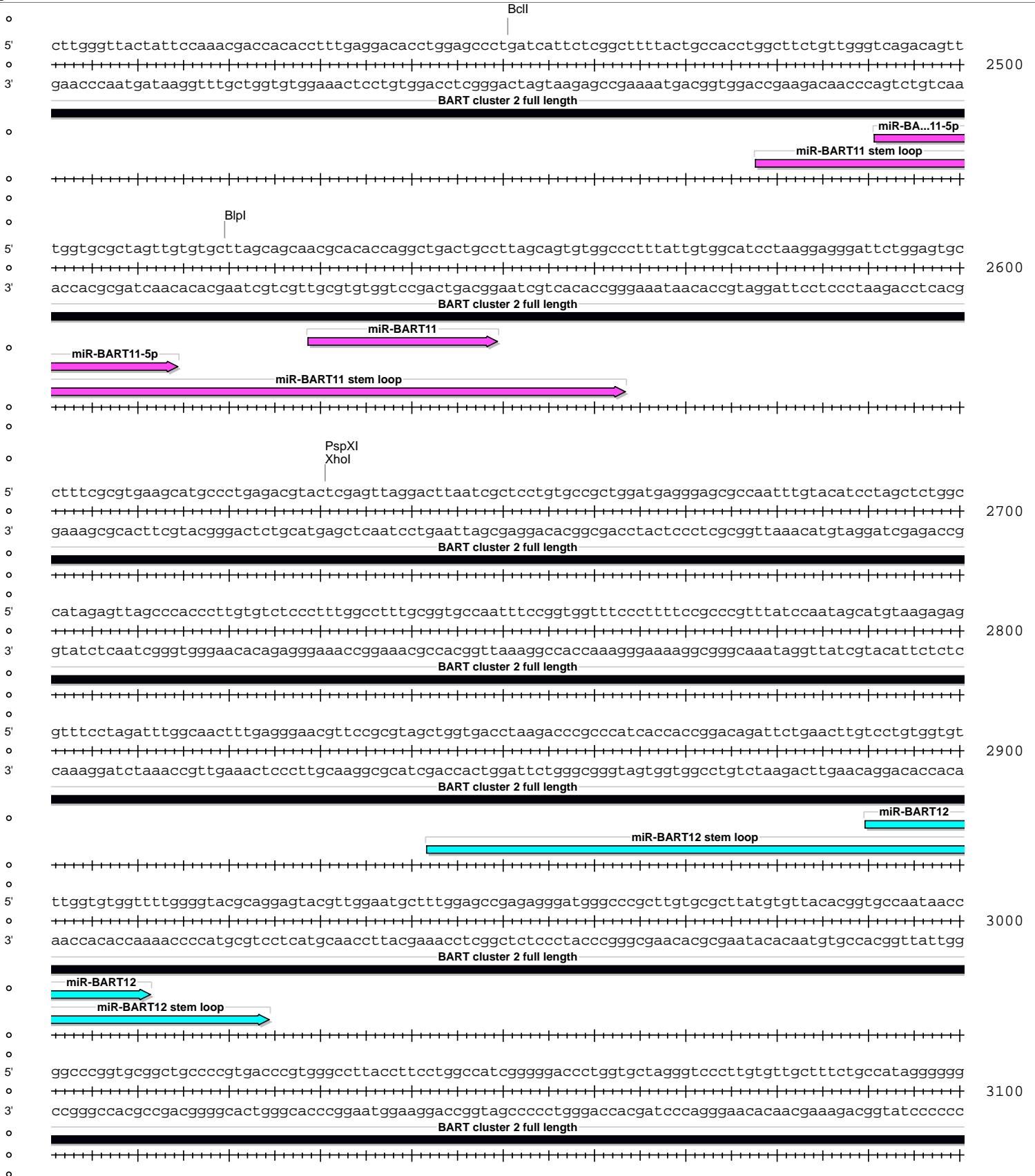


pCEP4-dsRed-BART7-14



pCEP4-dsRed-BART7-14





pCEP4-dsRed-BART7-14

5' aaagcatcgccttcagaattggctgctccgttggaacatttgaggcctactgtatccgtgtcctgacaacattccccgcaaacatgacatgggttaattt  
 3' ttctgtagcggaagtcttaaccgacgaggcaaccttgtaaacctccggatgacataggcacaggactggtgtaagggcggtttgtactgtacccaatataa

