

## Product datasheet for SC112556

### CDC25B (NM\_021872) Human Untagged Clone

#### Product data:

**Product Type:** Expression Plasmids  
**Product Name:** CDC25B (NM\_021872) Human Untagged Clone  
**Tag:** Tag Free  
**Symbol:** CDC25B  
**Vector:** pCMV6-XL5  
**E. coli Selection:** Ampicillin (100 ug/mL)  
**Cell Selection:** None  
**Fully Sequenced ORF:** >OriGene sequence for NM\_021872 edited

```
GAATTCGGCACGAGGCTCTCCTCCCTCGCGCCTGGCCCTGTGGCTCTTCCTCCCTCCCTC
CTTCCCCCCCCCCCCACCCCTCGCCCGTGCTCCCTCGGCCAGCCAGCTGTGCCGGCG
TTTGTGGCTGCCCTGCGCCCGGCCCTCCAGCCAGCCTTCTGCCGGCCCCGCCGCGATGG
AGGTGCCCCAGCCGGAGCCCGGCCAGGCTCGGCTCTCAGTCCAGCAGGCGTGTGCCGGT
GCGCCAGCGTCCGGGCCACCTCCCGGGCTCCTGCTGGGATCTCATGGCCTCCTGGGGT
CCCCGGTGCGGGGCGGCCCTTCTCGCCGGTACCACCCTACCCAGACCATGCACGACC
TCGCCGGCTCGGCAGCGAAACCCAAAGAGTCAGGTAGGGACCCTGCTTCCCGAGCC
GCAGCCGCTGAGCACCTATCCCTGTCTCGACGGGCATCCGAATCCTCCCTGTCGTCTG
AATCCTCCGAATCTTCTGATGCAGGTCTCTGCATGGATTCCCCCAGCCCTATGGACCCC
ACATGGCGGAGCAGACGTTTGAACAGGCCATCCAGGCAGCCAGCCGGATCATTGAAACG
AGCAGTTTGCCATCAGACGCTTCCAGTCTATGCCGGTGAGGCTGTGGGCCACAGCCCCG
TGCTTCGGAACATCACCAACTCCAGGCCCGGACGGCCGGAGGAAGAGCGAGGCCGGCA
GTGGAGCTGCCAGCAGCTCTGGGAAGACAAGGAGAATGATGGATTTGTCTTCAAGATGC
CATGGAAGCCACACATCCAGCTCCACCCATGCTCTGGCAGAGTGGCCAGCCGAGGG
AAGCCTTTGCCAGAGACCCAGCTCGGCCCGGACCTGATGTGTCTCAGTCTGACCGGA
AGATGGAAGTGGAGGAGCTCAGCCCCCTGGCCCTAGGTCGTTCTCTGACCCCTGCAG
AGGGGGATACTGAGGAAGATGATGGATTTGTGGACATCCTAGAGAGTGACTTAAAGGATG
ATGATGCAGTTCCCCCAGGCATGGAGAGTCTCATTAGTGGCCCACTGGTCAAGACCTTGG
AAAAGGAAGAGGAAAAGGACCTCGTCATGTACAGCAAGTGCCAGCGGCTCTTCCGCTCTC
CGTCCATGCCCTGCAGCGTGATCCGGCCATCCTCAAGAGGCTGGAGCGGCCCCAGGACA
GGGACACGCCCGTGCAGAATAAGCGGAGGCGGAGCGTGACCCCTCCTGAGGAGCAGCAGG
AGGCTGAGGAACCTAAAGCCCGCTCCTCCGCTCAAAATCACTGTGTACAGATGATCG
AGAACCTCCTGGACAGTGACCACCGAGAGCTGATTGGAGATTACTTAAGGCCTTCTCC
TACAGACAGTAGACGAAAGCACCAAGACCTCAAGTACATCTCACCAGAAACGATGGTGG
CCCTATTGACGGCAAGTTCAGCAACATCGTGGATAAGTTTGTGATTGTAGACTGCAGAT
ACCCCTATGAATATGAAGCGGGCACATCAAGACTGCGGTGAACTTGCCCTGGAACCGG
ACGCCGAGAGCTTCTACTGAAGAGCCCCATCGCGCCCTGTAGCCTGGACAAGAGAGTCA
TCCTCATTTTCCACTGTGAATTCTCATCTGAGCGTGGGCCCGCATGTGCCGTTTCATCA
GGGAACGAGACCGTGCTCAACGACTACCCAGCCTCTACTACCCTGAGATGTATATCC
```



[View online >](#)

