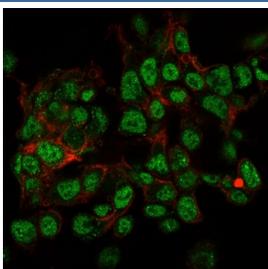


SUMO-2/3 Antibody [clone SPM572] (V9080)

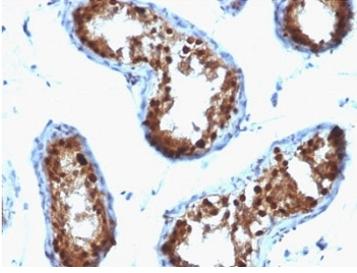
Catalog No.	Formulation	Size
V9080-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V9080-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V9080SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug
V9080IHC-7ML	Prediluted 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
Host	Mouse
Clonality	Monoclonal (mouse origin)
Isotype	Mouse IgG1, kappa
Clone Name	SPM572
Purity	Protein G affinity chromatography
UniProt	P61956
Localization	Predominantly nuclear with some cytoplasmic
Applications	Immunofluorescence : 1-2ug/ml Immunohistochemistry (FFPE) : 2-4ug/ml for 30 min at RT
Limitations	This SUMO-2/3 antibody is available for research use only.



Immunofluorescent testing of PFA-fixed human HepG2 cells with SUMO2/3 antibody (green, clone SPM572) and Phalloidin (red).



IHC: Formalin-fixed, paraffin-embedded human testicular carcinoma stained with SUMO-2/3 antibody (clone SPM572).

Description

This mAb reacts with both SUMO-2 and SUMO-3. The small ubiquitin-related modifier (SUMO) proteins, which include SUMO-1, 2 and 3, belong to the ubiquitin-like protein family. Like ubiquitin, the SUMO proteins are synthesized as precursor proteins that undergo processing before conjugation to target proteins. Also, both utilize the E1, E2 and E3 cascade enzymes for conjugation. However, SUMO and ubiquitin differ with respect to targeting. Ubiquitination predominantly targets proteins for degradation, whereas sumoylation targets proteins to a variety of cellular processing, including nuclear transport, transcriptional regulation, apoptosis and protein stability. The unconjugated SUMO-1, 2 and 3 proteins localize to the nuclear membrane, nuclear bodies and cytoplasm, respectively. SUMO-1 utilizes Ubc9 for conjugation to several target proteins, which include MDM2, p53, PML and RanGap1. SUMO-2 and 3 contribute to a greater percentage of protein modification than does SUMO-1 and unlike SUMO-1, they can form polymeric chains. In addition, SUMO-3 regulates beta-Amyloid generation and may be critical in the onset or progression of Alzheimer's disease.

Application Notes

The optimal dilution of the SUMO-2/3 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

Recombinant human protein was used as the immunogen for this SUMO-2/3 antibody.

Storage

Store the SUMO-2/3 antibody at 2-8°C (with azide) or aliquot and store at -20°C or colder (without azide).