

Plasmid documentation sheet

Plasmid name: **pSS02_c-peredox-mCherry_DS**

Other names:

Inserted gene: c-peredox-mCherry

Vector size: 12723 bp

Insert size: 2768 bp

Cloning method: conventional Gateway Greengate

Insertion site (if conventional):

Vector: pSS02

Resistance(s) bacteria: Kanamycin

Resistance(s) plants: Hygromycin

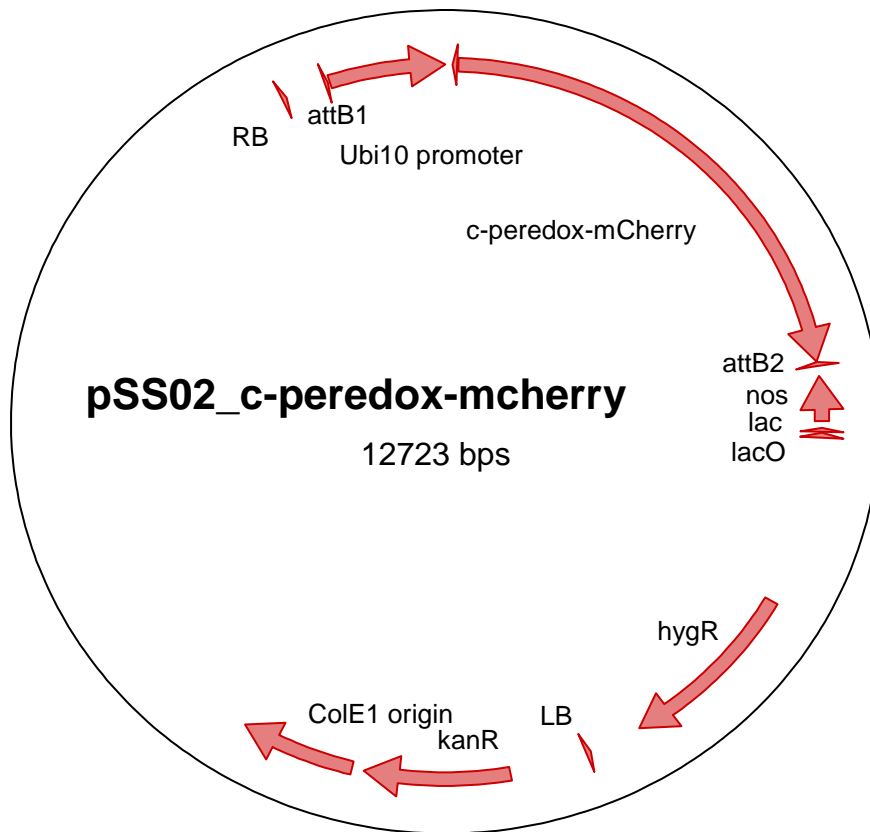
Purpose: Expression in Arabidopsis

Constructed by: Markus Schwarzländer

Published References:

Associated files (DNA-files etc):

Map:



Sequence:

GGTACCGGGCCCCCTCGAGGCGCGCCAAGCTATCAAACAAGTTTGTACAAAAAAGCA
GGCTTACCATGGTTGCTAGCAAAGTTCCTGAAGCAGCCATTTCCAGACTGATTACTTAC
CTGAGAATTCTGGAAGAGCTGGAAGCCCAAGGTGTACACCGCACCCTCCGAGCAACTG
GGCGAGCTGGCCAGGTCACCGCCTTCCAGGTTGATAAGGACCTGTCCTACTTCGGCTCC
TACGGCACTGACGGCGTTGGCTACACTGTACCGTCTCAAGAGAGAACTGCGCCATATC
CTCGGTCTGAACCGCAAATGGGGCCTGTGCATCGTGGGGATGGGCCGCTGGGATCCGCT
CTTGCTGATTGGCTGGTTTTGGCGAGAGCTTCGAGCTGCGCGTTTCTTCGATGTTGAC
CCAGGTATGGTTGGTCGGCCGTTTCGCGGTGGTGTATCGAACACGTTGATCTGCTGCC
CAGCGGTACCTGGTCGCATCGAAATCGTCTGCTGACGGTTCACGCGAGGCAGCACAG
AAGGCTGCCGACCTGCTGTTGCCGCTGGCATCAAGGGCATCTGAACTTCGCTCCAGTT
GTACTGGAGGTTCCAAGGAAGTGGCTGTTGAGAACGTTGACATCCTGGCCGGTCTGACC
CGTCTGAGCTTTGCCATTCTGAACCCACGTGGAGCGCAGCAGGTGGGCATGGTTTTCACT
GCTCACAACGTGTATATCATGGCTGACAAACAGAAGAACGGTATCAAGGCCAACTTCAAG
ATCCGCCACAACATCGAAGACGGCGGCTTCAGCTGGCTGATCACTACCAGCAGAACACC

