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COL9A1 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP2762c

Product Information

Application	WB, IHC-P, E
Primary Accession	P20849
Other Accession	Q05722
Reactivity	Human, Mouse, Rat
Predicted	Mouse, Bovine, Canine, Rabbit
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	91869
Antigen Region	428-456

Additional Information

Gene ID	1297
Other Names	Collagen alpha-1(IX) chain, COL9A1
Target/Specificity	This COL9A1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 428-456 amino acids from the Central region of human COL9A1.
Dilution	WB~~1:1000 IHC-P~~1:100~500 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.05% (V/V) Proclin 300. This antibody is purified through a protein A column, followed by peptide affinity purification.
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	COL9A1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	COL9A1
Function	Structural component of hyaline cartilage and vitreous of the eye.
Cellular Location	Secreted, extracellular space, extracellular matrix

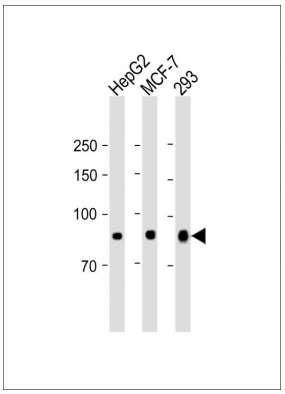
Background

COL9A1 is one of the three alpha chains of type IX collagen, which is a minor (5-20%) collagen component of hyaline cartilage. Type IX collagen is usually found in tissues containing type II collagen, a fibrillar collagen. Studies in knockout mice have shown that synthesis of the alpha 1 chain is essential for assembly of type IX collagen molecules, a heterotrimeric molecule,and that lack of type IX collagen is associated with early onset osteoarthritis. Mutations in the COL9A1 gene are associated with osteoarthritis in humans, with multiple epiphyseal dysplasia, 6, a form of chondrodysplasia, and with Stickler syndrome, a disease characterized by ophthalmic, orofacial, articular, and auditory defects.

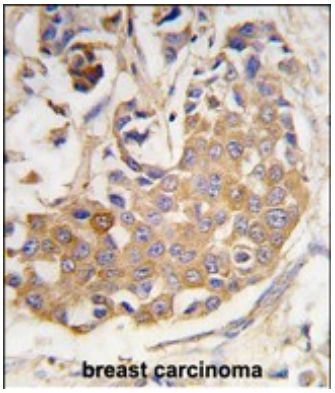
References

Fresquet,M., J. Biol. Chem. 282 (48), 34634-34643 (2007)
Liu,L.Y., Yi Chuan 29 (4), 427-432 (2007)
Van Camp,G., Am. J. Hum. Genet. 79 (3), 449-457 (2006)
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Images



All lanes: Anti-COL9A1 Antibody (Center) at 1:1000 dilution Lane 1: HepG2 whole cell lysate Lane 2: MCF-7 whole cell lysate Lane 3: 293 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size: 91 KDa Blocking/Dilution buffer: 5% NFDM/TBST.



Formalin-fixed and paraffin-embedded human breast carcinoma tissue reacted with COL9A1 antibody (Center) (Cat.#AP2762c), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.