

Product datasheet for **SC310310**

ATF2 (NM_001880) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	ATF2 (NM_001880) Human Untagged Clone
Tag:	Tag Free
Symbol:	ATF2
Synonyms:	CRE-BP1; CREB-2; CREB2; HB16; TREB7
Mammalian Cell Selection:	None
Vector:	<u>pCMV6-XL4</u>
E. coli Selection:	Ampicillin (100 ug/mL)

Fully Sequenced ORF: >OriGene ORF sequence for NM_001880 edited
 ATGAAATTCAAGTTACATGTGAATCTGCCAGGCAATACAAGGACCTGTGGAATATGAGT
 GATGACAAACCCCTTTCTATGTAAGTCTGCGCCTGGATGTGGCCAGCGTTTTACCAACGAGGAT
 CATTTGGCTGTCCATAAACATAAACATGAGATGACACTGAAATTTGGTCCAGCAGTAAT
 GACAGTGTCAATTGTGGCTGATCAGACCCCAACCAACAAGATTCTTGAAAACTGTGAA
 GAAGTGGGTTTGTAAATGAGTTGGCGAGTCCATTTGAGAATGAATCAAGAAAGCTTCA
 GAAGATGACATTAATAAATGCCTCTAGATTTATCCCCTCTTGCAACACCTATCATAAGA
 AGCAAAATTGAGGAGCCTTCTGTTGTAGAAACAACTCACCAGGATAGTCCTTTACCTCAC
 CCAGAGTCTACTACCAGTGTGAGAAGGAAGTACCATTGGCACAACCTGCACAGCCACA
 TCAGCTATTGTTCTCCAGCATCATTACAGGTTCCCAATGTGCTGCTTACAAGTTCTGAC
 TCAAGTGAATTATTCAGCAGGCAGTACCTTCACCAACCTCAAGTACTGTAATCACCCAG
 GCACCATCCTCTAACAGGCCAATTGTCCCTGTACCAGGCCATTTCTCTTCTGTTACAT
 CTTCTAATGGACAAACCATGCCTGTTGCTATTCTGCATCAATTACAAGTTCTAATGTG
 CATGTTCCAGCTGCAGTCCCCTCGTTCCGACCAGTACCATTGGTCCCTAGTGTCCAGGA
 ATCCCAGGTCCTTCTCTCCCAACCAAGTACAGTACAGAAAGCAAAATGAGATTAAGGCT
 GCTTTGACCCAGCAACATCCTCCAGTTACCAATGGTGATACTGTCAAAGGTCATGGTAGC
 GGATTGGTTAGGACTCAGTCAGAGGAATCTCGACCGCAGTCATTACAACAGCCAGCCACA
 TCCACTACAGAACTCCGGCTTCTCCAGCTCACACAACCTCACAGACCCAAAGTACAAGT
 GGTTCGTCGAGAGAGCAGCTAACGAAGATCCTGATGAAAAAGGAGAAAGTTTTAGAG
 CGAAATAGAGCAGCAGCTTCAAGATGCCGACAAAAAGGAAAGTCTGGGTTCAAGTCTTTA
 GAGAAGAAAGCTGAAGACTTGAGTTCATTAATGGTCAGTGCAGAGTGAAGTACCCTG
 CTGAGAAATGAAGTGGCAGAGCTGAAACAGCTTCTTCTGGCTCATAAAGATTGCCCTGTA
 ACCGCCATGCAGAAGAAATCTGGCTATCATACTGCTGATAAAGATGATAGTTCAGAAGAC
 ATTTCAAGTCCGAGTAGTCCACATACAGAAGCTATACAGCATAGTTCGGTCAGCACATCC
 AATGGAGTCAGTTCAACCTCCAAGGCAGAAGCTGTAGCCACTTCAGTCTCACCCAGATG
 GCGGACCAGAGTACAGAGCCTGCTTTTACAGATCGTTATGGCTCCTTCTCCAGTCA
 CAGCCCTCAGGAAGTTGA



[View online »](#)