CCAATCGGCGACGGCCCTGTTCTGCTGCCTGACAACCACTACTTAAGCATCCAGTCTAAA
CTGTCCAAAGACCCAAACGAGAAGCGCGACCACATGGTTCTGCTGGAATTTGTTACCGCC
GCTGGCATCACCCACGGCATGGACGAACTGTACAAGGGCGGCACCGGGGGATCTATGGTT
TCCAAAGGCGAGGAACTGTTCACTGGTGTGTTCTATCCTGGTTGAACTGGACGGCGAC
GTTAACGGCCACAAATTCAGCGTTAGCGGGGAAGGCGAAGGAGACGCTACCTACGGCAAG
CTGACTCTGAAGTTCATCTGCACCACTGGCAAGCTGCCTGTTCTTGGCCTACCCTGGTT
ACTACCTTCTCCTATGGTGTATGGTTTTCGCCAGATATCCTGACCACATGAAGCAGCAC
GACTTCTCAAGAGCGCCATGCCTGAGGGCTACGTTCAAGAACGCACCATCTTTTTCAAG
GACGACGGCAACTATAAGACACGCGCTGAGGTTAAGTTCGAGGGCGACACTCTGGTTAAC
CGCATCGAGCTGAAGGGCATCGACTTCAAGGAGGACGGCAACATCCTGGGCCATAAGCTT
GAATATAACACCAAGGTACCTGAAGCCGCCATCAGCCGCCTCATCACTTACCTCCGCATC
CTGGAGGAGCTCGAAGCCCAAGGCGTTCACCGCACTGCAAGCGAGCAGCTGGGCGAACTG
GCACAGGTTACAGCATTCCAGGTTGACGAAGATCTGCCTATTTTCGGTTCCTACGGCACC
GACGGTGTGGCTACACAGTCCCTGTCTGAAGCGCGAGCTGCGCCACATCCTGGGCCTG
AACC GCAAGTGGGGCTTATGCATCGTTGGCATGGGCCGCCTCGGTAGTGCCTGGCAGAC
TGGCCGGGCTTTGGTGAATCTTTCGAACTGCGCGGCTTCTTCGACGTTGATCCAGGCATG
GTTGGGCGCCCTGTTTCGCGGTGGCGTTATCGAGCATGTTGACCTCCTGCCACAGCGCGTC
CCGGGTCGCATCGAGATCGCCCTGCTGACCGTTCCTCGCGAAGCTGCACAGAAGGCAGCC
GACTTACTAGTCGCCGCTGGTATCAAGGGAATTCTGAACTTCGCCCTGTTGTTCTGGAG
GTTCTAAGGAAGTTGCTGTTGAAAACGTTGATTTCTGGCCGGCCTGACCCGCCTGAGC
TTCGCAATCCTGAATCCTAAGTGGCGCGAAGAAATGATGGGTTCCGGAAGTGGGGGCAAC
GCCTCTGACGGTGGTGGGTCTGGTGGTATGGTGAAGGCGAGGAGGATAACATGGCC
ATCATCAAGGAGTTCATGCGCTTCAAGGTGCACATGGAGGGCTCCGTGAACGGCCACGAG
TTCGAGATCGAGGGCGAGGGCGAGGGCCGCCCTACGAGGGCACCCAGACCGCCAAGCTG
AAGGTGACCAAGGGTGGCCCCCTGCCCTTCGCTGGGACATCCTGTCCCCTCAGTTCATG
TACGGCTCCAAGGCCTACGTGAAGCACCCCGCCGACATCCCCGACTACTTGAAGCTGTCC
TTCCCCGAGGGCTTCAAGTGGGAGCGCGTGATGAACTTCGAGGACGGCGGCGTGGTGACC
GTGACCCAGGACTCCTCCCTGCAGGACGGCGAGTTCATCTACAAGGTGAAGCTGCGCGGC

