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Product datasheet for RC240136

ATP7A (NM_001282224) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	ATP7A (NM_001282224) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	ATP7A
Synonyms:	DSMAX; MK; MNK; SMAX3
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin
ORF Nucleotide Sequence:	>RC240136 representing NM_001282224 Red=Cloning site Blue=ORF Green=Tags(s) TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC GCCGCGATCGCC ATGGATCCAAGTATGGGTGTGAATTCTGTTACCATTTCTGTTGAGGGTATGACTTGCAATTCCTGTGTTT GGACCATTGAGCAGCAGATTGGAAAAGTGAATGGTGTGCATCACATTAAGGTATCACTGGAAGAAAAAAA TGCAACTATTATTTATGACCCTAAACTACAGACTCCAAAGACCCTACAGGAAGCTATTGATGACATGGGC TTTGATGCTGTTATCCATAATCCTGACCCTCTCCCTGTTTTAACTGACACCTTGTTTCTGACTGTTACGG CGTCACTGACTTTGCCATGGGACCATATCCAAAGCACATTGCTGAAGACCAAGGGTGTGACAGACATTAA AATTTACCCTCAGAAAAGAACTGTAGCAGTGACAATAATCCCTTCTATAGTGAATGCCAATCAGATAAAA GAGCTGGTTCCAGAACTCAGTTTAGATACTGGGACACTGGAGAAAAAGTCAGGAGCTTGTGAAGATCATA GTATGGCTCAAGCTGGTGAAGTCGTGCTGAAGATGAAAGTGGAAGGGATGACCTGCCATTCATGTACTAG CACTATTGAAGGAAAAATTGGGAAACTGCAAGGTGTTCAGCGAATTAAAGTCTCCCTGGACAATCAAGAA GCTACTATTGTTTATCAACCTCATCTTATCTCAGTAGAGGAAATGAAAAAGCAGATTGAAGCTATGGGCT TTCCAGCATTTGTCAAAAAGCAGCCCAAGTACCTCAAATTGGGAGCTATTGATGTAGAACGTCTAAAGAA CACACCAGTTAAATCCTCAGAAGGGTCACAGCAAAGGAGTCCATCATATACCAATGATTCAACAGCCACT TTCATCATTGATGGCATGCATTGTAAATCATGTGTGTCAAATATTGAAAGTACTTTATCTGCACTCCAAT ATGTAAGCAGCATAGTAGTTTCTTTAGAGAATAGGTCTGCCATTGTGAAGTATAATGCAAGCTCAGTCAC TCCAGAATCCCTGAGAAAAGCAATAGAGGCTGTATCACCGGGGCTATATAGAGTTAGTATCACAAGTGAA GTTGAGAGTACCTCAAACTCTCCCTCCAGCTCATCTCTTCAGAAGATTCCTTTGAATGTAGTTAGCCAGC CTCTGACACAAGAAACTGTGATAAACATTGATGGCATGACTTGTAATTCCTGTGTGCAGTCTATTGAGGG TGTCATATCAAAAAAGCCAGGTGTAAAATCCATACGAGTCTCCCTTGCAAATAGCAATGGGACTGTTGAG TATGATCCTCTACTAACCTCTCCAGAAACGTTGAGAGGAGCAATAGAAGACATGGGATTTGATGCTACCT TGTCAGACACGAATGAGCCGTTGGTAGTAATAGCTCAGCCTTCATCGGAAATGCCGCTTTTGACTTCAAC TAATGAATTTTATACTAAAGGGATGACACCAGTTCAAGACAAGGAGGAAGGAAAGAATTCATCTAAGTGT TACATACAGGTCACTGGCATGACTTGCGCTTCCTGTGTAGCAAACATTGAACGGAATTTAAGGCGGGAAG

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Protein Sequence:

>RC240136 representing NM_001282224
Red=Cloning site Green=Tags(s)

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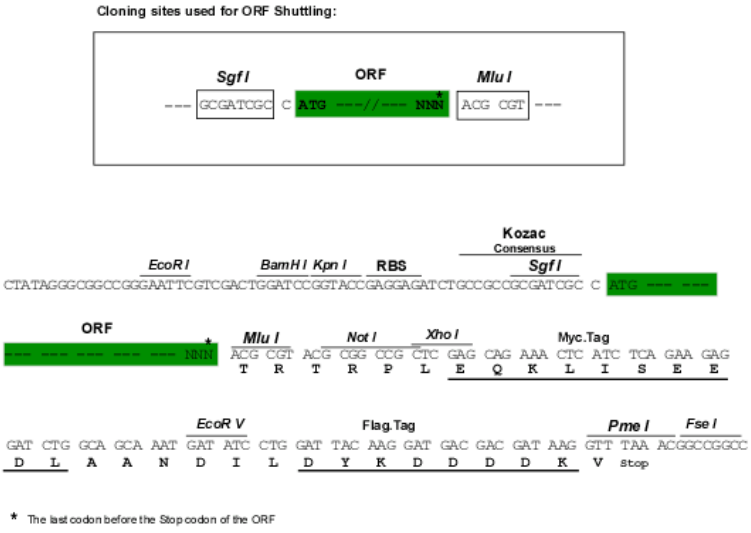
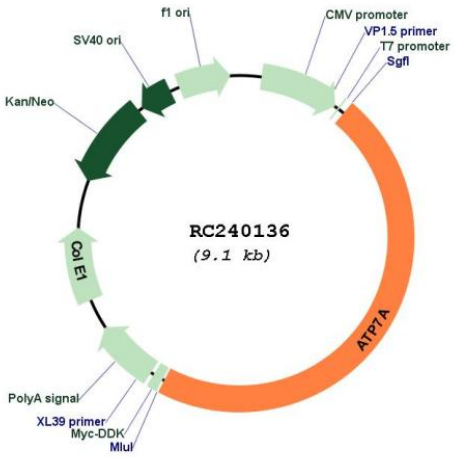
Restriction Sites: SgfI-MluI

Cloning Scheme:



Plasmid Map:



ACCN:	NM_001282224
ORF Size:	4266 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.
RefSeq:	NM_001282224.1, NP_001269153.1
RefSeq Size:	8306 bp
RefSeq ORF:	4269 bp
Locus ID:	538
UniProt ID:	Q04656
Cytogenetics:	Xq21.1
Protein Families:	Druggable Genome, Transmembrane
MW:	154.8 kDa
Gene Summary:	This gene encodes a transmembrane protein that functions in copper transport across membranes. This protein is localized to the trans Golgi network, where it is predicted to supply copper to copper-dependent enzymes in the secretory pathway. It relocalizes to the plasma membrane under conditions of elevated extracellular copper, and functions in the efflux of copper from cells. Mutations in this gene are associated with Menkes disease, X-linked distal spinal muscular atrophy, and occipital horn syndrome. Alternatively-spliced transcript variants have been observed. [provided by RefSeq, Aug 2013]