

CUL5 Antibody (C-term)
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP7577b**Specification**

CUL5 Antibody (C-term) - Product Information

Application	WB, IHC-P, FC,E
Primary Accession	Q93034
Other Accession	Q29425
Reactivity	Human
Predicted	Rabbit
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	90955
Antigen Region	747-774

CUL5 Antibody (C-term) - Additional Information**Gene ID** 8065**Other Names**

Cullin-5, CUL-5, Vasopressin-activated calcium-mobilizing receptor 1, VACM-1, CUL5, VACM1

Target/Specificity

This CUL5 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 747-774 amino acids from the C-terminal region of human CUL5.

Dilution

WB~~1:1000
IHC-P~~1:50~100
FC~~1:10~50

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

CUL5 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

CUL5 Antibody (C-term) - Protein Information**Name** CUL5 {ECO:0000303|PubMed:10230407, ECO:0000312|HGNC:HGNC:2556}

Function Core component of multiple SCF-like ECS (Elongin-Cullin 2/5- SOCS-box protein) E3 ubiquitin-protein ligase complexes, which mediate the ubiquitination and subsequent proteasomal degradation of target proteins (PubMed:[11384984](#), PubMed:[15601820](#)). As a scaffold protein may contribute to catalysis through positioning of the substrate and the ubiquitin-conjugating enzyme (PubMed:[11384984](#), PubMed:[15601820](#)). The functional specificity of the E3 ubiquitin-protein ligase complex depends on the variable substrate recognition component (PubMed:[11384984](#), PubMed:[15601820](#)). ECS(SOCS1) seems to direct ubiquitination of JAK2 (PubMed:[11384984](#)). ECS(KLHDC1) complex is part of the DesCEND (destruction via C-end degrons) pathway and mediates ubiquitination and degradation of truncated SELENOS selenoprotein produced by failed UGA/Sec decoding, which ends with a glycine (PubMed:[32200094](#)). As part of a multisubunit complex composed of elongin BC complex (ELOB and ELOC), elongin A/ELOA, RBX1 and CUL5; polyubiquitinates monoubiquitinated POLR2A (PubMed:[19920177](#)). May form a cell surface vasopressin receptor (PubMed:[9037604](#)).

Cellular Location

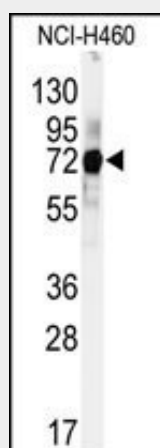
Nucleus. Note=Localizes to sites of DNA damage in a UBAP2 and UBAP2L-dependent manner.

CUL5 Antibody (C-term) - Protocols

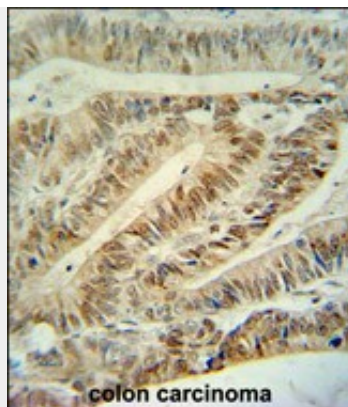
Provided below are standard protocols that you may find useful for product applications.

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

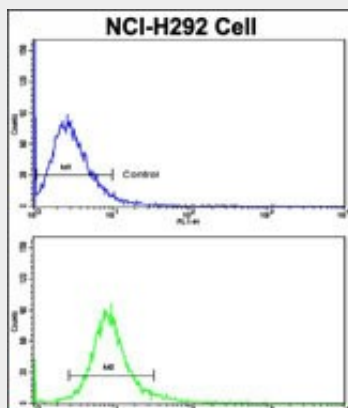
CUL5 Antibody (C-term) - Images



Western blot analysis of anti-CUL5 Antibody (C-term)(Cat.#AP7577b) in Hela cell line lysates (35ug/lane). CUL5 (arrow) was detected using the purified Pab.



CUL5 Antibody (C-term) (Cat. #AP7577b) immunohistochemistry analysis in formalin fixed and paraffin embedded human colon carcinoma followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the CUL5 Antibody (C-term) for immunohistochemistry. Clinical relevance has not been evaluated.



Flow cytometric analysis of NCI-H292 cells using CUL5 Antibody (C-term)(bottom histogram) compared to a negative control cell (top histogram). FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

CUL5 Antibody (C-term) - Background

CUL5 is a core component of multiple SCF-like ECS (Elongin-Cullin 2/5-SOCS-box protein) E3 ubiquitin-protein ligase complexes, which mediate the ubiquitination and subsequent proteasomal degradation of target proteins. As a scaffold protein may contribute to catalysis through positioning of the substrate and the ubiquitin-conjugating enzyme. The functional specificity of the E3 ubiquitin-protein ligase complex depends on the variable substrate recognition component. ECS(SOCS1) seems to direct ubiquitination of JAK2. It seems to be involved proteasomal degradation of p53/TP53 stimulated by adenovirus E1B-55 kDa protein and may form a cell surface vasopressin receptor.

CUL5 Antibody (C-term) - References

- Kamura T., Burian D., Yan Q.J. Biol. Chem. 276:29748-29753(2001)
- Mehle A., Goncalves J., Santa-Marta M. Genes Dev. 18:2861-2866(2004)
- Kamura T., Maenaka K., Kotoshiba S. Genes Dev. 18:3055-3065(2004)