

## Product datasheet for **RC224774**

### MACC1 (NM\_182762) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	MACC1 (NM_182762) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	MACC1
Synonyms:	7A5; SH3BP4L
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)



[View online »](#)

**ORF Nucleotide  
Sequence:**

>RC224774 representing NM\_182762  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGCATCGCC**

ATGCTAATCACTGAAAGAAAACATTTTCGGTCAAGAAATTGCACAAAGTATGTCTGAAGCAAATTTGA  
 TTGACATGGAAGCTGGAAAACCTCTCAAAAAGTTGCAATATTACAGAATGCCAGGACCCAGACTTGCTTCA  
 CAATTGGCCGGATGCTTTCCACCCTTCGTGGTAATAATGCTTCCAAAAGTTGCAAAATCCATTCTGGAATCAA  
 CTGTCTGCTTCTAACCCATTTTTGGATGACATAACTCAACTAAGAAAATACAGGAAGAGAAAATAATATTT  
 CCATCTTAAAGGAAGATCCTTTTCTTTCTGTAGAGAAAATAGAAAATGGAAATCTTTTGATTCTCCGG  
 TGATGAACTTGATGTGCATCAGTTACTTAGGCAGACTTCTCAAGAAATCTGGAAGATCTAAAAGTGT  
 TCAGAATCTGGACATTTAGACGACACAGCACATGCCATCAGAGTACATAACTCTGACCAGATCC  
 TACTACACGACTTAGAGTGGCTTAAAAATGATCGGGAGGCTTATAAAATGGCTTGGTTAAGTCAACGCCA  
 GCTGGCCCGCTCCTGCCTTGATTGAATACAATTAGTCAGAGCCCTGGATGGGCCAGACACAATTGCG  
 GAGGTCACCATAGCTTGCAAAGTAAACCATCAAGGAGGGTCAGTACAATTACCTGAATCAGACATCACTG  
 TTCATGTGCCCAAGGTATGTGGCTGTGGGAGAATCCAAGAGGTGTCTCTAAGGGCTTTCCTTGATCC  
 GCCACACATGCTTAACCATGATCTTTCGTGCACTGTGAGCCCGTTGTTGGAAATCATGTTAGGCAACCTC  
 AATACAATGGAAGCCCTTTTGTGGAGATGAAAATGGGGCTGAAGTAAAGAAAGGATCCTTTAGCCAAG  
 TCATGACAGAAATGGTGTGTTTACACAGCTTGGGTAAAGAAGGCCCTTTTAAAGTTTTAAGCAACTGCTA  
 CATTTATAAAGACACCATCCAAGTCAAGCTAATCGACTGAGTCAGGTAATGTATCTAGTGGTTGCTGCA  
 CAAGCTAAAGCTTCCGTCACCACTGCCACCATTTGGGATTATCCACAAAACCACTCAATTTGGAA  
 TTTATGGACCCAAATATATCCATCCCAGTTTTACTGTTGTTTTAACAGTTTGTGGACACAATTATATGCC  
 AGGACAGCTTACAATTTCTGATATTAAGAAGGGTGGAAAAACATATCTCCAGTTGTGTTTCAGCTCTGG  
 GGAAGCAGTCATTTTTACTTGACAAGCCACAAGATTTAAGTATTTCTATTTTTCTGTGATCCTGATT  
 TTGAAGTAAAGACAGAAGGAGAAAAGAAAATTAACAAAAGCAGTTGGAAGCAGGTGAAGTAGTTCA  
 TCAACAATTTTTATTTCTTTAGTTGAGCACAGAGAGATGCACTTGTGTTGTTTTGTTCAAGTGGAG  
 CCTCCCAATGGTGAACCAGTTGCACAGTTCTCTATCACTACTCCTGATCCAACCCCAAACCTAAAAAGAC  
 TCTCGAATCTGCCAGGCTATTTGCAGAAGAAGGAGGAAAATCAAGTCTGCTCCTTATCACAAAAATTTCT  
 TGTTAAATATCCTACATTTCAAGATAAAACATTGAACTTTAGCAACTATGGGGTAACCCTGAAGGCAGTG  
 CTAAGACAAAAGCAAGATTGATTACTTCTTGAATATTTCAAAGGGGACACAATAGCTCTCCTCGGGGAAG  
 GTAAGGTAAGGCTATTGGTCAGTCCAAAGTGAAGAATGGTATGTAGGAGTCTCAGAGGTAAGATTGG  
 ACTTGTACACTGCAAAAATGTCAAGGTGATTTCAAAGGAGCAAGTAAATGTTTATGTCAGATAGTGTCTTT  
 ACAACCAGAAATCTTCTTGAACAGATTGTCTGCCTTTAAAAAATTTGACTTATATCTACTCAGTTGAT  
 TAACCTTGGTGTGAGAAAAGTTTATGATTGGAAGTTTTAGCTGATGTCTGGGTTACTCACATCTGTC  
 CCTGGAAGATTTTGATCAAAATCAAGCAGACAAAGAATCAGAGAAAAGTTTCTTATGTTATAAAGAAGTTA  
 AAGGAAGATTGCCACACAGAGAGAAAATACAAGGAAGTTTCTGTATGAACTATTGTGGCTCTTCTGAAAA  
 TGGATTGCCAAGAGTTAGTCGCACGTCTCATCAAGAAGCTGCTGTTCTGACTTCAGCTGCAAGCTTGG  
 AAAAGGCTGGAGGAACTAGCTGAAAAGTTAGTACGACTCACAAAGCAACAAATGGAGGCATATGAAAT  
 CCTCATCGAGGAAACACTGGAGATGTTGCTGTTGAGATGATGTGGAACCTGCCTATGATTTTCTGTATA  
 CCTGGAGTGCTCACTATGGAATAACTACAGAGATGTGTTACAAGACCTTCAGTCAGCTTTGGACAGAAT  
 GAAAAACCTGTGACTAAACACTGGAGAGAATTAAGTGGAGTTTTAATACTAGTAAATCTTTGGAGGTT  
 TTGAGAGTAACTGCATTCTCCACTTCTGAGGAAGTA