BART cluster 2 full length

miR-BART19-5p

miR-BART19 stem loop

5' aaacatgttttgttggcttgggaatgctcttagggcctggaagcttgtcattggattcatcgtttctgaaactacaggcgtaggcctattgttagcaggc  
 3' ttgtacaaaacaacgaaaccttacgagaatcccggaccttcgaacagtaacctaaagtagcaaaggacttgatgtccgcatcccggataacatcgtccg

BART cluster 2 full length

miR-B...20-5p

miR-BART19-3p

miR-BART19 stem loop

miR-...0-5p

miR-BART20 stem loop

5' atgtcttcattcctgcgtaccgaatggcatgaaggcacagcctgttaccattggcacctttttccatgtaaacctccgtgatcctgggtcctttggaga  
 3' tacagaagtaaggacgcatggcttaccgtacttccgtgtcggacaatggtaaccgtggaaaaaaggtagacatttgaggcactaggaccaggaaacctct

BART cluster 2 full length

miR-BART20-5p

miR-BART20-3p

miR-BART20-5p

miR-BART20 stem loop

KasI  
NarI  
SfoI  
BbeI

5' ctcaagtgtgaatttgttttgggtgttcggcgccaggcctctcgacgttggaaatgtcaactcaactgggcacctcgataaccggctcgtggctcgtaca  
 3' gagttcacacttaacaaaaccacaagccggtccgtagagctgcaaccttacagtgagtgaaaccgtggagctattggccgagcaccgagcatgt

BART cluster 2 full length

miR-BART13\*

miR-BART13 stem loop

5' gacgattgttggctctgtaacttgccaggacggctgacgatgtgttagtctgccacttgcacccgcttgggtactcgggagactaatggggg  
 3' ctgctaacaaccgagacatgaaacggtccctgcccactgctacacaaatcagacggtgaacgtaggccgcgaaaccaatgagccctctgattaccccc

