



LD Biopharma, Inc.
9924 Mesa Rim Road Suite B
San Diego, CA 92121
Tel: 858-876-8266
<http://www.ldbiopharma.com>

- PRODUCT DATA SHEET -

Name of Product: Recombinant Human NAPA Protein
Catalog Number: hRP-0767
Manufacturer: LD Biopharma, Inc.

Introduction

Human NAPA gene encodes a member of the soluble NSF attachment protein (SNAP) family. SNAP proteins play a critical role in the docking and fusion of vesicles to target membranes as part of the 20S NSF-SNAP-SNARE complex. The encoded protein plays a role in the completion of membrane fusion by mediating the interaction of N-ethylmaleimide-sensitive factor (NSF) with the vesicle-associated and membrane-associated SNAP receptor (SNARE) complex, and stimulating the ATPase activity of NSF.

Full-length human NAPA (295aa, Isoform-1) gene was constructed with 15aa N-terminal T7 tag and expressed in E.coli as inclusion bodies, refolded using our unique “temperature shift inclusion body refolding” technology and chromatographically purified.

Gene Symbol:	NAPA (SNAPA)
Accession Number:	NP_003818
Species:	Human
Size:	50 µg / Vial
Composition:	0.5 mg/ml, sterile-filtered, in 20 mM pH 8.0 Tris-HCl Buffer, with proprietary formulation of NaCl, KCl, EDTA, arginine, DTT and Glycerol.
Storage:	In Liquid. Keep at -80°C for long term storage. Product is stable at 4 °C for at least 30 days.

Key References

Naydenov, N.G., et al., *Loss of soluble N-ethylmaleimide-sensitive factor attachment protein alpha (alphaSNAP) induces epithelial cell apoptosis via down-regulation of Bcl-2 expression and disruption of the Golgi.* J. Biol. Chem. 287 (8), 5928-5941 (2012)



LD Biopharma, Inc.
9924 Mesa Rim Road Suite B
San Diego, CA 92121
Tel: 858-876-8266
<http://www.ldbiopharma.com>

Furuta,N., et al., *Combinational soluble N-ethylmaleimide-sensitive factor attachment protein receptor proteins VAMP8 and Vti1b mediate fusion of antimicrobial and canonical autophagosomes with lysosomes.* Mol. Biol. Cell 21 (6), 1001-1010 (2010)

Andreeva,A.V., et al., *G alpha12 interaction with alphaSNAP induces VE-cadherin localization at endothelial junctions and regulates barrier function.* J. Biol. Chem. 280 (34), 30376-30383 (2005)

Applications

1. May be used for in vitro autophagy / Bcl2 mediated apoptosis regulation study with intracellular protein delivery of this protein.
2. As soluble/native protein, may be used as enzymatic substrate protein for ubiquitin assay.
3. May be used for mapping protein–protein interaction assay.
4. May be used as antigen for specific antibody development and cancer diagnostic development.

Quality Control

1. Purity: > 90% by SDS-PAGE.

Recombinant Protein Sequence

MASMTGGQQMGRGEFDNSGKEAEAMALLAEAERKVKNSQSFFSGLFGGSSKIEEACEIYARAAN
MFKMAKNWSAAGNAFCQAAQLHLQLQSKHDAATCFVDAGNAFKKADPQEA INCLMRAIEIYTDM
GRFTIAAKHHISIAEIIYETELVDIEKAI AHYEQSADYYKGEE SNSSANKCLLKVAGYAALLEQY
QKAIDIYEQVGTNAMDSPLLKYSADYFFKAALCHFCIDMLNAKLAVQKYEELFPAFSDSRECK
LMKLLLEAHEEQNVDSYTESVKEYDSISRLDQWLT TMLLR IKKTIQGDEEDLR