**ACGCGT**ACGCGGCCGCTCGAGCAGAAAACATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
 ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC224774 representing NM\_182762  
 Red=Cloning site Green=Tags(s)

MLITERKHFRSGRIAQSMSEANLIDMEAGKLSKSCNITECQDPDLLHNWPAFTLRGNNASKVANPFWNQ  
 LSASNPFLLDDITQLRNNRKRNNISILKEDPFLFCREIENGNSFDSSGDELVDVHQLLRQTSRNSGRSKSV  
 SELLDILDDTAHAHQSIHNSDQILLHDLEWLKNDREAYKMAWLSQRQLARSCLDLNTISQSPGWAQTQLA  
 EVTIACKVNHQGGSVQLPESDITVHVPPQGHVAVGEGFQEVSLRAFLDPPHMLNHDLSCTVSPILLEIMLGNL  
 NTMEALLLEMKIGAEVRKDPFSQVMTMCLHSLGKEGPFKVLNVCYIYKDTIQVKLIDLQVMYLVVAA  
 QAKALPSPAATIWDYIHKTTISIGIYGPKYIHPSTVVLTVCGHNYMPGQLTISDIKGGKNI SPVVFQLW  
 GKQSFLLDKPQDLSISIFSCDPDFEVKTEGERKEIKQKLEAGEVVHQQFLFSLVEHREMHLD FDFCVQVE  
 PPNGEPAQFSITTPDPTPNLKRSLNLPGYLQKKEEIKSAPLSPKILVKYPTFDKTLNFSNYGVTLKAV  
 LRQSKIDYFLEYFKGDTIALLGEGKVKAI GQSKVKEWYVGVLRGKIGLVHCKNVKVISKEQVMFMSDSVF  
 TTRNLLQIVLPLKCLTYIYSVVLTLVSEKVVYDWKVLADVLGYSHLSLEDFDQIQADKESEKVSYVIKLL  
 KEDCHTERNTRKFLYELIVALLKMDQELVARLIQEAAVLTSAVKLGKGWRELAEKLVRLLTKQQMEAYE  
 IPHRGNTGDVAVEMMKPAYDFLYTWSAHYGNNYRDVLDLQDLSALDRMKNPVTKHWRELTVGLILVNSLEV  
 LRVTAFTSTSEEV

