

# Product datasheet for TA503010BM

#### OriGene Technologies, Inc.

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

## AK3L1 (AK4) Mouse Monoclonal Antibody (HRP conjugated) [Clone ID: OTI7E5]

**Product data:** 

**Product Type:** Primary Antibodies

Clone Name: OTI7E5

**Applications:** FC, IF, WB

Recommended Dilution: WB 1:2000, IF 1:100, FLOW 1:100

Reactivity: Human, Mouse, Rat

Host: Mouse Isotype: IgG1

Clonality: Monoclonal

Immunogen: Full length human recombinant protein of human AK4 (NP\_037542) produced in HEK293T

cell.

**Formulation:** PBS (pH 7.3) containing 1% BSA, 50% glycerol.

**Concentration:** 0.5 mg/ml

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

(protein A/G)

Conjugation: HRP

**Storage:** Store at -20°C as received.

**Stability:** Stable for 12 months from date of receipt.

**Predicted Protein Size:** 25.1 kDa

**Gene Name:** adenylate kinase 4

Database Link: NP 037542

Entrez Gene 11639 MouseEntrez Gene 29223 RatEntrez Gene 205 Human

P27144





#### Background:

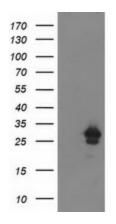
This gene encodes a member of the adenylate kinase family of enzymes. The encoded protein is localized to the mitochondrial matrix. Adenylate kinases regulate the adenine and guanine nucleotide compositions within a cell by catalyzing the reversible transfer of phosphate group among these nucleotides. Five isozymes of adenylate kinase have been identified in vertebrates. Expression of these isozymes is tissue-specific and developmentally regulated. A pseudogene for this gene has been located on chromosome 17. Three transcript variants encoding the same protein have been identified for this gene. Sequence alignment suggests that the gene defined by NM\_013410, NM\_203464, and NM\_001005353 is located on chromosome 1. [provided by RefSeq]

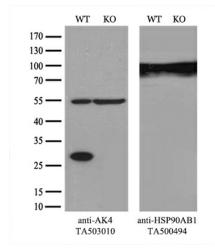
Synonyms: AK3; AK3L1; AK3L2; AK 4

**Protein Families:** Druggable Genome

**Protein Pathways:** Metabolic pathways, Purine metabolism

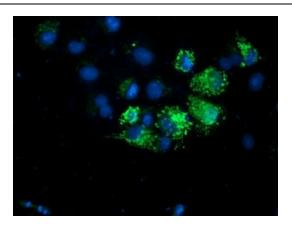
### **Product images:**



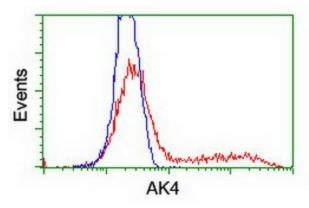


HEK293T cells were transfected with the pCMV6-ENTRY control (Left lane) or pCMV6-ENTRY AK4 ([RC220572], Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-AK4. Positive lysates [LY402259] (100ug) and [LC402259] (20ug) can be purchased separately from OriGene.

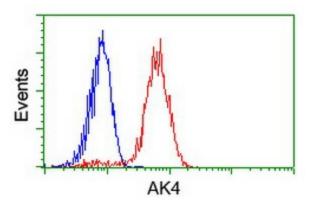
Equivalent amounts of cell lysates (10 ug per lane) of wild-type HeLa cells (WT, Cat# LC810HELA) and AK4-Knockout HeLa cells (KO, Cat# [LC834937]) were separated by SDS-PAGE and immunoblotted with anti-AK4 monoclonal antibody [TA503010] (1:500). Then the blotted membrane was stripped and reprobed with anti-HSP90 antibody as a loading control.



Anti-AK4 mouse monoclonal antibody ([TA503010]) immunofluorescent staining of COS7 cells transiently transfected by pCMV6-ENTRY AK4 ([RC220572]).



HEK293T cells transfected with either [RC220572] overexpress plasmid (Red) or empty vector control plasmid (Blue) were immunostained by anti-AK4 antibody ([TA503010]), and then analyzed by flow cytometry.



Flow cytometric Analysis of Hela cells, using anti-AK4 antibody ([TA503010]), (Red), compared to a nonspecific negative control antibody, (Blue).