

Figure 1: HRP-20057 Complete Plasmid Sequence

```
>HRP-20057_70046700_complete_plasmid_sequence
>pCRXLTOPO.SHIV.BG505.332N.375Y.dct
ACGCGTGAAGGGATTTATTACAGTGAAGAAGACATAGAATCTTAGACATGTACTTAGAAAAAGAAGAAGGCATCGTACCAGATTG
GCAGGATTACACCTCAGGACCAGGAATTAGATACCCAAAGACATTTGGCTGGCTATGGAAATTAGTCCCTGTAAATGTATCAGATGA
GGCACAGGAGGATGAGAGGCATTATTTAATGCAGCCAGCTCAAACCTTCCAAGTGGGATGACCCCTGGGGAGAGGTTCTAGCATGGAA
GTTTGATCCAACCTAGCCTACACTTATGAGGCATATGTTAGATACCCAGAAGAGTTTGAAGCAAGTCAGGCCTGTAGAGGAAGA
GGTTAGAAGAAGGCTAACCGCAAGAGGCCCTTCTTAAACATGGCTGACAAGAAGGAACTCGCTGAGACAGCAGGGACTTCCACAAGG
GGATGTTACGGGGAGTACTGGGGAGGAGCCGGTCGGGAACACCCACTTTCTTGATGTATAAATATCACTGCATTTCCGCTCTGTATT
CAGTCGCTCTGCGGAGAGGCTGGCAGATTGAGCCCTGGGAGGTTCTCTCCAGCACTAGCAGGTAGAGCCTGGGTGTTCCCTGTAGA
CTCTCACCAGCACTGGCCGGTGTGGCAGAGTGGCTCCACGCTTGCTTAAAGCCCTCTCAATAAAGCTGCCATTTTAGAA
GTAAGCTAGTGTGTGCCATCTCCATCTCTCCTAGTCGCGCTGGTCACTCGGTACTCGGTAATAAGAAGACCCCTGGTCTGTTAGGACC
CTTTCTGCTTTGGGAAACCGAAGCAGGAAATCCCTAGCAGATTGGCGCCGAACAGGGACTTGAAGGAGAGTGAGAGACTCCTGAG
TACGGCTGAGTGAAGGCAGTAAGGGCGGCAGGAACCAACCAGCAGGAGTGTCTCTATAAAGGCGCGGGTCCGTACCAGACGGCGTG
AGGAGCGGGAGAGGAGAGGCTCCGGTTGCAGGTAAGTGCAACAAAAAGAGATAGCTGTCTTTATCCAGGAAGGGATAATAA
GATAGAGTGGGAGATGGGCGCGAGAACTCCGCTTGTGTCAGGGAAGAAAGCAGATGAATTAGAAAAAATTAGGCTACGACCCGGCGG
AAAGAAAAAGTACATGTTGAAGCATGTAGTATGGGCAGCAATGAATAGATAGATTTGGATTAGCAGAAAGCCTGTTGGAGAACAA
AGAAGGATGTCAAAAAATACCTTTCACTTTAGCTCCATTAGTGCACAGGCTCAGAAAAATTTAAAAGCCTTTATAATACTGTCTG
CGTCATCTGGTGCATTCACGAGAGAGAAAGTGAACACACTGAGGAAGCAAAACAGATAGTGCAGACAGACCTGTTGGTGAAGAAC
AGGAACAGCAGAACTATGCCAAAAACAAGTAGACCAACAGCACCATCTAGCGGCAGAGGAGGAAATTACCCAGTACAACAAATAGG
TGTTAACTATGTCCACCTGCCATTAAGCCCGAGAACATTAATGCCTGGGTAATAATGATAGAGGAAAAGAAATTTGGAGCAGAAGT
AGTGCCAGGATTTACGGCACTGTGCAAGGCTGCACCCCTATGACATTAATCAGATGTTAAATGTGTGGGAGACCATCAGGCGGC
