

Recombinant SUMO1 protein - biotinylated

Catalog No: 82105, 82705

Expressed In: *E. coli*

Quantity: 100, 1000 µg

Source: Human

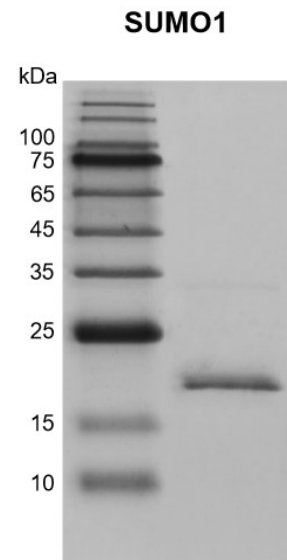
Buffer Contents: Recombinant SUMO1 protein - biotinylated is supplied in 25 mM Tris pH 8.0, 300 mM NaCl, 20% glycerol, 0.5 mM TCEP.

Background: SUMO1 (Small ubiquitin-related modifier 1) is a ubiquitin-like protein that can be covalently attached to proteins as a monomer or a lysine-linked polymer. Covalent attachment via an isopeptide bond to its substrates requires prior activation by the E1 complex SAE1-SAE2 and linkage to the E2 enzyme UBE2I, and can be promoted by E3 ligases such as PIAS1-4, RANBP2 or CBX4. This post-translational modification on lysine residues of proteins plays a crucial role in a number of cellular processes such as nuclear transport, DNA replication and repair, mitosis and signal transduction. Involved for instance in targeting RANGAP1 to the nuclear pore complex protein RANBP2. Covalently attached to the voltage-gated potassium channel KCNB1; this modulates the gating characteristics of KCNB1.

Protein Details: Recombinant SUMO1 protein - biotinylated that includes full length of human SUMO1 protein (accession number NP_001005781.1) was expressed in *E. coli* and contains an N-terminal His & Avi tag with a molecular weight of 15.81 kDa. This protein has been modified by biotin in vivo. The purity of the protein is ≥ 95% by SDS-PAGE.

Application Notes: This product was manufactured as described in Protein Details. Where possible, Active Motif has developed functional or activity assays for recombinant proteins. Additional characterization such as enzyme kinetic activity assays, inhibitor screening or other biological activity assays may not have been performed for every product. All available data for a given product is shown on the lot-specific Technical Data Sheet.

Storage and Guarantee: Recombinant proteins in solution are temperature sensitive and must be stored at -80°C to prevent degradation. Avoid repeated freeze/thaw cycles and keep on ice when not in storage. This product is for research use only and is not for use in diagnostic procedures. This product is guaranteed for 6 months from date of arrival.

**Recombinant SUMO1 protein gel**

12.5% SDS -PAGE Coomassie staining

MW: 15.81 kDa

Purity: ≥95%