

# CMTM1 (N-14): sc-107486

## BACKGROUND

Chemokines are members of a superfamily of small inducible, secreted, pro-inflammatory cytokines. Members of the chemokine-like factor superfamily (CKLF5F) share similarities with both chemokine and transmembrane 4 super-families of signaling molecules. As a member of the CKLF5F family of proteins, CMTM1 (CKLF-like MARVEL transmembrane domain-containing protein 1), also known as CKLF5F1 (chemokine-like factor superfamily member 1), is a 169 amino acid multi-pass membrane protein that is highly expressed in testis, therefore probably playing a role in spermatogenesis or testicular development. CMTM1 contains a CC-chemokine motif and four transmembrane segments. The gene encoding CMTM1 resides in a tight gene cluster on human chromosome 16 with CKLF, CMTM2, CMTM3 and CMTM4. There are at least sixteen isoforms of CMTM1 that are produced as a result of alternative splicing events.

## REFERENCES

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- Xu, M., et al. 2005. A functional promoter region of the CKLF5F2 gene is located in the last intron/exon region of the upstream CKLF5F1 gene. *Int. J. Biochem. Cell Biol.* 37: 1296-1307.
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## CHROMOSOMAL LOCATION

Genetic locus: CMTM1 (human) mapping to 16q21.

## STORAGE

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

## SOURCE

CMTM1 (N-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of CMTM1 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-107486 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

CMTM1 (N-14) is recommended for detection of CMTM1 of 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); non cross-reactive with CMTM1-1α, CMTM1-1β, CMTM1-12 or CMTM1-19.

Suitable for use as control antibody for CMTM1 siRNA (h): sc-92994, CMTM1 shRNA Plasmid (h): sc-92994-SH and CMTM1 shRNA (h) Lentiviral Particles: sc-92994-V.

Molecular Weight of CMTM1: 19 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<sup>™</sup> compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker<sup>™</sup> 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<sup>™</sup> Mounting Medium: sc-24941.

## RESEARCH USE

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

## PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) or our catalog for detailed protocols and support products.