TATGCAGATTATCAGAGACATTATAAACGAGGAGGCTGCAGATTGGGACTTGCAGCACCACAAACAGCTCCACAACAAGGACAGCT
TAGGGAGCCGTAGGATCAGATATTGCAGGAACAACCTAGCTCAGTAGATGAACAAATCCAGTGGATGTACAGACAACAGAACCCCAT
ACCAGTAGGCAACATTTACAGGAGATGGATCCAACCTGGGGTTGCAAAAAATGTGTGTCAGAAATGATATAACCCCAACAAACATTTAGATGT
AAAACAAGGGCCAAAGGAGCCATTTTCAGAGCTATGTAGACAGGTTCTACAAAAGCTTAAAGAGCAGAAACAAACAGATGCAGCAGTAAA
GAATTGGATGACTCAAACACTGCTGATTCAAATGCTAACCCAGATTGCAAGCTAGTGTGAAGGGGCTGGGTGTGAATCCCACCT
AGAAGAAATGCTAACGGCTTGTCAAGGAGTAGGGGACCAGGACAGAAGGCTAGATTAATGGCAGAAGCCCTAAAAGAGGCCCTCGC
ACCAGTGCCAATCCCTTTTGCAGCAGCCCAACAGAGGGGACCAAGAAAGCCAATTAAGTGTGGAAATTTGGGAAAGAGGGACACTC
TGCAAAGCAATGCAGAGCCCCAAGAAGACAGGGATGCTGGAATGTGGAAAAATGGACCATGTTATGGCCAAATGCCAGACAGACA
GGCCGGTTTTTTAGGCCTTGGTCCATGGGAAAGAAGCCCCGCAATTTCCCCATGGCTCAAGTGCATCAGGGGCTGACGCCAATCTGC
TCCCCCAGAGGCCAGCTGTGGATCTGCTAAAGAACTACATGCAGTTGGGCAAGCAGCAGAGAGAAAGCAGAGAGGAGCCCTTACAA
GGAGGTGACAGAGGATTTGCTGCACCTCAATTTCTCTTTGGAGGAGACCAGTAGTCACTGCTCATATTGAAGGACAGCCTGTAGAA
GTATTACTGGATACAGGGGCTGATGATTCTATTGTAACAGGAATAGAGTTAGGTCCACATTATACCCAAAAATAGTAGGAGGAATA
GGAGGTTTTATTAATACTAAAGAATACAAAAATGTAGAAATAGAAAGTTTTAGGCAAAAGGATTAAGGGACAATCATGACAGGGGAC
ACCCCGATTAACATTTTTGGTAGAAATTTGCTAACAGCTCTGGGGATGTCTCTAAATCTTCCCATAGCTAAGGTAGAGCCTGTAAAA
GTCGCCTTAAAGCCAGGAAAGGTTGGACCAAAATGAAGCAGTGGCCATTTATCAAAAGAAAAGATAGTTGCATTAAGAGAAATCTGT
GAAAAGATGAAAAGGATGGTCAGTTGGAGGAGCTCCCCCGACCAATCCATACAAACCCCAATTTGCTATAAAGAAAAGGAT
AAGAACAATGGAGAAATGCTGATAGATTTTAGGGAACATAATGGGCTCACTCAGGACTTTACGGAACTCCAATTAGGAATACCACAC
CCTGCAGGACTAGCAAAAAGGAAAAGGATTACAGTACTGGATATAGGTGACGCATATTTCTCCATACCTCTAGATGAAGAATTTAGG
CAGTACACTGCCTTTACTTTACCATCAGTAAATAATGCAGAGCCAGGAAAACGATACATTTATAAGGTTCTGCCTCAGGGATGGAAG
GGGTACCAGCCATCTCCAATACACTATGAGACATGTGTTAGAACCCCTTCAGGAAGGCAAAATCCAGATGTGACCTTAGTCCAGTAT
