

CD26 Antibody

Rabbit mAb Catalog # AP91245

# Specification

# CD26 Antibody - Product Information

ApplicationWBPrimary AccessionP27487ReactivityRatClonalityMonoclonalOther NamesDipeptidyl peptidase 4; ADABP; Adenosine deaminase complexing protein 2; ADCP-2; Dipeptidyl<br/>peptidase IV; DPP IV; T-cell activation antigen CD26; TP103; CD26; DPP4; ADCP2; DPP 4; DPP IV;

lsotype	Rabbit IgG
Host	Rabbit
Calculated MW	88279 Da

# **CD26 Antibody - Additional Information**

Dilution Purification Immunogen	WB~~1:1000 Affinity-chromatography A synthesized peptide derived from human CD26
Description	Interacts with multiple important cell surface ligands, such as adenosine deaminase, fibronectin, and IGF2 receptor to influence processes like T cell activation, cell migration and proliferation. Several DDP4 inhibitors have been developed and their effects have been tested in the field of diabetes, cardiovascular disease and tumor immunity.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

# **CD26 Antibody - Protein Information**

Name DPP4 (HGNC:3009)

Synonyms ADCP2, CD26

### **Function**

Cell surface glycoprotein receptor involved in the costimulatory signal essential for T-cell receptor (TCR)-mediated T- cell activation (PubMed:<a href="http://www.uniprot.org/citations/10900005"">http://www.uniprot.org/citations/10900005</a>



target=" blank">10900005</a>, PubMed:<a href="http://www.uniprot.org/citations/10951221" target=" blank">10951221</a>, PubMed:<a href="http://www.uniprot.org/citations/11772392" target="blank">11772392</a>, PubMed:<a href="http://www.uniprot.org/citations/17287217" target=" blank">17287217</a>). Acts as a positive regulator of T-cell coactivation, by binding at least ADA, CAV1, IGF2R, and PTPRC (PubMed: <a href="http://www.uniprot.org/citations/10900005"" target=" blank">10900005</a>, PubMed:<a href="http://www.uniprot.org/citations/10951221" target=" blank">10951221</a>, PubMed:<a href="http://www.uniprot.org/citations/11772392" target=" blank">11772392</a>, PubMed:<a href="http://www.uniprot.org/citations/14691230" target=" blank">14691230</a>). Its binding to CAV1 and CARD11 induces T-cell proliferation and NF-kappa-B activation in a T-cell receptor/CD3-dependent manner (PubMed:<a href="http://www.uniprot.org/citations/17287217" target=" blank">17287217</a>). Its interaction with ADA also regulates lymphocyte-epithelial cell adhesion (PubMed:<a href="http://www.uniprot.org/citations/11772392" target=" blank">11772392</a>). In association with FAP is involved in the pericellular proteolysis of the extracellular matrix (ECM), the migration and invasion of endothelial cells into the ECM (PubMed:<a href="http://www.uniprot.org/citations/10593948" target=" blank">10593948</a>, PubMed:<a href="http://www.uniprot.org/citations/16651416" target=" blank">16651416</a>). May be involved in the promotion of lymphatic endothelial cells adhesion, migration and tube formation (PubMed:<a href="http://www.uniprot.org/citations/18708048" target=" blank">18708048</a>). When overexpressed, enhanced cell proliferation, a process inhibited by GPC3 (PubMed:<a href="http://www.uniprot.org/citations/17549790" target=" blank">17549790</a>). Also acts as a serine exopeptidase with a dipeptidyl peptidase activity that regulates various physiological processes by cleaving peptides in the circulation, including many chemokines, mitogenic growth factors, neuropeptides and peptide hormones such as brain natriuretic peptide 32 (PubMed: <a href="http://www.uniprot.org/citations/10570924" target="\_blank">10570924</a>, PubMed:<a href="http://www.uniprot.org/citations/16254193" target=" blank">16254193</a>). Removes N-terminal dipeptides sequentially from polypeptides having unsubstituted N-termini provided that the penultimate residue is proline (PubMed:<a href="http://www.uniprot.org/citations/10593948" target=" blank">10593948</a>).

### **Cellular Location**

[Dipeptidyl peptidase 4 soluble form]: Secreted Note=Detected in the serum and the seminal fluid

#### **Tissue Location**

Expressed specifically in lymphatic vessels but not in blood vessels in the skin, small intestine, esophagus, ovary, breast and prostate glands. Not detected in lymphatic vessels in the lung, kidney, uterus, liver and stomach (at protein level). Expressed in the poorly differentiated crypt cells of the small intestine as well as in the mature villous cells. Expressed at very low levels in the colon

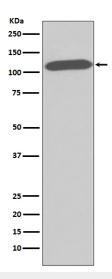
### **CD26 Antibody - Protocols**

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

# **CD26 Antibody - Images**





Western blot analysis of CD26 expression in HUVEC cell lysate.