abcam

Product datasheet

Anti-Collagen I antibody [COL-1] ab6308

33 Abreviews 434 References 画像数 4

製品の概要

製品名	Anti-Collagen I antibody [COL-1]
製品の詳細	Mouse monoclonal [COL-1] to Collagen I
由来種	Mouse
アプリケーション	**適用あり:** IHC-Fr, WB
種交差性	**交差種:** Human **交差が予測される動物種:** Rat, Cow, Pig, Deer
免疫原	Full length native protein (purified) corresponding to Cow Collagen I. Cow skin collagen type I
エピトープ	The epitope recognized by the antibody may be sensitive to routine formalin fixation and paraffin embedding. There have been varying results when using this antibody in IHC-P. Please refer to our customer Abreviews for more protocol information and optimization steps when using this antibody in IHC-P.
ポジティブ・コントロール	WB: Natural Cow Collagen I protein (**ab7526**), IHC-Fr: Human tonsil tissue.
特記事項	Production of this antibody has been changed on 23rd June 2016. The following lots are from ascites and are still in stock as of 23rd June 2016 : GR210978, GR175242, GR158374. Lot numbers higher than GR210978 will be from tissue culture supernatant. Please note that the dilutions may need to be adjusted accordingly. The Life Science industry has been in the grips of a reproducibility crisis for a number of years. Abcam is leading the way in addressing this with our range of recombinant monoclonal antibodies and knockout edited cell lines for gold-standard validation. Please check that this product meets your needs before purchasing. If you have any questions, special requirements or concerns, please send us an inquiry and/or contact our Support team ahead of purchase. Recommended alternatives for this product can be found below, along with publications, customer reviews and Q&As

製品の特性

製品の状態	Liquid
保存方法	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long term. Avoid freeze / thaw cycle.
バッファー	pH: 7.40 Preservative: 0.0976% Sodium azide

	Constituent: PBS
精製度	Proprietary Purification
特記事項（精製）	Purified from Tissue culture supernatant.
ポリ/モノ	モノクローナル
クローン名	COL-1
アイソタイプ	IgG1

アプリケーション

The Abpromise guarantee **Abpromise保証は、** 次のテスト済みアプリケーションにおけるab6308の使用に適用されます

アプリケーションノートには、推奨の開始希釈率がありますが、適切な希釈率につきましてはご検討ください。

アプリケーション	Abreviews	特記事項
IHC-Fr	★★★☆☆ (2)	Use a concentration of 3.5 - 7 µg/ml. (amplification required).Use on unfixed tissue or acetone fixed tissue.
WB	★★★☆☆ (2)	Use a concentration of 1 - 2 µg/ml. Use under non reducing condition. Detects a band of approximately 130 kDa (predicted molecular weight: 130 kDa). The antibody is reactive with the native (non-denaturing, helical) form of collagen type I and not reactive when tested on thermally denatured molecules. Use native (non-denaturing) conditions. Positive Control: Hu stomach, skin and adrenal gland tissue

ターゲット情報

機能	Type I collagen is a member of group I collagen (fibrillar forming collagen).
組織特異性	Forms the fibrils of tendon, ligaments and bones. In bones the fibrils are mineralized with calcium hydroxyapatite.
関連疾患	Defects in COL1A1 are the cause of Caffey disease (CAFFD) [MIM:114000]; also known as infantile cortical hyperostosis. Caffey disease is characterized by an infantile episode of massive subperiosteal new bone formation that typically involves the diaphyses of the long bones, mandible, and clavicles. The involved bones may also appear inflamed, with painful swelling and systemic fever often accompanying the illness. The bone changes usually begin before 5 months of age and resolve before 2 years of age. Defects in COL1A1 are a cause of Ehlers-Danlos syndrome type 1 (EDS1) [MIM:130000]; also known as Ehlers-Danlos syndrome gravis. EDS is a connective tissue disorder characterized by hyperextensible skin, atrophic cutaneous scars due to tissue fragility and joint hyperlaxity. EDS1 is the severe form of classic Ehlers-Danlos syndrome. Defects in COL1A1 are the cause of Ehlers-Danlos syndrome type 7A (EDS7A) [MIM:130060]; also known as autosomal dominant Ehlers-Danlos syndrome type VII. EDS is a connective tissue disorder characterized by hyperextensible skin, atrophic cutaneous scars due to tissue fragility and joint hyperlaxity. EDS7A is marked by bilateral congenital hip dislocation, hyperlaxity of the joints, and recurrent partial dislocations. Defects in COL1A1 are a cause of osteogenesis imperfecta type 1 (OI1) [MIM:166200]. A dominantly inherited connective tissue disorder characterized by bone fragility and blue sclerae.

