

For Research Use Only

Band 3/AE 1 Polyclonal antibody

Catalog Number: 28131-1-AP **9 Publications**



Basic Information

Catalog Number: 28131-1-AP	GenBank Accession Number: BC101570	Purification Method: Antigen affinity purification
Size: 350 µg/ml	GeneID (NCBI): 6521	Recommended Dilutions: WB 1:200-1:1000 IHC 1:50-1:500 IF-P 1:50-1:500
Source: Rabbit	UNIPROT ID: P02730	
Isotype: IgG	Full Name: solute carrier family 4, anion exchanger, member 1 (erythrocyte membrane protein band 3, Diego blood group)	
Immunogen Catalog Number: AG27878	Calculated MW: 911 aa, 102 kDa	
	Observed MW: 95-100 kDa	

Applications

Tested Applications: WB, IHC, IF-P, ELISA	Positive Controls: WB : COLO 320 cells, mouse liver tissue
Cited Applications: WB, IHC, IF, IP	IHC : human spleen tissue, human stomach cancer tissue
Species Specificity: human, mouse	IF-P : human placenta tissue,
Cited Species: human, mouse	

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

Anion exchanger 1 (AE1), also known as band 3, is a 95-100 kDa transmembrane glycoprotein which is abundantly expressed in erythrocyte plasma membrane and mediates the electroneutral exchange of Cl⁻ and HCO₃⁻. It contains a 52-55 kDa C-terminal membrane crossing domain and a 43 kDa N-terminal cytoplasmic domain. Degradation of band 3 protein occurred during erythrocyte aging. The oxidative stress can also activate the proteolysis of band 3 through caspases.

Notable Publications

Author	Pubmed ID	Journal	Application
Eunus S Ali	35772404	Mol Cell	WB
Akihito Kitao	31997080	Int J Hematol	IP
George Vaisey	36515266	eLife	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:

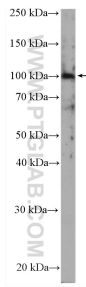
T: 4006900926

E: Proteintech-CN@ptglab.com

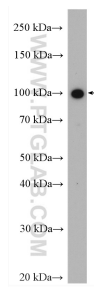
W: ptgcn.com

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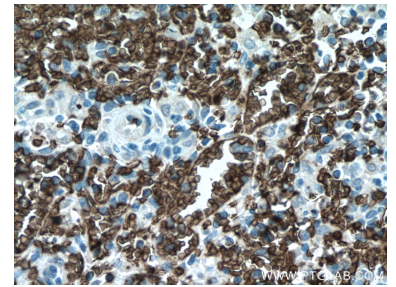
Selected Validation Data



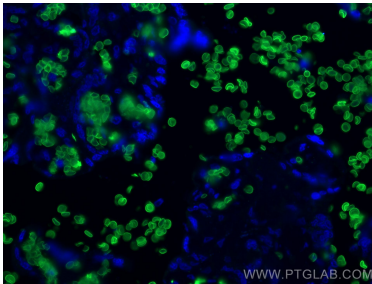
mouse liver tissue were subjected to SDS PAGE followed by western blot with 28131-1-AP (band 3/ AE1 antibody) at dilution of 1:600 incubated at room temperature for 1.5 hours.



COLO 320 cells were subjected to SDS PAGE followed by western blot with 28131-1-AP (band 3/ AE1 antibody) at dilution of 1:300 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffin-embedded human spleen tissue slide using 28131-1-AP (SLC4A1 antibody) at dilution of 1:200 (under 40x lens. Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed human placenta tissue using band 3/ AE1 antibody (28131-1-AP) at dilution of 1:200 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L).