ATGGATGACATCTTAATAGCTAGTGACAGGACAGACCTGGAACATGACAGGGTAGTTTTACAGTTAAAGGAACTCTTAAATAGCATA
GGGTTTTCTACCCAGAAGAGAAATTCAAAAAGATCCCCATTTCAATGGATGGGGTACGAATGTGGCCAACAAAATGGAAGTTG
CAAAAGATAGAGTTGCCACAAAAGAGAGACCTGGACAGTGAATGATATACAGAAGTTAGTAGGAGTATTAATTTGGGCAGCTCAAAT
TATCCAGGTATAAAAAACCAACATCTCTGTAGGTTAATTAGAGGAAAAATGACTCTAACAGAGGAAGTTCAGTGGACTGAGATGGCA
GAAGCAGAATATGAGGAAAATAAAATAATTCTCAGTCAGGAACAAGAAGGATGTTATTACCAAGAAGGCAAGCCATTAGAAGCCACG
GTAATAAAGAGTCAGGACAATCAGTGGTCTTATAAAATTCACCAAGAAGACAAAATACTAAAAGTAGGAAAATTTGCAAGATAAAG
AATACACATAACCAATGGAGTTAGACTATTAGCACATGTAATACAGAAAATAGGAAAGGAAGCAATAGTGATCTGGGACAGGTCCCA
AAATCCACTTACCAGTTGAGAGGGATGTATGGGAACAGTGGTGGACAGACTATTGGCAGGTAACCTGGATACCCGGAATGGGATTTT
ATCTCAACACCACCACTAGTAAGATTAGTCTTCAATCTAGTGAAGAACCCTATAGAGGGAGAAGAAACCTATTATACAGATGGATCA
TGTAATAAACAGTCAAAAAGAGGGGAAAGCAGGATATATCACAGATAGGGGCAAAAGACAAAAGTAAAAGTGTAGAACAGACTACTAAT
CAACAAGCAGAATTTGAAGCATTCTCATGGCATTGACAGACTCAGGGCCAAAGGCAAAATATTATAGTAGATTACAAATATGTTATG
GGAATAAATAACAGGATGCCCTACAGAATCAGAGAGCAGGCTAGTTAACCAATAATAGAAGAAATGATTAAGAAAGTCAGAAATTTAT
GTAGCATGGGTACCAGCACAAAAGGTATAGGAGGAAACCAAGAAATAGACCACCTAGTTAGTCAAGGGATTAGACAAGTTCTCTTC
TTGGAAAAGATAGAGCCAGCACAAGAAGAACATGATAAAATACCATAGTAATGTAAGAAGAAATGGTATTCAAATTTGGATTACCCAGA
CTAGTGGCCAAACAGATAGTAGACACATGTGATAAATGTCACTCAGAAAAGGAGAAGCTATACATGGGCAGGTAATTCAGATCTAGGG
ACTTGGCAAAATGGATTGTACCCATCTAGAGGGAAAAATAATCATATAGTGCAGTACATGTAGCTAGTGGATTGATCATAAGACAGAGTA
ATTCACAAAGAGACAGGAAGACAGACAGCACTATTTCTGTTAAAATTTGGCAGGCAGATGGCCATTTACACATCTACACACAGATAAT
GGTGTAACTTTGCCTCGCAAGAAGTAAAGATGGTTGCATGGTGGCAGGGATAGAGCACACCTTTGGGGTACCCTACAATCCACAG
AGTCAGGGAGTAGTGAAGCAATGAATCACCCACTGAAAAATCAAATAGATAGAATCAGGGAACAAGCAAAATTCAGTAGAAACCATA
GTATTAATGGCAGTTCATTGCATGAATTTTAAAAGAAGGGGAGGAATAGGGGATATGACTCCAGCAGAAAGATTAATTAACATGATC