BART cluster 2 full length

miR-BART13

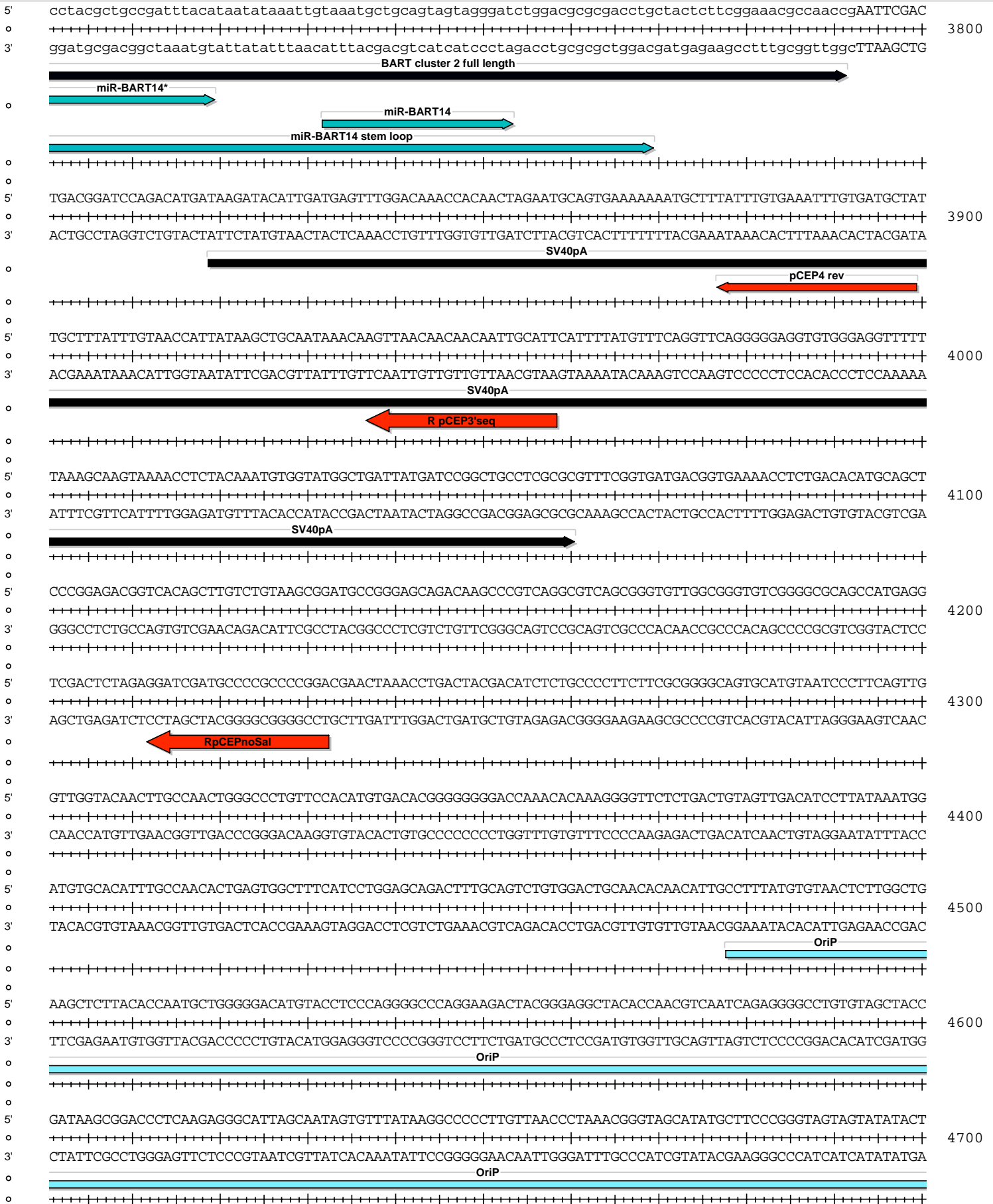
miR-BART13 stem loop

5' tgtggatggcacaggctgggggtgagctcgggagtgccctgggctgtgctgcagccattcgccctctgggatgagatgttcaggggtggcggta  
 3' acaccataccgtgtccgacccccactcagaccctacagggacccgcaacgacgtcgggtaagcgggagaccctactctacaagtcccaccggccatg

