For Research Use Only

FOXK2 Recombinant antibody

Catalog Number:83735-6-RR

Featured Product



Basic Information

Catalog Number: GenBank Accession Number:

83735-6-RR NM_004514.3

GeneID (NCBI): Size:

100ul , Concentration: 1000 $\mu g/ml$ by 3607 Nanodrop:

UNIPROT ID: Q01167 Rabbit Full Name:

Isotype: forkhead box K2

IgG Calculated MW: 69 kDa

Immunogen Catalog Number: AG33625

Observed MW:

69-79 kDa

Applications

Tested Applications:

WB, IHC, IF/ICC, FC (Intra), 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: HEK-293T cells, HAP1 cells, HeLa cells, MCF-7 cells, T-47D cells. MDA-MB-231 cells, U2OS cells

Purification Method:

Protein A purfication

Recommended Dilutions:

WB 1:5000-1:50000

IF/ICC 1:200-1:800

IHC 1:500-1:2000

CloneNo.:

240692H4

IHC: human placenta tissue, human colon tissue,

human stomach cancer tissue

IF/ICC: SH-SY5Y cells.

Background Information

FOXK2 (forkhead box K2), also known as ILF and ILF1. FOXK2 is localized at nucleus and cytoplasm. It is also expected to be expressed in testis, brain and lymphoid and non-lymphoid cells (PMID: 1339390). The protein encoded by this gene contains a fork head DNA binding domain. This protein can bind to the purine-rich motifs of the HIV long terminal repeat (LTR), and to the similar purine-rich motif in the interleukin 2 (IL2) promoter. It may be involved in the regulation of viral and cellular promoter elements. And its molecular weight is 69 kDa. Anett Marais demonstrate that FOXK2 is phosphorylated in a cell cycle-dependent manner. This phosphorylation peaks during M phase and is mediated by CDK cyclin complexes. FOXK2 exhibits a periodic rise in its phosphorylation levels during the cell cycle, with hyperphosphorylation occurring in mitotic cells (PMID: 20810654).

Storage

Storage:

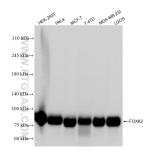
Store at -20°C. Stable for one year after shipment. Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol, pH7.3

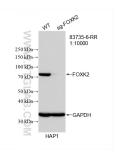
Aliquoting is unnecessary for -20°C storage

*** 20ul sizes contain 0.1% BSA

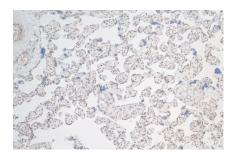
Selected Validation Data



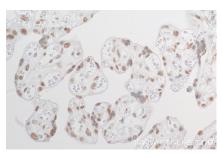
Various lysates were subjected to SDS PAGE followed by western blot with 83735-6-RR (FOXK2 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



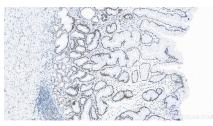
WB result of FOXK2 antibody (83735-6-RR; 1:10000; room temperature for 1.5 hours) with wild-type and sg-FOXK2 transfected HAP1 cells.



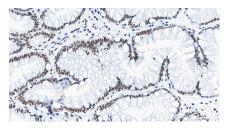
Immunohistochemical analysis of paraffinembedded human placenta tissue slide using 83735-6-RR (FOXK2 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded human placenta tissue slide using 83735-6-RR (FOXK2 antibody) at dilution of 1:2000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



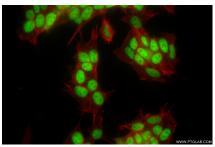
Immunohistochemical analysis of paraffinembedded human stomach cancer tissue slide using 83735-6-RR (FOXK2 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



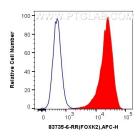
Immunohistochemical analysis of paraffinembedded human stomach cancer tissue slide using 83735-6-RR (FOXK2 antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



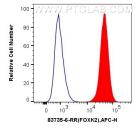
Immunohistochemical analysis of paraffinembedded human colon tissue slide using 83735-6-RR (FOXK2 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).

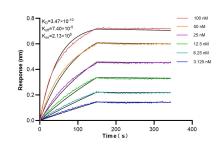


Immunofluorescent analysis of (4% PFA) fixed SH-SYSY cells using FO XK2 antibody (83735-6-RR, Clone: 240692H4) at dilution of 1:400 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-Phalloidin (red).



1x10^6 SH-SY5Y cells were intracellularly stained with 0.25 ug Foxk2 Recombinant Antibody (83735-6-RR, Clone:240692H4) and APC-Conjugated Goat Anti-Rabbit 1gG(H+L)(red), or 0.25 ug Rabbit 1gG Isotype Control Recombinant Antibody (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed and permeabilized with Transcription Factor Staining Buffer Kit (PF00011).





1x10^6 HEK-293T cells were intracellularly stained with 0.25 ug Foxk2 Recombinant Antibody (83735-6-RR, Clone:240692H4) and APC-Conjugated Goat Anti-Rabbit IgG(H+L)(red), or 0.25 ug Rabbit IgG Isotype Control Recombinant Antibody (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed and permeabilized with Transcription Factor Staining Buffer Kit (PF00011).

Biolayer interferometry (BLL) kinetic assays of 83735-6-RR against Human FOXK2 were performed. The affinity constant is 0.347 nM.