```

ACTACAGAACAAGAAATACAATTTCAACAATCAAAAACTCAAAATTTAAAAATTTTCGGGTCTATTACAGAGAAGGCAGAGATCAA
CTGTGGAAGGGACCCGGTGAAGTATTTGTGAAAGGGGAAGGAGCAGTCTTAAAGGTAGGGACAGACATTAAGGTAGTACCCAGA
AGAAAGGCTAAAATTTATCAAAGATTTATGGAGGAGGAAAAGAGGTGGATAGCAGTTCCACATGGAGGATACCCGAGAGGCTAGAGAG
GTGGCATAGTCTCATAAAATATTTGAAATATAAACTAAAGATCTGCAAAGGTTTGTATGTGCCCATTTATAAGGTTGGATGGGC
ATGGTGGACTGCAGCAGAGTAATCTTCCCCTACAGGAAGGACATTTAGAAAGTACAAGGGTATTGGCATTGGACCCAGAAAG
AGGGTGGCTCAGTACTTATGCAGTGAAGATAACCTGGTACTCAAGGAACCTTTGGACAGATGTACACCAGACTATGCAGACATTTT
ACTGCATAGCACTTATTTCCCTTGTCTTACAGCGGGAGAAGTGAGAAGGGCCATCAGGGGAGAACAACCTGCTGTCTTGTGCAAGTT
CCCGAGAGCTCATAGGTACCAGGTACCAAGCCTACAGTACTTAGCACTAAAAGTAGTAAGCGATGTCAGATCCCAGGGAGAGAATCC
CACCTGGAACAGTGGAGAAGAGACAATAGGAGAGGCTTTCGAATGGCTAAACAGAACAGTAGAGGAGATAAACAGAGAGGCGGTAA
ACCACCTACCAAGGGAGCTGATTTTCCAGGTTTGGCAAAGGCTTGGGAATACTGGCATGTGAACAAGGGATGTCACAAAGCTATG
TAAAATACAGACTCTGTGTTAATAACAAAGGCTTTATTTATGCATTTCAAGAAAGGCTGTAGATGCTTAGGGGAAGGACCGGG
CAGGGTAGAGTGGAGACCTCCTCCTCCTCCCTCCAGGATAGCATAAAATGGAAGAAAGACTCCAGAAAATGAAGGCCAC
AAAGGGAACCATGGGATGAATGGGTAGTGGAGGCTTGAAGAAGTGAAGAAGAGCTTTAAAACACTTTGATCCTCGCTTGTCTAA
CTGCCTTGGTAATCATATCTATAATAGACATGGAGACACCCTTGGAGGAGCAGGAGAAGTCTATTAGAATCCTCCAACGAGCACTCT
TCATGCATTTTCAAGGCGGATGCATCCACTCCAGAAATCGGCCAACCTGGGGGAGGAAATCCTCTCAACTATACCGCCCTCTAGAA
GCATGCTATAAATGGAGCCCGTAGATCCTAGCCTAGAGCCTTGGAAATCATCCAGGAAGTCAAGCCTGGGACTCCTTGTAAACAGCTGTT
ATTGTAACAGTGTCTGATCATTTGTCAATTTGTCTTATAACGAAAGGCTTAGGCATCTCCTATGGCAGGAAGAAGCGGAGACAGC
GACGAGAAGCTCTCAAGGCGGTACAGCTCATCAAGATCATATATCAAAGCAGTAAGTAGTACATGTAATGCTTCCCTTGGAAATTT
GGCAATAGTAGGACTGGTAGTGGCATTAAATTTAGCAATAGTTGTGTGGACTATAGTAGGTATAGAATATAAGAGGCTGCTAAAGC
AAAGGAAAATAGACAGGTTAATTTGAGAGAATAAGAGAAAGAGCAGAAGACAGTGGCAATGAGAGTGTAGGGATACAGAGGAATTTGT
