

Product datasheet for **TP727781**

Thrombospondin 1 (THBS1) Human Recombinant Protein

Product data:

Product Type:	Recombinant Proteins
Description:	Recombinant Human Thrombospondin-1/THBS1 (C-10His)
Species:	Human
Expression cDNA Clone or AA Sequence:	Asn19-Pro1170
Tag:	C-His
Buffer:	Lyophilized from a 0.2 um filtered solution of PBS, pH 7.4.
Note:	Recombinant Human Thrombospondin-1 is produced by our Mammalian expression system and the target gene encoding Asn19-Pro1170 is expressed with a 10His tag at the C-terminus.
Storage:	Lyophilized protein should be stored at < -20°C, though stable at room temperature for 3 weeks. Reconstituted protein solution can be stored at 4-7°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
Stability:	12 months from date of despatch
Locus ID:	7057
UniProt ID:	P07996
Synonyms:	Thrombospondin-1; THBS1; TSP; TSP1
Summary:	Thrombospondin-1 (TSP-1) is a 150-180kDa calcium-sensitive protein that is secreted as a disulfide-linked homotrimer. TSP-1 regulates a wide range of cellular functions including their interactions with other cells and with the extracellular matrix (ECM). TSP-1 contains an N-terminal Laminin G-like globular domain, an extended central region with one vWFC domain, 3 TSP type 1 domains, 2 EGF-like domains, and 8 TSP type3 domains, and a globular TSP C-terminal domain. Distinct regions of TSP-1 have been associated with binding to particular ECM or cellular molecules. TSP-1 counteracts the angiogenic, hypotensive, and antithrombotic effects of nitric oxide (NO). It binds and neutralizes VEGF, blocks VEGF R2 signaling on vascular endothelial cells(EC), and destabilizes adhesive contacts between EC. TSP-1 also plays an important role in wound repair and tissue fibrosis by binding latent TGF-beta and inducing release of the active cytokine from the latency associated peptide (LAP).
Protein Families:	Druggable Genome



[View online »](#)

Protein Pathways: Bladder cancer, ECM-receptor interaction, Focal adhesion, p53 signaling pathway, TGF-beta signaling pathway