

Recombinant Mouse FGA/Fibrinogen A protein (His Tag)

Catalog Number: PDEM100293

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

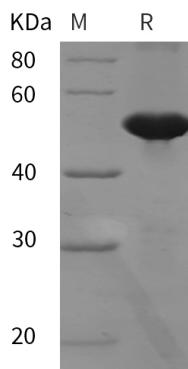
Description

Species	Mouse
Source	E.coli-derived Mouse FGA protein Asp434-Gln789, with an N-terminal His
Calculated MW	39.1 kDa
Observed MW	50 kDa
Accession	E9PV24
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

Fibrinogen is a 340 kDa, secreted glycoprotein complex that is found in blood at concentrations of 150-400 mg/dL. It is secreted primarily by hepatocytes, but is also reported to be expressed by fibroblasts, type I alveolar epithelium, intestinal epithelium and some tumor cells. Fibrinogen is a homodimer that is composed of two, three-polypeptide chain subunits. Fibrinogen plays a central role in clot formation. Conversion of fibrinogen to fibrin is triggered by thrombin, which cleaves fibrinopeptides A and B from alpha and beta chains, and thus exposes the N-terminal polymerization sites responsible for the formation of the soft clot. The soft clot is converted into the hard clot by factor XIIIa which catalyzes the epsilon-(gamma-glutamyl)lysine cross-linking between gamma chains (stronger) and between alpha chains (weaker) of different monomers. Fibrinogen is also a component of the ECM and binds to cell surface molecules on inflammatory cells. Mature mouse alpha, beta and gamma-chains share 67%, 85% and 83% aa identity with human alpha, beta and gamma-chains, respectively.