

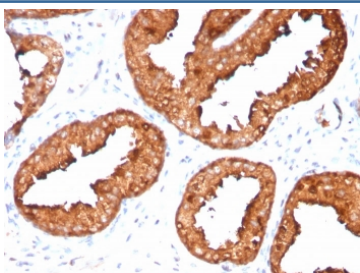
PSA Antibody Recombinant Rabbit MAb KLK3/4551R / Prostate Specific Antigen KLK3 Antibody [clone KLK3/4551R] (V8460)

Catalog No.	Formulation	Size
V8460-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V8460-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V8460SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug

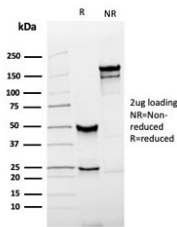
Recombinant **RABBIT MONOCLONAL**

[Bulk quote request](#)

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Rabbit
Clonality	Recombinant Rabbit Monoclonal
Isotype	Rabbit IgG
Clone Name	KLK3/4551R
Purity	Protein A affinity chromatography
UniProt	P07288
Localization	Cytoplasmic
Applications	Immunohistochemistry (FFPE) : 1-2ug/ml for 30 minutes at RT
Limitations	This recombinant PSA antibody is available for research use only.



PSA Antibody Recombinant Rabbit MAb KLK3/4551R IHC staining of human prostate carcinoma. Immunohistochemistry analysis of FFPE human prostate carcinoma tissue using PSA Antibody Recombinant Rabbit MAb KLK3/4551R shows strong HRP-DAB brown cytoplasmic staining in malignant prostate epithelial cells forming glandular tumor structures, consistent with Prostate specific antigen (KLK3) expression in prostate-derived carcinoma cells. Surrounding stromal cells remain largely negative. HIER: tissue sections were boiled in pH 9 10mM Tris with 1mM EDTA for 20 minutes and allowed to cool before testing.



SDS-PAGE analysis of purified, BSA-free recombinant PSA antibody (clone KLK3/4551R) as confirmation of integrity and purity.

Description

Prostate specific antigen (KLK3) is a secreted serine protease encoded by the KLK3 gene and produced primarily by luminal epithelial cells of the prostate gland. The protein is widely known as Prostate specific antigen or PSA and is a member of the kallikrein related peptidase family of serine proteases. PSA Antibody Recombinant Rabbit MAb KLK3/4551R recognizes the KLK3 protein and enables detection of PSA expression in studies investigating prostate epithelial biology and prostate cancer.

PSA is synthesized as a precursor enzyme that contains a signal peptide and propeptide sequence that are removed during secretion and activation. The mature enzyme is released into the lumen of prostatic ducts and acini, where it functions as a protease in seminal plasma. PSA cleaves semenogelin proteins and related substrates, promoting liquefaction of the seminal coagulum following ejaculation and facilitating sperm motility.

In normal prostate tissue, KLK3 expression is largely restricted to luminal epithelial cells lining the prostatic glands. The protein is typically localized to the cytoplasm and glandular luminal secretions of these epithelial cells, reflecting active synthesis and secretion of PSA by prostate epithelium. This restricted cellular distribution has made PSA one of the most widely studied markers of prostate epithelial differentiation.

PSA expression is frequently retained in prostate adenocarcinoma and in metastatic tumors originating from prostate tissue. Detection of Prostate specific antigen therefore provides important biological insight when studying prostate tumor differentiation, tumor origin, and the cellular lineage of prostate-derived malignancies. Evaluation of PSA expression patterns is commonly used in studies examining prostate cancer progression and prostate epithelial biology.

PSA Antibody Recombinant Rabbit MAb KLK3/4551R provides a reagent for detecting KLK3 protein in studies of prostate tissue biology and prostate cancer models. Recombinant monoclonal antibodies recognize a defined epitope within the target protein, enabling consistent antigen recognition and supporting investigation of PSA expression in molecular and cellular research systems.

Application Notes

1. Optimal dilution of the PSA Antibody Recombinant Rabbit MAb KLK3/4551R antibody should be determined by the researcher.
2. This mAb makes an excellent pair with clone 1A7G6B6 for PSA tests.

Immunogen

Recombinant full-length human KLK3/PSA protein was used as the immunogen for the recombinant PSA antibody.

Storage

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

Alternate Names

Prostate specific antigen antibody, KLK3 antibody, Kallikrein related peptidase 3 antibody, Human PSA antibody

