

FIGURE 1A

```

1  CGGAGGAGGA CGCGAGCCCC UUGC GGCGG UCAUCACAGC CCAGCCUCGG GGCUGCCACA
61 GCGCGUUGCG CCUGUGCGCC CUCG GUCCCC GCGUCCACUG AGCGCCGCGC UCGGGGAUGG
121 GGCCCGGCCG GCCGGCCCCC GCGCCUGGC CUCGUCACCU GCUGCGCUGC GUCCUGCUCC
181 UCGGGUGCCU GCACCUCGGC CGUCCCGGCG CCCCUGGGGA CGCCGCCUC CCGGAACCCA
241 ACGUCUUCU CAUCUUCAGC CAUGGACUGC AGGGCUGCCU GGAGGCCAG GGCGGGACAG
301 UCAGAGUCAC CCCGGCUUGC AAUACCAGCC UCCUGCCCA GCGCUGGAAG UGGGUCUCCC
361 GAAACCGGCU AUUCAACCG GGUACCAUGC AGUGCCUGGG CACAGGCUGG CCAGGCACCA
421 ACACCACGGC CUCCCUGGGC AUGUAUGAGU GUGACCGGGA AGCACUGAAU CUUCGCUGGC
481 AUUGUCGUAC ACUGGGUGAC CAGCUGUCCU UGCUCUGGG GGCCCGCACC AGCAACAUAU
541 CCAAGCCUGG CACCCUUGAG CGUGGUGACC AGACCCGAG UGGCCAGUGG CGCAUCUACG
601 GCAGCGAGGA GGACCUAUGU GCUCUGCCU ACCACGAGGU CUACACCAUC CAGGGAAACU
661 CCCACGAAA GCCUGCACC AUCCCUUCA AAUAUGACAA CCAGUGGUUC CACGGCUGCA
721 CCAGCACGGG CCGCGAGGAU GGUCACCUGU GGUGUGCCAC CACCCAGGAC UACGGCAAAG
781 ACGAGCGCUG GGGCUUCUGC CCCAUCAAGA GUAACGACUG CGAGACCUUC UGGGACAAGG
841 ACCAGCUGAC UGACAGCUGC UACCAGUUUA ACUCCAGUC CACGCUGUCG UGGAGGGAGG
901 CCUGGGCCAG CUGCGAGCAG CAGGGUGCGG AUCUGCUGAG CAUCACGGAG AUCCACGAGC
961 AGACCUACAU CAACGGCCUC CUCACUGGGU ACAGCUCCAC CCUGUGGAUC GGCUUGAAUG
1021 ACUUGGACAC GAGCGGAGGC UGGCAGUGGU CGGACAACUC GCCCCUCAAG UACCUCAACU
1081 GGGAGAGUGA CCAGCCGGAC AACCCAGUG AGGAGAACUG UGGAGUGAUC CGCACUGAGU
1141 CCUCGGGCGG CUGGCAGAAC CGUGACUGCA GCAUCGCGCU GCCCUAUGUG UGCAAGAAGA
1201 AGCCCAACGC CACGGCCGAG CCCACCCUC CAGACAGGUG GGCCAAUGUG AAGGUGGAGU
1261 GCGAGCCGAG CUGGCAGCCC UUCAGGGCC ACUGCUACCG CCUGCAGGCC GAGAAGCGCA
1321 GCUGGCAGGA GUCCAAGAAG GCAUGUCUAC GGGGCGGUGG CGACCUGGUC AGCAUCCACA
1381 GCAUGGCGGA GCUGGAAUUC AUCACCAAGC AGAUCAAGCA AGAGGUGGAG GAGCUGUGGA
1441 UCGGCCUCAA CGAUUUGAAA CUGCAGAUGA AUUUUGAGUG GUCUGACGGG AGCCUUGUGA
1501 GCUUCACCCA CUGGCACCCC UUUGAGCCA ACAACUCCG GGACAGUCUG GAGGACUGUG
1561 UCACCAUCUG GGGCCCGGAA GGCCGCUGGA ACGACAGUCC CUGUAACCAG UCCUUGCCAU
1621 CCAUCUGCAA GAAGGCAGGC CAGCUGAGCC AGGGGGCCGC CGAGGAGGAC CAUGGCUGCC
1681 GGAAGGGUUG GACGUGGCAC AGCCCAUCCU GCUACUGGCU GGGAGAAGAC CAAGUGACCU
1741 ACAGUGAGGC CCGCGCCUG UGCACUGACC AUGGCUCUCA GCUGGUCACC AUCACCAACA
1801 GGUUCGAGCA GGCCUUCGUC AGCAGCCUCA UCUACAACUG GGAGGGCGAG UACUUCUGGA
1861 CGGCCUGCA GGACCUCAAC AGCACCGGCU CCUUCUUCUG GCUCAGUGGG GAUGAAGUCA
1921 UGUACACCCA CUGGAACCGG GACCAGCCG GGUACAGCCG UGGGGGCUGC GUGGCGCUGG
1981 CCACUGGCAG CGCCAUGGGG CUGUGGGAGG UGAAGAACUG UACCUCGUUC CGGGCCCCGU
2041 ACAUCUGCCG GCAGAGCCUG GGCACUCCAG UGACGCCGGA GCUGCCGGGG CCAGAUCCCA
2101 CGCCAGCCU CACUGGCUC UGUCCCCAGG GCUGGGCCUC GGACACCAA CUCCGGUAUU
2161 GCUAUAAGGU GUUCAGCUCA GAGCGGCUGC AGGACAAGAA GAGCUGGGUC CAGGCCAGG
2221 GGGCCUGCCA GGAGCUGGGG GCCCAGCUGC UGAGCCUGGC CAGCUACGAG GAGGAGCACU

```

FIGURE 1A cont.

