

PLUNC antibody - middle region

Rabbit Polyclonal Antibody

Catalog # AI12105

Product Information

Application	WB, IHC
Primary Accession	Q9NP55
Other Accession	NM_016583 , NP_057667
Reactivity	Human, Mouse, Rat, Rabbit, Pig, Goat, Dog, Guinea Pig, Bovine
Predicted	Pig
Host	Rabbit
Clonality	Polyclonal
Calculated MW	26713

Additional Information

Gene ID	51297
Alias Symbol Other Names	LUNX, NASG, SPLUNC1, SPURT, bA49G10.5, PLUNC, LPLUNC3 BPI fold-containing family A member 1, Lung-specific protein X, Nasopharyngeal carcinoma-related protein, Palate lung and nasal epithelium clone protein, Secretory protein in upper respiratory tracts, Short PLUNC1, SPLUNC1, Tracheal epithelium-enriched protein, Von Ebner protein HI, BPIFA1, LUNX, NASG, PLUNC, SPLUNC1, SPURT
Format	Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.
Reconstitution & Storage	Add 50 ul of distilled water. Final anti-PLUNC antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.
Precautions	PLUNC antibody - middle region is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	BPIFA1
Synonyms	LUNX, NASG, PLUNC, SPLUNC1, SPURT
Function	Lipid-binding protein which shows high specificity for the surfactant phospholipid dipalmitoylphosphatidylcholine (DPPC) (PubMed: 25223608). Plays a role in the innate immune responses of the upper airways (PubMed: 23132494 , PubMed: 23499554). Reduces the surface tension in secretions from airway epithelia and inhibits the formation of biofilm by

pathogenic Gram-negative bacteria, such as *P.aeruginosa* and *K.pneumoniae* (PubMed:[23132494](#), PubMed:[23499554](#), PubMed:[27145151](#)). Negatively regulates proteolytic cleavage of SCNN1G, an event that is required for activation of the epithelial sodium channel (ENaC), and thereby contributes to airway surface liquid homeostasis and proper clearance of mucus (PubMed:[24043776](#), PubMed:[24124190](#)). Plays a role in the airway inflammatory response after exposure to irritants (PubMed:[11425234](#)). May attract macrophages and neutrophils (PubMed:[23132494](#)).

Cellular Location

Secreted. Note=Apical side of airway epithelial cells. Detected in airway surface liquid, nasal mucus and sputum

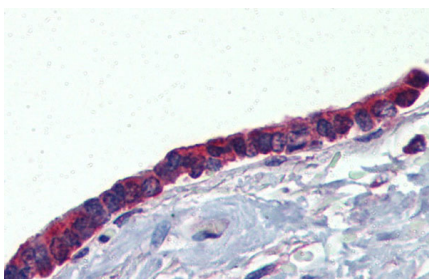
Tissue Location

Highly expressed in lung, upper airways and nasopharyngeal regions, including trachea and nasal epithelium (at protein level) (PubMed:11018263, PubMed:11251963, PubMed:11425234, PubMed:12409287, PubMed:26559477). Specifically expressed in the secretory ducts and submucosal glands of tracheobronchial tissues (at protein level) (PubMed:11425234, PubMed:12409287). Also expressed in the eye where it is detected in lacrimal gland, eyelid, conjunctiva and cornea (at protein level) (PubMed:26559477). Specifically localizes to epithelial cell layers in cornea, eyelid (basal epithelium) and conjunctiva (at protein level) (PubMed:26559477). Detected within acinar cells and ducts in the lacrimal and Meibomian glands (at protein level) (PubMed:26559477). In lung, shows highest expression in the trachea and progressive decrease from proximal (bronchial) to distal (bronchiolar) airways (PubMed:12409287). Also expressed in lung cancers and some other types of cancer (PubMed:11251963)

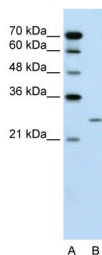
References

Zhou,H.D.,(2006)*Mol.Immunol.*43(11),1864-1871
ReconstitutionandStorage:Forshorttermuse,storeat2-8Cupto 1week.Forlongtermstorage,storeat-20Cinsmallaliquotstopreventfreeze-thawcycles.

Images



Immunohistochemistry with Human Lung, respiratory epithelium tissue at an antibody concentration of 5.0µg/ml using anti-PLUNC antibody



WB Suggested Anti-PLUNC Antibody Titration: 0.2-1 µg/ml
Positive Control: Jurkat cell lysate