Osteogenesis imperfecta type 1 is non-deforming with normal height or mild short stature, and no dentinogenesis imperfecta.
Defects in COL1A1 are a cause of osteogenesis imperfecta type 2A (OI2A) [MIM:166210]; also known as osteogenesis imperfecta congenita. A connective tissue disorder characterized by bone fragility, with many perinatal fractures, severe bowing of long bones, undermineralization, and death in the perinatal period due to respiratory insufficiency.
Defects in COL1A1 are a cause of osteogenesis imperfecta type 3 (OI3) [MIM:259420]. A connective tissue disorder characterized by progressively deforming bones, very short stature, a triangular face, severe scoliosis, grayish sclera, and dentinogenesis imperfecta.
Defects in COL1A1 are a cause of osteogenesis imperfecta type 4 (OI4) [MIM:166220]; also known as osteogenesis imperfecta with normal sclerae. A connective tissue disorder characterized by moderately short stature, mild to moderate scoliosis, grayish or white sclera and dentinogenesis imperfecta.
Genetic variations in COL1A1 are a cause of susceptibility to osteoporosis (OSTEOP) [MIM:166710]; also known as involutional or senile osteoporosis or postmenopausal osteoporosis. Osteoporosis is characterized by reduced bone mass, disruption of bone microarchitecture without alteration in the composition of bone. Osteoporotic bones are more at risk of fracture.
Note=A chromosomal aberration involving COL1A1 is found in dermatofibrosarcoma protuberans. Translocation t(17;22)(q22;q13) with PDGF.

配列類似性

Belongs to the fibrillar collagen family.
Contains 1 fibrillar collagen NC1 domain.
Contains 1 VWFC domain.

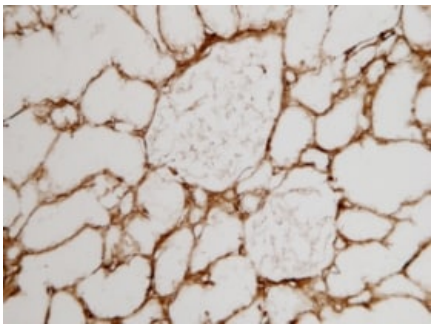
翻訳後修飾

Proline residues at the third position of the tripeptide repeating unit (G-X-Y) are hydroxylated in some or all of the chains. Proline residues at the second position of the tripeptide repeating unit (G-X-Y) are hydroxylated in some of the chains.
O-linked glycan consists of a Glc-Gal disaccharide bound to the oxygen atom of a post-translationally added hydroxyl group.

細胞内局在

Secreted > extracellular space > extracellular matrix.

