For Research Use Only

## NUP153 Recombinant monoclonal antibody, PBS Only (Capture)

proteintech®

Antibodies | ELISA kits | Proteins

www.ptglab.com

**Purification Method:** 

Protein A purification

CloneNo.:

251519G11

Catalog Number:86622-1-PBS

**Basic Information** 

Catalog Number: GenBank Accession Number:

86622-1-PBS BC052965

Size: GeneID (NCBI): 100ug, Concentration: 1 mg/ml by 9972

Nanodrop; UNIPROT ID:
Source: P49790
Rabbit Full Name:

 Isotype:
 nucleoporin 153kDa

 IgG
 Calculated MW:

 Immunogen Catalog Number:
 154 kDa

 AG5519
 Observed MW:

160-170 kDa

**Applications** 

**Tested Applications:** 

WB, IF/ICC, Sandwich ELISA, Indirect ELISA

Species Specificity: human, mouse

**Product Information** 

86622-1-PBS targets NUP153 as part of a matched antibody pair:

MP02679-1: 86622-1-PBS capture and 86622-2-PBS detection (validated in Sandwich ELISA)

Unconjugated rabbit recombinant monoclonal antibody in PBS only (BSA and azide free) storage buffer at a concentration of 1 mg/mL, ready for conjugation. Created using Proteintech's proprietary in-house recombinant technology. Recombinant production enables unrivalled batch-to-batch consistency, easy scale-up, and future security of supply.

This conjugation ready format makes antibodies ideal for use in many applications including: ELISAs, multiplex assays requiring matched pairs, mass cytometry, and multiplex imaging applications. Antibody use should be optimized by the end user for each application and assay.

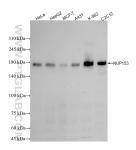
## **Background Information**

NUP153 is an FG-repeat containing NUP, contains a high-affinity site for importin- $\beta$ , localizes on the nucleoplasmic face of the nuclear pore and is required for assembly of the nuclear basket and import of a subset of nuclear proteins [PMID:18845677]. NUP153 also facilitates nuclear export of mRNA and ribonucleoprotein particles and may have additional functions within the nucleus [PMID:16195343]. The 53BP1-NUP153/importin- $\beta$  pathway as an important aspect of the DDR network add to an emerging evidence of subcellular trafficking as an integral part of genome surveillance [PMID:22075984].

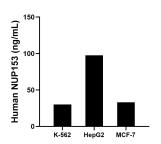
Storage

Storage: Store at -80°C. Storage Buffer: PBS only, pH7.3

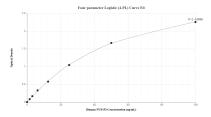
## Selected Validation Data



Various lysates were subjected to SDS PAGE followed by western blot with 86622-1-RR (NUP153 antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 86622-1-PBS in a different storage buffer formulation.



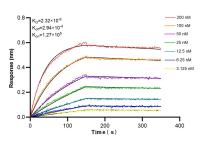
The mean NUP153 concentration was determined to be 30.07 ng/mL in K-562 cell extract based on a 1.20 mg/mL extract load, 97.51 ng/mL in HepG2 cell extract based on a 1.20 mg/mL extract load and 33.07 ng/mL in MCF-7 cell extract based on a 1.20 mg/mL extract load.



Sandwich ELISA standard curve of MP02679-1, Human NUP153 Recombinant Matched Antibody Pair - PBS only. 86622-1-PBS was coated to a plate as the capture antibody and incubated with serial dilutions of standard Ag5519. 86622-2-PBS was HRP conjugated as the detection antibody. Range: 1.56-100 ng/mL



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using NUP153 antibody (86622-1-RR, Clone: 251519G11) at dilution of 1:500 and CoraLite® 488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-Phalloidin (red). This data was developed using the same antibody clone with 86622-1-PBS in a different storage buffer formulation.



Biolayer interferometry (BLL) kinetic assays of 86622-1-RR against Human NUP153 were performed. The affinity constant is 2.32 nM.