SANTA CRUZ BIOTECHNOLOGY, INC.

# ABHD14B (D-14): sc-99760

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The Power to Question

## BACKGROUND

The α/β hydrolase superfamily comprise diverse members that are involved in important biochemical processes and related to various diseases. They have unrelated sequences, various substrates, and different kinds of catalytic activities, yet they share the same canonical α/β hydrolase fold, which consists of an eight-stranded parallel α/β structure. They are also characterized by a catalytic triad composed of a histidine, an acid and a nucleophile. Members of this superfamily are often drug targets for treating diseases, such as diabetes, Alzheimer's disease, obesity and blood clotting disorders. The Ab hydrolase domain containing (ABHD) gene subfamily is comprised of 15 mostly uncharacterized members. Most of which utilize a serine nucleophile to form the G-X-S-X-G nucleophile elbow. ABHD1 plays a role in metabolizing smoking xenobiotics. ABHD2 participates in the development of atherosclerosis. ABHD4 is involved in an alternative synthesis pathway of NAE. Mutations in ABHD5 contribute to Chanarin-Dorfman syndrome. ABDH6 may play a role in nervous system metabolism and signaling. ABHD14B is a 210 amino acid protein that localizes to both the cytoplasm and the nucleus where it exists as two alternatively spliced isoforms.

## REFERENCES


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## CHROMOSOMAL LOCATION

Genetic locus: ABHD14B (human) mapping to 3p21.1; Abhd14b (mouse) mapping to 9 F1.

## SOURCE

ABHD14B (D-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of ABHD14B 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.

Blocking peptide available for competition studies, sc-99760 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

ABHD14B (D-14) is recommended for detection of ABHD14B of mouse 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); non cross-reactive with other ABHD family members.

Suitable for use as control antibody for ABHD14B siRNA (h): sc-77948, ABHD14B siRNA (m): sc-140769, ABHD14B shRNA Plasmid (h): sc-77948-SH, ABHD14B shRNA Plasmid (m): sc-140769-SH, ABHD14B shRNA (h) Lentiviral Particles: sc-77948-V and ABHD14B shRNA (m) Lentiviral Particles: sc-140769-V.

Molecular Weight of ABHD14B: 22 kDa.

## RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (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 donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (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.