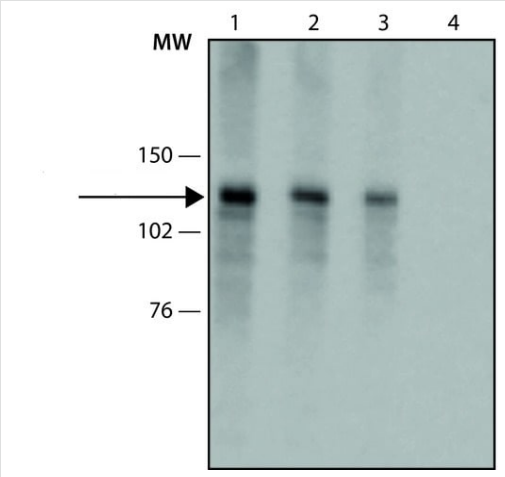
画像



Immunohistochemistry (Frozen sections) - Anti-Collagen I antibody [COL-1] (ab6308)

This image was kindly supplied as part of the review submitted by Arvi-Matti Kuusniemi

Immunoperoxidase staining of unfixed frozen tissue sections with **ab6308**. Picture of human kidney cortex showing two glomeruli and surrounding tubulointerstitium.

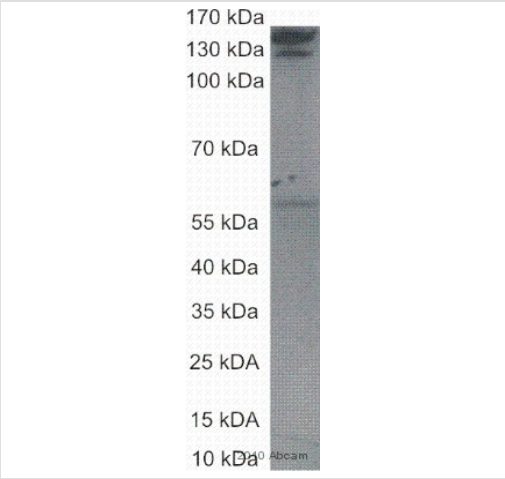


Western blot - Anti-Collagen I antibody [COL-1] (ab6308)

Lane 1 : Anti-Collagen I antibody [COL-1] (ab6308) at 2 µg/ml
Lane 2 : Anti-Collagen I antibody [COL-1] (ab6308) at 1 µg/ml
Lane 3 : Anti-Collagen I antibody [COL-1] (ab6308) at 0.5 µg/ml
Lane 4 : Anti-Collagen I antibody [COL-1] (ab6308) at 0 µg/ml

All lanes : Recombinant human Collagen 1

Predicted band size: 130 kDa



Western blot - Anti-Collagen I antibody [COL-1] (ab6308)
This image is courtesy of an anonymous Abreview

Anti-Collagen I antibody [COL-1] (ab6308) at 1/1000 dilution +
Human brain whole tissue lysate at 10 µg

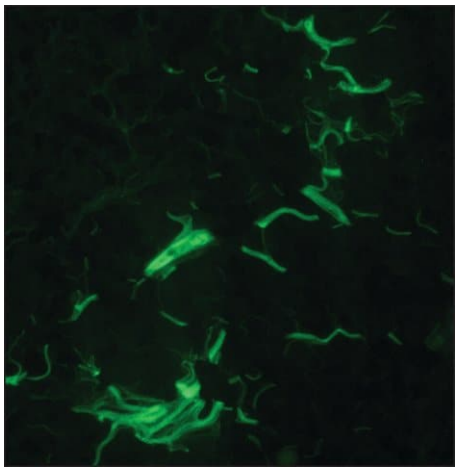
Secondary
An HRP-conjugated goat polyclonal to mouse IgG at 1/7500 dilution

Developed using the ECL technique.

Performed under reducing conditions.

Predicted band size: 130 kDa

Exposure time: 24 hours



Immunohistochemistry (Frozen sections) - Anti-Collagen I antibody [COL-1] (ab6308)

Acetone-fixed human tonsil tissue frozen section stained for Collagen I with ab6308 at 7 µg/mL in immunohistochemical analysis.

Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit **https://www.abcam.co.jp/abpromise** or contact our technical team.

Terms and conditions

- Guarantee only valid for products bought direct from Abcam or one of our authorized distributors