## SANTA CRUZ BIOTECHNOLOGY, INC.

# Lyn (H-70): sc-28790



## BACKGROUND

Src is the human homolog of the v-src gene of the Rous sarcoma virus, also known as avian sarcoma virus or ASV. Src is the first proto-oncogenic nonreceptor tyrosine kinase characterized in human. By virtue of common structural motifs, the Src family is composed of nine members in vertebrates, including Src, Yes, Fgr, Frk, Fyn, Lyn, Hck, Lck and Blk. Src-family kinases transduce signals that are involved in the control of a variety of cellular processes, including proliferation, differentiation, motility and adhesion. Src-family kinases contain an amino-terminal cell membrane anchor followed by an SH3 domain and an SH2 domain involved in modular association and activation, respectively. Src-family kinases are normally maintained in an inactive state and can be activated transiently during cellular events such as mitosis. The human Lyn gene maps to chromosome 8q12.1 and encodes a 505 amino acid protein. Hematopoietic tissues predominantly express Lyn, which influences normal immunoglobulin production and regulation.

## REFERENCES

- 1. Sakaguchi, A.Y., et al. 1982. Organization of human proto-oncogenes. Am. J. Hum. Genet. 34: 175.
- Hibbs, M.L., et al. 1997. Lyn, a Src-like tyrosine kinase. Int. J. Biochem. Cell Biol. 29: 397-400.

## CHROMOSOMAL LOCATION

Genetic locus: LYN (human) mapping to 8q12.1; Lyn (mouse) mapping to 4 A1.

#### SOURCE

Lyn (H-70) is a rabbit polyclonal antibody raised against amino acids 1-70 mapping at the N-terminus of Lyn of human origin.

## PRODUCT

Each vial contains 200  $\mu g$  IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

## **APPLICATIONS**

Lyn (H-70) is recommended for detection of Lyn 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).

Lyn (H-70) is also recommended for detection of Lyn in additional species, including equine, canine and bovine.

Suitable for use as control antibody for Lyn siRNA (h): sc-29393, Lyn siRNA (m): sc-35828, Lyn shRNA Plasmid (h): sc-29393-SH, Lyn shRNA Plasmid (m): sc-35828-SH, Lyn shRNA (h) Lentiviral Particles: sc-29393-V and Lyn shRNA (m) Lentiviral Particles: sc-35828-V.

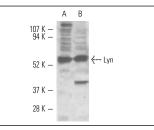
Molecular Weight of Lyn isoforms: 53/56 kDa.

Positive Controls: Ramos cell lysate: sc-2216, HeLa whole cell lysate: sc-2200 or HL-60 whole cell lysate: sc-2209.

#### **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<sup>™</sup> compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker<sup>™</sup> Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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<sup>™</sup> Mounting Medium: sc-24941.

#### DATA



Lyn (H-70): sc-28790. Western blot analysis of Lyn expression in Ramos (A) and HL-60 (B) whole cell lysates.

#### SELECT PRODUCT CITATIONS

- Konecny, G.E., et al. 2009. Activity of the multikinase inhibitor dasatinib against ovarian cancer cells. Br. J. Cancer 101: 1699-1708.
- Uchino, S., et al. 2010. Inhibition of N-methyl-D-aspartate receptor activity resulted in aberrant neuronal migration caused by delayed morphological development in the mouse neocortex. Neuroscience 169: 609-618.
- Verma-Gaur, J., et al. 2012. Negative feedback regulation of antigen receptors through calmodulin inhibition of E2A. J. Immunol. 188: 6175-6183.
- Hauser, J., et al. 2013. Broad feedback inhibition of pre-B-cell receptor signaling components. Mol. Immunol. 54: 247-253.

#### **STORAGE**

Store at 4° C, \*\*D0 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.