2281 UUGUGGCCAA CAUGCUC AAC AAGAUUCUUG GUGAAUCAGA ACCCGAGAUC CACGAGCAGC
 2341 ACUGGUUUCUG GAUCGGCCUG AACCGUCGGG AUCCCAGAGG GGGUCAGAGU UGGCGCUGGA
 2401 GCGACGGCGU AGGGUUCUCU UACCACAAUU UCGACCGGAG CCGGCACGAC GACGACGACA
 2461 UCCGAGGCUG UGCGGUGCUG GACCUGGCCU CCCUGCAGUG GGUGGCCAUG CAGUGCGACA
 2521 CACAGCUGGA CUGGAUCUGC AAGAUC CCA GAGGUACGGA CGUGCGGGAG CCCGACGACA
 2581 GCCCUC AAG CCGACGGGAA UGGCUGCGCU UCCAGGAGGC CGAGUACAAG UUCUUUGAGC
 2641 ACCACUCCAC GUGGGCGCAG GCGCAGCGCA UCUGCACGUG GUUCCAGGCC GAGCUGACCU
 2701 CCGUGCACAG CCAGGCAGAG CUAGACUUC UGAGCCACAA CUUGCAGAAG UUCUCCCGGG
 2761 CCCAGGAGCA GCACUGGUGG AUCGGCCUGC ACACCUCUGA GAGCGAUGGG CGCUUCAGAU
 2821 GGACAGAUGG UUCAUUAUA AACUUAUCU CCUGGGCACC AGGCAAACCU CGGCCUGUCG
 2881 GCAAGGACAA GAAGUGCGUG UACAUGACAG CCAGCCGAGA GGACUGGGGG GACCAGAGGU
 2941 GCCUGACAGC CUUGCCCUAC AUCUGCAAGC GCAGCAACGU CACCAAAGAA ACGCAGCCCC
 3001 CAGACCUGCC AACUACAGCC CUGGGGGGCU GCCCCUCUGA CUGGAUCCAG UUCUC AACA
 3061 AGUGUUUUA GGUCCAGGGC CAGGAACCCC AGAGCCGGGU GAAGUGGUCA GAGGCACAGU
 3121 UCUCUGUGA ACAGCAAGAG GCCCAGCUGG UCACCAUCAC AAACCCCUUA GAGCAAGCAU
 3181 UCAUCACAGC CAGCCUGCCC AAUGUGACCU UUGACCUUG GAUUGGCCUC CAUGCCUCGC
 3241 AGAGGGACUU CCAGUGGGUG GAGCAGGAGC CUUUGAUGUA UGCCAACUGG GCACCUGGGG
 3301 AGCCUCUGG CCCUAGCCCU GCUCCAGUG GCAACAAACC GACCAGCUGU GCGUGGUCC
 3361 UGCACAGCCC CUCAGCCCAC UUCACUGGCC GCUGGGACGA UCGGAGCUGC ACGGAGGAGA
 3421 CCCAUGGCUU CAUCUGCCAG AAGGGCACGG ACCCCUCCU GAGCCCGUCC CCAGCAGCGC
 3481 UGCCCCCGC CCCGGGCACU GAGCUCUCCU ACCUCAACGG CACCUUCCGG CUGCUUCAGA
 3541 AGCCGUGCG CUGGCACGAU GCCCUCUGC UGUGUGAGAG CCACAAUGCC AGCCUGGCCU
 3601 ACGUGCCCGA CCCCUACACC CAGGCCUUC UACGCAGGC UGCCCAGGG CUGCGCACGC
 3661 CGCUCUGGAU UGGGCUGGCU GCGGAGGAG GCUCUCGGCG GUACUCCUGG GUCUCAGAGG
 3721 AGCCGUGAA CUACGUGGGC UGGCAGGACG GGGAGCCGCA GCAGCCGGGG GGCUGUACCU
 3781 ACGUAGAUGU GGACGGGGCC UGGCGCACCA CCAGCUGUGA CACCAAGCUG CAGGGGGCUG
 3841 UGUGUGGGGU UAGCAGUGGG CCCCUCUCCU CCCGAAGAAU AAGCUACCAU GGCAGCUGUC
 3901 CCCAGGGACU GGCAGACUCC GCGUGGAUUC CCUUCGCGGA GCACUGCUAU UCUUCCACA
 3961 UGGAGCUGCU GCUGGGCCAC AAGGAGGCGC GACAGCGCUG CCAGAGAGCG GGUGGGGCCG
 4021 UCCUGUCUUA CCUGGAUGAG AUGGAGAAUG UGUUUGUCUG GGAGCACCUG CAGAGCUAUG
 4081 AGGGCCAGAG UCGGGGCGCC UGGCUGGGCA UGAACUCAA CCCC AAGGA GGCACUCUGG
 4141 UCUGGCAGGA CAACACAGCU GUGAACUACU CCAACUGGGG GCCCCGGGC UUGGGCCCCA
 4201 GCAUGCUGAG CCACAACAGC UGCUACUGGA UUCAGAGCAA CAGCGGGCUA UGGCGCCCCG
 4261 GCGCUUGCAC CAACAUCACC AUGGGUGUCG UCUGCAAGCU UCCUCGUGCU GAGCAGAGCA
 4321 GCUUCUCCCC AUCAGCGCUU CCAGAGAACC CAGCGGCCCU GGUGGUGGUG CUGAUGGCGG
 4381 UGCUGCUGCU CCUGGCCUUG CUGACCGCAG CCCUCAUCCU UUACCGGAGG CGCCAGAGCA
 4441 UCGAGCGCGG GGCCUUGAG GGUGCCCGCU ACAGCCGCG CAGCUCCAGC CCCACCGAGG
 4501 CCACUGAGAA GAACAUCUG GUGUCAGACA UGAAAUGAA UGAGCAACAA GAAUAGAGCC

FIGURE 1A cont.