ACCAACTTCCCCTCCGACGGCCCCGTAATGCAGAAGAAGACCATGGGCTGGGAGGCCTCC
TCCGAGCGGATGTACCCCGAGGACGGCGCCCTGAAGGGCGAGATCAAGCAGAGGCTGAAG
CTGAAGGACGGCGGCCACTACGACGCTGAGGTCAAGACCACCTACAAGGCCAAGAAGCCC
GTGCAGCTGCCCGGCGCCTACAACGTCAACATCAAGTTGGACATCACCTCCCACAACGAG
GACTACACCATCGTGGAACAGTACGAACGCGCCGAGGGCCGCACTCCACCGGCGGCATG
GACGAACTGTACAAGTGA GTCCCAGCTTTCTGTACAAAGTGGTTCGATAATTCCTTAAT
TAACTAGTTCTAGAGCGGCCGCCACC GCGGTGGAGCTC GAATTTCCCCGATCGTTCAAA
CATTGGCAATAAAGTTTCTTAAGATTGAATCCTGTTGCCGGTCTTGCGATGATTATCAT
ATAATTTCTGTTGAATTACGTTAAGCATGTAATAATTAACATGTAATGCATGACGTTATT
TATGAGATGGGTTTTTATGATTAGAGTCCCGCAATTATACATTTAATACGCGATAGAAAA
CAAAATATAGCGCGCAAAC TAGGATAAATTATCGCGCGCGGTGTCATCTATGTTACTGAA
TTCGTAATCATGGTCATAGCTGTTTCCTGTGTGAA AATTGTTATCCGCTCACAATTCCACA
CAACATACGAGCCGGAAGCATAAAGTGTAAG CCTGGGGTGCCTAATGAGTGAGCTAACT
CACATTAATTGCGTTGCGCTCACTGCCCGCTTCCAGTCGGGAAACCTGTCGTGCCAGCT
GCATTAATGAATCGGCCAACGCGCGGGGAGAGGCGGTTTTCGTATTGGCTAGAGCAGCTT
GCCAACATGGTGGAGCACGACACTCTCGTCTACTCCAAGAATATCAAAGATACAGTCTCA
GAAGACCAAAGGGCTATTGAGACTTTTCAACAAAGGGTAATATCGGGAAACCTCCTCGGA
TTCCATTGCCAGCTATCTGTCACTTCATCAAAGGACAGTAGAAAAGGAAGGTGGCACC
TACAAATGCCATCATTGCGATAAAGGAAAGGCTATCGTTCAAGATGCCTCTGCCGACAGT
GGTCCCAAAGATGGACCCCCACCCACGAGGAGCATCGTGAAAAAGAAGACGTTCCAACC
ACGTCTTCAAAGCAAGTGGATTGATGTGATAACATGGTGGAGCACGACACTCTCGTCTAC
TCCAAGAATATCAAAGATACAGTCTCAGAAGACCAAAGGGCTATTGAGACTTTTCAACAA
AGGGTAATATCGGGAAACCTCCTCGGATTCCATTGCCAGCTATCTGTCACTTCATCAA
AGGACAGTAGAAAAGGAAGGTGGCACCTACAAATGCCATCATTGCGATAAAGGAAAGGCT
ATCGTTCAAGATGCCTCTGCCGACAGTGGTCCCAAAGATGGACCCCCACCCACGAGGAGC
ATCGTGGAAAAAGAAGACGTTCCAACCACGTCTTCAAAGCAAGTGGATTGATGTGATATC
TCCACTGACGTAAGGGATGACGCACAATCCCACTATCCTTCGCAAGACCTTCCTCTATAT
AAGGAAGTTCATTTCAATTTGGAGAGGACACGCTGAAATCACCAGTCTCTCTCTACAAATC

