

CARF (P-18): sc-74908

BACKGROUND

CARF (calcium-response factor), also known as ALS2CR8 (amyotrophic lateral sclerosis 2 chromosomal region candidate gene 8 protein) or NYD-SP24, is a 725 amino acid nuclear protein. Expressed in a wide variety of tissues with highest expression in the hippocampus, CARF is thought to be a transcription factor that associates with the p53 tumor suppression pathway. CARF cooperates, co-localizes and is co-regulated with ARF, an ADP-ribosylation factor, and, through this interaction, helps to mediate ARF-p53-induced apoptotic signaling. This apoptotic pathway is implicated in cell cycle control, proper cellular development, response to DNA damage and the aging process, suggesting that CARF participates in various events throughout the cell. Mutations in the gene encoding CARF may be implicated in familial amyotrophic lateral sclerosis 2, a fatal neurodegenerative disease that is characterized by upper and lower motor neuron damage. Two isoforms of CARF exist due to alternative splicing events.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: ALS2CR8 (human) mapping to 2q33.2.

SOURCE

CARF (P-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of CARF 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-74908 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

CARF (P-18) is recommended for detection of CARF of 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).

CARF (P-18) is also recommended for detection of CARF in additional species, including porcine.

Suitable for use as control antibody for CARF siRNA (h): sc-72795, CARF shRNA Plasmid (h): sc-72795-SH and CARF shRNA (h) Lentiviral Particles: sc-72795-V.

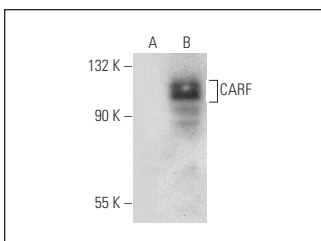
Molecular Weight of CARF: 84 kDa.

Positive Controls: HeLa nuclear extract: sc-2120, Jurkat nuclear extract: sc-2132 or CARF (h2): 293T Lysate: sc-159702.

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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.

DATA



CARF (P-18): sc-74908. Western blot analysis of CARF expression in non-transfected: sc-117752 (A) and human CARF transfected: sc-159702 (B) 293T whole cell lysates.

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.