CAGCACTTATTTAGATGGGGAACATGATCTTGGGGATGATAATAATCTGTAGTGCAGCAGAAAACCTTGTGGGTACTGTCTACTAT
GGGTACCTGTGTGAAAAGACGCAGAGACCCTTATTTTGTGCATCAGATGCTAAAGCATATGAGACAGAAAAGCATAATGTCTGG
GCTACACATGCCTGTGTACCCACAGACCCCAACCAAGAAATACATTTGGAAAATGTGACTGAAGAGTTTAAACATGTGGAAAAAT
AACATGGTAGAGCAGATGCATACAGATATCATCAGTCTATGGGACCAAAGCCTAAAGCCATGTGTAAGTTAACCCCTCTCTCGCTT
ACTCTACAGTGTACCAATGTCAACCAATAATATCCTGATGACATGAGGGGAGAATTAACAACTGCTCTTTCAATATGACACACAGAG
CTAAGGGATAAGAAACAGAAGGTTTATTTACTTTTTTATAGACTAGATGTAGTACAATAAAGGATAAAGGATAAGGAGTAAT
AATAGTAAACAAGGAGTATAGATTAATAAATTTGTAATACCTCAGCCATTACACAGGCTTGTCCAAGGATCCTTTGAGCCAATTTCC
ATACATTTATTTGTGCCCGAGCTGGTTTGTGCATCCTAAAGTGTAAAGATAAGAAGTTCAATGGAACAGGGCCATGCCAAGTGTACGC
ACAGTACAATGCACACATGGAATCAAGCCAGTAGTATCAACTCACTGCTGTTAAATGGCAGTCTAGCAGAAGAAGAGGTAATGATT
AGATCTGAAAATATCACAACAATGCCAAAACATACTAGTACAATTTAAACCGCCTGTGCAAATTAATTTGACCCAGACTAACAAAC
AATACAGGAAAATATACGTATAGGACAGGACAAGCAATCTATGCAACAGGGGACATAAATAGGGATATAAGACAAGCACAATTTGT
AACGTCAGTAAAGCAATGGAATGAAACTTTGGGAAAGGTTGTTCAAAACAATTAAGAAAACACTTTGGGAAACAACAATAAAGAA
TTTGTAAATTTCTCAGGAGGGGATCTAGAAGTCAACAACATTTATTTAATTTGTGGAGGAGAATTTTCTATTGTAACACATCAGGC
CTGTTCAATAGCACTTGGATTAGCAATACCAGCGTGCAGGGGTCAAATAGCACGGGGTCAAATGACAGTATAACTCTCCCATGCAGA
ATAAAGCAAATTTATAAATATGTGGCAGAGAATAGGACAAGCAATGTATGCCCTCCCATCAAGGAGTAATAAGATGTGTATCAAAC
ATTACAGGGCTAATATTAACAAGAGATGGTGGGAGTACTAATAGTACAACCTGAAACCTTCAAGCCTGGAGGAGGAGATAGAGGGAC
AATTGGAGAAGTGAATTTATAAAGTATAAAGTAGTAAAAATGAAACCATAGGAGTAGCACCACAGGGAAGAGAAAGAGAGTGGTGTG
GGGAGAGAAAAGTGGAAATGGAATAGGAGCTGTCTTCTGGGTTCTTAGGAGCAGCAGGAAAGCACTATGGGCGCGGCTGAAATG
ACGCTGACGGTACAGGCCAGAAATTTATTTATCTGGCATAAGTGCACAGCAAAGCAATTTGCTGAGGGCTATAGAGGCTCAACAACAT
CTGTTGAAACTCACGGTCTGGGGCATTTAAACAGCTCCAGGCAAGGGTCTGGCTGTGGAAAGATACTAAGGGATCAACAGCTTCTA