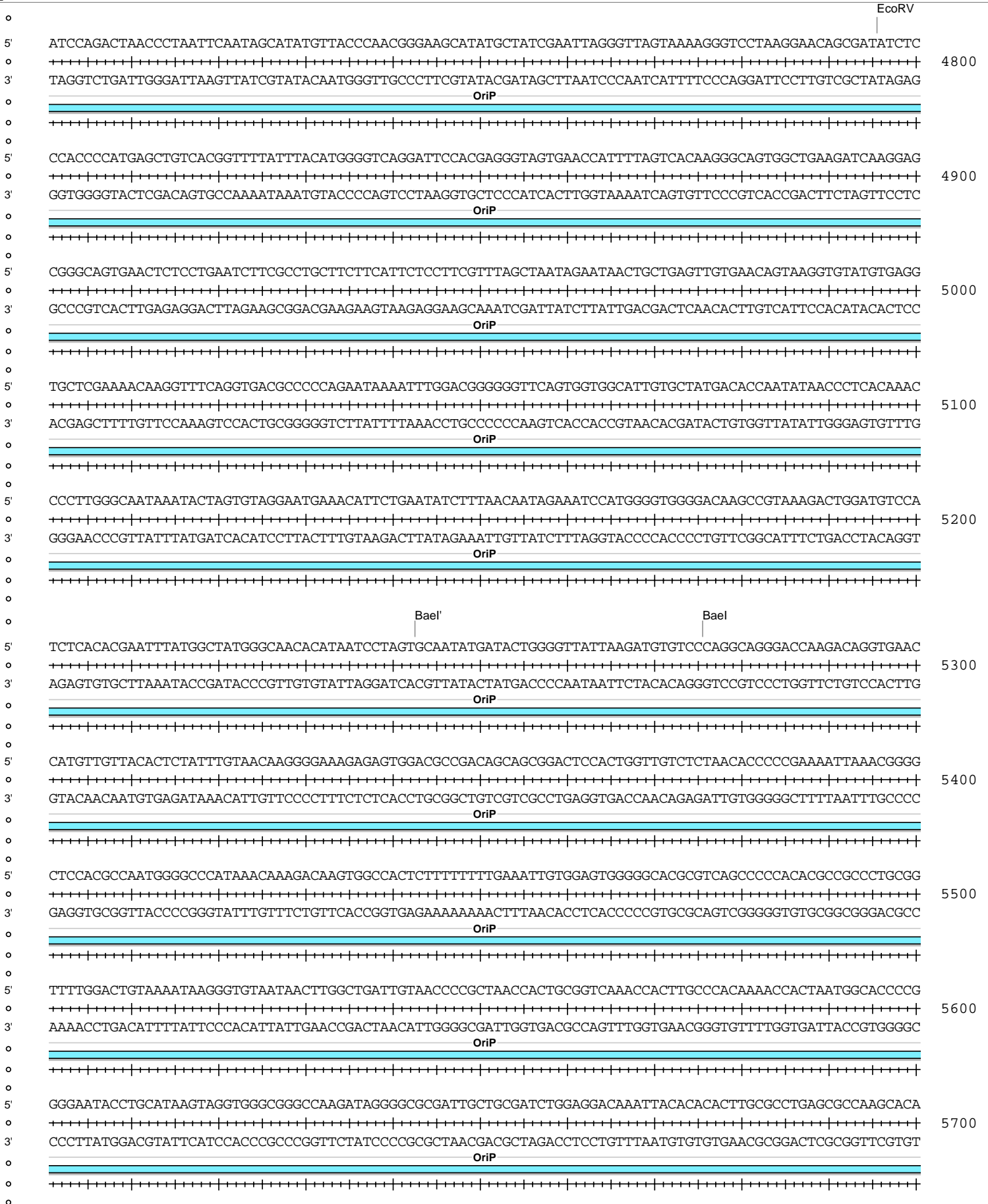
BART cluster 2 full length

miR-BART14 stem loop

