

**PI 3 kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody**

<b>Catalog No :</b>	YP0224
<b>Reactivity :</b>	Human;Mouse;Rat;Monkey;Pig
<b>Applications :</b>	WB;IHC;IF;ELISA
<b>Target :</b>	PI3 kinase p85/p55
<b>Fields :</b>	>>EGFR tyrosine kinase inhibitor resistance;>>Endocrine resistance;>>Platinum drug resistance;>>ErbB signaling pathway;>>Ras signaling pathway;>>Rap1 signaling pathway;>>cAMP signaling pathway;>>Chemokine signaling pathway;>>HIF-1 signaling pathway;>>FoxO signaling pathway;>>Phosphatidylinositol signaling system;>>Sphingolipid signaling pathway;>>Phospholipase D signaling pathway;>>Autophagy - animal;>>mTOR signaling pathway;>>PI3K-Akt signaling pathway;>>AMPK signaling pathway;>>Apoptosis;>>Longevity regulating pathway;>>Longevity regulating pathway - multiple species;>>Cellular senescence;>>Axon guidance;>>VEGF signaling pathway;>>Osteoclast differentiation;>>Focal adhesion;>>Signaling pathways regulating pluripotency of stem cells;>>Platelet activation;>>Neutrophil extracellular trap formation;>>Toll-like receptor signaling pathway;>>C-type lectin receptor signaling pathway;>>JAK-STAT signaling pathway;>>Natural killer cell mediated cytotoxicity;>>T cell receptor signaling pathway;>
<b>Gene Name :</b>	PIK3R1/PIK3R3
<b>Protein Name :</b>	Phosphatidylinositol 3-kinase regulatory subunit alpha/gamma
<b>Human Gene Id :</b>	5295
<b>Human Swiss Prot No :</b>	P27986/Q92569
<b>Mouse Gene Id :</b>	18708/18710
<b>Rat Gene Id :</b>	25513/60664
<b>Rat Swiss Prot No :</b>	Q63787/Q63789
<b>Immunogen :</b>	The antiserum was produced against synthesized peptide derived from human PI3-kinase p85-alpha/gamma around the phosphorylation site of Tyr467/199. AA

range:436-485

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**Specificity :** Phospho-PI 3-kinase p85/p55 (Y467/199) Polyclonal Antibody detects endogenous levels of PI 3-kinase p85/p55 protein only when phosphorylated at Y467/199.

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**Formulation :** Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

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**Source :** Polyclonal, Rabbit,IgG

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**Dilution :** WB 1:500 - 1:2000. IHC 1:100 - 1:300. IF 1:200 - 1:1000. ELISA: 1:10000. Not yet tested in other applications.

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**Purification :** The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.

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**Concentration :** 1 mg/ml

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**Storage Stability :** -15°C to -25°C/1 year(Do not lower than -25°C)

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**Observed Band :** 55kD,85kD

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**Cell Pathway :** Regulates Angiogenesis; Regulation\_Microtubule; Regulation of Actin Dynamics; SAPK\_JNK; Stem cell pathway; Insulin Receptor; ErbB/HER; AMPK; mTOR; B Cell Receptor; Adherens\_Junction

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**Background :** Phosphatidylinositol 3-kinase phosphorylates the inositol ring of phosphatidylinositol at the 3-prime position. The enzyme comprises a 110 kD catalytic subunit and a regulatory subunit of either 85, 55, or 50 kD. This gene encodes the 85 kD regulatory subunit. Phosphatidylinositol 3-kinase plays an important role in the metabolic actions of insulin, and a mutation in this gene has been associated with insulin resistance. Alternative splicing of this gene results in four transcript variants encoding different isoforms. [provided by RefSeq, Jun 2011],