GGAATTTGGGGCTGCTCTGAAAACCTCATCTGCACCATAATGTGCCCTGGAACCTAGTTGGAGTAATAGAAACCTGAGTGAGATA
TGGGCAACATGACCTGGCTGCAATGGGATAAAGAAATTAGCAATTACACACAGATAATATATGGCTACTTGAAGAATCGCAGAAC
CAGCAGGAAAAGAAATGAACAAGACTTATTGGCATTGGATAAGTGGCAAGTCTGTGGAATGGTTTGACATATCAAACCTGGCTGTGG
TATATAAAAATCTTTATAATGATAGTAGGAGGCTTAATAGGATTAAGAATAGTTTTTGTGCTTTCTGTAATACATAGAGTTAGG
CAGGATAACTACTTTGTGTTTTAGGACTCCTCCCAACCCACGGGGACCCGAGCCAGCCGAAAGAAAGAAAGGTTGGA
GAGCAAGGCAGAGACAGATCCATTCGATTGCTGACCGGATTGTGCAACTTATCTGGGACGACCTGAGGAACCTGTGCCTCTCAGC
TACCACCACTTGGAGACTTAATCTTAATTTGAGCGAGGATTGTGCAACTTCTGGGACGAGGGGTGGGAAGCCCTCAAATATCTT
TGGAAACATCCTCCAGTATTGGATCCAGGAAGTGAAGAATAGTGTATCAGCTTGTTTGATACCATAGCAATAGCAGTAGCCTACCTA
CAATATGGGTGGAGCTATTTCCATGAGGCGGTCCAAGCCGGCTGGAGATCTGCGACAGAGACTTTCGCGGGCGCTGGGGAGACTTA
TGGGAGACTCTTAGGAGAGGTGGAAGATGGATCCTCGCAATCCTTAGGAGGATTAGACAAGGGCTTGGAGTCACTCTCTTGTGAGGG
ACAGAAAATCAATCAGGGAACATACATGAATACCTCAGGAGAAACCCAGCTGAAGAGAGGAAAATTAGCATAACAGAAAACAAAA
TATGGATGATGTAGATGAGGAAGATGATGACTTGGTAGGGTACCAGTGTGCCACGAGTTCCCTAAGAACAATGAGTTACAAATTT
GGCAATAGATATGTCTCATTTTATAAAAAGAAAAGGGGGACTGGAAGGGATTTATTACAGTGCAGAAGACATAGAATCTTAGACAT
GTACTTAGAAAAGAAAGGACATCGTACCAGATTGGCAGGATTACACCTCAGGACCAGGAATTAGATACCCAAAGACATTTGGCTG
GCTATGGAAATTAGTCCCTGTAATGTATCAGATGAGGCACAGGAGGATGAGAGGCATTTTTAATGCAGCCAGCTCAAACCTCCAA
GTGGGATGACCTTGGGGAGAGGTTCTAGCATGGAAGTTTGTATCCAACCTTAGCCTACACTTATGAGGCATATGTTAGATACCCAGA
AGAGTTTGAAGCAAGTCAAGCCCTGTGAGGAAAGAGGTTAGAAGAAGGCTAACCGCAAGAGGCTTCTTAACATGGCTGACAAGAA
GAAAACCTCGCTGAGACAGCAGGACTTTCCACAAGGGGATGTTACGGGGAGGTAATGGGGAGGAGCCGCTGGGAAACACCCACTTTC
TTGATGTATAAATATCACTGCATTTTCGCTCTGTATTTCAGTCTGCTGCGGAGAGGCTGGCAGATTGAGCCCTGGGAGGTTCTCTCCA
GCACTAGCAGGTAGAGCCTGGGTGTTCCTGCTAGACTCTCACCAGCACTTGGCCGGTGTGGGCAGAGTGGCTCCACGCTTGTCTG
CTTAAAGCCCTCTTCAATAAAGCTGCCATTTTAGAAGTAAGCTAGTGTGTGTTCCCATCTCTCCTAGTCGCCGCTGGTCAACTCGG