pCEP4-dsRed-BART7-14

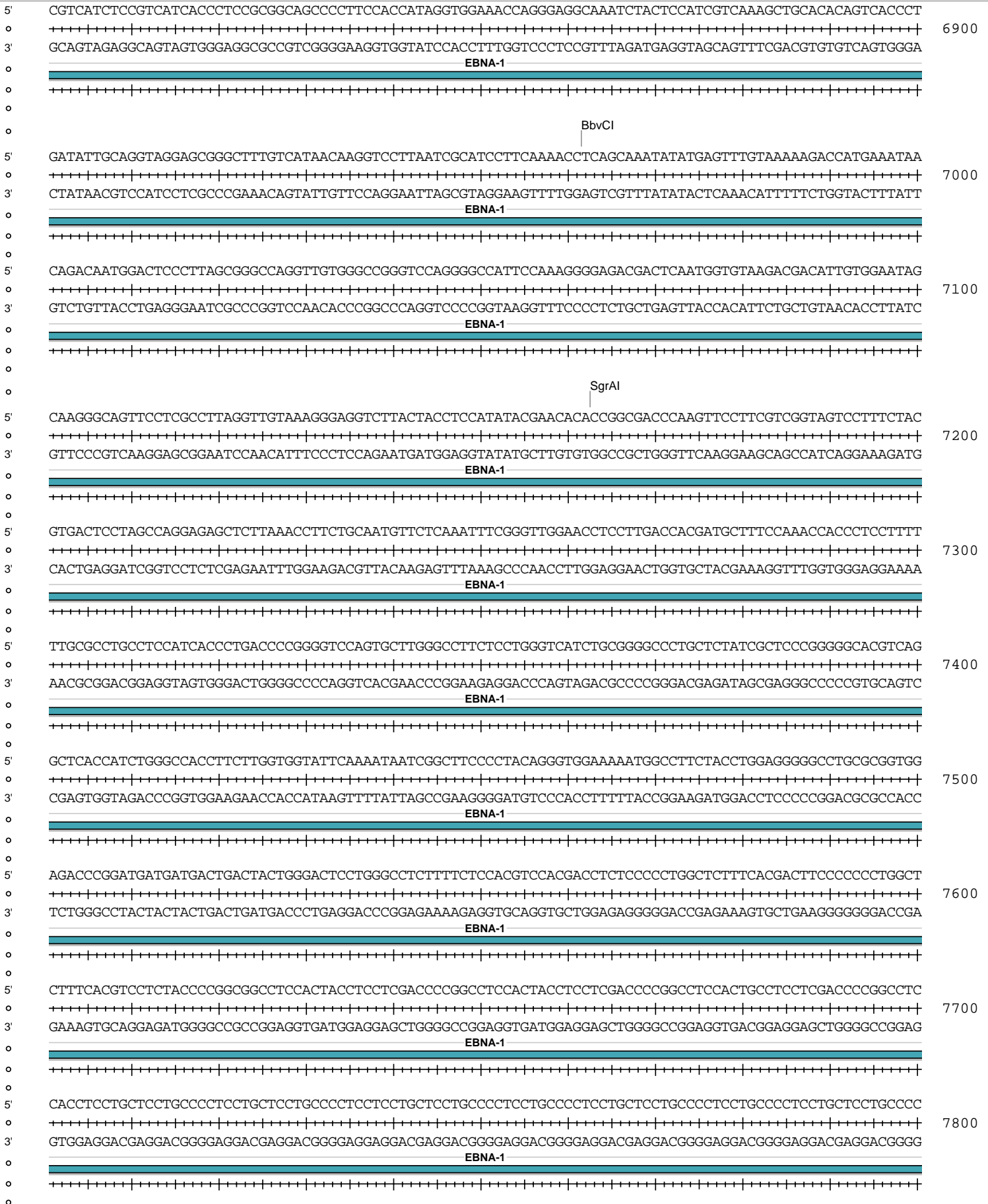








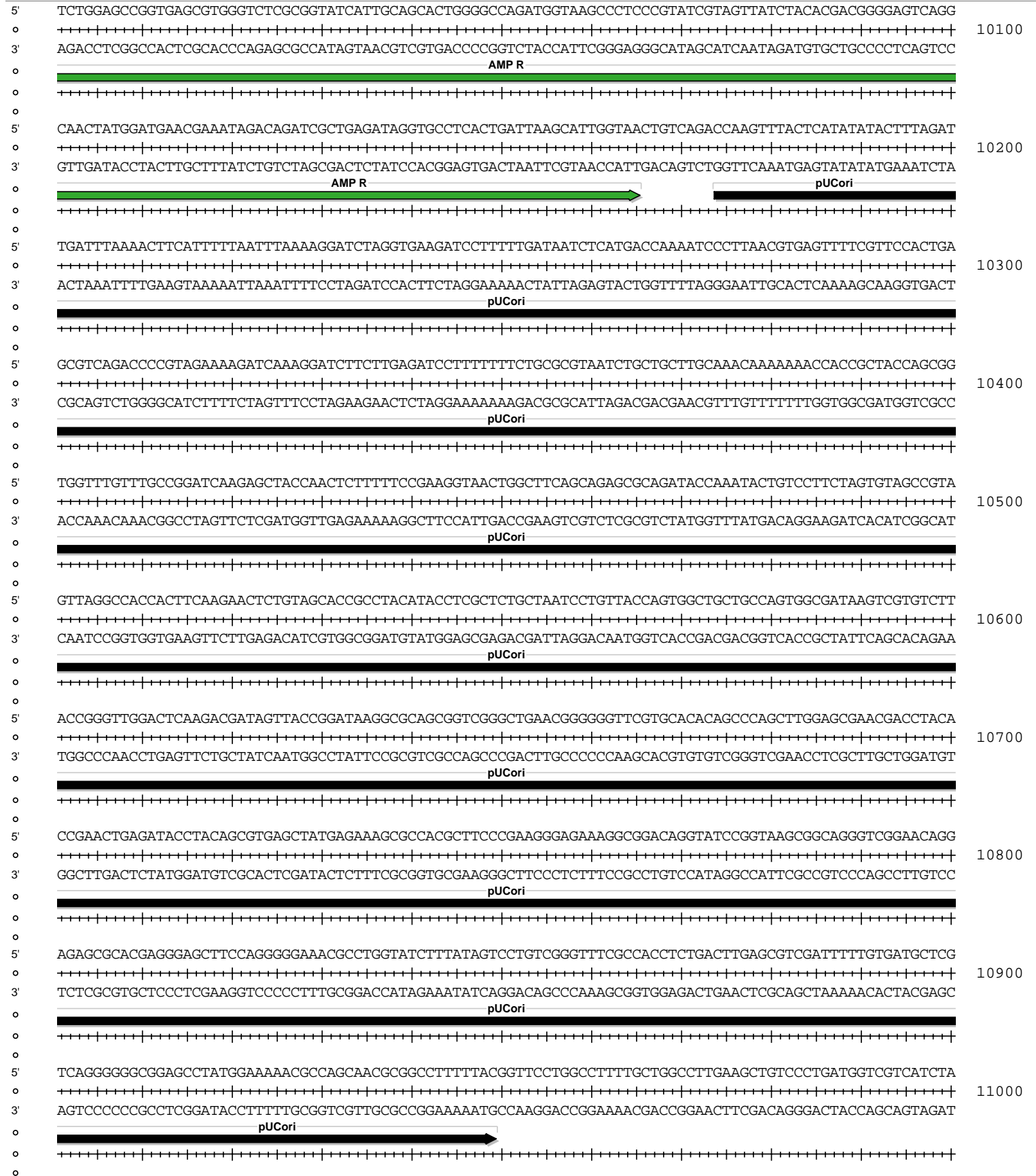