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**Function :** disease:Defects in PIK3R1 are a cause of severe insulin resistance.,domain:The SH3 domain mediates the binding to CBLB, and to HIV-1 Nef.,function:Binds to activated (phosphorylated) protein-Tyr kinases, through its SH2 domain, and acts as an adapter, mediating the association of the p110 catalytic unit to the plasma membrane. Necessary for the insulin-stimulated increase in glucose uptake and glycogen synthesis in insulin-sensitive tissues.,PTM:Polyubiquitinated in T-cells by CBLB; which does not promote proteasomal degradation but impairs association with CD28 and CD3Z upon T-cell activation.,similarity:Belongs to the PI3K p85 subunit family.,similarity:Contains 1 Rho-GAP domain.,similarity:Contains 1 SH3 domain.,similarity:Contains 2 SH2 domains.,subunit:Heterodimer of a p110 (catalytic) and a p85 (regulatory)

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subunits. Interacts with phosphorylated TOM1L1. Interacts with phosphorylat

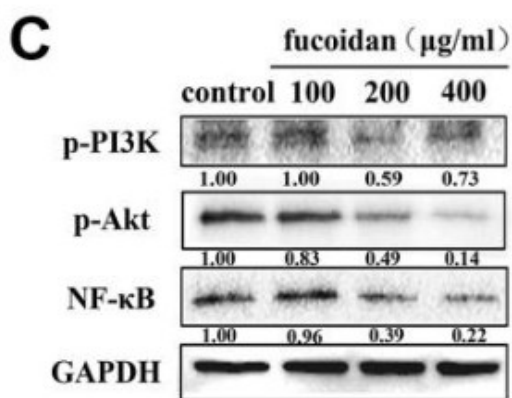
**Subcellular Location :**

nucleus,cytoplasm,cis-Golgi network,cytosol,plasma membrane,cell-cell junction,phosphatidylinositol 3-kinase complex,phosphatidylinositol 3-kinase complex, class IA,membrane,perinuclear endoplasmic reticulum membrane,

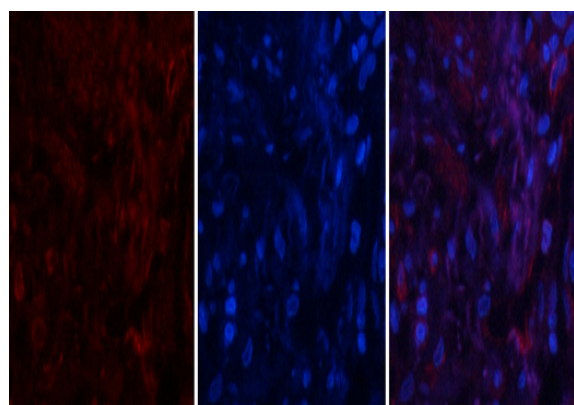
**Expression :**

Isoform 2 is expressed in skeletal muscle and brain, and at lower levels in kidney and cardiac muscle. Isoform 2 and isoform 4 are present in skeletal muscle (at protein level).

## Products Images



Yang, Yazong, et al. "Fucoidan inhibits lymphangiogenesis by downregulating the expression of VEGFR3 and PROX1 in human lymphatic endothelial cells." *Oncotarget* 7.25 (2016): 38025.

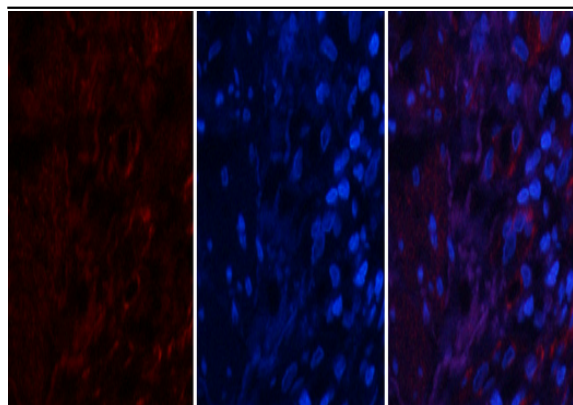


A

B

C

Immunofluorescence analysis of human-lung tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody(red) was diluted at 1:200(4°C,overnight). 2, Cy3 labeled Secondary antibody was diluted at 1:300(room temperature, 50min).3, Picture B: DAPI(blue) 10min. Picture A:Target. Picture B: DAPI. Picture C: merge of A+B

