SANTA CRUZ BIOTECHNOLOGY, INC.

FAM172A (A-21): sc-130924

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The Power to Question

BACKGROUND

FAM172A (family with sequence similarity 172, member A), also known as C5orf21 or DKFZp564D172, is a 416 amino acid secreted protein belonging to the UPF0528 family and is encoded by a gene located on human chromosome 5. Chromosome 5 contains 181 million base pairs and comprises nearly 6% of the human genome. Chromosome 5 is associated with Cockayne syndrome through the ERCC8 gene and familial adenomatous polyposis through the adenomatous polyposis coli (APC) tumor suppressor gene. Treacher Collins syndrome is also chromosome 5-associated and is caused by insertions or deletions within the TCOF1 gene. Deletion of the p arm of chromosome 5 leads to cri du chat syndrome, while deletion of the q arm or of chromosome 5 altogether is common in therapy-related acute myelogenous leukemias and myelodysplastic syndrome.

REFERENCES

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3. Kadmon, M., Tandara, A. and Herfarth, C. 2001. Duodenal adenomatosis in familial adenomatous polyposis coli. A review of the literature and results from the heidelberg polyposis register. Int. J. Colorectal Dis. 16: 63-75.
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6. Cleaver, J.E., Hefner, E., Laposa, R.R., Karentz, D. and Marti, T. 2007. Cockayne syndrome exhibits dysregulation of p21 and other gene products that may be independent of transcription-coupled repair. Neuroscience 145: 1300-1308.

CHROMOSOMAL LOCATION

Genetic locus: Fam172a (mouse) mapping to 13 C1.

SOURCE

FAM172A (A-21) is an affinity purified rabbit polyclonal antibody raised against synthetic FAM172A peptide of mouse origin.

PRODUCT

Each vial contains 50 µg IgG in 500 µl PBS with < 0.1% sodium azide, 0.1% gelatin and < 0.02% sucrose.

RESEARCH USE

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

APPLICATIONS

FAM172A (A-21) is recommended for detection of FAM172A of mouse 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)] and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for FAM172A siRNA (m): sc-108177, FAM172A shRNA Plasmid (m): sc-108177-SH and FAM172A shRNA (m) Lentiviral Particles: sc-108177-V.

Molecular Weight (predicted) of FAM172A: 48 kDa.

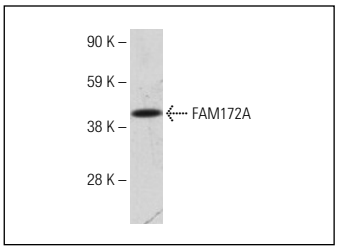
Molecular Weight (observed) of FAM172A: 46 kDa.

Positive Controls: NIH/3T3 whole cell lysate: sc-2210 or mouse brain extract: sc-2253.

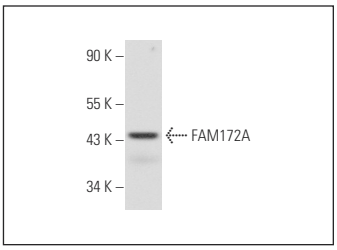
RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (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).

DATA



FAM172A (A-21): sc-130924. Western blot analysis of FAM172A expression in NIH/3T3 whole cell lysate.



FAM172A (A-21): sc-130924. Western blot analysis of FAM172A expression in mouse brain tissue extract.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PROTOCOLS

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