



# Product Information Sheet

# Polyclonal Anti- Aquaporin 5, AQP5

Catalogue No. PA1230

Lot No. 08G01

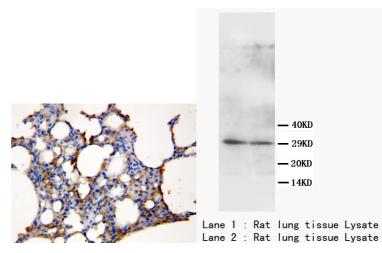
Ig type rabbit IgG

Size 100µg/vial

#### Specificity

Rat, mouse No cross reactivity with other proteins.

Recommended application Western blot



#### Immunogen

A synthetic peptide corresponding to a sequence at the C-terminal of human AQP5, different to the related rat sequence by three amino acids.

# Purity

Immunogen affinity purified.

## Application

	Concen- tration	Tested Species	Concluded Species	Antigen Retrieval
WB	1µg/ml	Rat	Ms	-
IHC-P	-	-	-	-
IHC-F	-	-	-	-
ICC	-	-	-	-

Other applications have not been tested.

Optimal dilutions should be determined by end user.

#### Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na $_2$ HPO $_4$ , 0.05mg Thimerosal, 0.05mg NaN $_3$ .

#### Reconstitution

To reorder contact us at: Antagene, Inc. Toll Free: 1(866)964-2589 email: Info@antageneinc.com 0.2ml of distilled water will yield a concentration of 500µg/ml.

#### Storage

At -20°C for one year. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for longer time.

#### FOR RESEARCH USE ONLY. NOT FOR DIAGNOSTIC AND CLINICAL USE.

## BACKGROUND

Aquaporin 5, also known as AQP5, is a water channel protein. The aquaporins (AQPs) are a family of more than 10 homologous water transporting proteins expressed in many mammalian epithelia and endothelia. At least five AQPs are expressed in the eye: AQP0 (MIP) in lens fiber, AQP1 in cornea endothelium, ciliary and lens epithelia and trabecular meshwork, AQP3 in conjunctiva, AQP4 in ciliary epithelium and retinal Müller cells, and AQP5 in corneal and lacrimal gland epithelia.<sup>1</sup> Among the seven human aquaporins cloned to date (AQPs 0-6), genes encoding the four most closely related aquaporins (AQP0, AQP2, AQP5, and AQP6) have been mapped to chromosome band 12q13, suggesting an aquaporin family gene cluster at this locus.<sup>2</sup> Aquaporin 5 plays a role in the generation of saliva, tears and pulmonary secretions.

## REFERENCE

- 1. Verkman AS (2003). "Role of aquaporin water channels in eye function.". *Exp. Eye Res.* 76 (2): 137–43.
- 2. Ma T, Yang B, Umenishi F, Verkman AS (1997). "Closely spaced tandem arrangement of AQP2, AQP5, and AQP6 genes in a 27-kilobase segment at chromosome locus 12q13.". *Genomics* 43 (3): 387–9.