

## 32-4836: Recombinant Human Split Hand/Foot Malformation Type 1

**Alternative Name :** SHFM1, Split Hand/Foot Malformation (Ectrodactyly) Type 1, DSS1, SHFD1, Deleted In Split Hand/Split Foot Protein 1, Split Hand/Foot Deleted Protein 1, Split Hand/Foot Malformation Type 1 Protein, Deleted In Split-Hand/Foot 1, 26S Proteasome Complex S

### Description

Source : Escherichia Coli. SHFM1 Human Recombinant produced in E.Coli is a single, non-glycosylated polypeptide chain containing 93 amino acids (1-70 a.a) and having a molecular mass of 10.7kDa (Molecular size on SDS-PAGE will appear higher). SHFM1 is fused to a 23 amino acid His-tag at N-terminus & purified by proprietary chromatographic techniques. 26S proteasome complex subunit DSS1 (SHFM1) has been suggested as a candidate gene for the autosomal dominant form of the heterogeneous limb developmental disorder split hand/split foot malformation type 1. SHFM1 is a subunit of the 26S proteasome which plays a part in ubiquitin-dependent proteolysis. SHFM1 binds and stabilizes BRCA2 and is therefore involved in the control of R-loop-associated DNA damage and thus transcription-associated genomic instability. Furthermore, SHFM1 may have a role in the completion of the cell cycle. SHFM1 is a component of the TREX-2 complex (transcription and export complex 2), comprised of at least ENY2, GANP, PCID2, DSS1, and either centrin CETN2 or CETN3.

### Product Info

**Amount :** 10 µg  
**Purification :** Greater than 85.0% as determined by SDS-PAGE.  
**Content :** SHFM1 protein solution (1mg/ml) containing 20mM Tris-HCl buffer (pH8.0), 10% glycerol and 0.1M NaCl.  
**Storage condition :** 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.  
**Amino Acid :** MGSSHHHHHH SSGLVPRGSH MGSMSEKKQP VDLGLLEEDD EFEEFPAEDW AGLDEDEDAH VWEDNWDDDN VEDDFSQQLR AELEKHGYKM ETS.

