

SLURP1 (P-20): sc-98140

BACKGROUND

SLURP1 (secreted LY6/PLAUR domain containing 1), also known as MDM, ARS, ANUP (anti-neoplastic urinary protein), LY6LS or ArsB (ARS component B), is a 103 amino acid secreted protein that exists as a homodimer possessing antitumor activity. Found in esophagus, stomach, exocervix, gums, urine, sweat, saliva, plasma and tears, SLURP1 is most highly expressed in the acrosyringium of the granular layer of skin, where it helps maintain the structure of the keratinocyte layers of the skin. Also considered a marker for late skin differentiation, SLURP1 contains one UPAR/Ly6 domain and is the cause of an autosomal recessive disorder of the skin known as Mal de Meleda (MDM). MDM is characterized by nail abnormalities, keratotic skin lesions, transgressive palmoplantar keratoderma (PPK), perioral erythema and may sometimes include hyperhidrosis.

REFERENCES

- Ridge, R.J. and Sloane, N.H. 1996. Partial N-terminal amino acid sequence of the anti-neoplastic urinary protein (ANUP) and the anti-tumour effect of the N-terminal nonapeptide of the unique cytokine present in human granulocytes. *Cytokine* 8: 1-5.
- Adermann, K., et al. 1999. Structural and phylogenetic characterization of human SLURP1, the first secreted mammalian member of the Ly-6/uPAR protein superfamily. *Protein Sci.* 8: 810-819.
- Fischer, J., et al. 2001. Mutations in the gene encoding SLURP1 in Mal de Meleda. *Hum. Mol. Genet.* 10: 875-880.
- Charfeddine, C., et al. 2003. A novel missense mutation in the gene encoding SLURP1 in patients with Mal de Meleda from northern Tunisia. *Br. J. Dermatol.* 149: 1108-1115.
- Mastrangeli, R., et al. 2003. ARS Component B: structural characterization, tissue expression and regulation of the gene and protein (SLURP1) associated with Mal de Meleda. *Eur. J. Dermatol.* 13: 560-570.
- Marrakchi, S., et al. 2003. Novel mutations in the gene encoding secreted lymphocyte antigen-6/urokinase-type plasminogen activator receptor-related protein-1 (SLURP1) and description of five ancestral haplotypes in patients with Mal de Meleda. *J. Invest. Dermatol.* 120: 351-355.

CHROMOSOMAL LOCATION

Genetic locus: SLURP1 (human) mapping to 8q24.3.

SOURCE

SLURP1 (P-20) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of SLURP1 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-98140 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

SLURP1 (P-20) is recommended for detection of SLURP1 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).

Suitable for use as control antibody for SLURP1 siRNA (h): sc-77513, SLURP1 shRNA Plasmid (h): sc-77513-SH and SLURP1 shRNA (h) Lentiviral Particles: sc-77513-V.

Molecular Weight of SLURP1: 9 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™ 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) 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.

SELECT PRODUCT CITATIONS

- Swamynathan, S., et al. 2012. Klf4 regulates the expression of slurp1, which functions as an immunomodulatory Peptide in the mouse cornea. *Invest. Ophthalmol. Vis. Sci.* 53: 8433-8446.

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.

PROTOCOLS

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