

Product datasheet for **RC226766**

ATXN7L3B (NM_001136262) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Tag: Myc-DDK
Symbol: ATXN7L3B
Synonyms: Inc-SCA7
Mammalian Cell Selection: Neomycin
Vector: pCMV6-Entry (PS100001)
E. coli Selection: Kanamycin (25 ug/mL)

ORF Nucleotide Sequence: >RC226766 representing NM_001136262
Red=Cloning site Blue=ORF Green=Tags(s)

TTTGTGAATACGACTCACTATAGGGCGGCCGGAATTCGTCTGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

ATGGAGGAAATTCGTTGGCCAACTGGATACTAACAAGCTAGAGGCCATCGCTCAGGAGATTTACGTAG
ACCTGATAGAGGATTCTTGTGGGATTCTGCTTTGAGGTGCACCGGCAGTCAAGTGTGGCTACTTCTA
CCTGGAGTTCGAGAGACTGGTAGCGTGAAGGATTTGGCATTAGCCAGTGAAGACAAAGGAGCGTGC
CGCCTCCGCTTTGCTCCCTTCCCGGAGAACCTGGGAATGGCCTGATCAGCAGCTGCAGCGCTCACCTC
CGGAATCCAG

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC226766 representing NM_001136262
Red=Cloning site Green=Tags(s)

MEEISLANLDTNKLEAIAQEIYVDLIEDSLGFCFEVHRAVKCGYFYLEFAETGSVKDFGIQPVEDKGAC
RLPLCSLPGEPGNGPDQQLQRSPPFQ

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/mk8100_e03.zip

Restriction Sites: SgfI-MluI



Cloning Scheme:



ACCN: NM_001136262

ORF Size: 291 bp

OTI Disclaimer: The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. [More info](#)

OTI Annotation: This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components: The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method:

1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

Note: Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.

RefSeq: [NM_001136262.2](#)

RefSeq Size: 3701 bp
RefSeq ORF: 294 bp
Locus ID: 552889

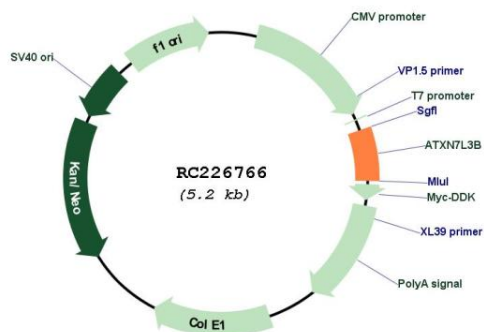
UniProt ID: [Q96GX2](#)

Cytogenetics: 12q21.1

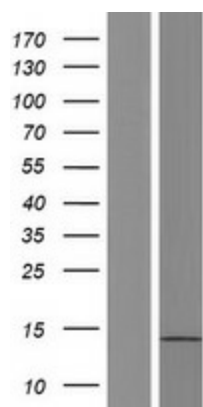
MW: 10.8 kDa

Gene Summary: By binding to ENY2, interferes with the nuclear functions of the deubiquitinase (DUB) module of the SAGA complex which consists of ENY2, ATXN7, ATXN7L3 and the histone deubiquitinating component USP22. Affects USP22 DUB activity toward histones indirectly by changing the subcellular distribution of ENY2 and altering ENY2 availability for ATXN7L3 interaction. Regulates H2B monoubiquitination (H2Bub1) levels through cytoplasmic sequestration of ENY2 resulting in loss of nuclear ENY2-ATXN7L3 association which destabilizes ATXN7L3. Affects protein expression levels of ENY2 and ATXN7L3.[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for RC226766



Western blot validation of overexpression lysate (Cat# [LY427871]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC226766 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).