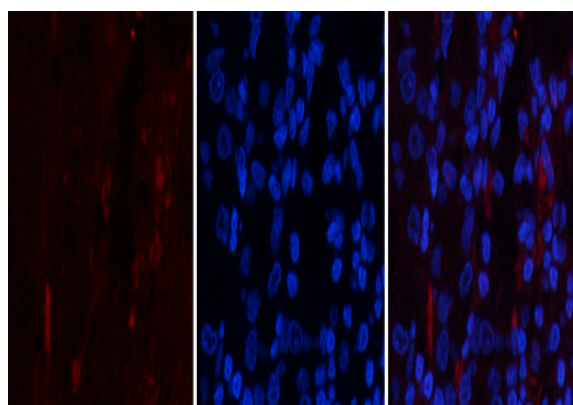


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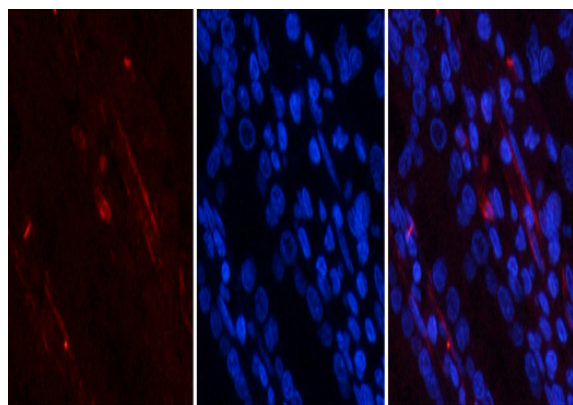


A

B

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Immunofluorescence analysis of human-stomach tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody(red) was diluted at 1:200(4°C,overnight). 2, Cy3 labeled Secondary antibody was diluted at 1:300(room temperature, 50min).3, Picture B: DAPI(blue) 10min. Picture A:Target. Picture B: DAPI. Picture C: merge of A+B

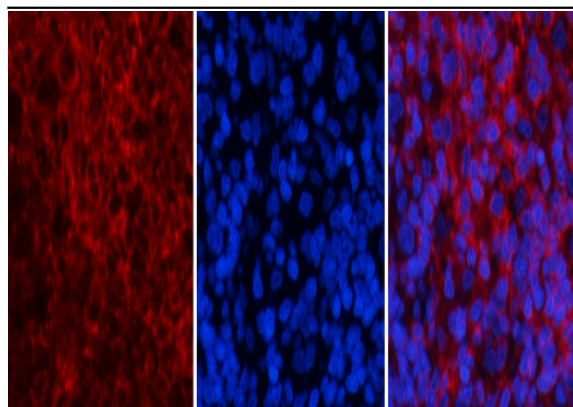


A

B

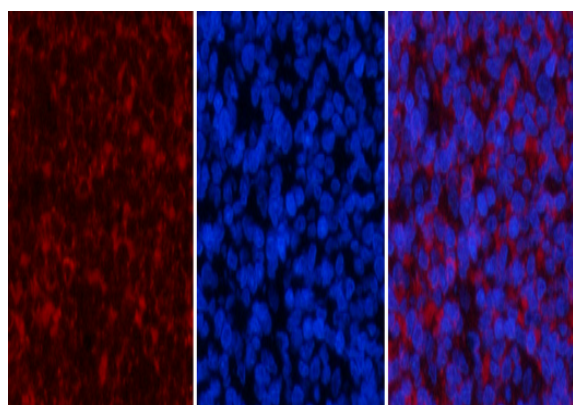
C

Immunofluorescence analysis of human-stomach tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody(red) was diluted at 1:200(4°C,overnight). 2, Cy3 labeled Secondary antibody was diluted at 1:300(room temperature, 50min).3, Picture B: DAPI(blue) 10min. Picture A:Target. Picture B: DAPI. Picture C: merge of A+B



