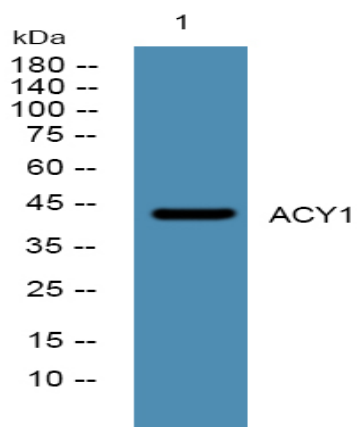


ACY1 Polyclonal Antibody

Catalog No :	YN2215
Reactivity :	Human;Mouse
Applications :	WB;ELISA
Target :	ACY1
Fields :	>>Arginine biosynthesis;>>Metabolic pathways;>>2-Oxocarboxylic acid metabolism;>>Biosynthesis of amino acids
Gene Name :	ACY1
Protein Name :	Aminoacylase-1 (ACY-1) (EC 3.5.1.14) (N-acyl-L-amino-acid amidohydrolase)
Human Gene Id :	95
Human Swiss Prot No :	Q03154
Mouse Swiss Prot No :	Q99JW2
Immunogen :	Synthesized peptide derived from part region of human protein
Specificity :	ACY1 Polyclonal Antibody detects endogenous levels of protein.
Formulation :	Liquid in PBS containing 50% glycerol, and 0.02% sodium azide.
Source :	Polyclonal, Rabbit,IgG
Dilution :	WB 1:500-2000 ELISA 1:5000-20000
Purification :	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Concentration :	1 mg/ml
Storage Stability :	-15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band :	44kD
Cell Pathway :	Arginine and proline metabolism;
Background :	This gene encodes a cytosolic, homodimeric, zinc-binding enzyme that catalyzes the hydrolysis of acylated L-amino acids to L-amino acids and an acyl group, and has been postulated to function in the catabolism and salvage of acylated amino acids. This gene is located on chromosome 3p21.1, a region reduced to homozygosity in small-cell lung cancer (SCLC), and its expression has been reported to be reduced or undetectable in SCLC cell lines and tumors. The amino acid sequence of human aminoacylase-1 is highly homologous to the porcine counterpart, and this enzyme is the first member of a new family of zinc-binding enzymes. Mutations in this gene cause aminoacylase-1 deficiency, a metabolic disorder characterized by central nervous system defects and increased urinary excretion of N-acetylated amino acids. Alternative splicing of this gene results in multiple transcript variants. Read-through transcription als
Function :	catalytic activity:An N-acyl-L-amino acid + H(2)O = a carboxylate + an L-amino acid.,cofactor:Binds 2 zinc ions per subunit.,disease:Defects in ACY1 are the cause of aminoacylase-1 deficiency (ACY1D) [MIM:609924]. ACY1D results in a metabolic disorder manifesting with encephalopathy, unspecific psychomotor delay, psychomotor delay with atrophy of the vermis and syringomyelia, marked muscular hypotonia or normal clinical features. Epileptic seizures are a frequent feature. All affected individuals exhibit markedly increased urinary excretion of several N-acetylated amino acids.,function:Involved in the hydrolysis of N-acylated or N-acetylated amino acids (except L-aspartate),similarity:Belongs to the peptidase M20A family.,subunit:Homodimer. Interacts with SPHK1.,tissue specificity:Expression is highest in kidney, strong in brain and weaker in placenta and spleen.,
Subcellular Location :	Cytoplasm.
Expression :	Expression is highest in kidney, strong in brain and weaker in placenta and spleen.

Products Images



Western blot analysis of lysates from SW480 cells, primary antibody was diluted at 1:1000, 4° over night