TGAAAGGCGGCTACAAGGAGTTCTCCCTCAGCACCCGAACCTTCTGTGAACCCAGGACT  
 ACCGGCCCATGAACCACGAGGCCTTCAAGGATGAGCTAAAGACCTTCCGCCTCAAGACTC  
 GCAGCTGGGCTGGGGAGCGGAGCCGGCGGGAGCTCTGTAGCCGGCTGCAGGACCAGTGAG  
 GGGCTGCGCCAGTCTGCTACCTCCCTTGCCCTTCGAGGCCTGAAGCCAGCTGCCCTAT  
 GGGCTGCCGGCTGAGGGCCTGCTGGAGGCCTCAGGTGCTGTCCATGGGAAAGATGGTG  
 TGGGTGTCCTGCCTGTCTGCCCCAGCCAGATCCCCTGTGTATCCCATCATTTTCCAT  
 ATCTGTGCCCCCCCCACCCTGGAAGAGCCAGTCTGTTGAGTTAGTTAAGTTGGGTTAA  
 TACCAGCTTAAAGGCAGTATTTTGTGCTCCAGGAGCTTCTTGTTCCTTGTAGGGTT  
 AACCTTCATCTTCTGTGCTGCTGAAACGCTCCTTTGTGTGTGTGTCAGCTGAGGCTGGG  
 GGAGAGCCGTGGTCCCTGAGGATGGGTCAGAGCTAAACTCCTTCCCTGGCCTGAGAGTCAG  
 CTCTCTGCCCTGTGACTTCCCGGGCCAGGGCTGCCCTAATCTCTGTAGGAACCGTGGT  
 ATGTCTGCCATGTTGCCCTTTCTTTTTCCCTTTTCTGTCCCACCATACGAGCACCTC  
 CAGCCTGAACAGAAGCTTACTCTTTCCCTATTTCAAGTGTACCTGTGTGCTTGGTCTGT  
 TTGACTTTACGCCATCTCAGGACACTTCCGTAGACTGTTTAGGTTCCCCTGTCAAATAT  
 CAGTTACCCACTCGGTCCAGTTTTGTTGCCCCAGAAAGGGATGTTATTATCCTTGGGGG  
 CTTCCAGGGCAAGGGTTAAGGCCTGAATCATGAGCCTGCTGGAAGCCAGCCCCTACTGC  
 TGTGAACCTGGGGCCTGACTGCTCAGAACTTGCTGCTGTCTTGTGCGGATGGATGGAA  
 GGTGGATGGATGGGTTGGATGGCCGTGGATGGCCGTGGATGCGCAGTGCCTTGCATACCC  
 AAACCAGGTGGGAGCGTTTTTGTGAGCATGACAGCCTGCAGCAGGAATATATGTGTGCCCT  
 ATTTGTGTGGACAAAAATATTTACACTTAGGGTTTGGAGCTATTAAGAGGAAATGTCAC  
 AGAAGCAGCTAAACCAAGGACTGAGCACCTCTGGATTCTGAATCTCAAGATGGGGGCGAG  
 GGCTGTGCTTGAAGGCCCTGTGAGTCATCTGTTAGGGCCTTGGTTCAATAAAGCACTGA  
 GCAAGTTGAGAAACCAAAAAAAAAAAAAAAAAAACTCGAC

**5' Read Nucleotide  
 Sequence:**

>OriGene 5' read for NM\_021872 unedited  
 GGTTCAAATTTTNTAATACGACTCACTATAGGGCGGCCGGAATTCGCACGAGGCTCTC  
 CTCCCTCGCGCCTGGCCCTGTGGCTCTTCTCCCTCCCTCCTTCCCCCCCCCCCCACCC  
 TCGCCCGCTGCCTCCCTCGGCCAGCCAGCTGTGCCGGCGTTTGTGGCTGCCCTGCGCC  
 CGGCCCTCCAGCCAGCCTTCTGCCGGCCCCGCCGATGGAGGTGCCCCAGCCGGAGCCC  
 GCGCCAGGCTCGGCTCTCAGTCCAGCAGCGGTGTGCGGTGGCGCCAGCGTCCGGGCCAC  
 CTCCCGGGCCTCCTGCTGGGATCTCATGGCCTCCTGGGGTCCCGGTGCGGGCGGCCGCT  
 TCCTCGCCGCTCACCCCTCACCCAGACCATGCACGACCTCGCCGGGCTCGGCAGCGAA  
 ACCCCAAAGAGTCAGGTAGGGACCTGCTCTTCCGAGCCGAGCCGCTGACGCACCTA  
 TCCCTGTCTGACGGGCATCCGAATCCTCCCTGTGCTGTAATCCTCCGAATCTTCTGAT  
 GCAGGTCTCTGCATGGATTCCCCAGCCCTATGGACCCACATGGCGGAGCAGACGTTT  
 GAACAGGCCATCCAGGCAGCCAGCCGATCATTGAAACGAGCAGTTTGCATCAGACGC  
 TTCCAGTCTATGCCGGTGAAGGCTGCTGTGCCACAGCCCCGTGCTTCGGACATACCAACT  
 CCCAGCGCCCCGAGCCGGAGGAGCGAAGCGGGCAGTGTAGCTGCCAACAGCTCTGGG  
 GGAAGACAAGAAGATGATGGATTTGGTCTTCAAGAGCCATGGNAGNCCACACATTCCACT  
 CCACCCATGCTCTGCCAAAGTGGCCACCCGAGGGAGCCTTTGCCAGAGACCAGCTCGC  
 CCCCAGCTGATGTGCTAGTCC