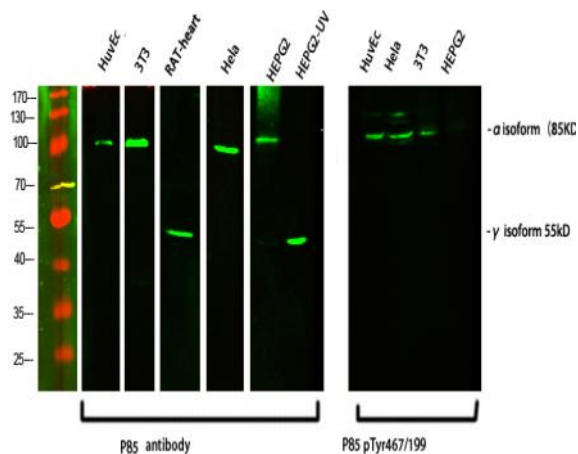
A B C

Immunofluorescence analysis of rat-spleen tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody (red) was diluted at 1:200 (4°C, overnight). 2, Cy3 labeled Secondary antibody was diluted at 1:300 (room temperature, 50 min). 3, Picture B: DAPI (blue) 10 min. Picture A: Target. Picture B: DAPI. Picture C: merge of A+B

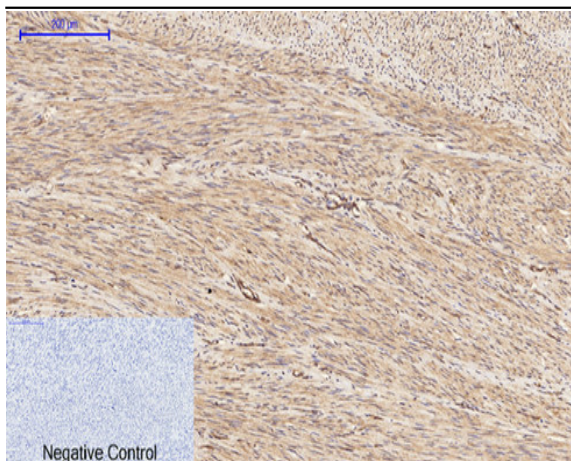


A B C

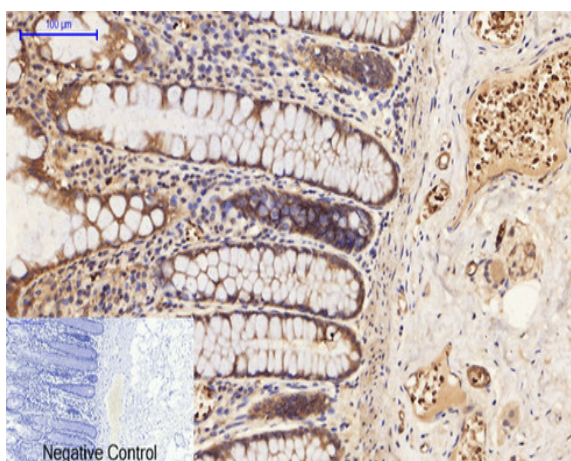
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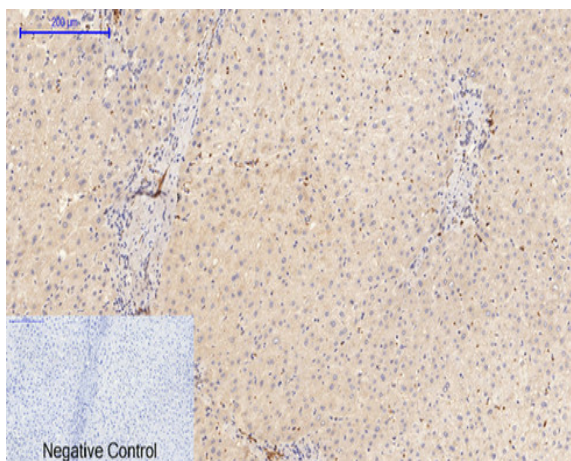
Western Blot analysis of various cells using primary antibody diluted at 1:1000 (4°C overnight). Secondary antibody: Goat Anti-rabbit IgG IRDye 800 (diluted at 1:5000, 25°C, 1 hour)