TATCTCTCTCGAGCTTTCGCAGATCCCGGGGGCAATGAGATATGAAAAAGCCTGAACTC
ACCGCGACGTCTGTCGAGAAGTTTCTGATCGAAAAGTTCGACAGCGTCTCCGACCTGATG
CAGCTCTCGGAGGGCGAAGAATCTCGTGCTTTCAGCTTCGATGTAGGAGGGCGTGGATAT
GTCCTGCGGGTAAATAGCTGCGCCGATGGTTTCTACAAAGATCGTTATGTTTATCGGCAC
TTTGCATCGGCCGCGCTCCCGATTCCGGAAGTGCTTGACATTGGGGAGTTTAGCGAGAGC
CTGACCTATTGCATCTCCCGCCGTGCACAGGGTGTACGTTGCAAGACCTGCCTGAAACC
GAACTGCCCCTGTTCTACAACCGGTGCGCGGAGGCTATGGATGCGATCGCTGCGGCCGAT
CTTAGCCAGACGAGCGGGTTCGGCCATTCCGACCGCAAGGAATCGGTCAATACACTACA
TGGCGTGATTTTCATATGCGCGATTGCTGATCCCATGTGTATCACTGGCAAAGTGTGATG
GACGACACCGTCAGTGCCTCCGTGCGCAGGCTCTCGATGAGCTGATGCTTTGGGCCGAG
GACTGCCCCGAAGTCCGGCACCTCGTGACGCGGATTTCCGGCTCCAACAATGTCCTGACG
GACAATGGCCGCATAACAGCGGTCATTGACTGGAGCGAGGCGATGTTCCGGGGATTCCCAA
TACGAGGTCGCCAACATCTTCTTGGAGGCCGTGGTTGGCTTGTATGGAGCAGCAGACG
CGCTACTTCGAGCGGAGGCATCCGGAGCTTGCAGGATCGCCACGACTCCGGGCGTATATG
CTCCGCATTGGTCTTGACCAACTCTATCAGAGCTTGGTTGACGGCAATTTTCGATGATGCA
GCTTGGGCGCAGGGTCGATGCGACGCAATCGTCCGATCCGGAGCCGGGACTGTCGGGCGT
ACACAAATCGCCCGAGAAGCGCGGCCGTCTGGACCGATGGCTGTGTAGAAGTACTCGCC
GATAGTGAAACCGACGCCCCAGCACTCGTCCGAGGGCAAAGAAATAGAGTAGATGCCGA
CCGGATCTGTCGATCGACAAGCTCGAGTTTCTCCATAATAATGTGTGAGTAGTTCCAGA
TAAGGGAATTAGGGTTCCTATAGGGTTTCGCTCATGTGTTGAGCATATAAGAAACCCTTA
GTATGTATTTGTATTTGTAAAATACTTCTATCAATAAAATTTCTAATTCCTAAAACCAA
ATCCAGTACTAAAATCCAGATCCCCGAATTAATTCGGCGTTAATTCAGTACATTA AAAA
CGTCCGCAATGTGTTATTAAGTTGTCTAAGCGTCAATTGTTTACACCACAATATATCCT
GCCACCAGCCAGCCAACAGCTCCCCGACCGGCAGCTCGGCACAAAATCACCCTCGATAC
AGGCAGCCATCAGTCCGGGACGGCGTCAGCGGGAGAGCCGTTGTAAGGCGGCAGACTTT
GCTCATGTTACCGATGCTATTCCGGAAGAACGGCAACTAAGCTGCCGGGTTTGAACACGG
ATGATCTCGCGGAGGGTAGCATGTTGATTGTAACGATGACAGAGCGTTGCTGCCTGTGAT
CACCGCGGTTTCAAATCGGCTCCGTGATACTATGTTATACGCCAACTTTGAAAACAAC

