abcam

Product datasheet

Human ANPEP (CD13) knockout THP-1 cell lysate ab275505

4 图像

概述

产品名称	人ANPEP (CD13) knockout THP-1 cell裂解物
产品概述	Knockout cell lysate achieved by CRISPR/Cas9.
Parental Cell Line	THP-1
Organism	Human
Mutation description	Knockout achieved by using CRISPR/Cas9, Homozygous: 2 bp deletion in exon 2
Passage number	<20
Knockout validation	Sanger Sequencing, Western Blot (WB)
Reconstitution notes	To use as WB control, resuspend the lyophilizate in 50 µL of LDS* Sample Buffer to have a final concentration of 2 mg/ml. For reducing conditions, we recommend a final concentration of 0.1 M DTT. **Usage of SDS sample buffer is not recommended with these lyophilized lysates.*
说明	**Lysate preparation:** Our lysates are made using RIPA buffer to which we add a protease inhibitor cocktail and phosphatase inhibitor cocktail (ratio: 300:100:10). *This means that the protein of interest is denatured.* If you require a native form of the protein please use the live cell version - found **here**. Please refer to our lysis protocol for further details on how our lysates are prepared. **User storage instructions:** Lyophilizate may be stored at 4°C. After reconstitution, store at -20°C for short-term storage or -80°C for long-term storage. Access thousands of knockout cell lysates, generated from commonly used cancer cell lines. **See here for more information on knockout cell lysates.** Abcam has not and does not intend to apply for the REACH Authorisation of customers' uses of products that contain European Authorisation list (Annex XIV) substances. It is the responsibility of our customers to check the necessity of application of REACH Authorisation, and any other relevant authorisations, for their intended uses. This product is subject to limited use licenses from The Broad Institute and ERS Genomics Limited, and is developed with patented technology. For full details of the limited use licenses and relevant patents please refer to our **limited use license** and **patent pages**.
经测试应用	**适用于:** WB

性能

存放说明	Store at -80°C. Please refer to protocols.

组件	1 kit
ab277313 - Human ANPEP knockout THP-1 cell lysate	1 x 100µg
ab277314 - Human wild-type THP-1 cell lysate	1 x 100µg

Cell type	acute monocytic leukemia
Disease	Acute Monocytic Leukemia
Gender	Male

靶标

功能	Broad specificity aminopeptidase. Plays a role in the final digestion of peptides generated from hydrolysis of proteins by gastric and pancreatic proteases. May play a critical role in the pathogenesis of cholesterol gallstone disease. May be involved in the metabolism of regulatory peptides of diverse cell types including small intestinal and tubular epithelial cells, macrophages, granulocytes and synaptic membranes from the CNS. Found to cleave antigen peptides bound to major histocompatibility complex class II molecules of presenting cells and to degrade neurotransmitters at synaptic junctions. Is also implicated as a regulator of IL-8 bioavailability in the endometrium, and therefore may contribute to the regulation of angiogenesis. Is used as a marker for acute myeloid leukemia and plays a role in tumor invasion. In case of human coronavirus 229E (HCoV-229E) infection, serves as receptor for HCoV-229E spike glycoprotein. Mediates as well human cytomegalovirus (HCMV) infection.
组织特异性	Expressed in epithelial cells of the kidney, intestine, and respiratory tract; granulocytes, monocytes, fibroblasts, endothelial cells, cerebral pericytes at the blood-brain barrier, synaptic membranes of cells in the CNS. Also expressed in endometrial stromal cells, but not in the endometrial glandular cells. Found in the vasculature of tissues that undergo angiogenesis and in malignant gliomas and lymph node metastases from multiple tumor types but not in blood vessels of normal tissues. A soluble form has been found in plasma. It is found to be elevated in plasma and effusions of cancer patients.
序列相似性	Belongs to the peptidase M1 family.
结构域	Amino acids 260-353 are essential to mediate susceptibility to infection with HCoV-229E (in porcine/human chimeric studies) and more specifically amino acids 288-295 (mutagenesis studies).
翻译后修饰	Sulfated. N- and O-glycosylated. May undergo proteolysis and give rise to a soluble form.
细胞定位	Cell membrane. Cytoplasm > cytosol. A soluble form has also been detected.

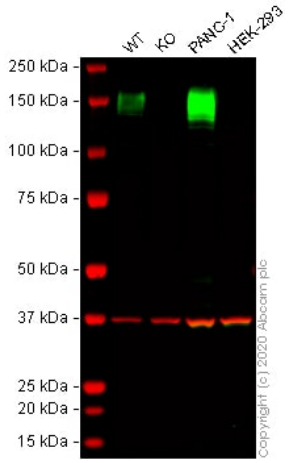
应用

The Abpromise guarantee	**Abpromise™承诺保证使用**ab275505**于以下的**经测试应用

“应用说明”部分 下显示的仅为推荐的起始稀释度;实际最佳的稀释度/浓度应由使用者检定。

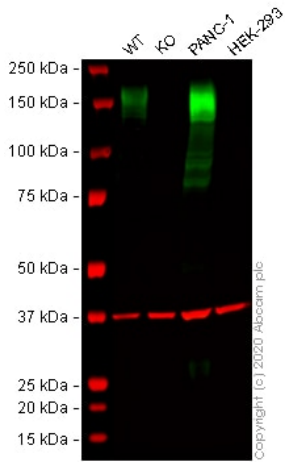
应用	Ab评论	说明
WB		Use at an assay dependent concentration. Predicted molecular weight: 109 kDa.

