

# Tenascin-C (H-300): sc-20932

## BACKGROUND

The tenascin family of extracellular matrix proteins includes Tenascin-C (also designated cytotactin or tenascin), Tenascin-R (also designated restrictin, TN-R or janusin) and Tenascin-X. Tenascin proteins function as substrate-adhesion molecules (SAMs) and are involved in regulating numerous developmental processes, such as morphogenetic cell migration and organogenesis. The tenascin family proteins arise from various splicing events in the region of coding for FNIII repeats. Tenascin-C and Tenascin-X are expressed in several tissues during embryogenesis and in adult tissues undergoing active remodeling, such as healing wounds and tumors. Tenascin-R is expressed on the surface of neurons and glial cells.

## REFERENCES

- Jung, M., et al. 1993. Astrocytes and neurons regulate the expression of the neural recognition molecule Janusin by cultured oligodendrocytes. *Glia* 9: 163-175.
- Schachner, M., et al. 1994. The perplexing multifunctionality of Janusin, a Tenascin-related molecule. *Perspect. Dev. Neurobiol.* 2: 33-41.

## CHROMOSOMAL LOCATION

Genetic locus: TNC (human) mapping to 9q33.1; Tnc (mouse) mapping to 4 C1.

## SOURCE

Tenascin-C (H-300) is a rabbit polyclonal antibody raised against amino acids 1601-1900 mapping near the C-terminus of Tenascin-C of human origin.

## PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

## APPLICATIONS

Tenascin-C (H-300) is recommended for detection of Tenascin-C of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Tenascin-C (H-300) is also recommended for detection of Tenascin-C in additional species, including equine, canine and porcine.

Suitable for use as control antibody for Tenascin-C siRNA (h): sc-43186, Tenascin-C siRNA (m): sc-43187, Tenascin-C shRNA Plasmid (h): sc-43186-SH, Tenascin-C shRNA Plasmid (m): sc-43187-SH, Tenascin-C shRNA (h) Lentiviral Particles: sc-43186-V and Tenascin-C shRNA (m) Lentiviral Particles: sc-43187-V.

Molecular Weight (predicted) of Tenascin-C: 220 kDa.

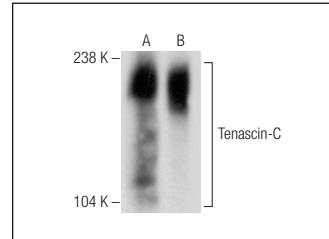
Molecular Weight (observed) of Tenascin-C: 220-260 kDa.

Positive Controls: U-251-MG whole cell lysate: sc-364176, U-87 MG cell lysate: sc-2411 or Hs68 cell lysate: sc-2230.

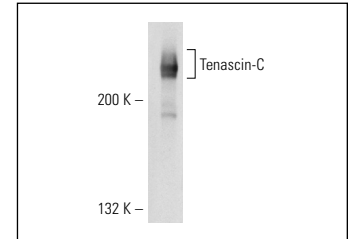
## STORAGE

Store at 4° C, **\*\*DO NOT FREEZE\*\***. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

## DATA



Tenascin-C (H-300): sc-20932. Western blot analysis of Tenascin-C expression in U-87 MG (A) and U-251 MG (B) whole cell lysates.



Tenascin-C (H-300): sc-20932. Western blot analysis of Tenascin-C expression in Hs68 whole cell lysate.

## SELECT PRODUCT CITATIONS

- Hoek, K., et al. 2004. Expression profiling reveals novel pathways in the transformation of melanocytes to melanomas. *Cancer Res.* 15: 5270-5282.
- Yeung, A.M., et al. 2008. Limbal epithelial crypt: a model for corneal epithelial maintenance and novel limbal regional variations. *Arch. Ophthalmol.* 126: 665-669.
- Jiang, L., et al. 2009. Synergistic effects of cyclic strain and Th1-like cytokines on tenascin-C production by rheumatic aortic valve interstitial cells. *Clin. Exp. Immunol.* 155: 216-223.
- Keophiphath, M., et al. 2009. Macrophage-secreted factors promote a profibrotic phenotype in human preadipocytes. *Mol. Endocrinol.* 23: 11-24.
- Umar, S., et al. 2009. Allogenic stem cell therapy improves right ventricular function by improving lung pathology in rats with pulmonary hypertension. *Am. J. Physiol. Heart Circ. Physiol.* 297: H1606-H1616.
- de Visser, Y.P., et al. 2009. Sildenafil attenuates pulmonary inflammation and fibrin deposition, mortality and right ventricular hypertrophy in neonatal hyperoxic lung injury. *Respir. Res.* 10: 30.
- Visser, Y.P., et al. 2010. Apelin attenuates hyperoxic lung and heart injury in neonatal rats. *Am. J. Respir. Crit. Care Med.* 182: 1239-1250.
- Karaöz, E., et al. 2011. Human dental pulp stem cells demonstrate better neural and epithelial stem cell properties than bone marrow-derived mesenchymal stem cells. *Histochem. Cell Biol.* 136: 455-473.

## RESEARCH USE

For research use only, not for use in diagnostic procedures.



Try **Tenascin-C (E-9): sc-25328** or **Tenascin-C (300-3): sc-13578**, our highly recommended monoclonal alternatives to Tenascin-C (H-300). Also, for AC, HRP, FITC, PE, Alexa Fluor® 488 and Alexa Fluor® 647 conjugates, see **Tenascin-C (E-9): sc-25328**.