4561 AGGCGCGUGG GCAGGGCCAG GCGGGGAGGA GCUGGGGAGC UGGGGCCCUG GGUCAGUCUG
 4621 GCCCCCACC AGCUGCCUGU CCAGUUGGCC UAUGGAAGGG UGCCCUGGG AGUCGCUGUU
 4681 GGGAGCCGGA GCUGGGCAGA GCCUGGGCUG GUGGGGUGCC ACCCUCCCAC AAGGGCUGGG
 4741 CUGAGACCCA GCUGAGUGCA GCGUGGCGUU UCCCUUUCUG GGGGGGCCUG AGGUCUUGUC
 4801 ACCUGGUCCU GUGCCCCCAC AGGAACCAGA GGUAGGAUGG GAGGGGGAAC GAGAGCCUCU
 4861 UUCUCCCCAG AGCCCCCGGC CCAGGCCUGU GAUCCGCGC CCCAGGACCC CCUUCUUUGC
 4921 AGAGCCCGAG GAGCCUCCCC UGUCCCCUG GGCAGAUCUG UUGUGUCUCU CUUCCCACCU
 4981 GGCAGCCUCA GCUCUGUGCC CCUCACCCUG CUCCCUCUG CCCCUUCUCU CCCACCCCUU
 5041 CCUUCUGAGC CGGGCCCUGG GGAUUGGGGA GCCCUCUUGU UCCUGAUGAG GGUCAGCUGA
 5101 GGGGGCUGAG CAUCCAUCAC UCCUGUGCCU GCUGGGGUGG CUGUGGGGCG UGGCAGGAGG
 5161 GGCCUAGGUG GGUUGGGCCU GAGAACCAGG GCACGGGUGU GGUGUCUGCU GGGCUGGAGA
 5221 UAAGACUGGG GAGAGACACC CCAACCUCCT AGGGUGGGAG CUGGGCCGGG CUGGGAUGUC
 5281 AUCUCCUGCC GGGCGGGGGA GGGCUCUGCC CCUGGAAGAG UCCCCUGUGG GGACCAAAAU
 5341 AAGUCCCCUA ACAUCUCCAG CUCCUGGCUC UGGUUUGGAG CAAGGGGAAG GGUUGCCAGA
 5401 GUCCUGGGGG CCCAGAGGA GCAGGAGUCU GGGAGGGCCC AGAGUUCACC CUCUAGUGGA
 5461 UCCAGGAGGA GCAGCACCCG AGCCUGGAG UGGCCCAGUA CCCUCCAAG AGGCCACAGU
 5521 CCCAGCCAGG ACAAAGUAUG CGGCCCAUCC UGGUGCGACA GCGUGGGACA AUGUGAACAU
 5581 GGACUCGAAG ACAUGGCCCU UUCUCUGUAG UUGAUUUUUU AAAUGUGCCA UUAUUGUUUU
 5641 U

FIGURE 1B

1 MGPGRPAPAP WPRHLLRCVL LLGCLHLGRP GAPGDAALPE PNVFLIFSHG LQGCLEAQGG
 61 QVRVTPACNT SLPAQRWKWV SRNRLFNLGT MQCLGTGWPG TTTASLGM YECDREALNLR
 121 WHCRTLGDL SLLLGARTSN ISKPGTLERG DQTRSGQWRI YGSEEDLCAL PYHEVYTIQG
 181 NSHGKPTIP FKYDNQWFHG CTSTGREDGH LWCATTQDYG KDERWGFCEPI KSNDCETFWD
 241 KDQLTDSCYQ FNFQSTLSWR EAWASCEQQG ADLLSITEIH EQTYINGLLT GYSSTLWIGL
 301 NDLDTS GGWQ WSDNSPLKYL NWESDQPDNP SEENCGVIRT ESSGGWQNRD CSIALPYVCK
 361 KKP NATAEPT PPDRWANVKV ECEPSWQPFQ GH CYRLQAEK RSWQESKKAC LRGGGDLVSI
 421 HSM AELEFIT KQIKQEVEEL WIGLNDLKLQ MNFEWSDGSL VSFTWHHPFE PNNFRDSLED
 481 CVTIWGPEGR WNDSPCNQSL PSICKKAGQL SQGAAEEDHG CRKGWTHWSP SCYWLGEDQV
 541 TYSEARRLCT DHGSQLVTIT NRFEQAFVSS LIYNWEGEYF WTALQDLNST GSFFWLSGDE
 601 VMYTHWNRDQ PGYSRGGCVA LATGSAMGLW EVKNCTSFRA RYICRQSLGT PVTPELPGPD
 661 PTPSLTGSCP QGWASDTKLR YCYKVFSSER LQDKKSWVQA QGACQELGAQ LLSLASYYYY
 721 HFVANMLNKI FGESEPEIHE QHFWWIGLNR RDPRGGQSWR WSDGVGFSYH NFDRSRHDDD
 781 DIRGCAVLDL ASLQWVAMQC DTQLDWICKI PRGTDVREPD DSPQGRREWL RFQEA EYKFF
 841 EHHSTWAQAA RICTWFQAEL TSVHSQAELD FLSHNLQKFS RAQE QHWWIG LHTSESDGRF
 901 RWTGDSIINF ISWAPGKPRP VGKDKKCVYM TASREDWGDQ RCLTALPYIC KRSNVTKETQ
 961 PPDLP TTALG GCPSDWIQFL NKCFVQVQGE PQSRVKWSEA QFSCEQQAQ LVTITNPLEQ

