



Human Type I Collagen

Cat. No.	Format	Size
1200-01S	Purified Protein - Solution	0.5 mg



Overview

Source	Placental villi
Purification	Controlled and limited pepsin digestion followed by selective salt precipitation
Purity	> 90% by SDS-PAGE
Alternate Name(s)	COL1A1, COL1A2

Description

Collagen is the main structural protein in the extracellular space and is the most abundant protein in the ECM. Collagens are divided into two classes - fibril (types I, II, III, V) and non-fibril (types IV, VI). Type I collagen is the most abundant collagen and is expressed in almost all connective tissues including skin, tendon, and bone tissue. It is also the predominant component of the interstitial matrix. Type I collagen mutations are associated in a range of diseases including osteogenesis imperfecta and Ehlers-Danlos syndrome. Type I collagen consists of two $\alpha 1(I)$ chains and one $\alpha 2(I)$ chain.

Applications

ELISA – Quality tested ^{1-15,26}
 SDS-PAGE – Quality tested
 WB – Reported in literature ^{16,17, 20, 21}
 SPR – Reported in literature ^{27,28}
 Cell Culture – Reported in literature ^{18,19}
 Stimulation Studies – Reported in literature ²⁵
 Coating Material for –
 Adhesion Studies – Reported in literature ²⁰⁻²⁴
 Autoimmune Studies – Reported in literature ²⁶
 Blood Disorder Studies – Reported in literature ^{27, 28}
 Differentiation Studies – Reported in literature ²⁹
 ECM Interaction Studies – Reported in literature ³⁰⁻³²
 Migration Studies – Reported in literature ³³

Handling and Storage

- The purified protein is supplied as a solution of 0.5 mg collagen in 1.0 mL of 500 mM acetic acid. Store at 2-8°C.
- Reagent is stable for the period shown on the label if stored as directed.

Warning

Reagent contains acetic acid. Please refer to product specific SDS.

References

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In accordance with current Good Manufacturing and Good Laboratory Practices (cGMP/cGLP), any protein of human blood origin should be handled pursuant to your organization's documented safety procedures and as if it is capable of transmitting infection. This product has **NOT** been tested for viral, bacterial, or other infectious agents such as, but not limited to, HIV, HbsAg, and HCV.

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