SANTA CRUZ BIOTECHNOLOGY, INC.

Anamorsin (FL-312): sc-134449



BACKGROUND

The name of the protein Anamorsin, also designated cytokine-induced apoptosis inhibitor 1 (CIAPIN1), comes from the Latin term "ana-mors-in", meaning "anti-death molecule". During hematopoiesis, Anamorsin is crucial for mediating the anti-apoptotic effects of various cytokines. It is a ubiquitously expressed protein, and when it is overexpressed, it confers apoptotic resistance. Anamorsin is primarily expressed in the cytoplasm of liver, pancreas and heart tissue cells and does not show any homology to known apoptosis regulatory molecules of the BcI-2 or CASP families, or to signal transduction molecules. Anamorsin expression in mouse cells confers resistance to apoptosis caused by IL-3 (interleukin-3) deprivation. Studies demonstrate that the addition of growth factors, such as EPO (erythropoietin), SCF (stem cell factor), TPO (thrombopoietin) or IL-3, all of which depend on Ras signaling, induce dose-dependent expression of Anamorsin in mouse cells.

REFERENCES

- 1. Loftus, B.J., et al. 1999. Genome duplications and other features in 12 Mb of DNA sequence from chromosome 16p and 16q. Genomics 60: 295-308.
- 2. Online Mendelian Inheritance in Man, OMIM™. 2002. Johns Hopkins University, Baltimore, MD. MIM Number: 608943. World Wide Web URL: http://www.ncbi.nlm.nih.gov/omim/
- Shibayama, H., et al. 2004. Identification of a cytokine-induced antiapoptotic molecule anamorsin essential for definitive hematopoiesis. J. Exp. Med. 199: 581-592.
- Hao, Z., et al. 2005. Preparation and characterization of a specific monoclonal antibody against CIAPIN1. Hybridoma 24: 141-145.
- Kanakura, Y. 2005. Regulation and dysregulation of hematopoiesis by a cytokine-induced antiapoptotic molecule anamorsin. Hematology 1: 73-75.
- Hao, Z., et al. 2006. Distribution of CIAPIN1 in normal fetal and adult human tissues. J. Histochem. Cytochem. 54: 417-426.

CHROMOSOMAL LOCATION

Genetic locus: CIAPIN1 (human) mapping to 16q21; Ciapin1 (mouse) mapping to 8 C5.

SOURCE

Anamorsin (FL-312) is a rabbit polyclonal antibody raised against amino acids 1-312 representing full length Anamorsin of human origin.

PRODUCT

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

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.

APPLICATIONS

Anamorsin (FL-312) is recommended for detection of Anamorsin isoforms 1, 2 and 3 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).

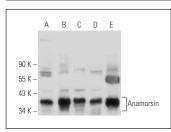
Anamorsin (FL-312) is also recommended for detection of Anamorsin isoforms 1, 2 and 3 in additional species, including equine, canine, bovine and porcine.

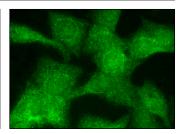
Suitable for use as control antibody for Anamorsin siRNA (h): sc-60168, Anamorsin siRNA (m): sc-60169, Anamorsin shRNA Plasmid (h): sc-60168-SH, Anamorsin shRNA Plasmid (m): sc-60169-SH, Anamorsin shRNA (h) Lentiviral Particles: sc-60168-V and Anamorsin shRNA (m) Lentiviral Particles: sc-60169-V.

Molecular Weight of Anamorsin: 34 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200, Hep G2 cell lysate: sc-2227 or COLO 320DM cell lysate: sc-2226.

DATA





Anamorsin (FL-312): sc-134449. Western blot analysis of Anamorsin expression in HeLa (A), COLO 320DM (B), T24 (C) and Hep G2 (D) whole cell lysates and mouse testis tissue extract (E).

Anamorsin (FL-312): sc-134449. Immunofluorescence staining of formalin-fixed Hep G2 cells showing nuclear and cytoplasmic localization.

PROTOCOLS

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

MONOS Satisfation Guaranteed

Try **Anamorsin (A-3): sc-271298**, our highly recommended monoclonal alternative to Anamorsin (FL-312).