TACTCGGTAATAAGAGACCCTGGTCTGTTAGGACCCTTTCTGCTTTGGGAAACCGAAGCAGGAAAATCCCTAGCACTCGAGCATGC
ATCTAGAGGGCCCAATTCGCCCTATAGTGAAGTCTATTACAATTCAGTGGCCGCTGTTTTACAACGTCGTGACTGGGAAAACCCCTGG

CGTTACCCAACCTTAATCGCCTTGCAGCACATCCCCCTTTCGCCAGCTGGCGTAATAGCGAAGAGGCCCGCACCGATCGCCCTTCCCA
ACAGTTGCGCAGCCTATACGTACGGCAGTTTAAAGTTTACACCTATAAAAGAGAGAGCCGTTATCGTCTGTTTTGTGGATGTACAGAG
TGATATTATTGACACGCCCGGGGGGACCGGATGGTGTATCCCCCTGGCCAGTGCACGTCTGCTGTTCAGATAAAGTCTCCCGTGAACCTTA
CCCGTGGTGCATATCGGGGATGAAAAGCTGGCGCATGATGACCACCGATATGGCCAGTGTGCCGGTCTCCGTTATCGGGGAAGAAGT
GGCTGATCTCAGCCACCGCGAAAAATGACATCAAAAACGCCATTAACTGATGTTCTGGGGAATATAAATGTCAGGCATGAGATTATC
AAAAAGGATCTTACCTAGATCCTTTTTACGTAGAAAAGCCAGTCCGCAGAAAACGGTGTGACCCCGGATGAATGTCAGCTACTGGGC
TATCTGGACAAGGGAAAACGCAAGCGCAAAGAGAAAAGCAGGTAGCTTGCAGTGGGCTTACATGGCGATAGCTAGACTGGGCGGTTTT
ATGGACAGCAAGCGAACCGGAATTGCCAGCTGGGGCGCCCTCTGGTAAGGTTGGGAAGCCCTGCAAAGTAAACTGGATGGCTTTCTT
GCCGCAAGGATCTGATGGCGCAGGGGATCAAGCTCTGATCAAGAGACAGGATGAGGATCGTTTTGTCATGATTGAACAAGATGGATT
GCACGCAGGTTCTCCGGCCGCTTGGGTGGAGAGGCTATTCCGCTATGACTGGGCACAACAGACAATCGGCTGCTCTGATGCCGCCGT
GTTCCGGCTGTACGCGCAGGGGGCCCGGTTCTTTTTGTCAAGACCGACCTGTCCGGTGCCTGAATGAACGCAAGAGGCAGC
GCGGTATCGTGGCTGGCCACGACGGCGTTCCTTGGCAGCTGTGCTCGACGTTGTCACTGAAGCGGGAAGGGACTGGCTGCTATT
GGGCGAAGTGGCGGGCAGGATCTCCTGTCTACCTTGTCTCCGCGAGAAAGTATCCATCATGGCTGATGCAATGCGGCGGCT
GCATACGCTTGATCCGGCTACCTGCCATTTCGACCACCAAGCGAAAACATCGCATCGAGCGAGCACGTAATCGGATGGAAGCCGGTCT
TGTCGATCAGGATGATCTGGACGAAGAGCATCAGGGGCTCGCGCCAGCCGAACGTTTCGCCAGGCTCAAGGCGAGCATGCCCGACGG
CGAGGATCTCGTGTGACCCATGGCGATGCCTGCTTGCAGAAATATCATGGTGGAAAATGGCCGCTTTTTCTGGATTTCATCGACTGTGG
CCGGTGGGTGTGGCGGACCGCTATCAGGACATAGCGTTGGCTACCCGTGATATTGCTGAAGAGCTTGGCGGCAATGGGCTGACCG
CTTCCGTGCTTTACGGTATCGCCGCTCCCGATTTCGACGCGCATCGCCTTCTATCGCCTTCTTGACGAGTTCTTCTGAATTAATTA