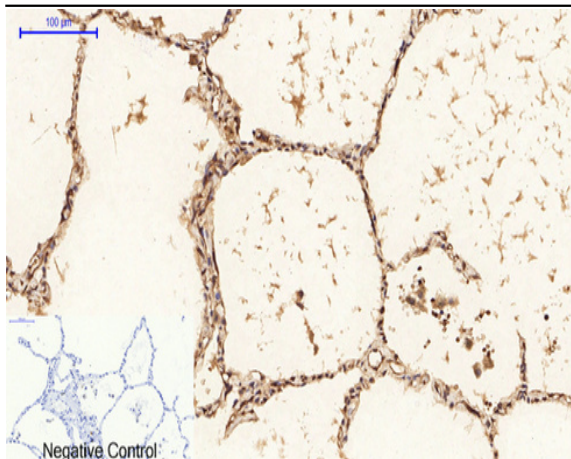
Immunohistochemical analysis of paraffin-embedded Human-uterus tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



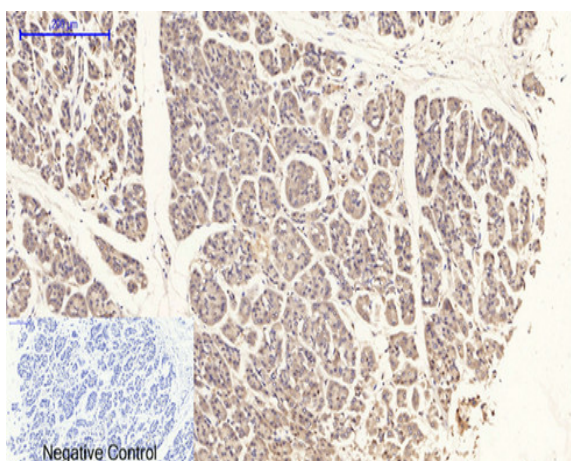
Immunohistochemical analysis of paraffin-embedded Human-colon tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



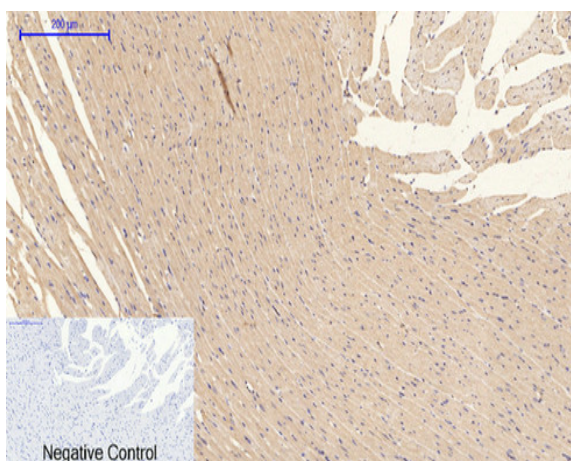
Immunohistochemical analysis of paraffin-embedded Human-liver tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



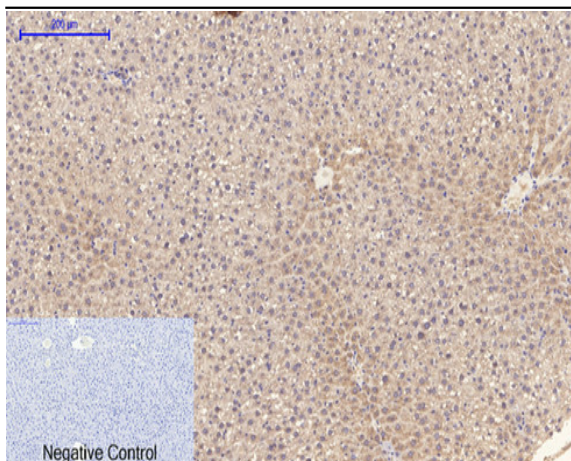
Immunohistochemical analysis of paraffin-embedded Human lung tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



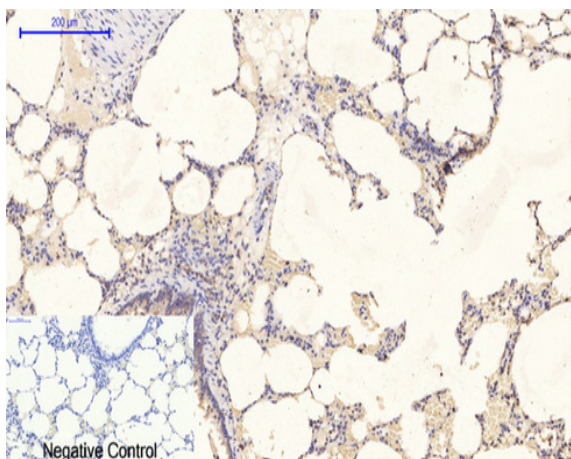
Immunohistochemical analysis of paraffin-embedded Human stomach-cancer tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



