

Product Information

Monoclonal Anti-TSPAN1, clone TSP13

produced in mouse, tissue culture supernatant

Catalog Number **SAB4200484**

Product Description

Monoclonal Anti-TSPAN1 (mouse IgM isotype) is derived from the hybridoma TSP13 produced by the fusion of mouse myeloma cells and splenocytes from BALB/c mice immunized with a synthetic peptide corresponding to a sequence at the N-terminus of human TSPAN1 (GeneID 10103), conjugated to KLH. The isotype is determined by ELISA using Mouse Monoclonal Antibody Isotyping Reagents, Catalog Number ISO2. The antibody is originated from culture supernatant of hybridoma cells grown in a bioreactor.

Monoclonal Anti-TSPAN1 recognizes human and mouse TSPAN1. The product may be used in several immunochemical techniques including immunoblotting (~ 26 kDa) and immunocytochemistry. Staining of the TSPAN1 band in immunoblotting is specifically inhibited by the immunizing protein.

Tetraspanins constitute a large family of ubiquitously expressed membrane proteins. Its members have been identified and implicated in the regulation of cell development, differentiation, proliferation, motility and tumor cell invasion.¹ TSPAN1 (formerly referred to as NET-1) is a new member of the tetraspanin family. Sequence analysis of TSPAN1 reveals a structure typical for tetraspanins, with the presence of four transmembrane domains delimiting two extracellular regions as well as conserved amino acid residues.² Over-expression of TSPAN1 has been observed in various tumors such as gastric, hepatocellular, ovarian as well as in colon cancer tissues.³⁻⁶ Studies have demonstrated that TSPAN1 protein not only stimulates cell proliferation but also enhances invasion and migration of gastric carcinoma cells.^{4,7-8} These findings suggested that TSPAN1 may play an important role in tumor progression in many of these cancers.

Reagent

Supplied as a culture supernatant solution containing 15 mM sodium azide as a preservative. The product contains fetal calf serum.

Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

Storage/Stability

For extended storage, freeze at -20 °C in working aliquots. Repeated freezing and thawing, or storage in "frost-free" freezers, is not recommended. If slight turbidity occurs upon prolonged storage, clarify the solution by centrifugation before use. Working dilution samples should be discarded if not used within 12 hours.

Product Profile

Immunoblotting: a working dilution of 1:8,000-1:16,000 is recommended using HL-60 total cell extracts.

Immunofluorescence: a working dilution of 1:250-1:500 is recommended using HL-60 cells.

Note: In order to obtain the best results using various techniques and preparations, we recommend determining optimal working dilutions by titration.

References

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3. Bennett, G., et al., *BMC Cancer*, **11**, 50-59 (2011).
4. Chen, Y., et al., *J. Korean Med. Sci.*, **25**, 1438-1442 (2010).
5. Scholz, C.J., et al., *Cancer Lett.*, **275**, 198-203 (2009).
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