

For Research Use Only

# GPSM1 Polyclonal antibody

Catalog Number: 11483-1-AP

Featured Product

3 Publications



## Basic Information

**Catalog Number:**

11483-1-AP

**Size:**

450 µg/ml

**Source:**

Rabbit

**Isotype:**

IgG

**Immunogen Catalog Number:**

AG2018

**GenBank Accession Number:**

BC017353

**GeneID (NCBI):**

26086

**UNIPROT ID:**

Q86YR5

**Full Name:**

G-protein signaling modulator 1  
(AGS3-like, C. elegans)

**Calculated MW:**

652 aa, 72 kDa

**Observed MW:**

72 kDa

**Purification Method:**

Antigen affinity purification

**Recommended Dilutions:**

WB 1:500-1:1000

IHC 1:50-1:500

IF 1:10-1:100

## Applications

**Tested Applications:**

IF/ICC, IHC, WB, ELISA

**Cited Applications:**

WB, IF, IHC

**Species Specificity:**

human, mouse, rat

**Cited Species:**

rat, mouse

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

**Positive Controls:**

**WB:** HeLa cells, human brain tissue, mouse brain tissue, mouse testis tissue

**IHC:** human oesophagus cancer tissue,

**IF:** HepG2 cells,

## Background Information

GPSM1, also named as AGS3, is a receptor-independent G protein activator that has been implicated in multiple biological events such as brain development, neuroplasticity and addiction, cardiac function, Golgi structure/function, macroautophagy and metabolism. It contains seven tetratricopeptide repeats in its N-terminal half and four G-protein regulatory (GPR) motifs in its C-terminal half. It has been shown that AGS3 could regulate the orientation of the mitotic spindle, cAMP production, membrane protein transport, and asymmetric cell division by binding preferentially to inactive Gai/o subunits complexed with guanine dinucleotide phosphate (GDP) at multiple G-protein regulatory or GoLoco motif repeats. It also plays an important anti-apoptotic role through enhancing the phosphorylation of cyclic AMP response element-binding protein (p-CREB).

## Notable Publications

Author	Pubmed ID	Journal	Application
Jing Yan	36434066	Nat Commun	WB,IHC,IF
Xuzi Cai	33220708	J Ovarian Res	WB,IHC
Mengyang Tang	37979657	Mol Metab	WB,IF

## Storage

**Storage:**

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

**Storage Buffer:**

PBS with 0.02% 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:

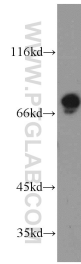
T: 4006900926

E: [Proteintech-CN@ptglab.com](mailto:Proteintech-CN@ptglab.com)

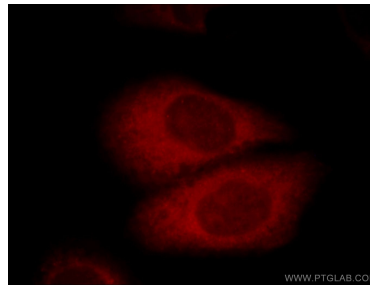
W: [ptgcn.com](http://ptgcn.com)

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

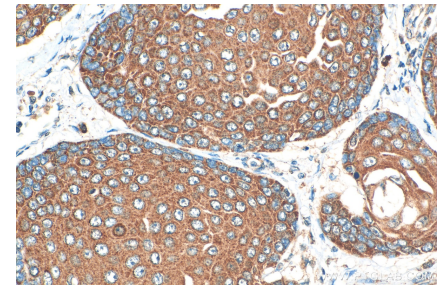
## Selected Validation Data



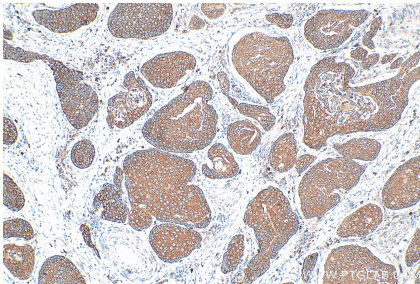
HeLa cells were subjected to SDS PAGE followed by western blot with 11483-1-AP (AGS3 antibody) at dilution of 1:600 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of HepG2 cells, using GPSM1 antibody 11483-1-AP at 1:25 dilution and Rhodamine-labeled goat anti-rabbit IgG (red).



Immunohistochemical analysis of paraffin-embedded human oesophagus cancer tissue slide using 11483-1-AP (GPSM1 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human oesophagus cancer tissue slide using 11483-1-AP (GPSM1 antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).