For Research Use Only

KGA/GAC Polyclonal ANTIBODY

Catalog Number: 12855-1-AP

Basic Information

Catalog Number: 12855-1-AP

Size: 35 μg/150 μl

Source: Rabbit

Isotype: IgG

Purification Method: Antigen affinity purification

Immunogen Catalog Number: AG3505

GeneBank Accession Number: BC098007

GenEnt Id (NCBI): 2744

Calculated MW: 69kDa, 71 kDa

Observed MW: 65 kDa, 58 kDa

Recommended Dilutions:

- WB: 1:1000-1:5000
- IP: 0.5-4.0 μg for IP and 1:2000-1:5000 for WB
- IHC: 1:100-1:500
- IF: 1:50-1:500

Applications

Tested Applications: IF, IHC, IP, WB, ELISA

Cited Applications: IF, IHC, WB

Species Specificity: human, mouse, rat

Cited Species: human, mouse, rat

Note - IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Background Information

GLS, also named as GLS1 and KAA4831, belongs to the glutaminase family. It catalyzes the first reaction in the primary pathway for the renal catabolism of glutamine. Glutaminase-, glutamate-, and taurine-immunoreactive neurons develop neurofibrillary tangles in Alzheimer’s disease (PMID:1672808). The glutaminase band in AA/1 cells is more intense than in HT29 cells, in accordance with measurements of glutaminase activity, and had the same molecular mass of approx. 63 kDa. The bands for both cell lines are clearly different in size from both rat liver glutaminase (59 kDa) and rat kidney glutaminase (65 kDa)/PMID:12408749. It also reveals a molecular weight of 63-64 kDa as a phosphate-dependent glutaminase (PMID:447624;7512428). It has 3 isoforms named as KGA, GAM, GAC. This antibody can recognize KGA and GAC.

Notable Publications

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Storage

Storage:

Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.1% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

For technical support and original validation data for this product please contact:

T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)

E: proteintech@ptglab.com

W: ptglab.com

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.
Selected Validation Data

**IP result of anti-KGA/GAC(IP:12855-1-AP, 4ug; Detection:12855-1-AP 1:5000)** with mouse brain tissue lysate 2400 ug

**Immunohistochemical analysis of paraffin-embedded human gliomas tissue slide using 12855-1-AP KGA/GAC antibody** at dilution of 1:200 (under 10x lens) heat mediated antigen retrieved with Tris-EDTA buffer(pH6).

**Immunohistochemical analysis of paraffin-embedded human gliomas tissue slide using 12855-1-AP KGA/GAC antibody** at dilution of 1:200 (under 40x lens) heat mediated antigen retrieved with Tris-EDTA buffer(pH6).

**HEK-293 cells were subjected to SDS PAGE followed by western blot with 12855-1-AP KGA/GAC antibody at dilution of 1:600 incubated at 4 degree celsius over night.**

**Various lysates were subjected to SDS PAGE followed by western blot with 12855-1-AP KGA/GAC antibody at dilution of 1:30000 incubated at room temperature for 1.5 hours.**

**Immunofluorescent analysis of (-20 Ethanol) fixed HEK-293 cells using 12855-1-AP (KGA/GAC antibody) at dilution of 1:50 and Alexa Fluor 488-conjugated AffiniPure Goat Anti-Rabbit IgG(H+L).**