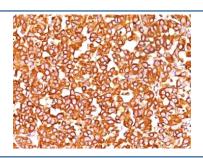


# VIM Antibody / Vimentin [clone SPM576] (V9098)

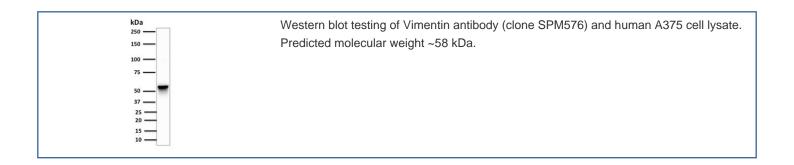
Catalog No.	Formulation	Size
V9098-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V9098-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V9098SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug
V9098IHC-7ML	Prediluted in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide; *For IHC use only*	7 ml

## **Bulk quote request**

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Clonality	Monoclonal (mouse origin)
Isotype	Mouse IgG1, kappa
Clone Name	SPM576
Purity	Protein G affinity chromatography
UniProt	P08670
Localization	Cytoplasmic
Applications	Western Blot : 1-2ug/ml Immunohistochemistry (FFPE) : 1-2ug/ml for 30 min at RT (1) (2)
Limitations	This VIM antibody is available for research use only.



IHC: Formalin-fixed, paraffin-embedded human melanoma stained with VIM antibody (clone SPM576).



#### **Description**

VIM antibody detects vimentin, a type III intermediate filament protein encoded by the VIM gene. Vimentin is expressed predominantly in mesenchymal cells, where it maintains cytoskeletal integrity, supports organelle positioning, and regulates migration. Because vimentin is a central marker of epithelial-mesenchymal transition, VIM antibody is widely used in oncology, developmental biology, and pathology.

Vimentin filaments form an essential part of the cytoskeleton, working alongside actin and microtubules to preserve cellular structure. They facilitate processes such as polarity, adhesion, and motility, which are crucial for wound healing, immune function, and embryogenesis. In cancer biology, vimentin expression correlates with invasiveness, metastatic potential, and poor prognosis, making it a widely studied marker of tumor progression.

The VIM antibody clone SPM576 provides consistent and specific recognition. Clone SPM576 has been referenced in peer-reviewed publications examining EMT, tumor biology, and cytoskeletal regulation. Its reproducibility supports immunohistochemistry, Western blotting, and immunofluorescence, where accurate detection of vimentin is required.

Research using clone SPM576 has demonstrated how vimentin upregulation accompanies EMT in carcinomas, supporting cellular reprogramming from an epithelial to a mesenchymal state. In developmental biology, vimentin serves as a hallmark of early mesenchymal differentiation, while in pathology, it distinguishes mesenchymal-derived tumors such as sarcomas from epithelial neoplasms. This antibody has also supported research into cytoskeletal remodeling in inflammation and tissue repair.

NSJ Bioreagents supplies this VIM antibody to support oncology, developmental biology, and cytoskeletal research. Alternate designations include vimentin antibody, intermediate filament protein antibody, mesenchymal marker antibody, EMT protein antibody, fibroblast cytoskeleton antibody, and sarcoma marker antibody.

## **Application Notes**

The optimal dilution of the VIM antibody for each application should be determined by the researcher.

- 1. Staining of formalin-fixed tissues requires boiling tissue sections in pH 9 10mM Tris with 1mM EDTA for 10-20 min followed by cooling at RT for 20 minutes.
- 2. The prediluted format is supplied in a dropper bottle and is optimized for use in IHC. After epitope retrieval step (if required), drip mAb solution onto the tissue section and incubate at RT for 30 min.

### **Immunogen**

Human recombinant protein was used as the immunogen for this VIM antibody.

#### **Storage**

Store the VIM antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).