

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

Product datasheet for TA500783

AKT2 Mouse Monoclonal Antibody [Clone ID: OTI8D9]

Product data:

Product Type: Primary Antibodies

Clone Name: OTI8D9

Applications: FC, IP, WB

Recommend Dilution: WB 1:2000, FLOW 1:100, IP 2ug/500ul

Reactivity: Human
Host: Mouse
Isotype: IgG1

Clonality: Monoclonal

Immunogen: Full length human recombinant protein of human AKT2 (NP_001617) produced in HEK293T

cell

Formulation: PBS (pH 7.3) containing 1% BSA, 50% glycerol and 0.02% sodium azide.

Concentration: 1 mg/ml

Purification: Purified from mouse ascites fluids or tissue culture supernatant by affinity chromatography

(protein A/G)

Predicted Protein Size: 55.6 kDa

Gene Name: AKT serine/threonine kinase 2

Database Link: NP 001617 Entrez Gene 208 Human

Background: This gene is a putative oncogene encoding a protein belonging to a subfamily of

serine/threonine kinases containing SH2-like (Src homology 2-like) domains. The gene was shown to be amplified and overexpressed in 2 of 8 ovarian carcinoma cell lines and 2 of 15 primary ovarian tumors. Overexpression contributes to the malignant phenotype of a subset of human ductal pancreatic cancers. The encoded protein is a general protein kinase capable

of phophorylating several known proteins. [provided by RefSeq]

Synonyms: HIHGHH; PKBB; PKBBETA; PRKBB; RAC-BETA

Protein Families: Druggable Genome, ES Cell Differentiation/IPS, Protein Kinase

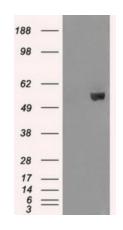




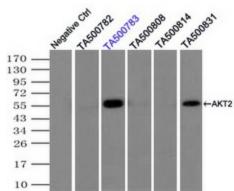
Protein Pathways:

Acute myeloid leukemia, Adipocytokine signaling pathway, Apoptosis, B cell receptor signaling pathway, Chemokine signaling pathway, Chronic myeloid leukemia, Colorectal cancer, Endometrial cancer, ErbB signaling pathway, Fc epsilon RI signaling pathway, Fc gamma R-mediated phagocytosis, Focal adhesion, Glioma, Insulin signaling pathway, Jak-STAT signaling pathway, MAPK signaling pathway, Melanoma, mTOR signaling pathway, Neurotrophin signaling pathway, Non-small cell lung cancer, Pancreatic cancer, Pathways in cancer, Progesterone-mediated oocyte maturation, Prostate cancer, Renal cell carcinoma, Small cell lung cancer, T cell receptor signaling pathway, Tight junction, Toll-like receptor signaling pathway, VEGF signaling pathway

Product images:

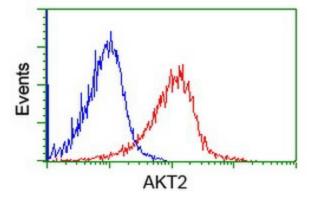


HEK293T cells were transfected with the pCMV6-ENTRY control (Left lane) or pCMV6-ENTRY AKT2 ([RC217733], Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-AKT2. Positive lysates [LY419836] (100ug) and [LC419836] (20ug) can be purchased separately from OriGene.

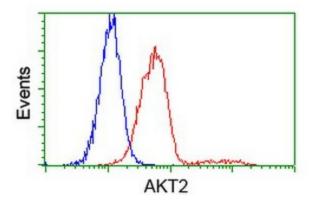


Immunoprecipitation (IP) of AKT2 by using TrueMab monoclonal anti-AKT2 antibodies (Negative control: IP without adding anti-AKT2 antibody.). For each experiment, 500ul of DDK tagged AKT2 overexpression lysates (at 1:5 dilution with HEK293T lysate), 2ug of anti-AKT2 antibody and 20ul (0.1mg) of goat anti-mouse conjugated magnetic beads were mixed and incubated overnight. After extensive wash to remove any non-specific binding, the immunoprecipitated products were analyzed with rabbit anti-DDK polyclonal antibody.





Flow cytometric Analysis of Jurkat cells, using anti-AKT2 antibody (TA500783), (Red), compared to a nonspecific negative control antibody, (Blue).



Flow cytometric Analysis of Hela cells, using anti-AKT2 antibody (TA500783), (Red), compared to a nonspecific negative control antibody, (Blue).