FIGURE 1B cont

1021	AFITASLPNV	TFDLWIGLHA	SQRDFQWVEQ	EPLMYANWAP	GEPSGSPSPAP	SGNKPTSCAV
1081	VLHSPSAHFT	GRWDDRSCTE	ETHGFICQKG	TDPSLSPSPA	ALPPAPGTEL	SYLNGTFRLL
1141	QKPLRWHDAL	LLCESHNASL	AYVPDPYTQA	FLTQAARGLR	TPLWIGLAGE	EGSRRYSWVS
1201	EEPLNYVGWQ	DGEPQQPGGC	TYVDVDGAWR	TTSCDTKLQG	AVCGVSSGPP	PPRRISYHGS
1261	CPQGLADSAW	IPFREHCYSF	HMELLLGHKE	ARQRCQRAGG	AVLSILDEME	NVFWWEHLQS
1321	YEGQSRGAWL	GMNFPNPKGGT	LVWQDNTAVN	YSNWGPPGLG	PSMLSHNSCY	WIQSNSGLWR
1381	PGACTNITMG	VVCKLPRAEQ	SSFSPSALPE	NPAALVVVLM	AVLLLLLALLT	AALILYRRRQ
1441	SIERGAFEGA	RYSRSSSSPT	EATEKNILVS	DMEMNEQQE		

FIGURE 1C

ATGTTGGGCCCCGGCCGGCCGGGCCCCCGCGCCCTGGCCTCGTCACTGCTGCGCTGCGTCTCTG
CTCCTCGGGTGCCTGCACCTCGGCCGTCCCGGCGCCCTGGGGACGCCGCCCTCCCGGAA
CCCAACGTCTTCTCATCTTCAGCCATGGACTGCAGGGCTGCCTGGAGGCCAGGGCGGG
CAGGTCAAGTCACCCCGGCTTGCAATACCAGCCTCCTGCCAGCGCTGGAAGTGGGTCT
TCCCGAAACCGGCTATTCAACCTGGGTACCATGCAGTGCCTGGGCACAGGCTGGCCAGG
ACCAACACCACGGCCTCCTGGGCATGTATGAGTGTGACCGGGAAGCACTGAATCTTCGC
TGGCATTTGTCGTACACTGGGTGACCAGCTGTCTTTGCTCCTGGGGGGCCCGCACCAGCAAC
ATATCCAAGCCTGGCACCCCTTGAGCGTGGTGACCAGACCCGAGTGGCCAGTGGCGCATC
TACGGCAGCGAGGAGGACCTATGTGCTCTGCCCTACCACGAGGTCTACACCATCCAGGGA
AACTCCCACGGAAAGCCGTGCACCATCCCCTTCAAATATGACAACCAAGTGGTTCCACGGC
TGCACACGACGAGGCCCGCGAGGATGGTCACCTGTGGTGTGTCACCAACCCAGGATACGGC
AAGACGAGCGCTGGGGCTTCTGCCCATCAAGAGTAACGACTGCGAGACCTTCTGGGAC
AAGGACCAGCTGACTGACAGCTGCTACCAGTTTAACTTCCAGTCCACGCTGTCTGGAGG
GAGGCCCTGGGCCAGCTGCGAGCAGCAGGGTGC GGATCTGCTGAGCATCACGGAGATCCAC
GAGCAGACCTACATCAACGGCCTCCTCACTGGGTACAGCTCCACCCTGTGGATCGGCTTG
AATGACTTTGGACACGAGCGGAGGCTGGCAGTGGTGGACAACTCGCCCCCTCAAGTACCTC
AACTGGGAGAGTGACCAGCCGGACAACCCAGTGAGGAGAACTGTGGAGTGATCCGCACT
GAGTCTTCGGGCGGCTGGCAGAACCGTGACTGCAGCATCGCGCTGCCCTATGTGTGCAAG
AAGAAGCCCCAACGCCACGGCCGAGCCACCCCTCCAGACAGGTGGGCCAATGTGAAGGTG
GAGTGCAGCCGAGCTGGCAGCCCTTCCAGGGCCACTGCTACCGCCTGCAGGCCGAGAAG
CGCAGCTGGCAGGAGTCCAAGAAGGCATGTCTACGGGGCGGTGGCGACCTGGTCAGCATC
CACAGCATGGCGGAGCTGGAATTCATCACCAAGCAGATCAAGCAAGAGGTGGAGGAGCTG
TGGATCGGCCTCAACGATTTGAACTGCAGATGAATTTTGAGTGGTCTGACGGGAGCCTT
GTGAGCTTCACCCACTGGCAGCCCCCTTTGAGCCCAACAACTTCCGGGACAGTCTGGAGGAC
TGTGTCAACCATCTGGGGCCCCGGAAGGCCGTGGAACGACAGTCCCTGTAACCACTCTTG
CCATCCATCTGCAAGAAGGCAGGCGAGCTGAGCCAGGGGGCCCGCAGGAGGACCATGGC
TGCCGGGATTACAAGGACGACGACGATAAGTGA

