SANTA CRUZ BIOTECHNOLOGY, INC.

URE-B1 (N-17): sc-49767

SANTA CRUZ BIOTECHNOLOGY

The Power to Question

BACKGROUND

The ubiquitin (Ub) pathway involves three sequential enzymatic steps that facilitate the conjugation of Ub and Ub-like molecules to specific protein substrates. The first step requires the ATP-dependent activation of the Ub C-terminus and the assembly of multi-Ub chains by the Ub-activating enzyme known as the E1 component. The Ub chain is then conjugated to the Ub-conjugating enzyme (E2) to generate an intermediate Ub-E2 complex. The Ub-ligase (E3) then catalyzes the transfer of Ub from E2 to the appropriate protein substrate. A wide range of enzymes facilitate in the proteolytic Ub pathway, including upstream regulatory element binding protein 1 (URE-B1), which functions as a suppressor element in the regulation of dynorphin and macrophage inflammatory protein 1 β gene transcription. URE-B1 is also a negative regulator of p53 during the colorectal carcinoma progression through the ubiquitination pathway mediated by its HECT domain.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: HUWE1 (human) mapping to Xp11.22; Huwe1 (mouse) mapping to X F3.

SOURCE

URE-B1 (N-17) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of URE-B1 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-49767 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

URE-B1 (N-17) is recommended for detection of URE-B1 (isoforms 1-3 reactive) 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).

URE-B1 (N-17) is also recommended for detection of URE-B1 (isoforms 1-3 reactive) in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for URE-B1 siRNA (h): sc-61758, URE-B1 siRNA (m): sc-61759, URE-B1 shRNA Plasmid (h): sc-61758-SH, URE-B1 shRNA Plasmid (m): sc-61759-SH, URE-B1 shRNA (h) Lentiviral Particles: sc-61758-V and URE-B1 shRNA (m) Lentiviral Particles: sc-61759-V.

Molecular Weight of URE-B1: 482.7 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.

PROTOCOLS

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