

ABLIM1 (C-12): sc-133269

BACKGROUND

The *C. elegans* protein UNC-115 mediates axon guidance by modulating the growth cone actin cytoskeleton in response to signals received by growth cone receptors. The mammalian homolog of UNC-115 is the actin-binding LIM protein family member 1 (ABLIM1, also designated limatin). The ABLIM1 protein has an N-terminal domain that contains four double zinc finger motifs, which conform to the LIM motif consensus sequence. ABLIM1 binds to F-actin through a dematin-like domain and is expressed in retina, brain and muscle tissue. There are four known isoforms of ABLIM1. The gene encoding ABLIM1 maps to a region of chromosome 10 associated with frequent loss of heterozygosity in human tumors, thus identifying ABLIM1 as a candidate tumor suppressor gene. ABLIM2 and ABLIM3 show highest expression in muscle and neuronal tissues, bind to F-actin, and are localized on stress fibers. They also have been shown to enhance STARS (striated muscle activator of Rho signaling) dependent activation of serum-response factor (SRF), thereby modulating transcription.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: ABLIM1 (human) mapping to 10q25.3; Ablim1 (mouse) mapping to 19 D2.

SOURCE

ABLIM1 (C-12) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping at the C-terminus of ABLIM1 of human origin.

PRODUCT

Each vial contains 100 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-133269 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

ABLIM1 (C-12) is recommended for detection of ABLIM1 isoforms 1, 2, 3 and 4 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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).

ABLIM1 (C-12) is also recommended for detection of ABLIM1 isoforms 1, 2, 3 and 4 in additional species, including canine, bovine, porcine and avian.

Suitable for use as control antibody for ABLIM1 siRNA (h): sc-90820, ABLIM1 siRNA (m): sc-140780, ABLIM1 shRNA Plasmid (h): sc-90820-SH, ABLIM1 shRNA Plasmid (m): sc-140780-SH, ABLIM1 shRNA (h) Lentiviral Particles: sc-90820-V and ABLIM1 shRNA (m) Lentiviral Particles: sc-140780-V.

Molecular Weight of ABLIM1: 88 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

STORAGE

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

RESEARCH USE

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

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.