FIGURE 1D

MGPGRPAPAPWPRHLLRCVLLLGCLHLGRPGAPGDAALPEPNVFLIFSHGLQGCLQAQGG
QVRVTPACNTSLPAQRWKWVSRNRLFNLGTMQCLGTGWPGTNTTASLGMYECDREALNLR
WHCRTLDGQLSLLLGARTSNISKPGTLERGDQTRSGQWRIYGSEEDLCALPYHEVYTIQG
NSHGKPC'TIPFKYDNQWFHGCTSTGREDGHLWCATTQDYGKDERWGF'CP'IKSND'CET'FWD
KDQLT'DSCYQ'FN'FQSTLSWREAWASCEQQGADLLSITEIHEQTYINGLLTGYSSTLWIGL
NDLDTSGGWQSDNSPLKYLNWESDQPDNPSEENC'GVIRTESSGGWQNRDCSIALPYVCK
KKPNATAEPTPPDRWANVKVECEPSWQPFQGH'CYRLQAEKRSWQESKKACLRGGGDLVSI
HMAELEF'ITKQIKQEVEELWIGLNDLKLQMNFEWSDGSLVSFTHWHPFEPNNFRDSLED
CVTIWGP'EGRWNDSPCNQSLPSICKKAGQLSQGAAEEDHGC'RDYKDDDDDK

FIGURE 1E

TAATGTGAGTTAGCTACTCTTAGGCACCCCAGGCTTTACACTTTATGCTTCCGGCTCGTATGTTGTGTGG
AATTGTGAGCGGATAACAATTTACACAGGAAACAGCTATGACCATGATTACGCCAAGCTTGCCAAATTC
TATTTCAAGGAGACAGTCATAATGAAATACCTATTGCCTACGGCAGCCGCTGGATTGTTACTCGCAG
CAAGCGGCGCGCATGCCCAGGTGCAGCTGGTGCAGTCTGGGGGAGGCCTGGTCAAGCCTGGGGGGTCCCT
GAGACTCTCCTGTGCAGCCTCTGGATTACCTTCAGTAGCTATAGCATGAACTGGGTCCGCCAGGCTCCA
GGGAAGGGGCTGGAGTGGGTGGCCAACATAAAGCCAGATGGAAGTGAGAGACACTCTGTGGACTCTGTGA
AGGGCCGATTACCATCTCCAGAGACAACCTCCAAGAAGTCACTGTATCTGCAAATGAACAGCCTGAGAGC
CGAGGACACGGCTGTTTATTACTGTGCGCGACCCGGGGCTGGGCGACTTGACTACTGGGGCCAGGGCACC
CTGGTCACCGTCTCCTCAGGTGGAGGCGGTTTCAGGCGGAGGTGGCTCTGGCGGTGGCGGATCGAATTTTA
TGCTGACTCAGGACGCTGCTGTGTCTGTGGCCTTGGGACAGACAGTCAGGATCACATGCCAAGGAGACAG
CCTCAGAAGCTATTATGCAAGCTGGTACCAACAGAAGCCAGGACAGGCCCTGTACTTGTCTGTCTATGGT
AAAAACAACCGACCCCTCAGGGATCCCAGACCGATTCTCTGGCTCCAGCTCAGGAAACACAGCTTCCTTGA
CCATCACTGGGGCTCAGGCGGAAGATGAGGCTGACTATTACTGTAAGTCCCGGGACAGCAGTGGTAACCC
CTGGGCGTTTCGGCGGAGGGACCAAGGTGACCGTCTTAGCTAGCGGCAAACCAATCCCAAACCCACTGCTG
GGCCTGGATAGTACTACCATCACCATTAGGCGGCCGCTACTGTTGAAAGTTGTTTAGCAAAAC
CTCATACAGAAAATTCATTTACTAACGTCTGGAAAGACGACAAAACCTTTAGATCGTTACGCTAACTATGA
GGGCTTG

FIGURE 1F

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

FIGURE 1G

CDR3 -H CARPGAGRLDYW

FIGURE 1H

CDR3 -L CNSRDSSGNPWAF

FIGURE 1J

MGPGRPAPAPWPRHLLRCVLLLGLHLGRPGAPGDAALPEPNVFLIFSHGLQGCLQAQGG
QVRVTPACNTSLPAQRWKVSRNRLFNLGTMQCLGTGWPGTNTTASLGMYECDREALNLR
WHCRTLDQLSLLLARTSNISKPGTLERGDQTRSGQWRIYGSEEDLCALPYHEVYTIQG
NSHGKPTIPFKYDNQWFHGCTSTGREDGHLWCATTQDYGKDERWGFPIKSNDCETFWD
KDQLTDSYQFNFQSTLSWREAWASCEQQGADLLSITEIHEQTYINGLLTGYSSTLWIGL
NDLDTSGGWQWSDNSPLKYLNWESDQPDNPSEENCGVIRTESSGGWQNRDCSIALPYVCK
KKPNATAEPTPPDRWANVKVECEPSWQPFQGHYRLQAEKRSWQESKKAACLRGGGDLVSI
HMAELEFITKQIKQEVEELWIGLNDLKLQMNFEWSDGSLVSFTHWHPFEPNNFRDSLED
CVTIWGPGRWNSPCNQSLPSICKKAGQLSQGAAEEDHGC