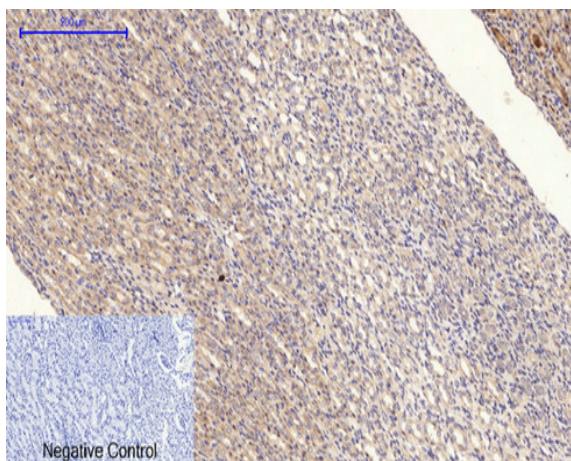
Immunohistochemical analysis of paraffin-embedded Rat-heart tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



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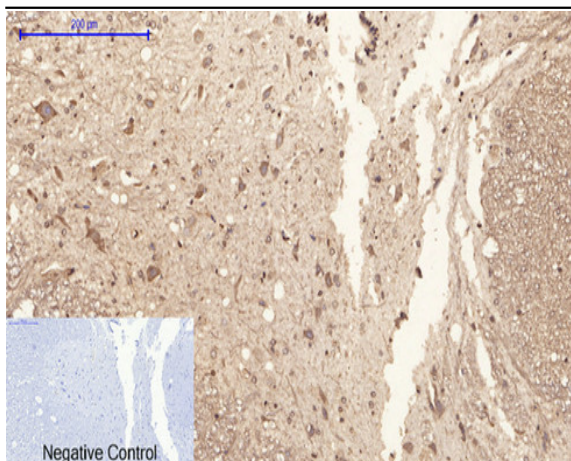


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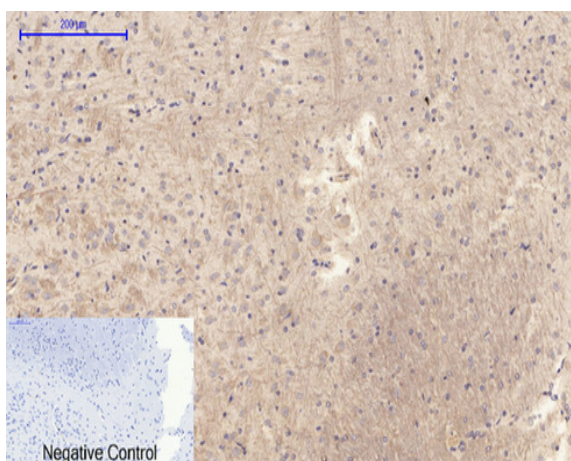


Immunohistochemical analysis of paraffin-embedded Rat-kidney tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.