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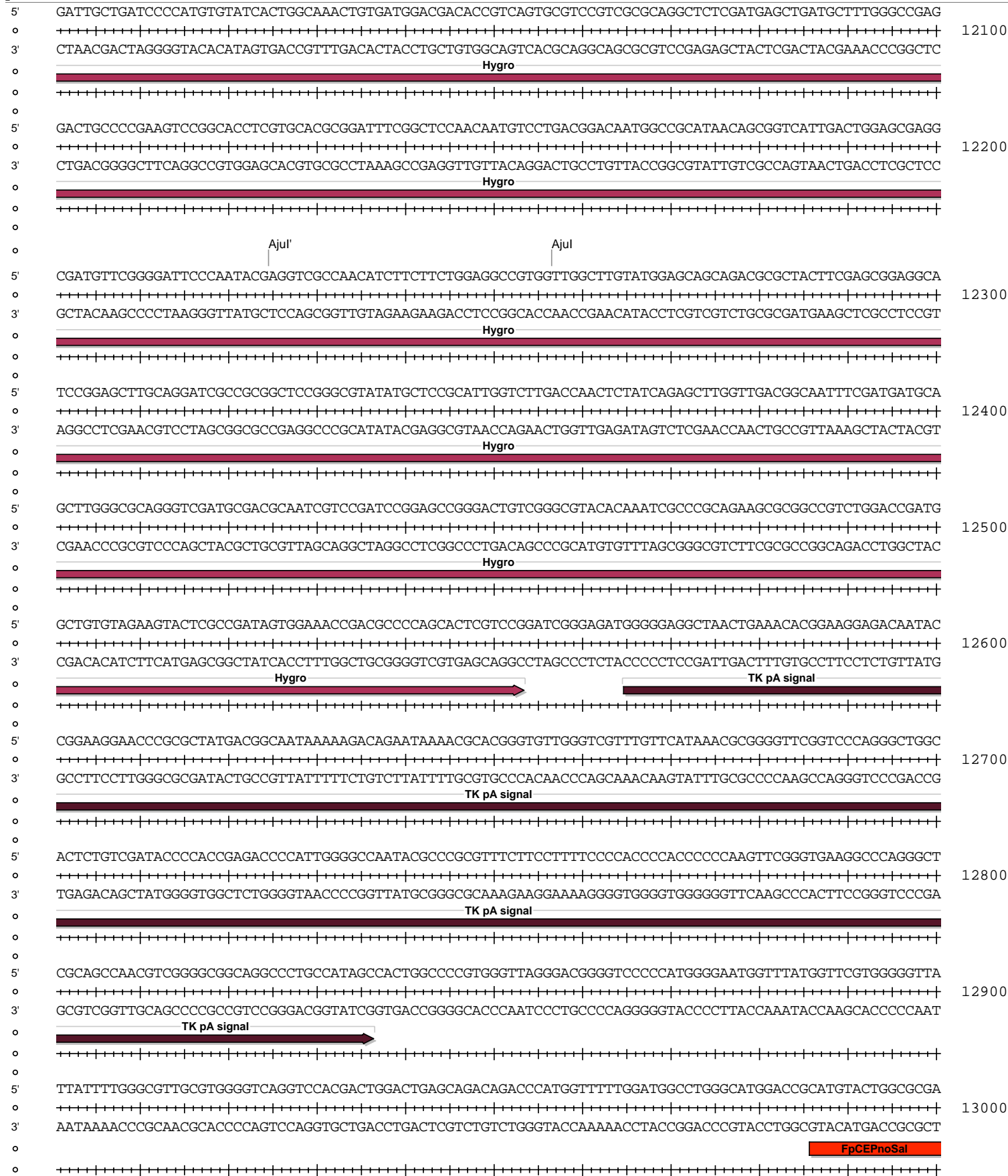
EcoNI