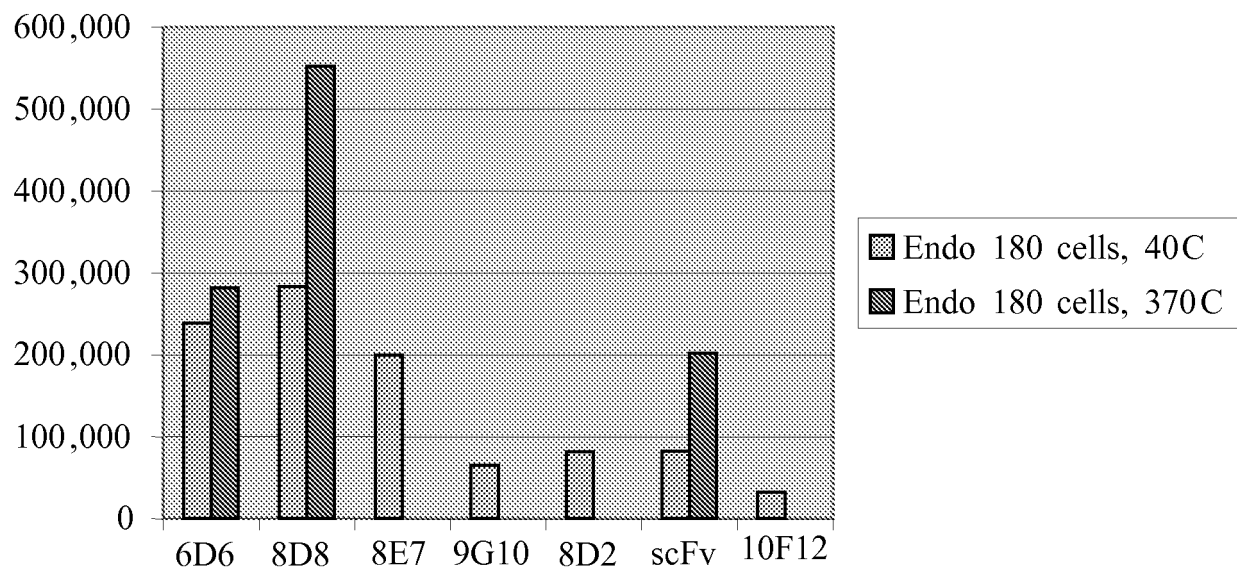
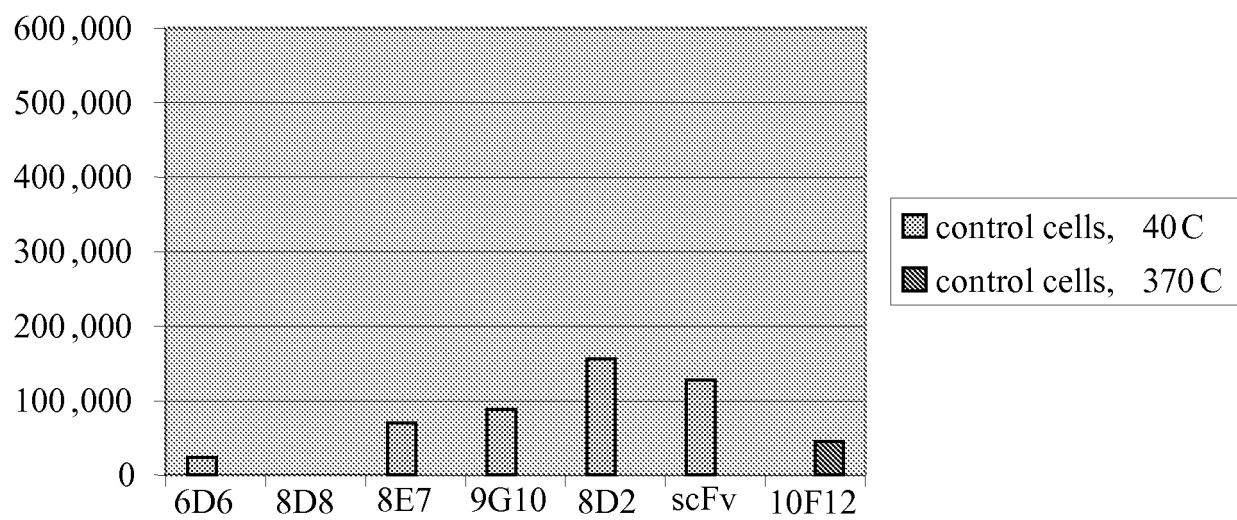
FIGURE 2A**FIGURE 2B**

