

REED LABORATORY – PRIMER GUIDE UIC College of Dentistry

Creating Primers:

Go to www.idtdna.com/uic/

Log in: CONTACT ME

Go to Custom DNA Oligos

The screenshot shows the IDT website's Oligo Entry interface. At the top, there's a navigation bar with 'Order Menu', 'Products & Services', 'Support & Education', and 'Tools'. Below that, the 'Oligo Entry' section is visible. It includes a 'Select All' checkbox, an 'Actions' dropdown, a '# of Items: 8' indicator, and a 'Go' button. A 'Bulk Input' button is also present. The main entry area shows a list of oligos, with the first one selected. The entry details for 'NG2-F' are as follows: Scale: 25 nmole DNA oligo; Normalization: None; Purification: Standard Desalting; Services: No services are available on this scale. The sequence is 'cacacttctctggacatttcttc' with 24 bases.

PRIMER SEQUENCES:

5' to 3'

CONTROL:

*GAPDH [F: CCAGTATGACTCCACTCACG] [R: GACTCCACGACATACTCAGC]-m
GAPDH [F: TCACTGCCACCCAGAAGAC] [R: TGTAGGCCATGAGGTCCAC] - m

MATRIX:

*Col1a1 [F: ACGGCTGCACGAGTCACAC] [R: GGCAGGCGGGAGGTCTT] - m
*Col2a1 [F: CCTCTGCGACGACATAATCT] [R: CTCCTTTCTGTCCCTTTGGT] - m
*Col3a1 [F: GTTCTAGAGGATGGCTGTAATAACACA] [R: TTGCCTTGCGTGTTTGATATTC]
- m
*Col6a1_1 [F: GATGAGGGTGAAGTGGGAGA] [R: CAGCACGAAGAGGATGTCAA] -m
*Col6a1_2 [F: AGAACATAGCCTGGACG] [R: ACAACCCGCCTTAGAG] -m
*Col10 [F:CCCCATCCCATTTATGAGATTCTG] [R: GAGCCATACCTGGTCATTTTCTGTG] - m
*Acan [F: GAAGACGACATCACCATCCAG] [R: CTGTCTTTGTCACCCACACATG] - m
Col9a1 [F: ACCCTGGGTATCCGCAACT] [R: ACCCTGGTAAGTCATCTTGGC]

APOPTOSIS/STRESS

*Casp3 [F: GTCCCACTGTCTGTCTCAATGC] [R: TCAAGAAAGGAGCAGAGAGTAG]
*HtRA2 [F: ATCTCCTTTGCCATCCCTTC] [R: GGTCAGCATCATCACTCCAA] – m
XIAP [F:] [R:]

Caspase 7 [F:] [R:]
Syntenin-1 [F:] [R:]
Bag1 [F:] [R:]
GRP78 [F:] [R:]
Mupp1 [F:] [R:]

ENDOCYTOSIS:

Stonin1 [F:] [R:]

INFLAMMATION:

TNFA [F: CCCTCACACTCAGATCATCTTCT] [R: GCTACGACGTGGGCTACAG] - m
**NOS2* [F: TCACTGGGACAGCACAGAAT] [R: TGTGTCTGCAGATGTGCTGA] - m

PROTEASE:

**ADAM10* [F: TACAACCATGCCAGCTTTTTAGT] [R: GCCGATGTGCCAGATGAGTG] - m
**MMP2* [F: CCAACTACGATGATGAC] [R: ACCAGTGTGAGTATCAG] - m
**MMP3* [F: TCCTGATGTTGGTGGCTTCAG] [R: TGTCTTGGCAAATCCGGTGTGA] - m*
**MMP9* [F: ACCACATCGAACTTCGA] [R: CGACCATACAGATACTG] - m*
**MMP13* [F: TGATGGACCTTCTGGTCTTCTGG] [R: CATCCACATGGTTGGGAAGTTCT] - m
**MMP14* [F: GTGCCCTAGGCCTACATCCG] [R: TTGGGTATCCATCCATCACT] - m
HtRA1 [F:] [R:]
MMP1 [F:] [R:]

CHONDROGENESIS:

**TGFB* [F: CACCTGCAAGACCATCGACAT] [R: GAGCCTTAGTTTGGACAGGATCTG] - m
**FGF-2* [F: TCCAGTTGGTATGTGGCACT] [R: CTTCTGTCCAGGTCCCGTTT] - m
**VEGFA* [F: GGAGATCCTTCGAGGAGCACTT] [R: GGCGATTTAGCAGCAGATATAAGAA] - m
**IHH* [F: AAACCTCGTGCCTCTTGCCTA] [R: TGACAGAGATGGCCAGTGAG] - r
**PTH1P* [F: CGCAGACGATGTCTTTACCA] [R: TCCACCCTTTGTCTGACTCC] - m
**OSX* [F: GAAAGGAGGCACAAAGAAG] [R: CACCAAGGAGTAGGTGTGTT] - m
**BMP4* [F: TTCCTGGTAACCGAATGCTGA] [R: CCTGAATCTCGGCGACTTTTT] - m
**SOX9* [F: CATCAGCAGCACCGCACCCA] [R: CGGGTGATGGGCGGGTAGGA] - m
**RUNX2* [F: GAGGGCACAAGTTCTATCTG] [R: CGCTCCGGCCCACAAATCTC] - m
**PDGFr* [F: AGGGGGCGTGATGACTAGC] [R: TTCCAGGAGTGATACCAGCTT] - m

CHONDROCYTE SIGNALLING:

**NG2_1* [F: GGTACCATGCTGCTTCGTAACA] [R: CCCACGGTTGAAAGTACGT] - h
**NG2_2* [F: ACCCTCATCAGGAGACCCTC] [R: CAGGAGGTTGCCTCTTCTGG] - h
**NG2_3* [F: CACACTTCTCCTGGACATTTCTTC] [R: TGGCAGGTGGTGAGGACAGT] - m
**NG2_4* [F: AGAAGACCCGCAGGCTCAAG] [R: CGTGGAGTTGGAGGATGACG] - m
ERK [F:] [R:]
MAPK [F:] [R:]