SANTA CRUZ BIOTECHNOLOGY, INC.

ASL (h): 293 Lysate: sc-110465

BACKGROUND

ASL (argininosuccinate lyase), also known as ASAL or arginosuccinase, is a member of the lyase 1 family of proteins and is predominantly expressed in the liver. Localizing to the cytoplasm and existing as a homotetramer, ASL catalyzes the hydrolytic cleavage of argininosuccinic acid (ASA) to fumarate and Arginine, an essential step of the urea cycle which is crucial for the detoxification of ammonia. This reaction is also involved in the biosynthesis of Arginine. In addition, ASL shares high sequence homology with the avian and reptilian eye lens protein, δ-crystallin. Mutations in the gene encoding ASL lead to an accumulation of ASA in body fluids and result in arginosuccinic aciduria (ASAuria), an autosomal recessive disorder that is characterized by hyperammonemia, liver enlargement, convulsions, physical and mental retardation, episodic unconsciousness, and dry and brittle hair showing trichorrhexis nodosa (weak points or nodes in the hair shaft).

REFERENCES

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STORAGE

Store at -20° C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

CHROMOSOMAL LOCATION

Genetic locus: ASL (human) mapping to 7q11.21.

PRODUCT

ASL (h): 293 Lysate represents a lysate of human ASL transfected 293 cells and is provided as 100 µg protein in 200 µl SDS-PAGE buffer.

APPLICATIONS

ASL (h): 293 Lysate is suitable as a Western Blotting positive control for human reactive ASL antibodies. Recommended use: 10-20 µl per lane.

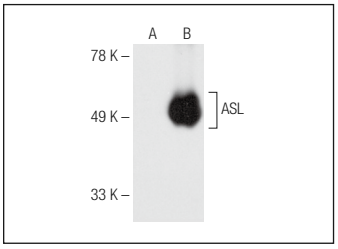
Control 293 Lysate: sc-110760 is available as a Western Blotting negative control lysate derived from non-tranfected 293 cells.

ASL (E-5): sc-374353 is recommended as a positive control antibody for Western Blot analysis of enhanced human ASL expression in ASL transfected 293 cells (starting dilution 1:100, dilution range 1:100-1:1,000).

RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-IgGκ BP-HRP: sc-516102 or m-IgGκ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz Marker™ Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 and Western Blotting Luminol Reagent: sc-2048.

DATA



ASL (E-5): sc-374353. Western blot analysis of ASL expression in non-transfected: sc-110760 (**A**) and human ASL transfected: sc-110465 (**B**) 293 whole cell lysates.

RESEARCH USE

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

PROTOCOLS

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