FIGURE 2C

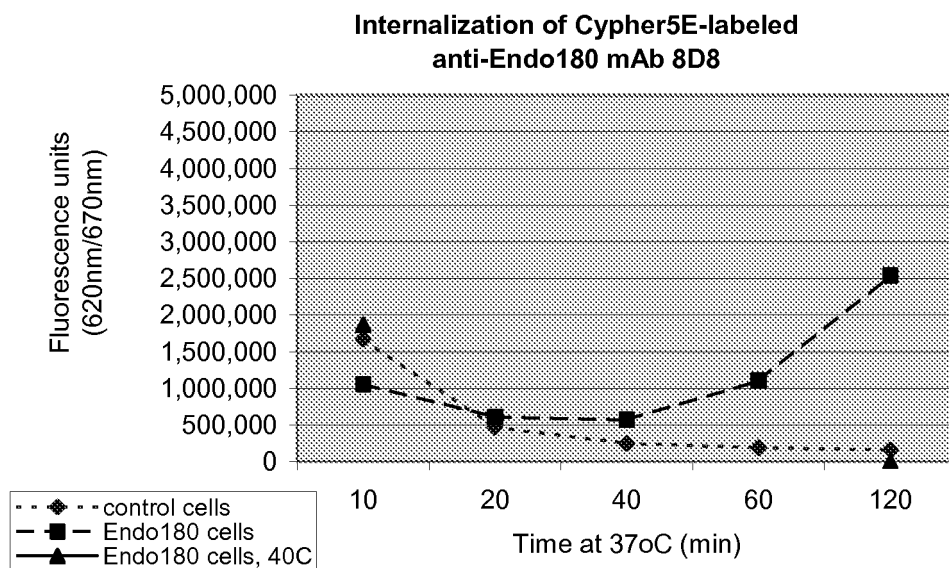


FIGURE 2D

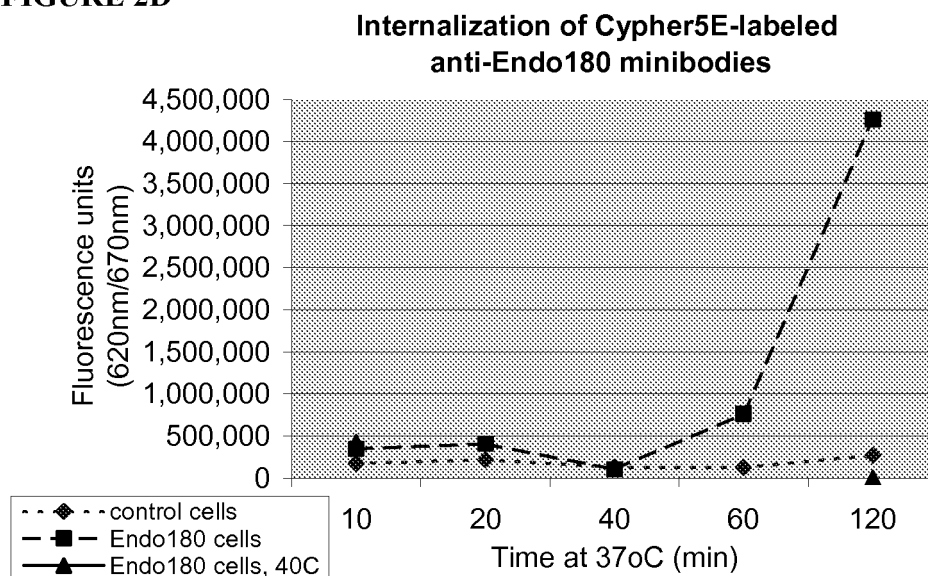


FIGURE 2E

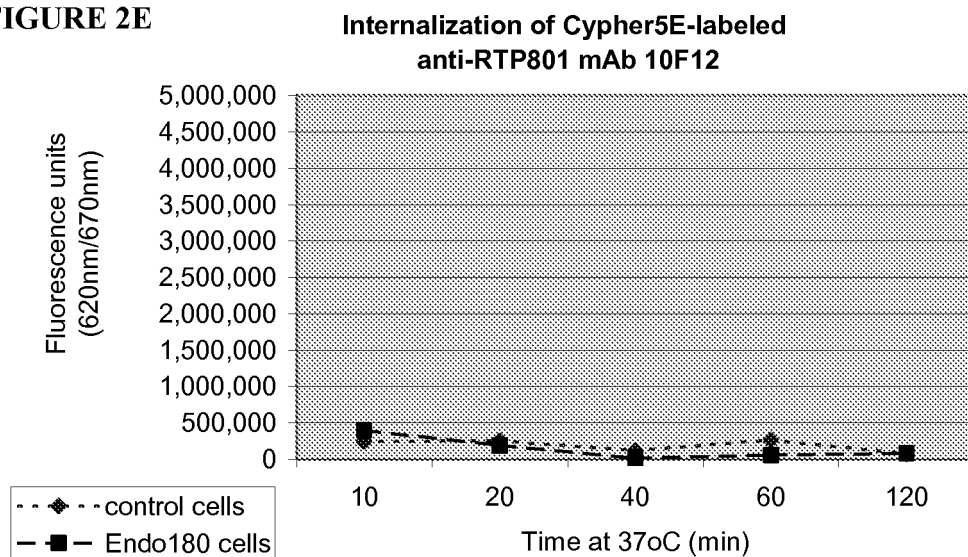


FIGURE 2F

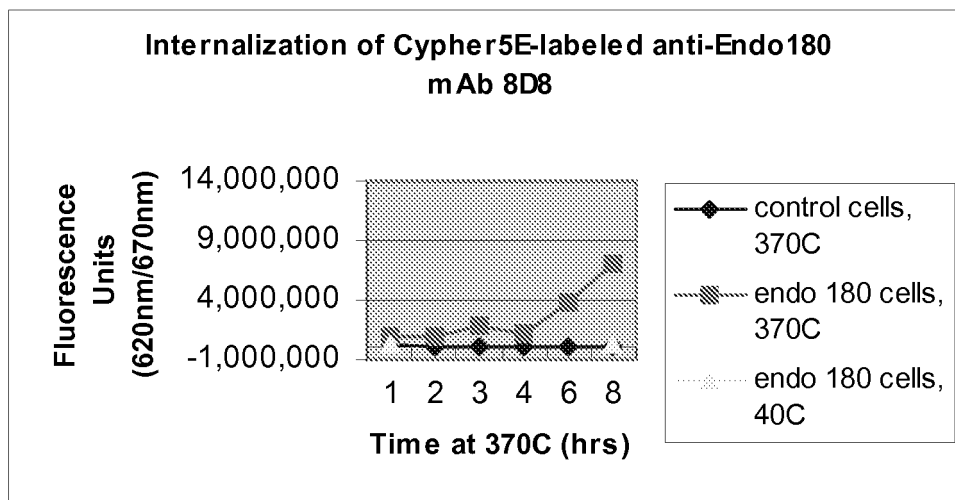


FIGURE 2G

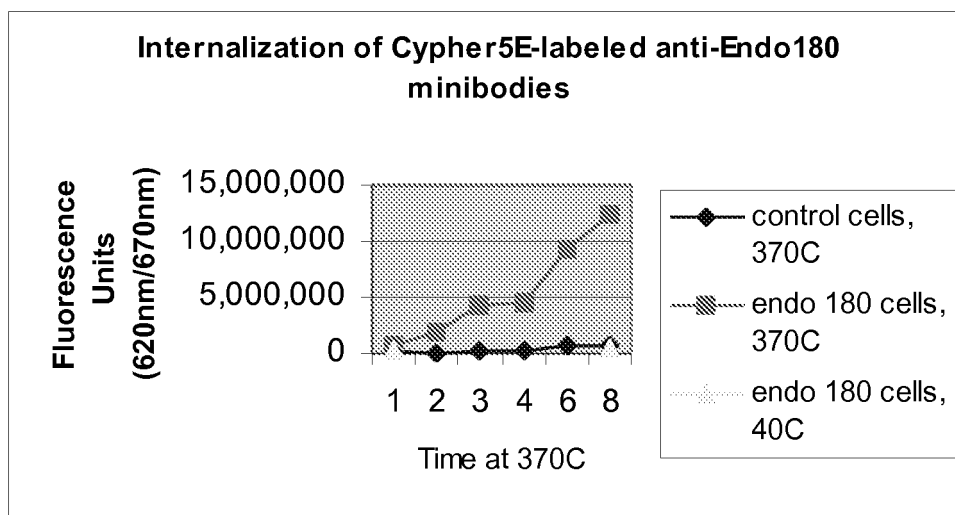


FIGURE 2H

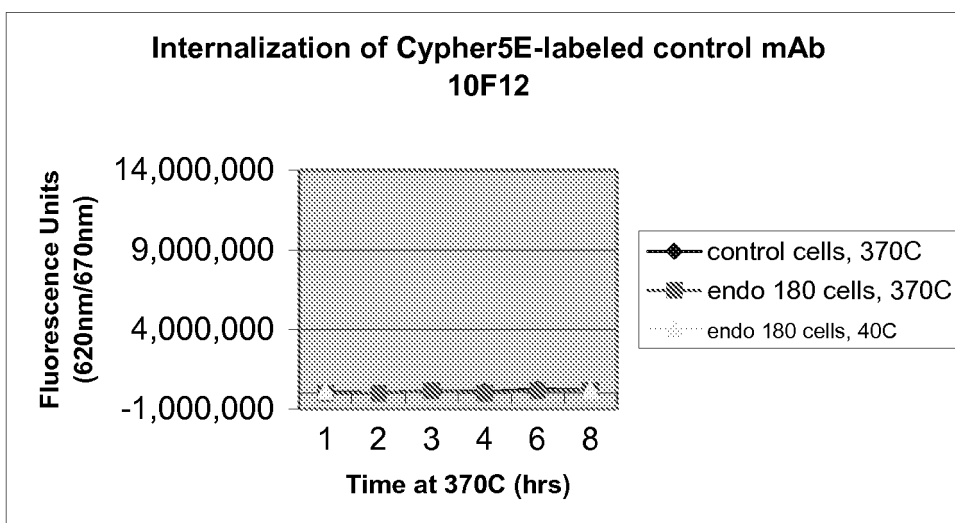
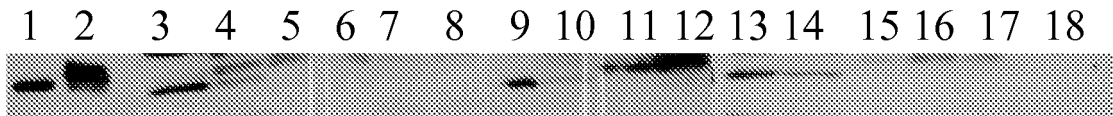
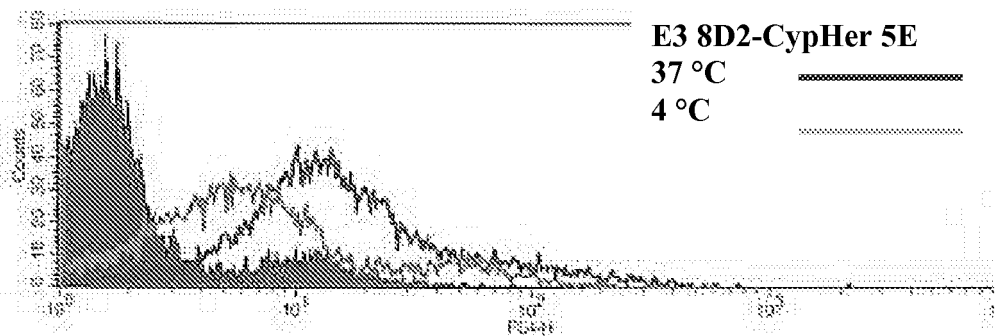


FIGURE 3:

1. E3 8D8-Biotin
2. NMIgG-Biotin
3. Mouse #26 injected with E3 8D8-Biotin, UUO kidney
4. Mouse #26 injected with E3 8D8-Biotin, Contra-lateral kidney
5. Mouse #38 injected with NMIgG-Biotin, UUO kidney
6. Mouse #38 injected with NMIgG-Biotin, Contra-lateral kidney
7. Mouse #50 injected with PBS, UUO kidney
8. Mouse #50 injected with PBS, Contra-lateral kidney
9. Mouse #33 injected with E3 8D8-Biotin, UUO kidney
10. Mouse #33 injected with E3 8D8-Biotin, Contra-lateral kidney
11. Mouse #40 injected with NMIgG-Biotin, UUO kidney
12. Mouse #40 injected with NMIgG-Biotin, Contra-lateral kidney
13. Mouse #27 injected with E3 8D8-Biotin, UUO kidney
14. Mouse #27 injected with E3 8D8-Biotin, Contra-lateral kidney
15. Mouse #36 injected with NMIgG-Biotin, UUO kidney
16. Mouse #36 injected with NMIgG-Biotin, Contra-lateral kidney
17. Mouse #37 injected with NMIgG-Biotin, UUO kidney
18. Mouse #37 injected with NMIgG-Biotin, Contra-lateral kidney

FIGURE 4A**FIGURE 4B**