

## 32-13026: ACTN1 Human

**Alternative Name :** ACTN1, Actinin, Alpha 1, Alpha-Actinin Cytoskeletal Isoform, F-Actin Cross-Linking Protein, Non-Muscle Alpha-Actinin-1, BDPLT15, Actinin 1 Smooth Muscle, Alpha-Actinin-1.

### Description

Source: Escherichia Coli.

Sterile Filtered colorless solution.

ACTN1 encodes a nonmuscle, cytoskeletal, alpha actinin isoform and maps to the same site as the structurally similar erythroid beta spectrin gene. Alpha actinins belong to the spectrin gene superfamily which represents a diverse group of cytoskeletal proteins, including the alpha and beta spectrins and dystrophins. Alpha actinin is an actin-binding protein with multiple roles in different cell types. In nonmuscle cells, the cytoskeletal isoform is found along microfilament bundles and adherens-type junctions, where it is involved in binding actin to the membrane. In contrast, skeletal, cardiac, and smooth muscle isoforms are localized to the Z-disc and analogous dense bodies, where they help anchor the myofibrillar actin filaments.

ACTN1 Human Recombinant produced in E.Coli is a single, non-glycosylated polypeptide chain containing 274 amino acids (1-249 a.a) and having a molecular mass of 31.4kDa. ACTN1 is fused to a 25 amino acid His-tag at N-terminus & purified by proprietary chromatographic techniques.

### Product Info

<b>Amount :</b>	5 µg / 20 µg
<b>Purification :</b>	Greater than 95.0% as determined by SDS-PAGE.
<b>Content :</b>	ACTN1 protein solution (1mg/ml) containing Phosphate Buffered Saline (pH7.4) 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 MGSEFMDHYD SQQTNDYMQP EEDWDRDLLL DPAWEKQQRK TFTAWCNSHL RKAGTQIENI EEDFRDGLKL MLLLEVISGE RLAKPERGKM RVHKISNVNK ALDFIASKGV KLVSIGAEI VDGNVKMTLG MIWTIILRFA IQDISVEETS AKEGLLLWCQ RKTAPYKNVN IQNFHISWKD GLGFCALIHR HRPELIDYGK LRKDDPLTNL NTAFDVAEKY LDIPKMLDAE DIVGTARPDE KAIMTYVSSF YHAF.