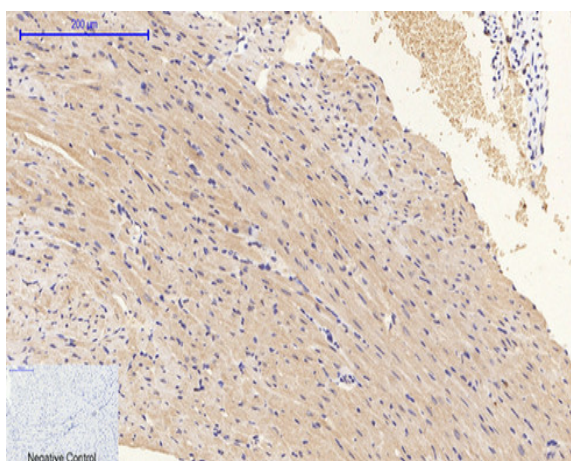




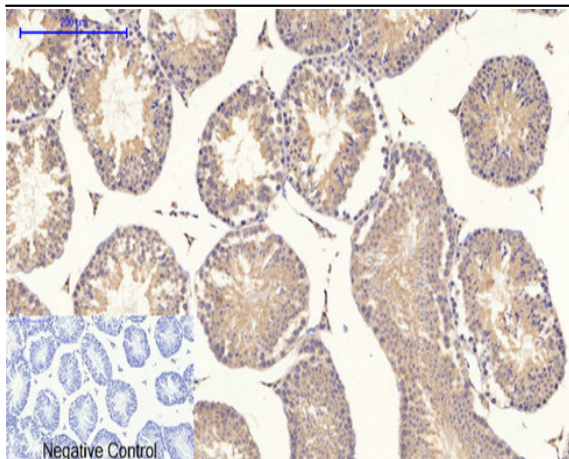
Immunohistochemical analysis of paraffin-embedded Rat-spinal-cord tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C,overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C,20min). 3,Secondary antibody was diluted at 1:200(room tempeRature, 30min). Negative control was used by secondary antibody only.



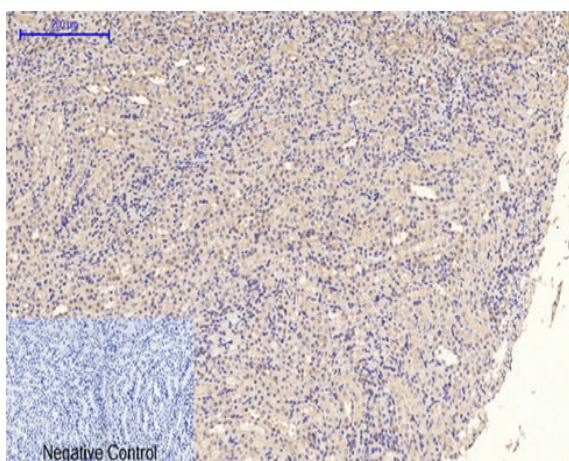
Immunohistochemical analysis of paraffin-embedded Rat-brain tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C,overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C,20min). 3,Secondary antibody was diluted at 1:200(room tempeRature, 30min). Negative control was used by secondary antibody only.



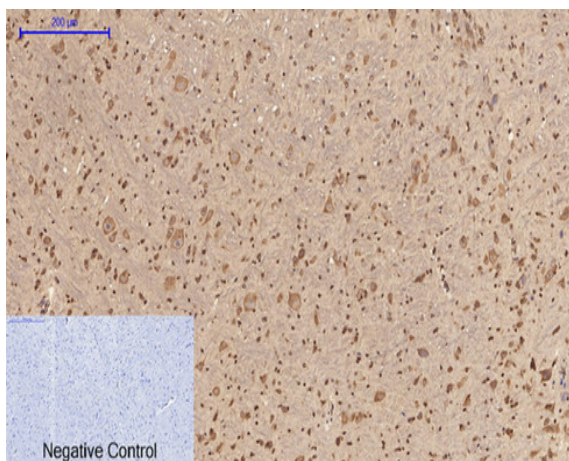
Immunohistochemical analysis of paraffin-embedded Mouse-heart tissue. 1,PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C,overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C,20min). 3,Secondary antibody was diluted at 1:200(room tempeRature, 30min). Negative control was used by secondary antibody only.



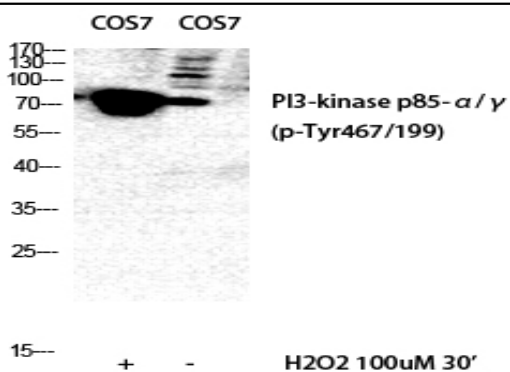
Immunohistochemical analysis of paraffin-embedded Mouse testis tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



