For Research Use Only

PSMA/GCPII Monoclonal antibody

Catalog Number:66678-1-lg 3 Publications



Basic Information

Catalog Number: 66678-1-lg Source: Mouse

Isotype: IgG1

Immunogen Catalog Number:

AG16594

GenBank Accession Number:

BC025672 GeneID (NCBI): 2346 UNIPROT ID:

Q04609

Full Name: folate hydrolase (prostate-specific membrane antigen) 1

Calculated MW: 719 aa, 81 kDa

Observed MW: 100-120 kDa

Purification Method:

Protein G purification

CloneNo.: 3G4E12

Recommended Dilutions: WB: 1:5000-1:50000 IHC: 1:1000-1:4000 IF-P: 1:200-1:800

Applications

Tested Applications: WB, IHC, IF-P, ELISA Cited Applications: WB

Species Specificity: human, mouse, rat Cited Species:

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: rat kidney tissue, LNCaP cells, mouse kidney tissue, rat brain tissue, mouse brain tissue

IHC: human prostate cancer tissue, mouse kidney

tissue

IF-P: human prostate cancer tissue,

Background Information

PSMA(Prostate-specific membrane antigen) is also named as FOLH1, FOLH, NAALAD1, PSM and belongs to the peptidase M28 family. PSMA is a 100-120 kDa integral transmembrane glycoprotein, considered to be a highly specific marker of the prostate gland, and has successfully been used as a marker of circulating prostatic epithelial cells(PMID:10074909; 15680901). It is involved in conversion of the major neurotransmitter (NAAG) to NAA and free glutamate. It has 8 isoforms produced by alternative splicing.

Notable Publications

Author	Pubmed ID	Journal	Application
Liyuan Yin	31988304	Sci Rep	WB
Alexander Kirschenbaum	39584003	Am J Clin Exp Urol	WB
Shouguo Peng	39246749	RSC Med Chem	

Storage

Storage

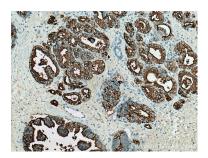
Store at -20°C. Stable for one year after shipment.

Storage Buffer:

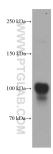
PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

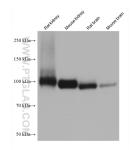
Selected Validation Data



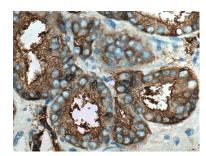
Immunohistochemical analysis of paraffinembedded human prostate cancer tissue slide using 66678-1-Ig (PSMA/GCPII antibody) at dilution of 1:2000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



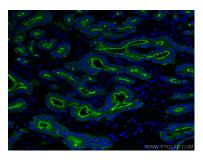
LNCaP cells were subjected to SDS PAGE followed by western blot with 66678-1-Ig (FOLH1 antibody) at dilution of 1:8000 incubated at room temperature for 1.5 hours.



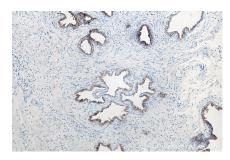
Various lysates were subjected to SDS PAGE followed by western blot with 66678-1-1g (PSMA/GCPII antibody) at dilution of 1:20000 incubated at room temperature for 1.5 hours.



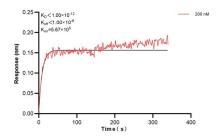
Immunohistochemical analysis of paraffinembedded human prostate cancer tissue slide using 66678-1-Ig (PSMA/GCPII antibody) at dilution of 1:2000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed human prostate cancer tissue using PSMA/GCPII antibody (66678-1-Ig, Clone: 3G4E12) at dilution of 1:400 and Coralite® 488-Conjugated Affini Pure Goat Anti-Mouse IgG(H+L).



Immunohistochemical analysis of paraffinembedded human prostate cancer tissue slide using 66678-1-lg (PSMA/GCPII antibody) at dilution of 1:4000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Biolayer interferometry (BLI) kinetic assay of 66678-1-Ig against Human PSMA/GCPII was performed. The affinity constant is below 1 pM.