

Anti-G6PD Picoband Antibody

Catalog # ABO11889

Specification

Anti-G6PD Picoband Antibody - Product Information

Application WB
Primary Accession P11413
Host Rabbit
Reactivity Human
Clonality Polyclonal
Format Lyophilized

Description

Rabbit IgG polyclonal antibody for Glucose-6-phosphate 1-dehydrogenase(G6PD) detection. Tested with WB in Human.

Reconstitution

Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-G6PD Picoband Antibody - Additional Information

Gene ID 2539

Other Names

Glucose-6-phosphate 1-dehydrogenase, G6PD, 1.1.1.49, G6PD

Calculated MW 59257 MW KDa

Application Details

Western blot, 0.1-0.5 μg/ml, Human

Tissue Specificity

Isoform Long is found in lymphoblasts, granulocytes and sperm.

Protein Name

Glucose-6-phosphate 1-dehydrogenase

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.

Immunogen

E.coli-derived human G6PD recombinant protein (Position: E315-L515). Human G6PD shares 95% and 96% amino acid (aa) sequences identity with mouse and rat G6PD, respectively.

Purification

Immunogen affinity purified.

Cross Reactivity

No cross reactivity with other proteins



Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time. Avoid repeated freezing and thawing.

Sequence Similarities

Belongs to the glucose-6-phosphate dehydrogenase family.

Anti-G6PD Picoband Antibody - Protein Information

Name G6PD

Function

Catalyzes the rate-limiting step of the oxidative pentose- phosphate pathway, which represents a route for the dissimilation of carbohydrates besides glycolysis. The main function of this enzyme is to provide reducing power (NADPH) and pentose phosphates for fatty acid and nucleic acid synthesis.

Cellular Location

Cytoplasm, cytosol. Membrane; Peripheral membrane protein

Tissue Location

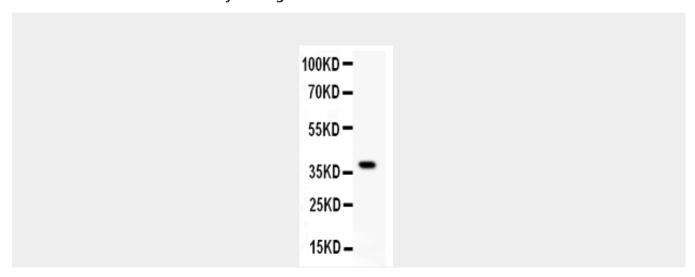
Isoform Long is found in lymphoblasts, granulocytes and sperm

Anti-G6PD Picoband Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

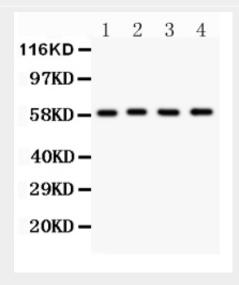
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-G6PD Picoband Antibody - Images





Anti- G6PD antibody, ABO11889, Western blottingAll lanes: Anti G6PD (ABO11889) at 0.5ug/mlWB: Recombinant Human G6PD Protein 0.5ngPredicted bind size: 39KDObserved bind size: 39KD



Anti- G6PD antibody, ABO11889, Western blottingAll lanes: Anti G6PD (ABO11889) at 0.5ug/mlLane 1: HELA Whole Cell Lysate at 40ugLane 2: MCF-7 Whole Cell Lysate at 40ugLane 3: SKOV Whole Cell Lysate at 40ugLane 4: HEPG2 Whole Cell Lysate at 40ugPredicted bind size: 59KDObserved bind size: 59KD

Anti-G6PD Picoband Antibody - Background

Glucose-6-phosphate dehydrogenase, also known as G6PD or G6PDH, is an enzyme that in humans is encoded by the G6PD gene. It is mapped to Xq28. G6PD plays a key role in the production of ribose 5-phosphate and the generation of NADPH in the hexose monophosphate pathway. Because this pathway is the only NADPH-generation process in mature red cells, which lack the citric adid cycle, a genetic deficiency of G6PD is often associated with adverse physiologic effects. It has been found that aldosterone decreased G6PD expression and activity, resulting in increased oxidant stress and decreased nitric oxide levels, similar to what is observed in G6PD-deficient endothelial cells.