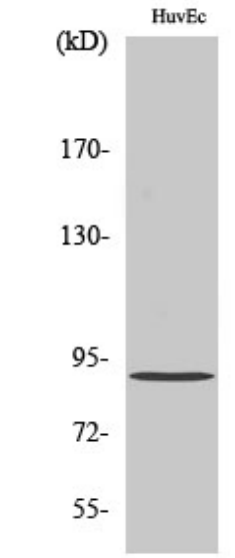
AKAP 149 Polyclonal Antibody

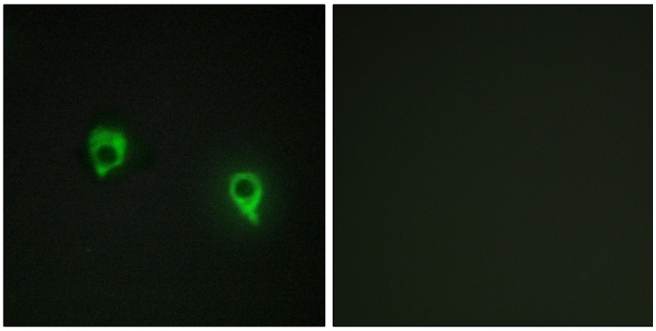
Catalog No	YP-Ab-03690
Isotype	IgG
Reactivity	Human;Rat;Mouse;
Applications	WB;IHC;IF;ELISA
Gene Name	AKAP1
Protein Name	A-kinase anchor protein 1 mitochondrial
Immunogen	The antiserum was produced against synthesized peptide derived from human AKAP1. AA range:281-330
Specificity	AKAP 149 Polyclonal Antibody detects endogenous levels of AKAP 149 protein.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source	Polyclonal, Rabbit,IgG
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300. Immunofluorescence: 1/200 - 1/1000. ELISA: 1/5000. Not yet tested in other applications.
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	AKAP1; AKAP149; PRKA1; A-kinase anchor protein 1; mitochondrial; A-kinase anchor protein 149 kDa; AKAP 149; Dual specificity A-kinase-anchoring protein 1; D-AKAP-1; Protein kinase A-anchoring protein 1; PRKA1; Spermatid A-kinase anchor prot
Observed Band	90kD
Cell Pathway	Mitochondrion outer membrane . Mitochondrion .
Tissue Specificity	Isoform 1 is detected in thymus, prostate, testis, ovary, colon and small intestine (PubMed:8769136). Isoform 2 is highly expressed in testis and detected at much lower levels in kidney, pancreas, liver, lung and brain (PubMed:7499250).
Function	domain:RII-alpha binding site, predicted to form an amphipathic helix, could participate in protein-protein interactions with a complementary surface on the R-subunit dimer.,function:Binds to type I and II regulatory subunits of protein kinase A and anchors them to the cytoplasmic face of the mitochondrial outer membrane.,similarity:Contains 1 KH domain.,similarity:Contains 1 Tudor domain.,tissue specificity:AKAP149 is highly expressed in prostate and small intestine whereas S-AKAP84 is expressed in kidney, pancreas, liver, lung and brain. AKAP149 is also expressed in colon carcinoma.,

Background	The A-kinase anchor proteins (AKAPs) are a group of structurally diverse proteins, which have the common function of binding to the regulatory subunit of protein kinase A (PKA) and confining the holoenzyme to discrete locations within the cell. This gene encodes a member of the AKAP family. The encoded protein binds to type I and type II regulatory subunits of PKA and anchors them to the mitochondrion. This protein is speculated to be involved in the cAMP-dependent signal transduction pathway and in directing RNA to a specific cellular compartment. [provided by RefSeq, Jul 2008],
matters needing attention	Avoid repeated freezing and thawing!
Usage suggestions	This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

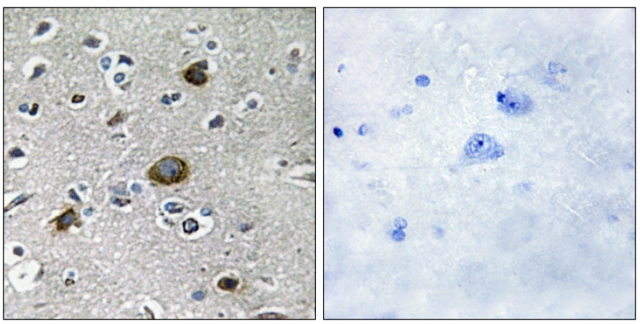
Products Images



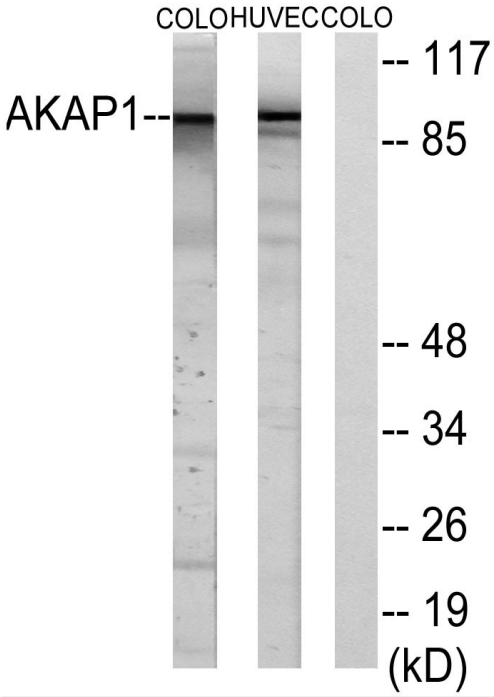
Western Blot analysis of various cells using AKAP 149 Polyclonal Antibody diluted at 1:2000



Immunofluorescence analysis of COS7 cells, using AKAP1 Antibody. The picture on the right is blocked with the synthesized peptide.



Immunohistochemistry analysis of paraffin-embedded human brain tissue, using AKAP1 Antibody. The picture on the right is blocked with the synthesized peptide.



Western blot analysis of lysates from HUVEC and COLO cells, using AKAP1 Antibody. The lane on the right is blocked with the synthesized peptide.