

# TORC2 Phospho Ser171 Rabbit pAb

CatalogNo: YP1707

## Key Features

### Host Species

- Rabbit

### Reactivity

- Human, Mouse, Rat

### Applications

- WB

### MW

- 76kD (Calculated)

### Isotype

- IgG

## Storage

**Storage\*** -15°C to -25°C/1 year (Do not lower than -25°C)

**Formulation** Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

## Recommended Dilution Ratios

**WB 1:500-2000**

## Basic Information

**Clonality** Polyclonal

## Immunogen Information

**Immunogen** Synthesized peptide derived from human TORC2 Phospho-Ser171

**Specificity** This antibody detects endogenous levels of TORC2 Phospho-Ser171 at Human, Mouse, Rat. The name of modified sites may be influenced by many factors, such as species (the modified site was not originally found in human samples) and the change of protein sequence (the previous protein sequence is incomplete, and the protein sequence may be prolonged with the development of protein sequencing technology). When naming, we will use the "numbers" in historical reference to keep the sites consistent with the reports. The antibody binds to the following modification sequence (lowercase letters are modification sites): TSsDS

---

## | Target Information

**Gene name** CRTC2 TORC2

**Protein Name** TORC2 Phospho-Ser171

Organism	Gene ID	UniProt ID
Human	<a href="#">200186</a> ;	<a href="#">Q53ET0</a> ;
Mouse	<a href="#">74343</a> ;	<a href="#">Q3U182</a> ;
Rat	<a href="#">310615</a> ;	<a href="#">Q3LRZ1</a> ;

**Cellular Localization** Cytoplasm . Nucleus . Translocated from the nucleus to the cytoplasm on interaction of the phosphorylated form with 14-3-3 protein (PubMed:15454081). In response to cAMP levels and glucagon, relocated to the nucleus (PubMed:15454081). .

**Tissue specificity** Most abundantly expressed in the thymus. Present in both B and T-lymphocytes. Highly expressed in HEK293T cells and in insulinomas. High levels also in spleen, ovary, muscle and lung, with highest levels in muscle. Lower levels found in brain, colon, heart, kidney, prostate, small intestine and stomach. Weak expression in liver and pancreas.

**Function** Function:Transcriptional coactivator for CREB1 which activates transcription through both consensus and variant cAMP response element (CRE) sites. Acts as a coactivator, in the SIK/TORC signaling pathway, being active when dephosphorylated and acts independently of CREB1 'Ser-133' phosphorylation. Enhances the interaction of CREB1 with TAF4. Regulates gluconeogenesis as a component of the LKB1/AMPK/TORC2 signaling pathway. Regulates the expression of specific genes such as the steroidogenic gene, StAR. Potent coactivator of PPARGC1A and inducer of mitochondrial biogenesis in muscle cells. Also coactivator for TAX activation of the human T-cell leukemia virus type 1 (HTLV-1) long terminal repeats (LTR).,polymorphism:Variant Cys-379, under a dominant model, linked to a recessive mutation in LKB1, may be associated with susceptibility to type II or non-insulin-dependent diabetes mellitus (NIDDM).,PTM:Phosphorylation/dephosphorylation states of Ser-171 are required for regulating transduction of CREB activity. TORCs are inactive when phosphorylated, and active when dephosphorylated at this site. This primary site of phosphorylation, is regulated by cAMP and calcium levels and is dependent on the phosphorylation of SIKs by LKB1. Both insulin and AMPK increase this phosphorylation, of TORC2 while glucagon suppresses it.,similarity:Belongs to the TORC family.,subcellular location:Translocated from the nucleus to the cytoplasm on interaction of the phosphorylated form with 14-3-3 protein. In response to cAMP levels and glucagon, relocated to the nucleus.,subunit:Binds, as a tetramer, through its N-terminal region, with the bZIP domain of CREB1. 'Arg-314' in the bZIP domain of CREB1 is essential for this interaction. Interaction, via its C-terminal, with TAF4, enhances recruitment of TAF4 to CREB1 (By similarity). Interacts with PPP3CA/calcineurin alpha, SNF1LK2 and 14-3-3 proteins, YWHAB and YWHAG. Interaction with the human T-cell leukemia virus type 1 (HTLV-1) Tax protein is essential for optimal transcription activation by Tax. Interaction with RFWD2/COP1 mediates nuclear export and degradation of TORC2.,tissue specificity:Most abundantly expressed in the thymus. Present in both B and T lymphocytes. Highly expressed in HEK293T cells and in insulinomas. High levels also in spleen, ovary, muscle and lung, with highest levels in muscle. Lower levels found in brain, colon, heart, kidney, prostate, small intestine and stomach. Weak expression in liver and pancreas.,

## | Validation Data

## | Contact information

Orders: order@immunoway.com  
Support: tech@immunoway.com  
Telephone: 877-594-3616 (Toll Free), 408-747-0185  
Website: <http://www.immunoway.com>  
Address: 2200 Ringwood Ave San Jose, CA 95131 USA



Please scan the QR code  
to access additional  
product information:  
**TORC2 Phospho  
Ser171 Rabbit pAb**

---

For Research Use Only. Not for Use in Diagnostic Procedures.

[Antibody](#) | [ELISA Kits](#) | [Protein](#) | [Reagents](#)