TTTGAAAAGCTGTTTTCTGGTATTTAAGGTTTTAGAATGCAAGGAACAGTGAATTGGAG
TTCGTCTGTATAATTAGCTTCTGGGGTATCTTTAAATACTGTAGAAAAGAGGAAGGA
AATAATAAATGGCTAAAATGAGAATATCACCGGAATTGAAAAAACTGATCGAAAAATACC
GCTGCGTAAAAGATACGGAAGGAATGTCTCTGCTAAGGTATATAAGCTGGTGGGAGAAA
ATGAAAACCTATATTTAAAAATGACGGACAGCCGGTATAAAGGGACCACCTATGATGTGG
AACGGGAAAAGGACATGATGCTATGGCTGGAAGGAAAAGCTGCCTGTTCCAAAGGTCTGC
ACTTTGAACGGCATGATGGCTGGAGCAATCTGCTCATGAGTGAGGCCGATGGCGTCCTTT
GCTCGGAAGAGTATGAAGATGAACAAAGCCCTGAAAAGATTATCGAGCTGTATGCGGAGT
GCATCAGGCTCTTCACTCCATCGACATATCGGATTGTCCCTATACGAATAGCTTAGACA
GCCGCTTAGCCGAATTGGATTACTTACTGAATAACGATCTGGCCGATGTGGATTGCGAAA
ACTGGGAAGAAGACACTCCATTTAAAGATCCGCGGAGCTGTATGATTTTTAAAGACGG
AAAAGCCCGAAGAGGAACCTGTCTTTCCACGGCGACCTGGGAGACAGCAACATCTTTG
TGAAAGATGGCAAAGTAAGTGGCTTTATTGATCTTGGGAGAAGCGGCAGGGCGGACAAGT
GGTATGACATTGCCTTCTGCGTCCGGTCGATCAGGGAGGATATCGGGGAAGAACAGTATG
TCGAGCTATTTTTGACTTACTGGGGATCAAGCCTGATTGGGAGAAAATAAAATATTATA
TTTTACTGGATGAATTGTTTTAGTACCTAGAATGCATGACCAAATCCCTAACGTGAGT
TTTCGTTCCACTGAGCGTCAGACCCCGTAGAAAAGATCAAAGGATCTTCTTGAGATCCTT
TTTTCTGCGCGTAATCTGCTGCTTGCAAACAAAAAAACCACCGCTACCAGCGGTGGTTT
GTTTGCCGGATCAAGAGCTACCAACTCTTTTTCCGAAGGTAAGTGGCTTCAGCAGAGCGC
AGATACCAAATACTGTCCTTCTAGTGTAGCCGTAGTTAGGCCACCACTTCAAGAACTCTG
TAGCACCGCTACATACCTCGCTCTGCTAATCCTGTTACCAGTGGCTGCTGCCAGTGGCG
ATAAGTCGTGTCTTACCGGGTTGGAAGTCAAGACGATAGTTACCGGATAAGGCGCAGCGGT
CGGGCTGAACGGGGGGTTCGTGCACACAGCCCAGCTTGGAGCGAACGACCTACACCGAAC
TGAGATACCTACAGCGTGAGCTATGAGAAAAGCGCCACGCTTCCGAAGGGAGAAAAGGCGG
ACAGGTATCCGGTAAGCGGCAGGGTTCGGAACAGGAGAGCGCACGAGGGAGCTTCCAGGGG
GAAACGCCTGGTATCTTTATAGTCCTGTGCGGTTTCGCCACCTTGACTTGAGCGTCGAT
TTTTGTGATGCTCGTCAGGGGGCGGAGCCTATGGAAAACGCCAGCAACGCGGCTTTT
TACGTTCTGGCCTTTTGTGCGCCTTTTGTCTACATGTTCTTCTGCGTTATCCCCTG

