

Recombinant Human AMPK1 protein (GST Tag)

Catalog Number: PDEH100794

Note: Centrifuge before opening to ensure complete recovery of vial contents.

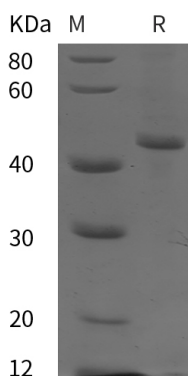
Description

Species	Human
Source	E.coli-derived Human AMPK1 protein Lys421-Gln574, with an N-terminal GST
Calculated MW	41.8 kDa
Observed MW	45 kDa
Accession	Q13131-2
Bio-activity	Not validated for activity

Properties

Purity	> 95% as determined by reducing SDS-PAGE.
Endotoxin	< 10 EU/mg of the protein as determined by the LAL method
Storage	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80 °C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with 5% Trehalose and 5% Mannitol.
Reconstitution	It is recommended that sterile water be added to the vial to prepare a stock solution of 0.5 mg/mL. Concentration is measured by UV-Vis.

Data



> 95 % as determined by reducing SDS-PAGE.

Background

AMP-activated protein kinase (AMPK) is a heterotrimeric complex consisting of a catalytic alpha subunit and regulatory beta and gamma subunits. Each subunit exists as alternate isoforms (alpha 1, alpha 2, beta 1, beta 2, gamma 1, gamma 2, gamma 3), with all 12 combinations able to form complexes. The catalytic alpha subunit of AMPK is activated allosterically by AMP, and by phosphorylation via the AMPK kinases LKB1 and CaMKK beta. AMPK's role in metabolic regulation has implicated this serine/threonine kinase as a therapeutic target in heart disease, obesity, and diabetes.

For Research Use Only