
Monoclonal Antibody To Porcine Mx1 Protein

Marker for Viral Infection

Monoclonal antibody AM39 recognizes the porcine Mx1 protein. Mx proteins are cytoplasmic proteins induced by type-1 interferons (α and β) in leukocytes. However, there is a baseline level of expression even in the absence of viral infection. In humans, mainly monocytes and lymphocytes have been shown to express the Mx gene, whereas Mx expression is low in granulocytes. Mx proteins are high molecular weight GTPases of 70 - 80kD which belong to the dynamin superfamily. Mx proteins have a strong propensity to aggregate and form homo-oligomers. A unique property is their antiviral activity against many RNA viruses.

Product Number:	T-3501 (Lot 01PO0904)
Clone:	AM39
Host species, isotype:	Mouse IgG1 kappa
Quantity:	200 μ g
Format:	Affinity purified, lyophilized Reconstitute by adding 0.5ml distilled water. This stock solution contains 0.4mg/ml IgG, phosphate buffered saline pH 7.2 (PBS), 5mg/ml bovine serum albumin (BSA) as a stabilizer and 0.09% sodium azide as a preservative.
Stability:	Original vial: 1 year at 4° - 8°C Stock solution or aliquots thereof: 1 year at -20°C. Avoid repeated thawing and freezing.
Applications:	Tested for immunohistochemistry (IHC), Western Blot, ELISA. Approximate working dilution for IHC: Frozen sections: 2-4 μ g/ml (1:100-1:200) swine tissue Paraffin sections: 8 μ g/ml (1:50); microwave pretreatment for antigen retrieval recommended. Optimal dilutions should be determined by the end user. Suggested positive control: Swine spleen. Please see www.bma.ch for protocols and general information.
Immunogen:	Recombinant porcine Mx1 protein
Antigen, epitope:	The epitope has not been fully characterized

Antigen distribution:

Tissue sections: In frozen sections cells are stained in clearly defined areas in swine spleen. These districts are located in the red and white pulp. In addition, single cells in the red and white pulp are stained.

Staining pattern in paraffin sections is strongly positive on follicular mantle B-lymphocytes whereas staining in germinal centre is weak.

Specificity:

Pig: Mx1 protein

Other species: diffuse reaction in bovine spleen

Selected references

O. Haller & G. Kochs: Interferon-Induced Mx Proteins: Dynammin-Like GTPases with Antiviral Activity. *Traffic* 3: 710-17 (2002). Review Article.

For *in vitro* research only. Caution: this product contains sodium azide, a poisonous and hazardous substance.

T-3501

AM39

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