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: [https://cdn.origene.com/chromatograms/mg3718\\_g09.zip](https://cdn.origene.com/chromatograms/mg3718_g09.zip)

Restriction Sites: SgfI-MluI

Cloning Scheme:

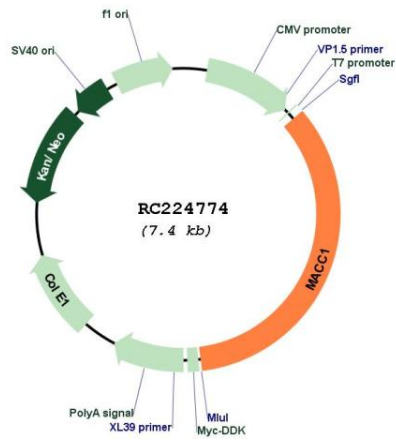
Cloning sites used for ORF Shuttling:



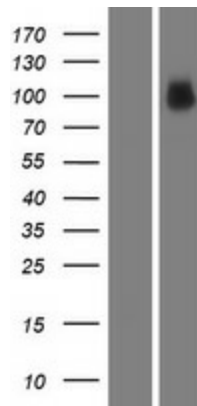
\* The last codon before the Stop codon of the ORF

<b>ACCN:</b>	NM_182762
<b>ORF Size:</b>	2556 bp
<b>OTI Disclaimer:</b>	<p>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 <a href="mailto:custsupport@origene.com">custsupport@origene.com</a> or by calling 301.340.3188 option 3 for pricing and delivery.</p> <p>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. <a href="#">More info</a></p>
<b>OTI Annotation:</b>	This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.
<b>Components:</b>	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).
<b>Reconstitution Method:</b>	<ol style="list-style-type: none"> <li>1. Centrifuge at 5,000xg for 5min.</li> <li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li> <li>3. Close the tube and incubate for 10 minutes at room temperature.</li> <li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li> <li>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.</li> </ol>
<b>RefSeq:</b>	<a href="#">NM_182762.4</a>
<b>RefSeq Size:</b>	3188 bp
<b>RefSeq ORF:</b>	2559 bp
<b>Locus ID:</b>	346389
<b>UniProt ID:</b>	<a href="#">Q6ZN28</a>
<b>Cytogenetics:</b>	7p21.1
<b>MW:</b>	96.5 kDa
<b>Gene Summary:</b>	<p>MACC1 is a key regulator of the hepatocyte growth factor (HGF; MIM 142409)-HGF receptor (HGFR, or MET; MIM 164860) pathway, which is involved in cellular growth, epithelial-mesenchymal transition, angiogenesis, cell motility, invasiveness, and metastasis. Expression of MACC1 in colon cancer (MIM 114500) specimens is an independent prognostic indicator for metastasis formation and metastasis-free survival (Stein et al., 2009 [PubMed 19098908]). [supplied by OMIM, Mar 2009]</p>

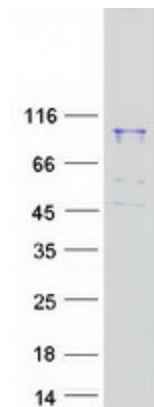
Product images:



Circular map for RC224774



Western blot validation of overexpression lysate (Cat# [LY405333]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC224774 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified MACC1 protein (Cat# [TP324774]). The protein was produced from HEK293T cells transfected with MACC1 cDNA clone (Cat# RC224774) using MegaTran 2.0 (Cat# [TT210002]).