

# LMTK3 Polyclonal antibody

Catalog Number: 22899-1-AP

## Basic Information

## Catalog Number:

22899-1-AP

## Size:

300 µg/ml

## Source:

Rabbit

## Isotype:

IgG

## GenBank Accession Number:

NM\_001080434

## GeneID (NCBI):

114783

## UNIPROT ID:

Q96Q04

## Full Name:

lemur tyrosine kinase 3

## Calculated MW:

154 kDa

## Observed MW:

~155 kDa

## Purification Method:

Antigen Affinity purified

## Recommended Dilutions:

WB 1:500-1:2000

IHC 1:50-1:500

## Applications

## Tested Applications:

IHC, WB, ELISA

## Species Specificity:

human

**Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0**

## Positive Controls:

WB : MCF-7 cells,

IHC : human breast cancer tissue, human lung cancer tissue

## Background Information

LMTK3 is enriched at a perinuclear structure around Golgi membranes, it is present as a dotted pattern throughout neurites, and localized at neuronal synapses. It is also expected to be expressed in brain and duodenum. LMTK3 is a serine/threonine protein kinase expressed predominantly in brain. LMTK3 regulated ER-alpha stability and activity directly at the mRNA level via downregulation of PKC catalytic activity, resulting in less phosphorylated AKT at ser473. In vitro kinase assays indicated that LMTK3 inhibited the ability of PKC to phosphorylate ER-alpha, thereby affecting ER-alpha activity indirectly at the protein level by protecting it from proteasomal degradation. In agreement, analysis with a breast tumor xenograft mouse model revealed that knockdown of LMTK3 reduced proliferation of ER-alpha-positive breast cancer cells and reduced tumor growth. In addition, LMTK3 abundance and intronic polymorphisms were significantly associated with human cancers, overall patient survival, and predicted response to endocrine therapies. The calculated molecular weight of LMTK3 is 153 kDa.

## Storage

## Storage:

Store at -20°C. Stable for one year after shipment.

## Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

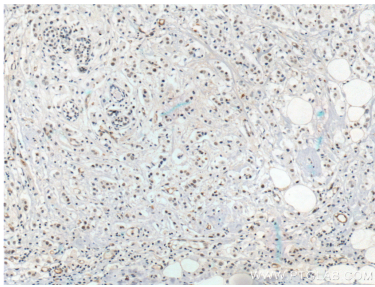
For technical support and original validation data for this product please contact:

T: 4006900926

E: [Proteintech-CN@ptglab.com](mailto:Proteintech-CN@ptglab.com)W: [ptgcn.com](http://ptgcn.com)

**This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.**

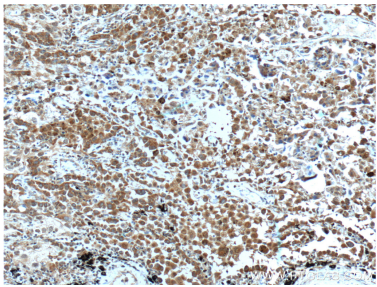
Selected Validation Data



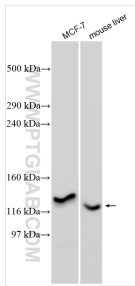
Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 22899-1-AP (LMTK3 Antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 22899-1-AP (LMTK3 Antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 22899-1-AP (LMTK3 Antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 22899-1-AP (LMTK3 antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.