SANTA CRUZ BIOTECHNOLOGY, INC.

XAGE-3 (E-12): sc-169822



The Power to Question

BACKGROUND

XAGE-3 (X antigen family, member 3), also known as PLAC6 (placenta-specific gene 6 protein), GAGED4 (G antigen family D member 4), CT12.3a (cancer/ testis antigen 12.3), CT12.3b or pp9012, is a 111 amino acid protein that belongs to the GAGE family and XAGE subfamily. XAGE-3 is thought to play a role in inhibition of cancer cell growth and is expressed primarily in placenta and fetal liver and spleen. The gene encoding XAGE-3 maps to human chromosome X, which consists of about 153 million base pairs and nearly 1,000 genes. The combination of a X and Y chromosome lead to normal male development while two copies of X lead to normal female development. There are a number of conditions related to an unusual number and combination of sex chromosomes being inherited, including Turner's syndrome, Klinefelter's syndrome and Triple X syndrome. Color blindness, hemophilia, and Duchenne muscular dystrophy are well known X chromosome-linked conditions which affect males more frequently as males carry a single X chromosome.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: XAGE3 (human) mapping to Xp11.22.

SOURCE

XAGE-3 (E-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of XAGE-3 of human origin.

STORAGE

Store at 4° C, **D0 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.

PRODUCT

Each vial contains 200 μg lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-169822 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

XAGE-3 (E-12) is recommended for detection of XAGE-3 of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ 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 other XAGE family members.

Suitable for use as control antibody for XAGE-3 siRNA (h): sc-90960, XAGE-3 shRNA Plasmid (h): sc-90960-SH and XAGE-3 shRNA (h) Lentiviral Particles: sc-90960-V.

Molecular Weight of XAGE-3: 12 kDa.

Positive Controls: XAGE-3 (h): 293T Lysate: sc-370723.

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

	A	В	
90 K – 55 K – 43 K – 34 K –	H		XAGE-3
23 K –			, MOLO

XAGE-3 (E-12): sc-169822. Western blot analysis of XAGE-3 expression in non-transfected: sc-117752 (A) and human XAGE-3 transfected: sc-370723 (B) 293T whole cell lysates.

RESEARCH USE

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