Human TGFBI / BIGH3 Protein (His Tag)

Catalog Number: **10569-H08H**

General Information

Gene Name Synonym:

BIGH3; CDB1; CDG2; CDGG1; CSD; CSD1; CSD2; CSD3; EBMD; LCD1

Protein Construction:

A DNA sequence encoding the extracellular domain of human beta IG-H3 (NP_000349.1) precursor (Met 1-His 683) was expressed, fused with a polyhistidine tag at the C-terminus.

Source: Human

Expression Host: HEK293 Cells

QC Testing

Purity: > 75 % as determined by SDS-PAGE

Endotoxin:

< 1.0 EU per μg of the protein as determined by the LAL method

Stability:

Samples are stable for up to twelve months from date of receipt at -70 ℃

Predicted N terminal: Gly 24

Molecular Mass:

The secreted recombinant human beta IG-H3 comprises 671 amino acids with a predicted molecular mass of 74 kDa. As a result of glycosylation, the apparent molecular mass of rh beta IG-H3 is approximately 65 kDa in SDS-PAGE under reducing conditions.

Formulation:

Lyophilized from sterile PBS, pH 7.4

Normally 5 % - 8 % trehalose, mannitol and 0.01% Tween80 are added as protectants before lyophilization. Specific concentrations are included in the hardcopy of COA. Please contact us for any concerns or special requirements.

Usage Guide

Storage:

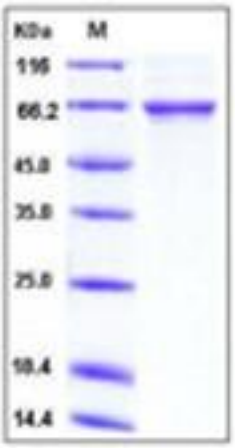
Store it under sterile conditions at -20℃ to -80℃ upon receiving. Recommend to aliquot the protein into smaller quantities for optimal storage.

Avoid repeated freeze-thaw cycles.

Reconstitution:

Detailed reconstitution instructions are sent along with the products.

SDS-PAGE:



Protein Description

TGFBI is an RGD-containing protein that binds to type I, II and IV collagens. The RGD motif is found in many extracellular matrix proteins modulating cell adhesion and serves as a ligand recognition sequence for several integrins. TGFBI plays a role in cell-collagen interactions and may be involved in endochondrial bone formation in cartilage. TGFBI is induced by transforming growth factor-beta and acts to inhibit cell adhesion. Mutations in TGFBI are associated with multiple types of corneal dystrophy. TGFBI can bind to type I, II, and IV collagens. This adhesion protein may play an important role in cell-collagen interactions. In cartilage, TGFBI may be involved in endochondral bone formation. Loss of the TGFBI is sufficient to induce specific resistance.

References

3.Kannabiran C, *et al*. (2006) TGFBI gene mutations in corneal dystrophies. Hum Mutat. 27(7): 615-25.