ATTCTGTGGATAACCGTATTACCGCCTTTGAGTGAGCTGATACCGCTCGCCGAGCCGAA
CGACCGAGCGCAGCGAGTCAGTGAGCGAGGAAGCGGAAGAGCGCCTGATGCGGTATTTTC
TCCTTACGCATCTGTGCGGTATTTACACCGCATATGGTGCACTCTCAGTACAATCTGCT
CTGATGCCGCATAGTTAAGCCAGTATACTCCGCTATCGCTACGTGACTGGGTCATGGC
TGCGCCCCGACACCCGCCAACACCCGCTGACGCGCCCTGACGGGCTTGTCTGCTCCCGGC
ATCCGCTTACAGACAAGCTGTGACCGTCTCCGGGAGCTGCATGTGTCAGAGGTTTTACC
GTCATCACCGAAACGCGCGAGGCAGGGTGCCTTGATGTGGGCGCCGGCGGTGAGTGGCG
ACGGCGCGGCTTGTCCGCGCCCTGGTAGATTGCCTGGCCGTAGGCCAGCCATTTTTGAGC
GGCCAGCGGCCGATAGGCCGACGCGAAGCGCGGGGCGTAGGGAGCGCAGCGACCGAA
GGGTAGGCGCTTTTTGCAGCTCTTCGGCTGTGCGCTGCCAGACAGTTATGCACAGGCCA
GGCGGGTTTTAAGAGTTTTAATAAGTTTTAAAGAGTTTTAGGCGGAAAAATCGCCTTTTT
TCTCTTTTATATCAGTCACTTACATGTGTGACCGGTTCCCAATGTACGGCTTTGGGTTCC
CAATGTACGGGTTCCGGTTCCTCAATGTACGGCTTTGGGTTCCCAATGTACGTGCTATCCA
CAGGAAAGAGACCTTTTCGACCTTTTTCCCTGCTAGGGCAATTTGCCCTAGCATCTGCT
CCGTACATTAGGAACCGGCGGATGCTTCGCCCTCGATCAGGTTGCGGTAGCGCATGACTA
GGATCGGGCCAGCCTGCCCCGCTCCTCCTCAAATCGTACTCCGGCAGGTCATTTGACC
CGATCAGCTTGCGCACGGTGAAACAGAACTTCTTGA ACTCTCCGGCGCTGCCACTGCGTT
CGTAGATCGTCTTGAACAACCATCTGGCTTCTGCCTTGCTGCGGCGCGGCGTGCCAGGC
GGTAGAGAAAACGGCCGATGCCGGGATCGATCAAAAAGTAATCGGGGTGAACCGTCAGCA
CGTCCGGGTTCTTGCTTCTGTGATCTCGCGGTACATCCAATCAGCTAGCTCGATCTCGA
TGTA CTCCGGCCGCCCGTTTCGCTCTTTACGATCTTGTAGCGGCTAATCAAGGCTTAC
CCTCGGATACCGTCACCAGGCGGCCGTTCTTGGCCTTCTTCGTACGCTGCATGGCAACGT
GCGTGGTGTAAACCGAATGCAGGTTTCTACCAGGTCGTCTTTCTGCTTCCGCCATCGG
CTCGCCGGCAGAACTTGAGTACGTCCGCAACGTGTGGACGGAACACGCGGCCGGGCTTGT
CTCCCTCCCTTCCCGGTATCGGTTTCATGGATTGCGTTAGATGGGAAACCGCCATCAGTA
CCAGGTCGTAATCCACACACTGGCCATGCCGGCCGGCCCTGCGGAAACCTCTACGTGCC
CGTCTGGAAGCTCGTAGCGGATCACCTCGCCAGCTCGTCGGTCACGCTTCGACAGACGGA
AAACGGCCACGTCCATGATGCTGCGACTATCGCGGGTGCCACGTCATAGAGCATCGGAA