5' TTTCGCTCCTGAGCCTCAAGCCAGGCCTCAAATTCCTCGTCCCCCTTTTTCGCTGGACGGTAGGGATGGGGATTCTCGGGACCCTCCTCTTCTCTTCAA  
9000  
3' AAACGCAGGACTCGGAGTTCGGTCCGGAGTTAAGGAGCAGGGGAAAAACGACCTGCCATCCCTACCCTAAGAGCCCTGGGGAGGAGAAGGAGAAGTT  
GGTCACCAGACAGAGATGCTACTGGGGCAACGGAAGAAAAGCTGGGTGCGGCCTGTGAGGATCAGCTTATCGATGATAAGCTGTCAAACATGAGAATTCT  
9100  
3' CCAGTGGTCTGTCTCTACGATGACCCCGTTGCCTTCTTTTCGACCCACGCCGGACACTCCTAGTCGAATAGCTACTATTTCGACAGTTTGTACTCTTAAGA  
TGAAGACGAAAGGCCTCGTGATACGCCTATTTTATAGGTTAATGTCATGATAATAATGGTTTCTTAGACGTCAGTGGCACTTTTCGGGAAATGTGC  
9200  
3' ACTTCTGCTTTCCCGGAGCACTATGCGGATAAAAAATATCCAATTACGACTACTATTATTACCAAAGAATCTGCAGTCCACCGTGAAAAGCCCTTTACACG  
GCGGAACCCCTATTTGTTTTATTTTCTAAATACATTCAAATATGTATCCGCTCATGAGACAATAACCCTGATAAATGCTTCAATAATATTGAAAAGGAA  
9300  
3' CGCCTTGGGGATAAAACAAATAAAAAGATTTATGTAAGTTTATACATAGGCGAGTACTCTGTTATTGGGACTATTTACGAAGTTATTATAACTTTTTCCTT  
GAGTATGAGTATTCAACATTTCCGTGTCGCCCTTATTCCCTTTTTTTCGGCATTTCCTGTTTTTTCCTCAGAACGCTGGTGAAGTAAAA  
9400  
3' CTCATACTCATAAGTTGTAAGGCACAGCGGAATAAGGGAAAAACGCCGTAAAACGGAAGGACAAAAACGAGTGGGTCTTTGCGACCACTTTCATTTT  
AMP R  
GATGCTGAAGATCAGTTGGGTGCACGAGTGGGTACATCGAACTGGATCTCAACAGCGTAAGATCCTTGAGAGTTTTCGCCCGAAGAACGTTTTCCAA  
9500  
3' CTACGACTTCTAGTCAACCACGTCCTACCCAATGTAGCTTGACCTAGAGTTGTTCGCCATTCTAGGAACTCTCAAAGCGGGGCTTCTTGCAAAGGTT  
AMP R  
TGATGAGCACTTTTAAAGTTCTGCTATGTGGCGCGTATTATCCCGTGTGACGCCGGCAAGAGCAACTCGGTGCGGCATACACTATCTCAGAATGA  
9600  
3' ACTACTCGTGAAAATTTCAAGACGATACACCGCGCCATAATAGGGCACAACGTCGGCCCGTTCTCGTTGAGCCAGCGGCGTATGTGATAAGAGTCTTACT  
AMP R  
CTTGGTTGAGTACTCACCAGTCCACAGAAAAGCATCTTACGGATGGCATGACAGTAAGAGAATTATGCAGTCTGCCATAACCATGAGTGATAACACTGCC  
9700  
3' GAACCAACTCATGAGTGGTCAAGTGTCTTTTCGTAGAATGCCTACCGTACTGTCTTCTTAATACGTCACGACGGTATTGGTACTCACTATTGTGACGC  
AMP R  
GCCAACTTACTTCTGACAACGATCGGAGGACCGAAGGAGCTAACCCTTTTTTGCACAACATGGGGGATCATGTAACCTCGCCTTGATCGTTGGGAACCGG  
9800  
3' CGGTTGAATGAAGACTGTTGCTAGCCTCCTGGCTTCTCGATTGGCGAAAAACGTTGTACCCCTAGTACATTGAGCGGAACTAGCAACCCTTGCC  
AMP R  
AGCTGAATGAAGCCATACCAAACGACGAGCGTGACACCACGATGCCTGCAGCAATGGCAACAACGTTGCGCAAACCTATTAAGTGGCGAACTACTTACTCT  
9900  
3' TCGACTTACTTCGGTATGGTTTGCTGCTCGCACTGTGGTGTACGGAGCTCGTTACCGTTGTTGCAACGCGTTTGATAATTGACCGCTTGATGAATGAGA  
AMP R  
AGCTTCCCGGCAACAATTAATAGACTGGATGGAGGCGGATAAAGTTGCAGGACCACTTCTGCGCTCGGCCCTTCCGGCTGGCTGGTTTATTGCTGATAAA  
10000  
3' TCGAAGGCGCGTTGTTAATTATCTGACCTACCTCCGCTATTTCAACGTCCTGTTGAAGACGCGAGCCGGGAAGGCCGACCGACCAATAACGACTATTT  
AMP R






