

Claudin 1 Recombinant monoclonal antibody

Catalog Number: 87782-2-RR

Basic Information

Catalog Number: 87782-2-RR	GenBank Accession Number: BC012471	Purification Method: Protein A purification
Source: Rabbit	GeneID (NCBI): 9076	CloneNo.: 253345A9
Isotype: IgG	UNIPROT ID: O95832	Recommended Dilutions: WB: 1:5000-1:50000 IHC: 1:500-1:2000 IF-P: 1:500-1:2000 IF/ICC: 1:500-1:2000
Immunogen Catalog Number: AG29269	Full Name: claudin 1 Calculated MW: 211 aa, 23 kDa Observed MW: 20-23 kDa	

Applications

Tested Applications:
WB, IHC, IF/ICC, IF-P, ELISA

Species Specificity:
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

Positive Controls:

WB : HepG2 cells, HT-29 cells, mouse colon tissue, A549 cells, A431 cells, mouse skin tissue, rat skin tissue, rat colon tissue

IHC : human skin tissue,

IF-P : rat colon tissue, mouse colon tissue

IF/ICC : HaCaT cells,

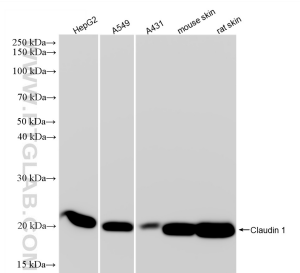
Background Information

Claudins are a family of proteins that are the most important components of the tight junctions, where they establish the paracellular barrier that controls the flow of molecules in the intercellular space between the cells of an epithelium. 23 Claudins have been identified. They are small (20-27 kilodaltons (kDa)) proteins with similar structures. They have four transmembrane domains, with the N-terminus and the C-terminus in the cytoplasm. Claudin-1 is an integral membrane protein expressed primarily in keratinocytes and normal mammary epithelial cells. Claudin 1 forms tight junctions with other claudin proteins and plays an important role in the intestinal epithelial barrier.

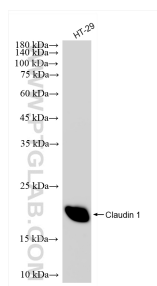
Storage

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

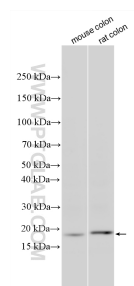
Selected Validation Data



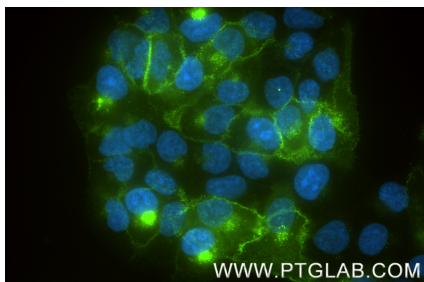
Various lysates were subjected to SDS PAGE followed by western blot with 87782-2-RR (Claudin 1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



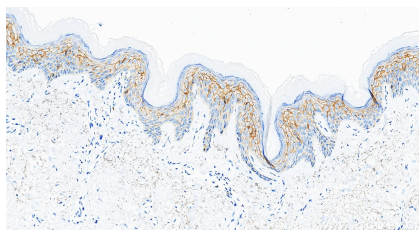
HT-29 cells were subjected to SDS PAGE followed by western blot with 87782-2-RR (Claudin 1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



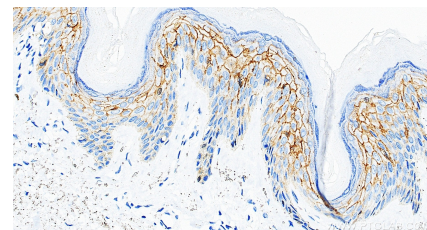
Various lysates were subjected to SDS PAGE followed by western blot with 87782-2-RR (Claudin 1 antibody) at dilution of 1:1500 incubated at room temperature for 1.5 hours.



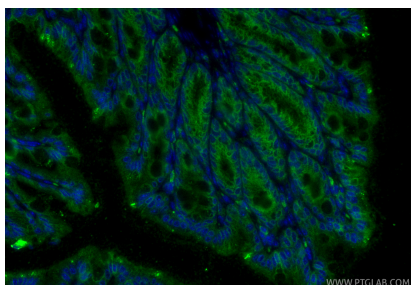
Immunofluorescent analysis of (-20°C Methanol) fixed HaCaT cells using Claudin 1 antibody (87782-2-RR, Clone: 253345A9) at dilution of 1:1000 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2).



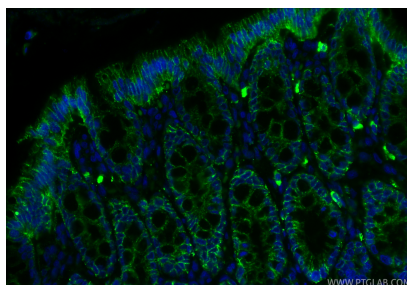
Immunohistochemical analysis of paraffin-embedded human skin tissue slide using 87782-2-RR (Claudin 1 antibody) at dilution of 1:1000 (under 20x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



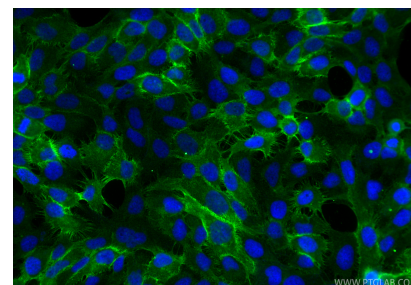
Immunohistochemical analysis of paraffin-embedded human skin tissue slide using 87782-2-RR (Claudin 1 antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded mouse colon tissue using Claudin 1 antibody (87782-2-RR, Clone: 253345A9) at dilution of 1:1000 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded rat colon tissue using Claudin 1 antibody (87782-2-RR, Clone: 253345A9) at dilution of 1:1000 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (-20°C Ethanol) fixed HaCaT cells using Claudin 1 antibody (87782-2-RR, Clone: 253345A9) at dilution of 1:400 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2).