CGAAAAAATCTGGTTGCTCGTCGCCCTTGGGCGGCTTCCTAATCGACGGCGCACCGGCTG
CCGGCGGTTGCCGGGATTCTTTGCGGATTCGATCAGCGGCCGCTTGCCACGATTCACCGG
GGCGTGCTTCTGCCTCGATGCGTTGCCGCTGGGCGGCCTGCGCGGCCTTCAACTTCTCCA
CCAGGTCATCACCCAGCGCCGCGCCGATTTGTACCGGGCCGGATGGTTTGCGACCGTCAC
GCCGATTCCTCGGGCTTGGGGTTCCAGTGCCATTGCAGGGCCGGCAGACAACCCAGCCG
CTTACGCCTGGCCAACCGCCCGTTCTCCACACATGGGGCATTCCACGGCGTCGGTGCCT
GGTTGTTCTTGATTTTCCATGCCGCCTCCTTAGCCGCTAAAATTCATCTACTCATTTAT
TCATTTGCTCATTTACTCTGGTAGCTGCGCGATGTATTCAGATAGCAGCTCGGTAATGGT
CTTGCCCTTGGCGTACCGCGTACATCTTCAGCTTGGTGTGATCCTCCGCCGGCAACTGAAA
GTTGACCCGCTTCATGGCTGGCGTGTCTGCCAGGCTGGCCAACGTTGCAGCCTTGCTGCT
GCGTGCGCTCGGACGGCCGGCACTTAGCGTGTTTGTGCTTTTGCTCATTTTCTCTTTACC
TCATTAECTCAAATGAGTTTTGATTTAATTCAGCGGCCAGCGCCTGGACCTCGCGGGCA
GCGTCGCCCTCGGGTTCTGATTCAAGAACGGTTGTGCCGGCGGGCAGTGCCTGGGTAG
CTCACGCGCTGCGTGATACGGGACTCAAGAATGGGCAGCTCGTACCCGGCCAGCGCCTCG
GCAACCTCACCGCCGATGCGCGTGCCTTTGATCGCCC GCGACACGACAAAGGCCGCTTGT
AGCCTTCCATCCGTGACCTCAATGCGCTGCTTAACCAGCTCCACCAGGTCGGCGGTGGCC
CATATGTCGTAAGGGCTTGGCTGCACCGGAATCAGCACGAAGTCGGCTGCCTTGATCGCG
GACACAGCCAAGTCCGCCGCTGGGGCGCTCCGTCGATCACTACGAAGTCGCGCCGGCCG
ATGGCCTTCACGTCGCGGTCAATCGTCGGGCGGTGATGCCGACAACGGTTAGCGGTTGA
TCTTCCCGCACGGCCGCCAATCGCGGGCACTGCCCTGGGGATCGGAATCGACTAACAGA
ACATCGGCCCCGGCGAGTTGCAGGGCGCGGGCTAGATGGGTTGCGATGGTTCGTCTTGCCT
GACCCGCTTTCTGGTTAAGTACAGCGATAACCTTCATGCGTTCCCCTTGCGTATTTGTT
TATTTACTCATCGCATCATATACGCAGCGACCGCATGACGCAAGCTGTTTTACTCAAATA
CACATCACCTTTTTAGACGGCGGGCGCTCGGTTTCTTCAGCGGCCAAGCTGGCCGGCCAGG
CCGCCAGCTTGGCATCAGACAAACCGGCCAGGATTTTCATGCAGCCGCACGGTTGAGACGT
GCGCGGGCGGCTCGAACACGTACCCGGCCGCGATCATCTCCGCTCGATCTCTTCGGTAA
TGAAAAACGGTTCGTCCTGGCCGTCCTGGTGCGGTTTCATGCTTGTTCTCTTGGCGTTC
ATTCTCGGCGGCCGCCAGGGCGTCGGCCTCGGTCAATGCGTCCTCACGGAAGGCACCGCG

