10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

C13orf31 antibody - middle region
Rabbit Polyclonal Antibody
Catalog # AI13513

Specification

C13orf31 antibody - middle region - Product Information

Application	**WB**
Primary Accession	Q8IV20
Other Accession	NM_153218, NP_694950
Reactivity	**Human, Mouse, Rat, Rabbit, Pig, Horse, Bovine, Guinea Pig, Dog**
Predicted	**Human, Mouse, Rat, Chicken, Bovine, Dog**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**48kDa KDa**

C13orf31 antibody - middle region - Additional Information

Gene ID 144811

Alias Symbol	**DKFZp686D11119, FLJ38725, C13orf31, RP11-5G9.2**

Other Names
Laccase domain-containing protein 1, LACC1, C13orf31

Format
Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

Reconstitution & Storage
Add 50 ul of distilled water. Final anti-C13orf31 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.

Precautions
C13orf31 antibody - middle region is for research use only and not for use in diagnostic or therapeutic procedures.

C13orf31 antibody - middle region - Protein Information

Name LACC1 {ECO:0000303|PubMed:25220867, ECO:0000312|HGNC:HGNC:26789}

Function
Purine nucleoside enzyme that catalyzes the phosphorolysis of adenosine, guanosine and inosine nucleosides, yielding D-ribose 1- phosphate and the respective free bases, adenine, guanine and hypoxanthine (PubMed:31978345). Also catalyzes the phosphorolysis of S- methyl-5'-thioadenosine into adenine and S-methyl-5-thio-alpha-D-ribose 1-phosphate (PubMed:31978345). Also has adenosine deaminase activity (PubMed:<a href="http://www.uniprot.org/citations/31978345"

target="_blank">31978345). Acts as a regulator of innate immunity in macrophages by modulating the purine nucleotide metabolism, thereby regulating the metabolic function and bioenergetic state of macrophages (PubMed:31978345). Enables a purine nucleotide cycle between adenosine and inosine monophosphate and adenylosuccinate that prevents cytoplasmic acidification and balances the cytoplasmic-mitochondrial redox interface (PubMed:31978345). The purine nucleotide cycle consumes aspartate and releases fumarate in a manner involving fatty acid oxidation and ATP-citrate lyase activity (PubMed:31978345). Participates in pattern recognition receptor (PRR)-induced cytokines in macrophages: associates with the NOD2-signaling complex and promotes optimal NOD2-induced signaling, cytokine secretion and bacterial clearance (PubMed:28593945, PubMed:31875558). Localizes to the endoplasmic reticulum upon PRR stimulation of macrophages and associates with endoplasmic reticulum-stress sensors, promoting the endoplasmic reticulum unfolded protein response (UPR) (PubMed:31875558). Does not show laccase activity (PubMed:27959965, PubMed:31978345).

Cellular Location
Cytoplasm {ECO:0000250|UniProtKB:Q8BZT9}. Nucleus {ECO:0000250|UniProtKB:Q8BZT9}. Endoplasmic reticulum. Peroxisome. Note=Upon stimulation of the pattern- recognition receptor (PRR) NOD2, localizes to the endoplasmic reticulum.

Tissue Location
Ubiquitously expressed, with higher expression levels in immune-related tissues such as lymph nodes and spleen (PubMed:27959965). Expressed in both intestinal and peripheral myeloid-derived cells (PubMed:28593945).

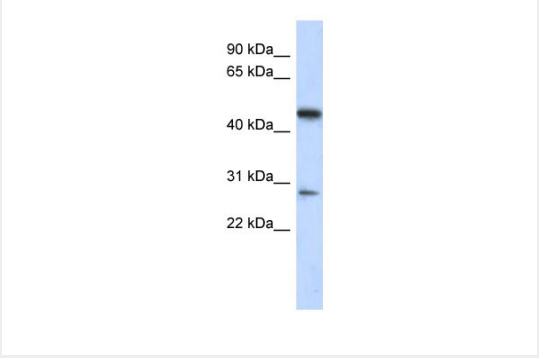
C13orf31 antibody - middle region - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

C13orf31 antibody - middle region - Images

10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999



WB Suggested Anti-C13orf31 Antibody Titration: 0.2-1 µg/ml
ELISA Titer: 1:1562500
Positive Control: Human Lung

C13orf31 antibody - middle region - References

Ota T.,et al.Nat. Genet. 36:40-45(2004).
Dunham A.,et al.Nature 428:522-528(2004).
Mural R.J.,et al.Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases.