

Freud-1 (Q-19): sc-79484

BACKGROUND

Freud-1 (five repressor element under dual repression-binding protein 1), also known as CC2D1A (coiled-coil and C2 domain-containing protein 1A) or MRT3, is a 951 amino acid protein that localizes to both the nucleus and the cytoplasm and contains one C2 domain. Existing as three alternatively spliced isoforms, Freud-1 functions as a transcription factor that binds specifically to the five repressor element (FRE) and, via this binding, represses the transcription of SR-1A in neuronal cells. Due to its influence on SR-1A transcription, Freud-1 may be associated with the development of anxiety and major depression. Defects in the gene encoding Freud-1 are the cause of non-syndromic mental retardation autosomal recessive type 3 (MRT3), which is characterized by severe mental retardation and psychomotor development delay in early childhood.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: CC2D1A (human) mapping to 19p13.12; Cc2d1a (mouse) mapping to 8 C3.

SOURCE

Freud-1 (Q-19) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of Freud-1 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-79484 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

Freud-1 (Q-19) is recommended for detection of Freud-1 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).

Freud-1 (Q-19) is also recommended for detection of Freud-1 in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for Freud-1 siRNA (h): sc-75065, Freud-1 siRNA (m): sc-75066, Freud-1 shRNA Plasmid (h): sc-75065-SH, Freud-1 shRNA Plasmid (m): sc-75066-SH, Freud-1 shRNA (h) Lentiviral Particles: sc-75065-V and Freud-1 shRNA (m) Lentiviral Particles: sc-75066-V.

Molecular Weight of Freud-1: 104 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.