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Product datasheet for RC206829

TBX3 (NM_016569) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	TBX3 (NM_016569) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	TBX3
Synonyms:	TBX3-ISO; UMS; XHL
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

View online »

ORF Nucleotide Sequence:

>RC206829 ORF sequence
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

ATGAGCCTCTCCATGAGAGATCCGGTCATTCCTGGGACAAGCATGGCCTACCATCCGTTCCTACCTCACC
GGGCGCCGGACTTCGCCATGAGCGCGGTGCTGGGTCACCAGCCGCCGTTCTTCCCCGCGCTGACGCTGCC
TCCCAACGGCGCGGCGGCGCTCTCGCTGCCGGGCGCCCTGGCCAAGCCGATCATGGATCAATTGGTGGGG
GCGGCCGAGACCGGCATCCCGTTCTCCTCCCTGGGGCCCCAGGCGCATCTGAGGCCTTTGAAGACCATGG
AGCCCGAAGAAGAGGTGGAGGACGACCCCAAGGTGCACCTGGAGGCTAAAGAACTTTGGGATCAGTTTCA
CAAGCGGGGCACCGAGATGGTCATTACCAAGTCGGGAAGGCGAATGTTTCCTCCATTTAAAGTGAGATGT
TCTGGGCTGGATAAAAAAGCCAAATACATTTTATTGATGGACATTATAGCTGCTGATGACTGTCGTTATA
AATTTCACAATTCTCGGTGGATGGTGGCTGGTAAGGCCGACCCCGAAATGCCAAAGAGGATGTACATTCA
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AACAACATTTCAGACAAACATGGATTTACTTTGGCCTTCCCAAGTGATCACGCTACGTGGCAGGGGAATT
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CAATGACATCTTGAAACTCCCTTATAGTACATTTCGGACATACTTGTTCCCCGAAACTGAATTCATCGCT
GTGACTGCATACCAGAATGATAAGATAACCCAGTTAAAAATAGACAACAACCCTTTTGCAAAAGGTTTCC
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CAGGCTTCTTCTCCAGCCGCCTCCACTGTAGGGACATCGAACCTCAAAGATTTATGTCCCAGCGAGGGTG
AGAGCGACGCCGAGGCCGAGAGCAAAGAGGAGCATGGCCCCGAGGCCTGCGACGCGGCCAAGATCTCCAC
CACCACGTCGGAGGAGCCCTGCCGTGACAAGGGCAGCCCCGCGGTCAAGGCTCACCTTTTCGCTGCTGAG
CGGCCCCGGGACAGCGGGCGGCTGGACAAAGCGTCGCCCGACTCACGCCATAGCCCCGCCACCATCTCGT
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GGAAGAGGCGCGCGCGCTCCCGGGCAAGGAGGCCTTCGCGCCGCTCACGGTGCAGACGGACGCGGCCGCC
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ACGGGCACCCGCTCTTCCTGCACCCCAGCCAGTTTGCCATGGGGGGCGCCTTCTCCAGCATGGCGGCCGC
TGGCATGGGTCCCCTCCTGGCCACGGTTTCTGGGGCCTCCACCGGTGTCTCGGGCCTGGATTCCACGGCC
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CATGGCCGCAGCGGCGGCCGCCTCCTCTGCGGCAGCCTCCAGCTCGGTGCACCGCCACCCCTTCCTCAAT
CTGAACACCATGCGCCCGCGGCTGCGCTACAGCCCCTACTCCATCCCGGTGCCGGTCCCGGACGGCAGCA
GTCTGCTCACCACCGCCCTGCCCTCCATGGCGGCGGCCGCGGGGCCCCTGGACGGCAAAGTCGCCGCCCT
GGCCGCCAGCCCGGCCTCGGTGGCAGTGGACTCGGGCTCTGAACTCAACAGCCGCTCCTCCACGCTCTCC
TCCAGCTCCATGTCCTTGTCGCCCAAACTCTGCGCGGAGAAAGAGGCGGCCACCAGCGAACTGCAGAGCA
TCCAGCGGTTGGTTAGCGGCTTGGAAGCCAAGCCGGACAGGTCCCGCAGCGCGTCCCCG

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence:

>RC206829 protein sequence
Red=Cloning site Green=Tags(s)

