

Product datasheet for AP53443PU-N

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

AMPK gamma 1 (PRKAG1) (N-term) Rabbit Polyclonal Antibody

Product data:

Product Type: Primary Antibodies

Applications: WE

Recommended Dilution: ELISA: 1/1000.

Western Blot: 1/100 - 1/500.

Reactivity: Human, Mouse

Host: Rabbit

Isotype: lg

Clonality: Polyclonal

Immunogen: KLH conjugated synthetic peptide between 5-33 amino acids from the N-terminal region of

human PRKAG1

Specificity: This antibody reacts to PRKAG1.

Formulation: PBS

State: Aff - Purified

State: Liquid purified Ig fraction

Preservative: 0.09% (W/V) sodium azide

Concentration: lot specific

Purification: Affinity chromatography on Protein A

Conjugation: Unconjugated

Storage: Store the antibody undiluted at 2-8°C for one month or (in aliquots) at -20°C for longer.

Avoid repeated freezing and thawing.

Stability: Shelf life: one year from despatch.

Predicted Protein Size: 37579 Da

Gene Name: protein kinase AMP-activated non-catalytic subunit gamma 1

Database Link: Entrez Gene 19082 MouseEntrez Gene 5571 Human

P54619





Background:

The protein encoded by this gene is a regulatory subunit of the AMP-activated protein kinase (AMPK). AMPK is a heterotrimer consisting of an alpha catalytic subunit, and non-catalytic beta and gamma subunits. AMPK is an important energy-sensing enzyme that monitors cellular energy status. In response to cellular metabolic stresses, AMPK is activated, and thus phosphorylates and inactivates acetyl-CoA carboxylase (ACC) and beta-hydroxy beta-methylglutaryl-CoA reductase (HMGCR), key enzymes involved in regulating de novo biosynthesis of fatty acid and cholesterol. This subunit is one of the gamma regulatory subunits of AMPK. Alternatively spliced transcript variants encoding distinct isoforms have been observed.

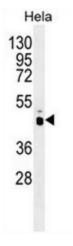
Synonyms: PRKAG1

Protein Families: Druggable Genome

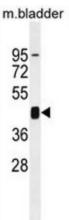
Protein Pathways: Adipocytokine signaling pathway, Hypertrophic cardiomyopathy (HCM), Insulin signaling

pathway

Product images:

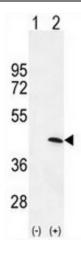


PRKAG1 Antibody (N-term) western blot analysis in Hela cell line lysates (35ug/lane). This demonstrates the PRKAG1 antibody detected the PRKAG1 protein (arrow).



PRKAG1 Antibody (N-term) western blot analysis in mouse bladder tissue lysates (35ug/lane). This demonstrates the PRKAG1 antibody detected the PRKAG1 protein (arrow).





Western blot analysis of PRKAG1 (arrow) using rabbit polyclonal PRKAG1 Antibody (N-term). 293 cell lysates (2 ug/lane) either nontransfected (Lane 1) or transiently transfected (Lane 2) with the PRKAG1 gene.