

**Cyclin O Antibody**  
**Catalog # ASC10436****Specification**

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**Cyclin O Antibody - Product Information**

|                   |   |
|-------------------|---|
| Application       | WB, E   |
| Primary Accession | <a href="#">P22674</a>  |
| Other Accession   | <a href="#">NP_066970</a> , <a href="#">153791755</a>                                       |
| Reactivity        | Human, Mouse, Rat   |
| Host              | Rabbit  |
| Clonality         | Polyclonal  |
| Isotype           | IgG   |
| Calculated MW     | 39 kDa KDa  |
| Application Notes | Cyclin O antibody can be used for the detection of Cyclin O by Western blot at 1 - 2 µg/mL. |

**Cyclin O Antibody - Additional Information**Gene ID **10309****Other Names**

Cyclin O Antibody: CCNU, UDG2, Cyclin-O, Cyclin O

**Target/Specificity**

CCNO; At least two isoforms of Cyclin O are known to exist; this antibody will recognize both isoforms.

**Reconstitution & Storage**

Cyclin O antibody can be stored at 4°C for three months and -20°C, stable for up to one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

**Precautions**

Cyclin O Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

**Cyclin O Antibody - Protein Information****Name** CCNO ([HGNC:18576](#))**Function**

Specifically required for generation of multiciliated cells, possibly by promoting a cell cycle state compatible with centriole amplification and maturation. Acts downstream of MCIDAS to promote mother centriole amplification and maturation in preparation for apical docking.

**Cellular Location**

Cytoplasm. Nucleus, nucleolus Note=Localizes to the apical part of cytoplasm

**Tissue Location**

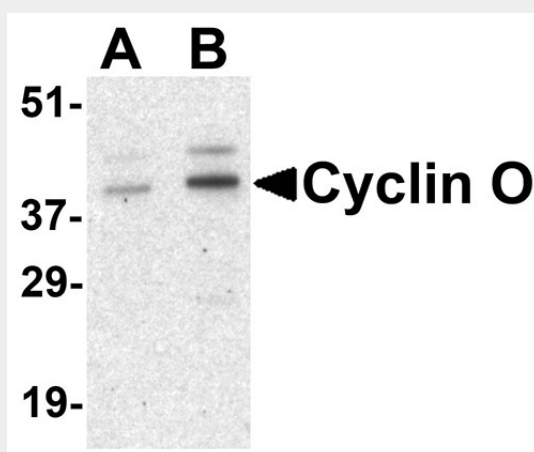
Present in respiratory cells (at protein level).

### Cyclin O Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

### Cyclin O Antibody - Images



Western blot analysis of Cyclin O in human bladder tissue lysate with Cyclin O antibody at (A) 1 and (B) 2  $\mu$ g/mL.

### Cyclin O Antibody - Background

Cyclin O Antibody: Cyclin O, also known as CCNO, has recently been identified as a Cdk1- and Cdk2-activating cyclin specific to apoptosis in lymphoid cells. Cyclin O binds to and activates Cdk2 in response to intrinsic apoptotic stimuli such as glucocorticoids or DNA-damaging agents. Suppression of Cyclin O expression by shRNA leads to the inhibition of glucocorticoid and DNA-damage-induced apoptosis due to a failure of apical caspase activation while leaving the CD95 death receptor-mediated apoptosis intact. Note: this gene, which had a previous symbol of UNG2, was erroneously identified as a uracil DNA glycosylase. A later publication identified this gene's product as a cyclin protein family member.

### Cyclin O Antibody - References

Roig MB, Roset R, Ortet L, et al. Identification of a novel cyclin required for the intrinsic apoptosis pathway in lymphoid cells. *Cell Death Diff.* 2009; 16:230-43.  
Muller SJ and Caradonna S. Isolation and characterization of a human cDNA encoding uracil-DNA glycosylase. *Biochim. Biophys. Acta* 1991; 1088:197-207.  
Muller SJ and Caradonna S. Cell cycle regulation of a human cyclin-like gene encoding uracil-DNA glycosylase. *J. Biol. Chem.* 1993; 268:1310-9.