CGCTTACAATTTCTGATGCGGTATTTTTCTCCTTACGCATCTGTGCGGTATTTTACACCCGCATCAGGTGGCACTTTTTCGGGAAATG
TGCGCGAAACCCCTATTTGTTTTATTTTTCTAAATACATTCAAATATGTATCCGCTCATGAGACAATAACCCTGATAAATGCTTCAAT
AATAGCACGTGAGGAGGGCCACCATGGCCAAGTTGACCAGTGCCTTCCGGTGTCTACCGCGCGGACGTCGCCGAGCGGTCGAGT
TCTGGACCGACCGCTCGGGTTCTCCCGGACTTCTGAGGAGGACTTTCGCCGGTGTGGTCCGGGACGACGTAACCTGTTTCATCA
GCGCGGTCCAGGACCAGGTGGTGGCGGACAACACCTGGCCTGGGTGTGGGTGGCGGCGCTGGACGAGCTGTACGCCGAGTGGTCCG
AGGTGCTGTCCACGAACTTCCGGGACGCTCCGGGCCGCGCATGACCGAGATCGGCGAGCAGCCGTGGGGGCGGGAGTTCGCCCTGC
GCGACCCGGCCGCAACTGCGTGCCTTCTGTTGGCCGAGGAGCAGGACTGACACGTGCTAAAACCTCATTMTTAAATTTAAAAGGATCT
AGGTGAAGATCCTTTTTGATAATCTCATGACCAAAATCCCTTAACGTGAGTTTTCTGTTCCACTGAGCGTCAGACCCCGTAGAAAAGA
TCAAAGGATCTTCTTGAGATCCTTTTTTTCTGCGCGTAATCTGCTGCTTGCAAAACAAAAAACACCCTACCAGCGGTGGTTTTGTT
TGCCGGATCAAGAGCTACCAACTCTTTTTCCGAAGTAACTGGCTTCAGCAGAGCGCAGATACCAAATACTGTTCTTCTAGTGTAGC
CGTAGTTAGGCCACCCTTCAAGAACTCTGTAGCACCGCTACATACCTCGCTCTGCTAATCCTGTTACCAGTGGCTGCTGCCAGTG
GCGATAAGTCTGTCTTACC GGTTGGACTCAAGACGATAGTTACCGGATAAGGCGCAGCGGTGGGGCTGAACGGGGGGTTCGTGCA
CACAGCCAGCTTGGAGCGAACGACCTACACCGAACTGAGATACCTACAGCGTGAAGCTATGAGAAAGCGCCACGCTTCCCGAAGGGA
GAAAGCGGACAGGTATCCGGTAAGCGGCAGGGTCGGAACAGGAGAGCGCACGAGGGAGCTTCCAGGGGGAACCGCTGGTATCTTT
ATAGTCTGTGGGTTTCGCCACCTCTGACTTGAGCGTCGATTTTTGTGATGCTCGTCAGGGGGCGGAGCCTATGGAAAAACGCCA
GCAACGCGGCTTTTTACGGTTCCTGGCCTTTTGTGCGCTTTTGTGCTCACATGTTCTTTCTGCGTTATCCCTGATTCTGTGGATA
ACCGTATTACCGCTTTGAGTGAAGTACCGCTCGCCGAGCCGAACGACCGAGCGCAGCGAGTCAAGTGAAGCGGAAAGCGGAAG
AGCGCCAAATACGCAAACCGCTCTCCCGCGCGTTGGCCGATTCATTAATGCAGCTGGCACGACAGGTTTCCCGACTGGAAAGCGG
GCAGTGAAGCGCAACGCAATTAATGTGAGTTAGCTCACTCATTAGGCACCCAGGCTTTACACTTATGCTTCCGGCTCGTATGTTGT
GTGAATTGTGAGCGGATAACAATTTACACAGGAAACAGCTATGACCATGATTACGCCAAGCTATTTAGGTG

