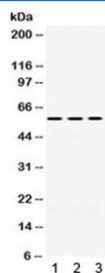


PDIA3 Antibody / ERp57 / Protein disulfide-isomerase A3 (R32052)

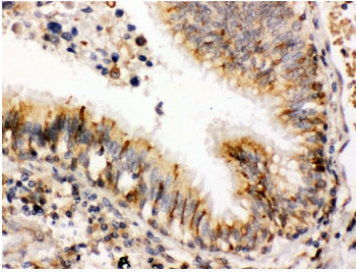
Catalog No.	Formulation	Size
R32052	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

Bulk quote request

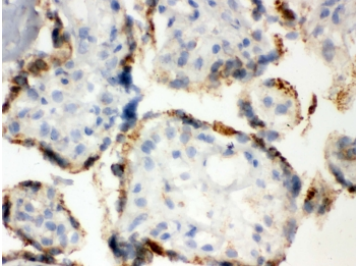
Availability	1-3 business days
Species Reactivity	Human, Mouse, Rat
Format	Antigen affinity purified
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity
Buffer	Lyophilized from 1X PBS with 2.5% BSA, 0.025% sodium azide
UniProt	P30101
Localization	Cytoplasmic, membrane
Applications	Western Blot : 0.1-0.5ug/ml Immunohistochemistry (FFPE) : 0.5-1ug/ml Immunohistochemistry (Frozen) : 0.5-1ug/ml Immunofluorescence : 2-4ug/ml Flow Cytometry : 1-3ug/million cells
Limitations	This PDIA3 antibody is available for research use only.



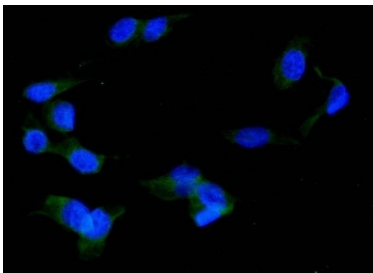
Western blot testing of 1) rat liver, 2) mouse liver and 3) human A549 lysate with PDIA3 antibody. Predicted molecular weight: ~57-60 kDa.



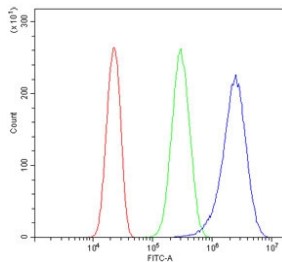
IHC testing of FFPE human lung cancer tissue with PDIA3 antibody. HIER: Boil the paraffin sections in pH 6, 10mM citrate buffer for 20 minutes and allow to cool prior to staining.



IHC testing of frozen human placental tissue with PDIA3 antibody.



Immunofluorescent staining of FFPE human U-2 OS cells with PDIA3 antibody (green) at 2ug/ml and DAPI nuclear stain (blue). HIER: steam section in pH6 citrate buffer for 20 min.



Flow cytometry testing of human PC-3 cells with PDIA3 antibody at 1ug/million cells (blocked with goat sera); Red=cells alone, Green=isotype control, Blue= PDIA3 antibody.

Description

PDIA3 (Protein disulfide isomerase family A, member 3), also called GRP58, Erp57 or ER60, is an isomerase enzyme. It is mapped on 15q15.3. PDIA3 is also part of the major histocompatibility complex (MHC) class I peptide-loading complex, which is essential for formation of the final antigen conformation and export from the endoplasmic reticulum to the cell surface. This gene encodes a protein of the endoplasmic reticulum that interacts with lectin chaperones calreticulin and calnexin to modulate folding of newly synthesized glycoproteins. The protein was once thought to be a phospholipase; however, it has been demonstrated that the protein actually has protein disulfide isomerase activity. It is thought that complexes of lectins and this protein mediate protein folding by promoting formation of disulfide bonds in their glycoprotein substrates.

Application Notes

Optimal dilution of the PDIA3 antibody should be determined by the researcher.

Immunogen

Amino acids RELSDFISYLQREATNPPVIEEKPKKKKKAQEDL of human PDIA3/Erp57 were used as the immunogen for the PDIA3 antibody.

Storage

After reconstitution, the PDIA3 antibody can be stored for up to one month at 4oC. For long-term, aliquot and store at -20oC. Avoid repeated freezing and thawing.