

# CXorf38 (T-18): sc-241372

## BACKGROUND

The X and Y chromosomes are the human sex chromosomes. Chromosome X consists of about 153 million base pairs and nearly 1,000 genes. The combination of an 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. More than one copy of the X chromosome with a Y chromosome causes Klinefelter's syndrome. A single copy of X alone leads to Turner's syndrome. More than two copies of the X chromosome, in the absence of a Y chromosome, is known as 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. The CXorf38 gene product has been provisionally designated CXorf38 pending further characterization.

## REFERENCES

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- Bernardino-Sgherri, J., et al. 2002. Overall DNA methylation and chromatin structure of normal and abnormal X chromosomes. *Cytogenet. Genome Res.* 99: 85-91.
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- Muntoni, F., et al. 2003. Dystrophin and mutations: one gene, several proteins, multiple phenotypes. *Lancet Neurol.* 2: 731-740.
- Deeb, S.S. 2005. The molecular basis of variation in human color vision. *Clin. Genet.* 67: 369-377.
- Bojesen, A., et al. 2006. The metabolic syndrome is frequent in Klinefelter's syndrome and is associated with abdominal obesity and hypogonadism. *Diabetes Care* 29: 1591-1598.
- Hayashi, T., et al. 2006. Novel form of a single X-linked visual pigment gene in a unique dichromatic color-vision defect. *Vis. Neurosci.* 23: 411-417.

## CHROMOSOMAL LOCATION

Genetic locus: CXorf38 (human) mapping to Xp11.4; 1810030007Rik (mouse) mapping to X A1.1.

## SOURCE

CXorf38 (T-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of CXorf38 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-241372 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

CXorf38 (T-18) is recommended for detection of 1810030007Rik of mouse origin, CXorf38 of human origin and RGD1565685 of rat 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).

CXorf38 (T-18) is also recommended for detection of CXorf38 in additional species, including canine, bovine and porcine.

Suitable for use as control antibody for CXorf38 siRNA (h): sc-91161, 1810030007Rik siRNA (m): sc-108566, CXorf38 shRNA Plasmid (h): sc-91161-SH, 1810030007Rik shRNA Plasmid (m): sc-108566-SH, CXorf38 shRNA (h) Lentiviral Particles: sc-91161-V and 1810030007Rik shRNA (m) Lentiviral Particles: sc-108566-V.

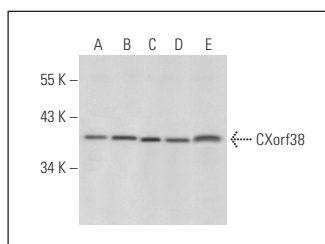
Molecular Weight of CXorf38: 37 kDa.

Positive Controls: CXorf38 (h): 293T Lysate: sc-174933, HeLa whole cell lysate: sc-2200 or K-562 whole cell lysate: sc-2203.

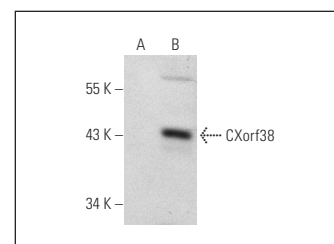
## RECOMMENDED SECONDARY REAGENTS

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



CXorf38 (T-18): sc-241372. Western blot analysis of CXorf38 expression in K-562 (A), Jurkat (B), HeLa (C), MOLT-4 (D) and HL-60 (E) whole cell lysates.



CXorf38 (T-18): sc-241372. Western blot analysis of CXorf38 expression in non-transfected: sc-117752 (A) and human CXorf38 transfected: sc-174933 (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.