CCGCCTGGCCTCGGTGGGCGTCACTTCTCGCTGCGCTCAAGTGCGCGGTACAGGGTCGA
GCGATGCACGCCAAGCAGTGCAGCCGCCTCTTTCACGGTGCGGCCTTCTGGTCGATCAG
CTCGCGGGCGTGCGCGATCTGTGCCGGGTGAGGGTAGGGCGGGGGCCAACTTCACGCC
TCGGGCCTTGGCGGCCTCGCGCCCGCTCCGGGTGCGGTCGATGATTAGGGAACGCTCGAA
CTCGGCAATGCCGGCGAACACGGTCAACACCATGCGGCCGGCCGGCGTGGTGGTGTCCGC
CCACGGCTCTGCCAGGCTACGCAGGCCCGCGCCGGCCTCCTGGATGCGCTCGGCAATGTC
CAGTAGGTCGCGGGTGTGCGGGCCAGGCGGTCTAGCCTGGTCACTGTCACAACGTCCGC
AGGGCGTAGGTGGTCAAGCATCCTGGCCAGCTCCGGGCGGTGCGGCCTGGTGCCGGTGAT
CTTCTCGAAAACAGCTTGGTGCAGCCGGCCGCGTGCAGTTCGGCCCGTTGGTTGGTCAA
GTCCTGGTCGTCGGTGCTGACGCGGGCATAGCCAGCAGGCCAGCGGCCGGCGCTTGT
CATGGCGTAATGTCTCCGGTTCTAGTCGCAAGTATTCTACTTTATGCGACTAAAACACGC
GACAAGAAAACGCCAGGAAAAGGGCAGGGCGGCAGCCTGTCGCGTAACTTAGGACTTGTG
CGACATGTCGTTTTCAGAAGACGGTGCAGTGAACGTCAGAAGCCGACTGCACTATAGCA
GCGGAGGGGTTGGATCAAAGTACTTTGATCCCGAGGGGAACCCTGTGGTTGGCATGCACA
TACAAATGGACGAACGGATAAACCTTTTCACGCCCTTTTAAATATCCGTTATTCTAATAA
ACGCTCTTTTCTCTTAGGTTTACCCGCCAATATATCCTGTCAAACACTGATAGTTTAAAC
TGAAGGCGGGAAACGACAATCTGATCCAAGCTCAAGCTGCTCTAGCATTGCCATTCAGG
CTGCGCAACTGTTGGGAAGGGCGATCGGTGCGGGCCTTTCGCTATTACGCCAGCTGGCG
AAAGGGGGATGTGCTGCAAGGCGATTAAGTTGGGTAACGCCAGGGTTTTCCAGTCACGA
CGTTGTAAACGACGGCCAGTGCCAAGCTT **CGACGAGTCAGTAATAAACGGCGTCAAAGT**
GGTTGCAGCCGGCACACACGAGTCGTGTTTATCAACTCAAAGCACAAATACTTTCTCA
ACCTAAAATAAGGCAATTAGCCAAAAACAACCTTTCGCGTGTAAACAACGCTCAATACAG
TGTCATTTATTATTAGCTATTGCTTACCCGCCTTAGCTTTCGTCGACCTAGTCGTCT
CGTCTTTCTTCTTCTTCTATAAAAACAATACCCAAAGAGCTCTTCTTCTTACAATT
CAGATTTCAATTTCTCAAATCTTAAAACTTCTCTCAATTCTCTTACCGTGATCAAG
GTAATTTCTGTGTTCTTATTCTCTCAAATCTTCGATTTGTTTTGTTTCGATCCAA
TTTCGTATATGTTCTTTGGTTAGATTCTGTTAATCTTAGATCGAAGACGATTTCTGG
TTTGATCGTTAGATATCATCTTAATTCTCGATTAGGGTTTCATAGATATCATCCGATTTG

TTCAAATAATTTGAGTTTTGTGCGAATAATTACTCTTCGATTTGTGATTTCTATCTAGATC

TGGTGTTAGTTTCTAGTTTGTGCGATCGAATTTGTAGATTAATCTGAGTTTTTCTGATTA

ACA

attB1

c-peredox-mCherry

attB2

nos

M13rev

lacO

lac

hygR

LB

KanR

ColE1

RB

M13for

Ubi10 Prom