# FAM170A (I-19): sc-246629



The Power to Question

#### **BACKGROUND**

FAM170A (family with sequence similarity 170, member A), also known as ZNFD (zinc finger domain-containing protein), is a 330 amino acid protein containing one  $\rm C_2H_2$ -type zinc finger. Existing as four alternatively spliced isoforms, FAM170A is encoded by a gene located on human chromosome 5q23.1. Chromosome 5 consists of 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**

- Rauch, A. and Dörr, H.G. 2007. Chromosome 5q subtelomeric deletion syndrome. Am. J. Med. Genet. C, Semin. Med. Genet. 145C: 372-376.
- Villa, N., et al. 2007. Fetal trisomy 5 mosaicism: case report and literature review. Am. J. Med. Genet. A 143A: 2343-2346.
- Shadduck, R.K., et al. 2007. Recent advances in myelodysplastic syndromes. Exp. Hematol. 35: 137-143.
- Falini, B., et al. 2007. Translocations and mutations involving the nucleophosmin (NPM1) gene in lymphomas and leukemias. Haematologica 92: 519-532.
- 5. Kristoffersen, K.E. 2008. Speech and language development in cri du chat syndrome: a critical review. Clin. Linguist. Phon. 22: 443-457.

## **CHROMOSOMAL LOCATION**

Genetic locus: FAM170A (human) mapping to 5q23.1.

# **SOURCE**

FAM170A (I-19) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of FAM170A of human origin.

#### **PRODUCT**

Each vial contains 200  $\mu g$  lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-246629 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

### **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.

#### **APPLICATIONS**

FAM170A (I-19) is recommended for detection of FAM170A of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g 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); non cross-reactive with FAM170.

FAM170A (I-19) is also recommended for detection of FAM170A in additional species, including canine.

Suitable for use as control antibody for FAM170A siRNA (h): sc-91645, FAM170A shRNA Plasmid (h): sc-91645-SH and FAM170A shRNA (h) Lentiviral Particles: sc-91645-V.

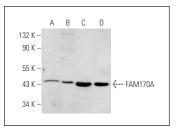
Molecular Weight of FAM170A isoforms 1/2/3/4: 37/32/28 kDa.

Positive Controls: Jurkat whole cell lysate: sc-2204, HeLa whole cell lysate: sc-2200 or Hs 732.Sk/Mu whole cell lysate: sc-364362.

### **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



FAM170A (I-19): sc-246629. Western blot analysis of FAM170A expression in HeLa (**A**), Jurkat (**B**) and Hs 732.Sk/Mu (**C**) whole cell lysates and human testis tissue extract (**D**).

## **RESEARCH USE**

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

Santa Cruz Biotechnology, Inc. 1.800.457.3801 831.457.3801 Fax 831.457.3801 Europe +00800 4573 8000 49 6221 4503 0 www.scbt.com