<b>3' Read Nucleotide Sequence:</b>	>OriGene 3' read for NM_021872 unedited CGCTTTTAGTATCGAGTTTTTTTTTTTTTTTTTTTTGGTTCTCTCAACTTGTCTCAGTGGCT TTATTTGAACCAAGGGCCCTAACAGATGACTCAGCAGGGCCTTCAAGCACAGCCCTGCC CCATCTTGAGATTCAGAAATCCAGAGGGTGCTCAGTCCTTGGTTAACTGCTTCTGTGACA TTTCTCTTGAATAGCTCCAAACCCTAAGTGTAATATTTTTGTCCACACAAATAGGCAC ACATATATTCTGCTGCAGGCTGCATGCTCAACAAAACGCTCCCACCTGGTTTGGGTAT GCAAGGCACTGCGCATCCACGGGCATCCACGGGCATCCACCCATCCATCCAACCTTCCAT CCATCCGCAACAAGACAGCAGCAAGTTCTGAGCAGTCAGGCCCCAGGGTTCACAGCAGTA GGGGCTGGGCTTCCAGCAAGCTCATGATTCAAGCCTTAACCCCTTGCCCTGGGAGCCCCCA AGGATAATAACATCCCTTTCTGGGGCAACAAAACCTGGGACCGAGTGGGTAAGTATATTT GACAGGGGAACCTAAACAGTCTACGGAAGTGTCTGAGATGGGCGTAAAGTCAAACAGAC CAAGCACACAGGTAACACTGAAATANGAAAGAGTAAGAGCTTCTGTTCAAGCTGGAGGTG CTCGTATGGTGGGACAGGAAAGGGGAATAGAGAAGGGGGCACATGGCAGACATACACCGT TCCTACAAAGATAGGGGCAGCCCTGGCCCGGAAGTCACAGGGCAGGAGCTGACCTCAGCC AGAATGAGTTAGCTCTGACCATCCTAAGGACACCGGTTTTCCCAGCTCACTGAACAACAC AAGGACGTTTAGACCAGAAAATAAGGTTAACCTACAGGAACAGAGCTCTGAGAACAATCC GCCTTAACTGGTTACCCACTATCACTAAAAACTGCTTTCAGGGTGGGGCCCGTATTGAAT GTGGTGACAGGG
<b>Restriction Sites:</b>	NotI-NotI
<b>ACCN:</b>	NM_021872
<b>Insert Size:</b>	3120 bp
<b>OTI Disclaimer:</b>	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).
<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_021872.2</a> , <a href="#">NP_068658.1</a>
<b>RefSeq Size:</b>	3578 bp
<b>RefSeq ORF:</b>	1620 bp
<b>Locus ID:</b>	994
<b>UniProt ID:</b>	<a href="#">P30305</a>
<b>Cytogenetics:</b>	20p13
<b>Domains:</b>	RHOD

<b>Protein Families:</b>	Druggable Genome, Phosphatase
<b>Protein Pathways:</b>	Cell cycle, MAPK signaling pathway, Progesterone-mediated oocyte maturation
<b>Gene Summary:</b>	<p>CDC25B is a member of the CDC25 family of phosphatases. CDC25B activates the cyclin dependent kinase CDC2 by removing two phosphate groups and it is required for entry into mitosis. CDC25B shuttles between the nucleus and the cytoplasm due to nuclear localization and nuclear export signals. The protein is nuclear in the M and G1 phases of the cell cycle and moves to the cytoplasm during S and G2. CDC25B has oncogenic properties, although its role in tumor formation has not been determined. Multiple transcript variants for this gene exist. [provided by RefSeq, Jul 2008]</p> <p>Transcript Variant: This variant (3), also known as CDC25B2, lacks an alternate in-frame exon, compared to variant 1, resulting in a shorter protein (isoform 3) compared to isoform 1.</p>