
Product Name: GCSc- γ Rabbit Polyclonal Antibody**Catalog #: APRab11369**

For research use only.

Summary

Description	Rabbit polyclonal Antibody
Host	Rabbit
Application	WB,ELISA
Reactivity	Human,Mouse,Rat
Conjugation	Unconjugated
Modification	Unmodified
Isotype	IgG
Clonality	Polyclonal
Form	Liquid
Concentration	1mg/ml
Storage	Aliquot and store at -20°C (valid for 12 months). Avoid freeze/thaw cycles.
Shipping	Ice bags
Buffer	Liquid in PBS containing 50% glycerol, 0.5% protective protein and 0.02% New type preservative N.
Purification	Affinity purification

Application

Dilution Ratio	WB 1:500-1:2000,ELISA 1:5000-1:20000
Molecular Weight	73kDa

Antigen Information

Gene Name	GCLC
Alternative Names	GCLC; GLCL; GLCLC; Glutamate--cysteine ligase catalytic subunit; GCS heavy chain; Gamma-ECS; Gamma-glutamylcysteine synthetase
Gene ID	2729.0
SwissProt ID	P48506
Immunogen	The antiserum was produced against synthesized peptide derived from human GCSc-gamma. AA range:266-315

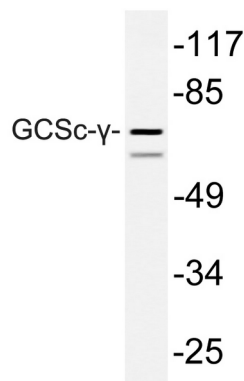
Background

Glutamate-cysteine ligase, also known as gamma-glutamylcysteine synthetase is the first rate-limiting enzyme of glutathione synthesis. The enzyme consists of two subunits, a heavy catalytic subunit and a light regulatory subunit. This locus encodes the catalytic subunit, while the regulatory subunit is derived from a different gene located on chromosome 1p22-p21. Mutations at this locus have been associated with hemolytic anemia due to deficiency of gamma-glutamylcysteine synthetase and susceptibility to myocardial infarction.[provided by RefSeq, Oct 2010],catalytic activity:ATP + L-glutamate + L-cysteine = ADP + phosphate + gamma-L-glutamyl-L-cysteine.,disease:Defects in GCLC are the cause of hemolytic anemia [MIM:230450].,enzyme regulation:Feedback inhibition by glutathione.,pathway:Sulfur metabolism; glutathione biosynthesis; glutathione from L-cysteine and L-glutamate: step 1/2.,similarity:Belongs to the glutamate--cysteine ligase type 3 family.,subunit:Heterodimer of a catalytic heavy chain and a regulatory light chain.,

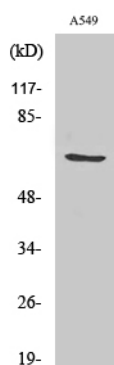
Research Area

Glutathione metabolism;

Image Data



Western blot analysis of lysate from A549 cells, using GCSc- γ antibody.



Western Blot analysis of various cells using GCSc- γ Polyclonal Antibody