Recombinant Mouse TIMP-2/TIMP2 protein (His Tag)

Catalog Number: PDEM100296

Note: *Centrifuge before opening to ensure complete recovery of vial contents.*

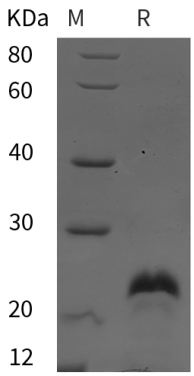
Description

Species	Mouse
Source	E.coli-derived Mouse TIMP-2 protein Cys27-Pro220, with an N-terminal His
Calculated MW	21.2 kDa
Observed MW	25 kDa
Accession	P25785
Bio-activity	Not validated for activity

Properties

Purity	> 95% as determined by reducing SDS-PAGE.
Endotoxin	< 10 EU/mg of the protein as determined by the LAL method
Storage	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80 ℃. Reconstituted protein solution can be stored at 4-8℃ for 2-7 days. Aliquots of reconstituted samples are stable at < -20℃ for 3 months.
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.
Formulation	Lyophilized from a 0.2 μm filtered solution in PBS with 5% Trehalose and 5% Mannitol.
Reconstitution	It is recommended that sterile water be added to the vial to prepare a stock solution of 0.5 mg/mL. Concentration is measured by UV-Vis.

Data



> 95 % as determined by reducing SDS-PAGE.

Background

Mouse Metalloproteinase inhibitor 2(TIMP-2), belongs to a family of proteins that regulate the activation and proteolytic activity of matrix metalloproteinases (MMPs). There are four mammalian members of the family, TIMP-1, TIMP-2, TIMP-3, and TIMP-4. The TIMP-2 is detected in testis, retina, hippocampus and cerebral cortex. The function of TIMP 2 protein is to inhibit MMPs non covalently by the formation of binary complexes. Complexes with metalloproteinases (such as collagenases) and irreversibly inactivates them by binding to their catalytic zinc cofactor.And the interaction with MMP-14 facilitates the activation of pro-MMP-2.It has been shown that the binding of TIMP 2 to a3b1 integrin results in the inhibition of endothelial cell proliferation and angiogenesis.