MSLSMRDPVIPGTSMAYHPFLPHRAPDFAMSAVLGHQPPFFPALTLPPNGAAALSLPGALAKPIMDQLVG
AAETGIPFSSLGPQAHLRPLKTMEPEEEVEDDPKVHLEAKELWDQFHKRGTEMVITKSGRRMFPPFKVRC
SGLDKKAKYILLMDIIAADDCRYKFHNSRWMVAGKADPEMPKRMYIHPDSPATGEQWMSKVVTFHKLKLT
NNISDKHGFTLAFPSDHATWQGNYSFGTQTILNSMHKYQPRFHIVRANDILKLPYSTFRTYLFPETEFIA
VTAYQNDKITQLKIDNNPFAKGFRDTGNGRREKRKQLTLQSMRVFDERHKKENGTSDESSSEQAAFNCFA
QASSPAASTVGTSNLKDLCPSEGESDAEAESKEEHGPEACDAAKISTTTSEEPCRDKGSPAVKAHLFAAE
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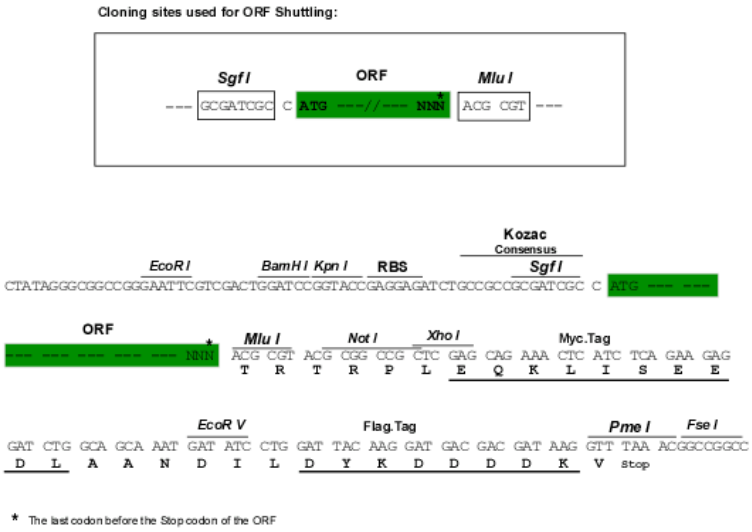
AHLAQGPLPGLGFAPGLAGQQFFNGHPLFLHPSQFAMGGAFSSMAAAGMGPLLATVSGASTGVSGLDSTA
MASAAAAQGLSGASAATLPFHLQQHVLASQGLAMSPFGSLFPYPYTYMAAAAAASSAAASSSVHRHPFLN
LNTMRPRLRYSPYSIPVPVPDGSSLLTTALPSMAAAAGPLDGKVAALAASPASVAVDSGSELNSRSSTLS
SSSMSLSPKLCAEKEAATSELQSIQRLVSGLEAKPDRSRSASP

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/mk6219_c04.zip

Restriction Sites: SgfI-MluI

Cloning Scheme:



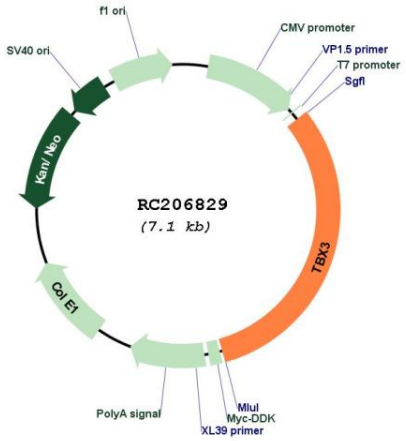
ACCN: NM_016569

ORF Size: 2229 bp

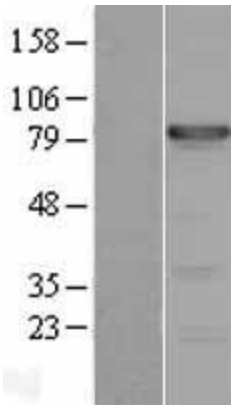
OTI Disclaimer:	Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery. 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_016569.4
RefSeq Size:	4814 bp
RefSeq ORF:	2232 bp
Locus ID:	6926
UniProt ID:	O15119
Cytogenetics:	12q24.21
Domains:	T-box
Protein Families:	Druggable Genome, Transcription Factors
MW:	79.4 kDa

Gene Summary: This gene is a member of a phylogenetically conserved family of genes that share a common DNA-binding domain, the T-box. T-box genes encode transcription factors involved in the regulation of developmental processes. This protein is a transcriptional repressor and is thought to play a role in the anterior/posterior axis of the tetrapod forelimb. Mutations in this gene cause ulnar-mammary syndrome, affecting limb, apocrine gland, tooth, hair, and genital development. Alternative splicing of this gene results in three transcript variants encoding different isoforms; however, the full length nature of one variant has not been determined. [provided by RefSeq, Jul 2008]

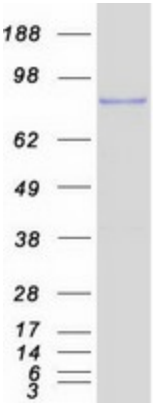
Product images:



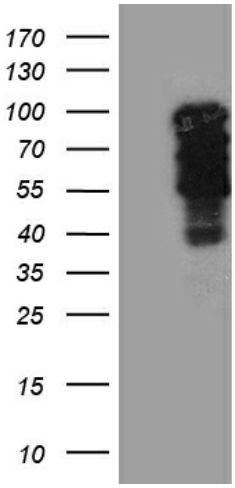
Circular map for RC206829



Western blot validation of overexpression lysate (Cat# [LY413892]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC206829 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified TBX3 protein (Cat# [TP306829]). The protein was produced from HEK293T cells transfected with TBX3 cDNA clone (Cat# RC206829) using MegaTran 2.0 (Cat# [TT210002]).



HEK293T cells were transfected with the pCMV6-ENTRY control (Cat# [PS100001], Left lane) or pCMV6-ENTRY TBX3 (Cat# RC206829, Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-TBX3(Cat# [TA811202]). Positive lysates [LY413892] (100ug) and [LC413892] (20ug) can be purchased separately from OriGene.