

[KD Validated] Anti-PKN1 Rabbit mAb

Purified Recombinant Rabbit Monoclonal Antibody

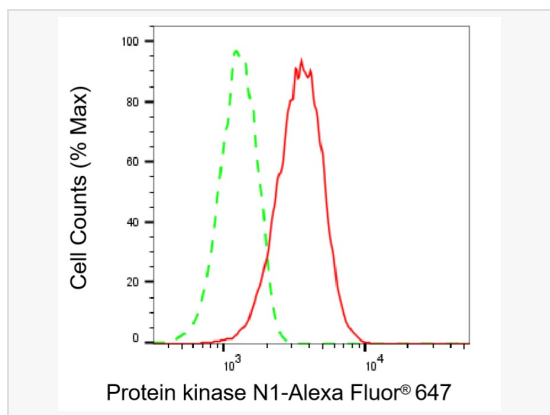
Catalog # R020436

Product Information

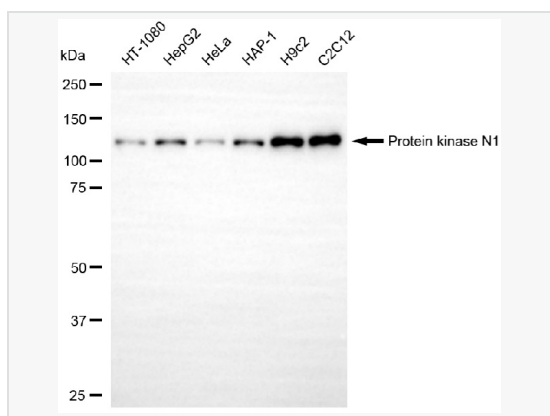
Application	WB, FC
Reactivity	Human, Mouse, Rat
Dilution	WB 1:1,000~1:5,000; FC 1:200~1:2,000
Host	Rabbit
Clonality	Monoclonal
Clone No.	81M97K23
Isotype	IgG
Label	Unconjugated
Immunogen	A synthesized peptide derived from human PKN1
Format	Affinity purified monoclonal antibody supplied in PBS with 0.02% sodium azide and 50% glycerol, pH 7.3.
Storage	Shipped on wet ice. Store at -20°C. Stable for 12 months from date of receipt. Aliquoting is unnecessary for -20°C storage.
Precautions	[KD Validated] Anti-PKN1 Rabbit mAb [81M97K23] is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

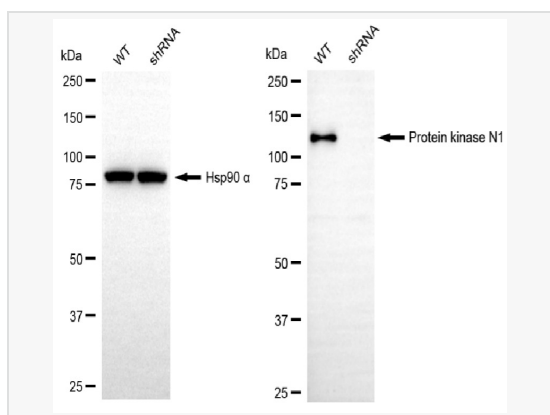
Synonyms	PKN1; Protein Kinase N1; PRK1; PAK1; PKN; Protein Kinase C-Like 1; PRKCL1; DBK; Serine/Threonine-Protein Kinase N1; Protease-Activated Kinase 1; Protein Kinase C-Like PKN; Protein Kinase PKN-Alpha; EC 2.7.11.13; MGC46204; PAK-1; Protein Kinase C-Related Kinase 1; Serine/Threonine Protein Kinase N; Protein-Kinase C-Related Kinase 1; Serine-Threonine Protein Kinase N; Serine-Threonine Kinase N; PKN-ALPHA; EC 2.7.11.
Calculated MW	Calculated MW: 104 kDa; Observed MW: 120 kDa
Uniprot ID	Q16512
Gene ID	5585
Background	The protein encoded by this gene belongs to the protein kinase C superfamily. This kinase is activated by Rho family of small G proteins and may mediate the Rho-dependent signaling pathway. This kinase can be activated by phospholipids and by limited proteolysis. The 3-phosphoinositide dependent protein kinase-1 (PDPK1/PDK1) is reported to phosphorylate this kinase, which may mediate insulin signals to the actin cytoskeleton. The proteolytic activation of this kinase by caspase-3 or related proteases during apoptosis suggests its role in signal transduction related to apoptosis. Alternatively spliced transcript variants encoding distinct isoforms have been observed.



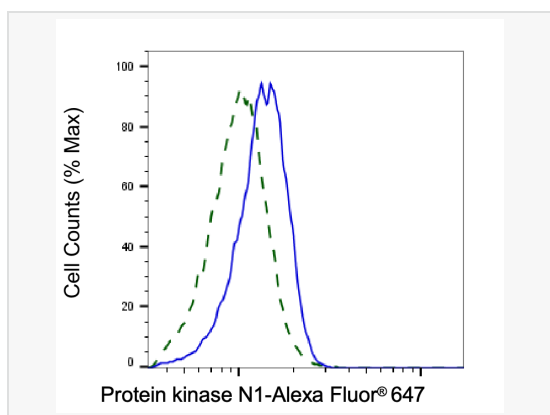
Flow cytometric analysis of Protein kinase N1 expression in C2C12 cells using Protein kinase N1 antibody (R020436, 1:2,000). Green, isotype control; red, Protein kinase N1.



Western blotting analysis using protein kinase N1 antibody (R020436). Total cell lysates (30 µg) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with protein kinase N1 antibody (R020436, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.



Western blotting analysis using protein kinase N1 antibody (R020436). Protein kinase N1A expression in wild-type (WT) and protein kinase N1 (PKN1) shRNA knockdown (KD) HeLa cells with 20 µg of total cell lysates. Hsp90 α serves as a loading control. The blot was incubated with protein kinase N1 antibody (R020436, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.



Validation of Protein kinase N1 knockdown using flow cytometry. Wild-type(WT, Blue) and knockdown(KD, Green) HeLa cells were stained with Protein kinase N1 antibody (R020436, 1:2,000) and analyzed using BD flow cytometer.