## SANTA CRUZ BIOTECHNOLOGY, INC.

# MOBP (T-13): sc-31604



## BACKGROUND

The gene encoding MOBP (Myelin-associated oligodendrocytic basic protein), a member of the central nervous system myelin-constituting proteins, maps to chromosome 3p22.2. MOBP has many splice variants that share a 68 amino acid N-terminal domain. MOBP-71, MOBP-81A, MOBP-99 and MOBP-169 are MOBP splice variants that contain exon 8b, which is similar to Myelin basic protein (MBP) mRNA RTS, however MOBP-69, MOBP-81B, and MOBP-170 lack this exon. The splice variants that contain exon 8b are expressed in Myelin, while those lacking exon 8b are retained in the oligodendrocyte soma. Exon 8b-containing variants are directed to sites of Myelin sheath assembly by exon 8b, where they play a structural role in Myelin formation. Splice variants lacking exon 8b likely play a cellular and/or regulatory role. MOBP is implicated in multiple sclerosis (MS), a human demyelinating disease, and in allergic encephalomyelitis in rodents.

#### REFERENCES

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- Zerari, F., Karpitskiy, V., Krause, J., Descarries, L. and Couture, R. 1997. Immunoelectron microscopic localization of NK-3 receptor in the rat spinal cord. Neuroreport 8: 2661-2664.
- 4.Renzi, D., Pellegrini, B., Tonelli, F., Surrenti, C. and Calabro, A. 2000. Substance P (neurokinin-1) and neurokinin A (neurokinin-2) receptor gene and protein expression in the healthy and inflamed human intestine. Am. J. Pathol. 157: 1511-1522.
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## CHROMOSOMAL LOCATION

Genetic locus: MOBP (human) mapping to 3p22.2; Mobp (mouse) mapping to 9 F4.

## SOURCE

MOBP (T-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of MOBP of human origin.

## PRODUCT

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

Blocking peptide available for competition studies, sc-31604 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

#### **APPLICATIONS**

MOBP (T-13) is recommended for detection of MOBP of mouse, rat and 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).

Suitable for use as control antibody for MOBP siRNA (h): sc-35953, MOBP siRNA (m): sc-35954, MOBP shRNA Plasmid (h): sc-35953-SH, MOBP shRNA Plasmid (m): sc-35954-SH, MOBP shRNA (h) Lentiviral Particles: sc-35953-V and MOBP shRNA (m) Lentiviral Particles: sc-35954-V.

Molecular Weight of MOBP: 25 kDa.

Positive Controls: mouse brain extract: sc-2253 or rat brain extract: sc-2392.

### **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) Immunofluo-rescence: 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.

## **STORAGE**

Store at 4° C, \*\*D0 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.

#### PROTOCOLS

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

## MONOS Satisfation Guaranteed

Try **MOBP (4C2): sc-517016**, our highly recommended monoclonal alternative to MOBP (T-13).