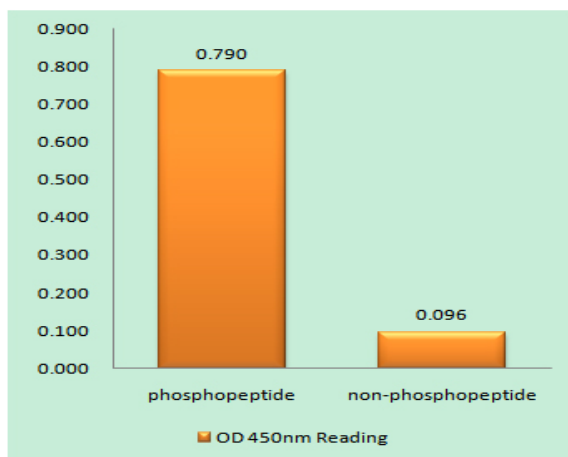
Immunohistochemical analysis of paraffin-embedded Mouse kidney tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



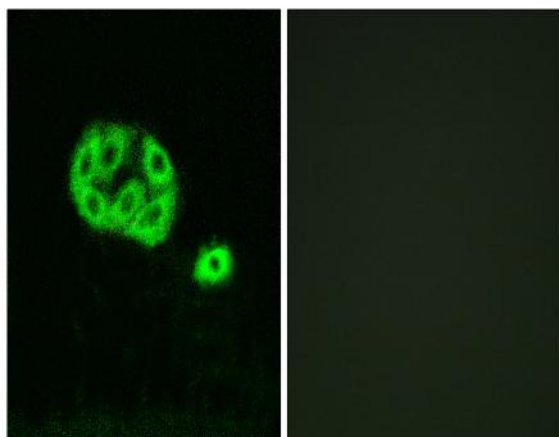
Immunohistochemical analysis of paraffin-embedded Mouse brain tissue. 1, PI 3-kinase p85/p55 (phospho Tyr467/199) Polyclonal Antibody was diluted at 1:200(4 °C, overnight). 2, Sodium citrate pH 6.0 was used for antibody retrieval(>98 °C, 20min). 3, Secondary antibody was diluted at 1:200(room temperature, 30min). Negative control was used by secondary antibody only.



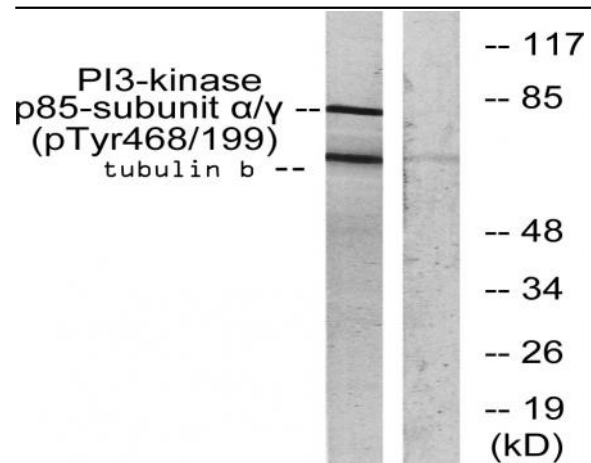
Western Blot analysis of COS7 cells using Phospho-PI 3-kinase p85/p55 (Y467/199) Polyclonal Antibody diluted at 1:1000



Enzyme-Linked Immunosorbent Assay (Phospho-ELISA) for Immunogen Phosphopeptide (Phospho-left) and Non-Phosphopeptide (Phospho-right), using PI3-kinase p85-alpha/gamma (Phospho-Tyr467/199) Antibody



Immunofluorescence analysis of NIH/3T3 cells, using PI3-kinase p85-alpha/gamma (Phospho-Tyr467/199) Antibody. The picture on the right is blocked with the phospho peptide.



Western blot analysis of lysates from COS7 cells treated with H<sub>2</sub>O<sub>2</sub> 100uM 30', using PI3-kinase p85-alpha/gamma (Phospho-Tyr467/199) Antibody. The lane on the right is blocked with the phospho peptide.