pCEP4-dsRed-BART7-14





pCEP4-dsRed-BART7-14

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5' CACGAACACCGGGCGTCTGTGGCTGCCAAACACCCCGACCCCAAAAACCACCGCGCGGATTTCTGGCGTGCCAAGCTAGTCGACCAATTCTCATGTTT
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
3' GTGCTTGTGGCCCGCAGACACCGGACCGTTTGTGGGGGCTGGGGGTTTTTGGTGGCGCGCCTAAAGACCGCACGGTTCGATCAGCTGGTTAAGAGTACAAA
o 
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
o
5' GACAGCTTATCATCGCAGATCCGGGCAACGTTGTTGCCATTGCTGCAGGCGCAGAAGTGGTAGGTATGGAAGATCTATACATTGAATCAATATGGCAAT
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
3' CTGTGCAATAGTAGCGTCTAGGCCCGTTGCAACAACGGTAACGACGTCGCGTCTTGACCATCCATACCTTCTAGATATGTAAGTTAGTTATAACCGTTA
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
o
5' TAGCCATATTAGTCATTGGTTATATAGCATAAATCAATATTGGCTATTGGCCATTGCATACGTTGTATCTATATCATAAATATGTACATTTATATTGGCTC
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
3' ATCGGTATAATCAGTAACCAATATATCGTATTTAGTTATAACCGATAACCGGTAAACGTATGCAACATAGATATAGTATTATACATGTAAATATAACCGAG
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
o
5' ATGTCCAATATGACCGCCAT
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
3' TACAGGTTATACTGGCGGTA
o +-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+-----+
o

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13100

13200

13300

13320