

LlwtMT: wild type *Littorina littorea* MT

LlwtMT cDNA sequence for cloning in pGEX-4T-1 plasmid

TTTATTGGATCCATGAGCTCTGTGTTTCGGAGCAGGTTGCACTGATGTGTGTAAGCAAACCCCATGC
GGGTGTGCAACCAGTGGATGTAAGTGTACCGACGATTGCAAATGTCAGTCGTGTAATAACGGCGCC
GGGTGCACCGATACTGCAAGCAGACGCCGTGTGGATGCGGTTCTGGGTGCAACTGCAAGGAAGAT
TGCCGCTGCCAATCGTGTCTACGGCCTGTAAATGCGCAGCGGGCTCTTGCAAATGCGGTAAAGGT
TGTACCGGGCCTGATTCGTGTAAGTGTGACCGCAGCTGCTCATGCAAATGACTCGAGAAA

LlwtMT protein sequence

MSSVFGAGCTDVCKQTPCGCATSGCNCTDDCKQSKYGAGCTDTCKQTPCGSGGCNCKEDCRCQSCSTAC
KCAAGSCKCGKGCTGPDSCCKDRSCSCK*

Lltr1MT: truncated 1 of *Littorina littorea* MT

Lltr1MT cDNA sequence for cloning in pGEX plasmid

TTTATTGGATCCATGGGTGCGGGCTGCACTGACACTTGTAAACAAACCCCATGCGGTTGCGGCAGT
GGCTGCAATTGCAAAGAAGATTGCCGTTGCCAGTCGTGTTCTACGGCATGTAAATGCGCCGCAGGT
TCTTGCAAATGCGGTAAAGGCTGCACGGGTCCAGATAGCTGTAAATGTGACCGTTCGTGCAGCTGT
AAATGACTCGAGAAA

Lltr1MT protein sequence

MGAGCTDTCKQTPCGSGGCNCKEDCRCQSCSTACKCAAGSCKCGKGCTGPDSCCKDRSCSCK*

Lltr2MT: truncated 2 of *Littorina littorea* MT (with SSVF peptide)

Lltr2MT cDNA sequence for cloning in pGEX plasmid

TTTATTGGATCCATGAGTAGTGTATTCGGGGCAGGTTGTACGGATACCTGCAAGCAGACCCCGTGT
GGCTGCGGTAGTGGATGCAACTGCAAAGAAGATTGTCGTTGCCAGTCGTGTTCAACCGCTTGCAA
TGCGCCGCAGGTAGCTGCAAATGCGGCAAAGGCTGCACCGGACCGGACTCTTGTAAGTGTGACCGT
TCTTGTTTCATGTAAGTAACTCGAGAAA

Lltr2MT protein sequence

MSSVFGAGCTDTCKQTPCGSGGCNCKEDCRCQSCSTACKCAAGSCKCGKGCTGPDSCCKDRSCSCK*

Figure S1. cDNA and protein sequence information of the proteins studied in this work. The constructs Lltr1MT and Lltr2MT are shown in comparison to LlwtMT. Both cDNA and protein sequences are shown, and the grey boxes indicate the 5' and 3' restriction sites (*Bam*HI and *Xho*I, respectively) used for cloning into the pGEX-4T-1 plasmid. Highlighted in yellow is the SSVF N-term sequence and in green the first metal binding domain that is removed in the mutated proteins.