图片



Western blot - Human ANPEP (CD13) knockout THP-1 cell lysate (ab275505)

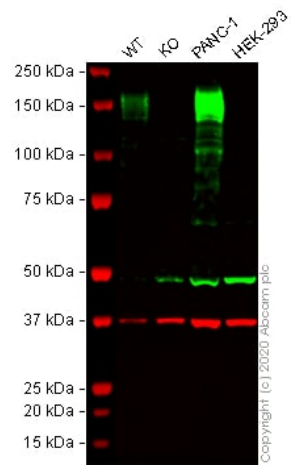
Lane 1: Wild-type THP-1 cell lysate 30 ug
Lane 2: ANPEP knockout THP-1 cell lysate 30 ug
Lane 3: PANC-1 cell lysate 30 ug
Lane 4: HEK-293 cell lysate 30 ug
Lanes 1 - 4: Merged signal (red and green). Green - **ab227663** observed at 160 kDa. Red - loading control **ab8245** (Mouse anti-GAPDH antibody [6C5]) observed at 37kDa.
ab227663 was shown to react with CD13 in wild-type THP-1 cells in western blot with loss of signal observed in ANPEP knockout cell line **ab273759** (knockout cell lysate ab275505). Wild-type and CD13 knockout THP-1 cell lysates were subjected to SDS-PAGE. Membranes were blocked in 3% milk in TBS-T (0.1% Tween®) before incubation with **ab227663** and **ab8245** (Mouse anti-GAPDH antibody [6C5]) overnight at 4°C at a 1 in 400 dilution and a 1 in 20000 dilution respectively. Blots were incubated with Goat anti-Rabbit IgG H&L (IRDye® 800CW) preabsorbed (**ab216773**) and Goat anti-Mouse IgG H&L (IRDye® 680RD) preabsorbed (**ab216776**) secondary antibodies at 1 in 20000 dilution for 1 hour at room temperature before imaging.



Western blot - Human ANPEP (CD13) knockout THP-1 cell lysate (ab275505)

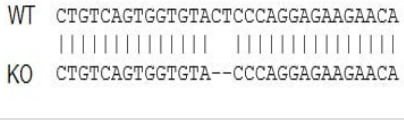
Lane 1: Wild-type THP-1 cell lysate 30 ug
Lane 2: ANPEP knockout THP-1 cell lysate 30 ug
Lane 3: PANC-1 cell lysate 30 ug
Lane 4: HEK-293 cell lysate 30 ug
Lanes 1 - 4: Merged signal (red and green). Green - **ab108382** observed at 160 kDa. Red - loading control **ab8245** (Mouse anti-GAPDH antibody [6C5]) observed at 37kDa.
ab108382 was shown to react with CD13 in wild-type THP-1 cells in western blot with loss of signal observed in ANPEP knockout cell line **ab273759** (knockout cell lysate ab275505). Wild-type and CD13 knockout THP-1 cell lysates were subjected to SDS-PAGE. Membranes were blocked in 3% milk in TBS-T (0.1% Tween®) before incubation with **ab108382** and **ab8245** (Mouse anti-GAPDH antibody [6C5]) overnight at 4°C at a 1 in 1000 dilution and a 1 in 20000 dilution respectively. Blots were incubated with Goat anti-Rabbit IgG H&L (IRDye® 800CW) preabsorbed (**ab216773**) and

Goat anti-Mouse IgG H&L (IRDye® 680RD) preabsorbed (**ab216776**) secondary antibodies at 1 in 20000 dilution for 1 hour at room temperature before imaging.



Western blot - Human ANPEP (CD13) knockout THP-1 cell lysate (ab275505)

Lane 1: Wild-type THP-1 cell lysate 30 ug
Lane 2: ANPEP knockout THP-1 cell lysate 30 ug
Lane 3: PANC-1 cell lysate 30 ug
Lane 4: HEK-293 cell lysate 30 ug
Lanes 1 - 4: Merged signal (red and green). Green - **ab108310** observed at 160 kDa. Red - loading control **ab8245** (Mouse anti-GAPDH antibody [6C5]) observed at 37kDa.
ab108310 was shown to react with CD13 in wild-type THP-1 cells in western blot with loss of signal observed in ANPEP knockout cell line **ab273759** (knockout cell lysate ab275505). Wild-type and CD13 knockout THP-1 cell lysates were subjected to SDS-PAGE. Membranes were blocked in fluorescent western blot (TBS-based) blocking solution before incubation with **ab108310** and **ab8245** (Mouse anti-GAPDH antibody [6C5]) overnight at 4˚C at a 1 in 1000 dilution and a 1 in 20000 dilution respectively. Blots were incubated with Goat anti-Rabbit IgG H&L (IRDye® 800CW) preabsorbed (**ab216773**) and Goat anti-Mouse IgG H&L (IRDye® 680RD) preabsorbed (**ab216776**) secondary antibodies at 1 in 20000 dilution for 1 hour at room temperature before imaging.



Sanger Sequencing - Human ANPEP knockout THP-1 cell lysate (ab275505)

Homozygous: 2 bp deletion in exon 2

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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