5' Read Nucleotide Sequence:	<p>>OriGene 5' read for NM_001880 unedited GAATTCGGCACGAGGCGGAAGCCTGTGGGAGCCCCTGGCCTTTAAGTGCCGTTACGACCTT TTCCTCCAGGGGTGCTTTGTAAACACGGCTGTGCTCAGGGCTCGCGGGTGACCGAAAGGA TCATGAACTAGTGACCTGGAAAGGGTACTAGATGGAACTTGAGAAAGGACTGCTTATTG ATAACAGCTAAGGTATTCCTGGAAGCAGAGTAAATAAAGCTCATGGCCCACCAGCTAGAA AGTATTTCTGCCATGAGAAAAAGAATGTGATAAGTTATTCAACTATGAAATCAAGTTA CATGTGAATTCGCCAGGCAATACAAGGACCTGTGGAATATGAGTGATGACAAACCCTTT CTATGTACTGCGCCTGGATGTGGCCAGCGTTTTACCAACGAGGATCATTTGGCTGTCCAT AAACATAAACATGAGATGACACTGAAATTTGGTCCAGCACGTAATGACAGTGTCATTGTG GCTGATCAGACCCCAACCAACAAGATTCTTGAAAACTGTGAAGAAGTGGGTTTGT AATGAGTTGGCGAGTCCATTTGAGAATGAATCAAGAAAGCTTCAGAAGATGACATTAA AAAATGCCTCTAGATTTATCCCCTTTGCAACACCTATCATAAGAAGCAAAATGAAGAG CCTTCTGTTGTAGAAACAACTACCAGGATAGTCTTTACCTCACCCAGAGTCTACTACC AGTGATGAGAAGGAAGTACCATTGGCACANACTGCACAGCCACATCAGCTATTGGTCGT CCAGCATATTACAGTTCCCAATGTGCTGCTTACAAGNTCTGACTCAANGTGTATATTC AGCAGGCAGTACCTTCAACCTCAGTACTGTATCACCCNAGCACATNNTCTACAGNCA AATGTN</p>
3' Read Nucleotide Sequence:	<p>>Forward primer walk for NM_001880 unedited TCGGAGAGAGCAGCTAACCGAAGATCCTGATGAAAAAGGAGAAAGCCTTTAGAGCGAAA TAGAGCAGCCAGCCCTCAAGACGCCGACAAAAAGGAAAGCTCTGGGTCTCAGTTCTCT TAGAGAAGAAAGTGAAGACTTGAGTCTCATTAAATGGTCAGCTGCAGAGTGAAGTACC CTGCTGAGAAATGAAGTGGCACAGCTGAAACAGCTTCTTCTGGCTCATAAAGATTGCCCT GTAACCGCATGCAGAAGAAATCTGGCTATCATCTGCTGATAAAGATGATAGTTCAGAA GACATTTCAAGTCCGAGTAGTCCACATACAGAAGCTATACAGCATAGTTCGGTCAGCACA TCCAATGGAGTCAGTTCAACCTCCAAGGCAGAAGCTGTAGCCACTTCAGTCTCACCCAG ATGGCGGACCAGAGTACAGAGCCTGCTCTTTCACAGATCGTTATGGCTCCTTCTCCCAG TCACAGCCCTCAGGAAGTTGATTAACCACTGCAGTACAACAGTTTTAGATACTCATTAG TGACTTCAAAGGGAAATCAAGGAAAGACCAGTTTCCATTTATGCGAAATCTGTGGTTGTA AATTTTTTTTTTTTACTTGAATTTAATTTGGCTCTAAAGTTTGTGTAGCAGCAGTTGA TCAGACTGAAAAACGGTTTTTGTGCTCTGAAAAAGACTGATTTTGTCTTTTTTTTTTAAT TATTAATTTTTTATTTTTCTGTGCTCAATGTGTTAATTTTTTATATTTTCTTTGTGA TTTTTTTTACTTTAATTTGCTTGTGTTTTATAATGGNGGTGTTTCTGATTCTTTT CTTCCCCTTCTCT</p>
Restriction Sites:	NotI-NotI
ACCN:	NM_001880
Insert Size:	2000 bp
OTI Disclaimer:	Our molecular clone sequence data has been matched to the reference identifier above as a point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative RNA splicing form or single nucleotide polymorphism (SNP).
OTI Annotation:	The open reading frame of this TrueClone was fully sequenced and found to be a perfect match to the protein associated to this reference.
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_001880.2](#), [NP_001871.2](#)

RefSeq Size: 2117 bp

RefSeq ORF: 1518 bp

Locus ID: 1386

UniProt ID: [P15336](#)

Cytogenetics: 2q31.1

Domains: BRLZ, zf-C2H2

Protein Families: Druggable Genome, Transcription Factors

Protein Pathways: MAPK signaling pathway

Gene Summary: This gene encodes a transcription factor that is a member of the leucine zipper family of DNA binding proteins. The encoded protein has been identified as a moonlighting protein based on its ability to perform mechanistically distinct functions. This protein binds to the cAMP-responsive element (CRE), an octameric palindrome. It forms a homodimer or a heterodimer with c-Jun and stimulates CRE-dependent transcription. This protein is also a histone acetyltransferase (HAT) that specifically acetylates histones H2B and H4 in vitro; thus it may represent a class of sequence-specific factors that activate transcription by direct effects on chromatin components. The encoded protein may also be involved in cell's DNA damage response independent of its role in transcriptional regulation. Several alternatively spliced transcript variants have been found for this gene [provided by RefSeq, Jan 2014].
Transcript Variant: This variant (1) encodes the longest isoform (1). Variants 1 and 2 encode the same isoform.