

## 32-3627: CSTA Recombinant Protein

**Alternative Name :** Cystatin-A, Cystatin-AS, Stefin-A, CSTA, STF1, STFA.

### Description

Source : Escherichia Coli. Cystatin A Human Recombinant produced in E.Coli is a single, non-glycosylated, Polypeptide chain containing 118 amino acids (1-98a.a.) and having a molecular mass of 13.1 kDa. The Cystatin A is fused to a 20 amino acid His tag at N-terminus and purified by proprietary chromatographic techniques. Human Cystatin A (CSTA or Stefin A) belongs to family 1 of the cystatin superfamily, which is characterized by the lack of disulphide bonds and carbohydrates. CSTA is an intracellular inhibitor regulating the activities of cysteine proteases of the papain family such as Cathepsins B, H and L. Cystatin A has also been implicated in several disease states. Because of altered proteolytic state in cancer progression, CSTA may have a role in the proteolytic pathways.

### Product Info

<b>Amount :</b>	20 µg
<b>Purification :</b>	Greater than 95% as determined by reducing SDS-PAGE.
<b>Content :</b>	Cystatin-A (1mg/ml) in 20mM Tris-HCl buffer (pH8.0), 1mM DTT and 10% glycerol.
<b>Storage condition :</b>	Store at 4°C if entire vial will be used within 2-4 weeks. Store, frozen at -20°C for longer periods of time. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Avoid multiple freeze-thaw cycles.
<b>Amino Acid :</b>	MGSSHHHHHH SSGLVPRGSH MIPGGLSEAK PATPEIQEIV DKVKPQLEEK TNETYGKLEA VQYKTQVVAG TNYIKVRAG DNKYMHLKVF KSLPGQNEDL VLTGYQVDKN KDDELTGF.

### Application Note

The IC50 value is < 1.0nM. The inhibitory function of CSTA on protease activity of papain was measured by a fluorometric assay using Z-FR-AMC at pH 7.5 at 25°C.

