FIG. 1A

```
      β1 α1
   NcoI
-2 CCATGGGCAGAGACTCCCCAAGGGATTTCGTGTACCAGTTCAAGGGCCTGTGCTACTACACC 60
    M  G  R  D  S  P  R  D  F  V  Y  Q  F  K  G  L  C  Y  Y  T

61  AACGGGACGCAGCGCATACGGGATGTGATCAGATACATCTACAACCAGGAGGAGTACCTG 120
    N  G  T  Q  R  I  R  D  V  I  R  Y  I  Y  N  Q  E  E  Y  L

121 CGCTACGACAGCGACGTGGGCGAGTACCGCGCGCTGACCGAGCTGGGGCGGCCCTCAGCC 180
    R  Y  D  S  D  V  G  E  Y  R  A  L  T  E  L  G  R  P  S  A
                                                        Pst I
181 GAGTACTTTAACAAGCAGTACCTGGAGCAGACGCGGGCCGAGCTGGACACGGTCTGCAGA 240
    E  Y  F  N  K  Q  Y  L  E  Q  T  R  A  E  L  D  T  V  C  R
                                  end of β1   start of a1
241 CACAACTACGAGGGGTCGGAGGTCCGCACCTCCCTGCGGCGGCTTGGAGGTCAAGACGAC 300
    H  N  Y  E  G  S  E  V  R  T  S  L  R  R  L  G  G  Q  D  D

301 ATTGAGGCCGACCACGTAGCCGCCTATGGTATAAATATGTATCAGTATTATGAATCCAGA 360
    I  E  A  D  H  V  A  A  Y  G  I  N  M  Y  Q  Y  Y  E  S  R

361 GGCCAGTTCACACATGAATTTGATGGTGACGAGGAATTCTATGTGGACTTGGATAAGAAG 420
    G  Q  F  T  H  E  F  D  G  D  E  E  F  Y  V  D  L  D  K  K

421 GAGACCATCTGGAGGATCCCCGAGTTTGGACAGCTGACAAGCTTTGACCCCCAAGGTGGA 480
    E  T  I  W  R  I  P  E  F  G  Q  L  T  S  F  D  P  Q  G  G

481 CTTCAAAATATAGCTATAATAAAACACAATTTGGAAATCTTGATGAAGAGGTCAAATTCA 540
    L  Q  N  I  A  I  I  K  H  N  L  E  I  L  M  K  R  S  N  S
                        Xho I
541 ACCCAAGCTGTCAACTAACTCGAG
    T  Q  A  V  N  end
```