

Basic Information

Product Name	Anti-CD10/MME Antibody	
Gene Name	MME	
Source	Rabbit	
Clonality	Polyclonal	
Isotype	IgG	
Species Reactivity	human, rat	
Tested Application	WB, IHC, FCM	
Contents	500 ug/ml antibody with PBS, 0.02% NaN ₃ , 1 mg/ml BSA and 50% glycerol.	
Immunogen	E.coli-derived human CD10 recombinant protein (Position: Y52-W750). Human CD10 shares 94% amino acid (aa) sequences identity with both mouse and rat CD10.	
Concentration	500 ug/ml	
Purification	Immunogen affinity purified.	
Observed MW	100 kDa	
Dilution Ratios	Western blot (WB):	1:500-2000
	Immunohistochemistry (IHC):	1:50-400
	Flow Cytometry (Fixed):	1:50-200
	(Boiling the paraffin sections in 10mM citrate buffer,pH6.0,or PH8.0 EDTA repair liquid for 22 mins is required for the staining of formalin/paraffin sections.) Optimal working dilutions must be determined by end user.	

Storage

12 months from date of receipt, -20°C as supplied.

Background Information

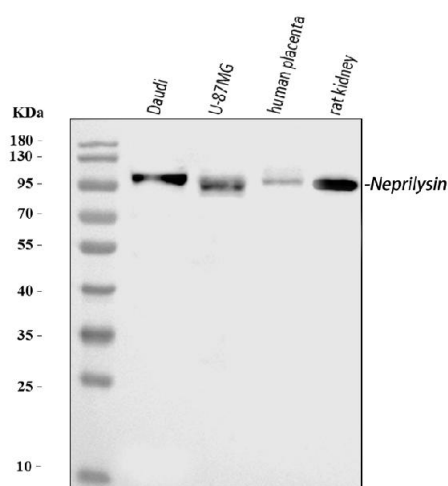
CD10, also known as membrane metallo-endopeptidase, neutral endopeptidase(NEP), Neprilysin, or common acute lymphoblastic leukemia antigen(CALLA), is a zinc-dependent metalloprotease enzyme that degrades a number of small secreted peptides, most notably the amyloid beta peptide whose abnormal misfolding and aggregation in neural tissue has been implicated as a cause of Alzheimer's disease. This gene is localized to human chromosome 3 by study of somatic cell hybrids and regionalized the location to 3q21-q27 by in situ hybridization. By cDNA transfection analysis, CD10 is confirmed as a functional neutral endopeptidase of the type that has previously been called enkephalinase.

CD10 has also been called atriopeptidase. Atriopeptidase specifically degrades atrial natriuretic factor. A specific enzyme inhibitor was developed and reported that it had effects similar to those of low-dose ANF infusion. These effects include diuresis, natriuresis, vasodilatation, and suppression of the renin-angiotensin-aldosterone system.

Reference

Anti-CD10/MME Antibody被引用在5文献中。

Selected Validation Data



Western blot analysis of CD10/MME using anti-CD10/MME antibody (PB9058). The sample well of each lane was loaded with 30 ug of sample under reducing conditions.

Lane 1: human daudi whole cell lysates,

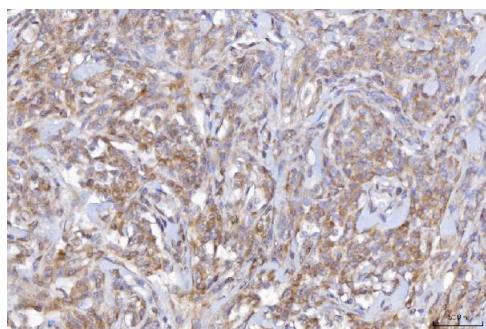
Lane 2: human U-87MG whole cell lysates,

Lane 3: human placenta tissue lysates,

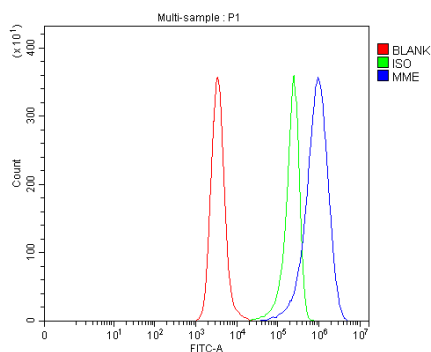
Lane 4: rat kidney tissue lysates.

After electrophoresis, proteins were transferred to a membrane.

Then the membrane was incubated with rabbit anti-CD10/MME antigen affinity purified polyclonal antibody (PB9058) at a dilution of 1:1000 and probed with a goat anti-rabbit IgG-HRP secondary antibody (Catalog # BA1054). The signal is developed using ECL Plus Western Blotting Substrate (Catalog # AR1197). A specific band was detected for CD10/MME at approximately 100 kDa. The expected band size for CD10/MME is at 86 kDa.



IHC analysis of CD10/MME using anti-CD10/MME antibody (PB9058). CD10/MME was detected in a paraffin-embedded section of human lymphoma tissue. Biotinylated goat anti-rabbit IgG was used as secondary antibody. The tissue section was incubated with rabbit anti-CD10/MME Antibody (PB9058) at a dilution of 1:200 and developed using Streptavidin-Biotin-Complex (SABC) (Catalog # SA1022) with DAB (Catalog # AR1027) as the chromogen.



Flow Cytometry analysis of Daudi cells using anti-CD10/MME antibody (PB9058).

Overlay histogram showing Daudi cells stained with PB9058 (Blue line). The cells were fixed with 4% paraformaldehyde and blocked with 10% normal goat serum. And then incubated with rabbit anti-CD10/MME Antibody (PB9058) at 1:100 dilution for 30 min at 20°C. Fluoro488 conjugated goat anti-rabbit IgG (BA1127) was used as secondary antibody at 1:100 dilution for 30 minutes at 20°C. Isotype control antibody (Green line) was rabbit IgG at 1:100 dilution used under the same conditions. Unlabelled sample without incubation with primary antibody and secondary antibody (Red line) was used as a blank control.