


Anti-Dnmt1 antibody [60B1220.1] ab13537

★★★★★ [22 Abreviews](#) [195 References](#) [5 图像](#)

概述

产品名称	Anti-Dnmt1抗体[60B1220.1]
描述	小鼠单克隆抗体[60B1220.1] to Dnmt1
宿主	Mouse
特异性	This antibody detects a ~180 kDa protein, corresponding to the apparent molecular mass of Dnmt1 on SDS-PAGE immunoblots in samples of human and mouse origin. Immunogen itself has been shown to be toxic.
经测试应用	适用于: IHC-P, Flow Cyt, WB
种属反应性	与反应: Mouse, Human 预测可用于: Cow 
免疫原	Synthetic peptide: EKDDREDKENAFKR , corresponding to amino acids 637-650 of Human Dnmt1 Run BLAST with Run BLAST with
阳性对照	WB: H1299 cell lysate. IHC-Fr: Human colon carcinoma tissue. Mouse medullar kidney tissue. Flow Cyt: HeLa cells.
常规说明	For maximum product recovery, centrifuge the product vial before removing cap. Shipped at on gel packs. DNMT1 high levels are toxic, as a result it may be tough to find sometimes. Signal amplification might be needed. The Life Science industry has been in the grips of a reproducibility crisis for a number of years. Abcam is leading the way in addressing this with our range of recombinant monoclonal antibodies and knockout edited cell lines for gold-standard validation. Please check that this product meets your needs before purchasing. If you have any questions, special requirements or concerns, please send us an inquiry and/or contact our Support team ahead of purchase. Recommended alternatives for this product can be found below, along with publications, customer reviews and Q&As

性能

形式	Liquid
存放说明	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C.

	Avoid freeze / thaw cycle.
存储溶液	Preservative: 0.09% Sodium azide Constituents: PBS, 50% Glycerol
纯度	Protein G purified
纯化说明	This antibody is affinity purified.
克隆	单克隆
克隆编号	60B1220.1
同种型	IgG1

应用

The Abpromise guarantee **Abpromise™** 承诺保证使用 ab13537 于以下的经测试应用

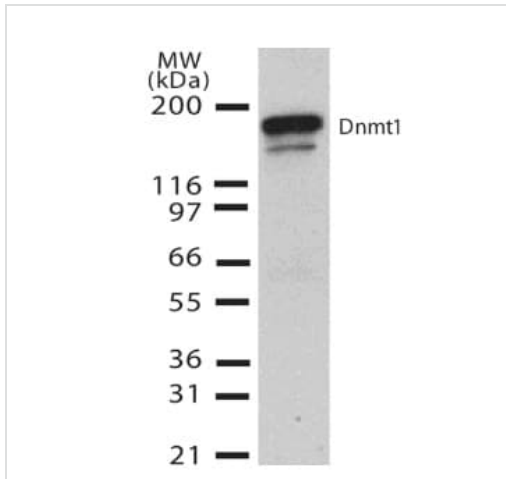
“应用说明”部分 下显示的仅为推荐的起始稀释度;实际最佳的稀释度/浓度应由使用者检定。

应用	Ab评论	说明
IHC-P	★★★★★ (2)	Use at an assay dependent concentration.
Flow Cyt		1/100. ab170190 - Mouse monoclonal IgG1, is suitable for use as an isotype control with this antibody.
WB	★★★★☆ (12)	1/1000. Detects a band of approximately 180 kDa (predicted molecular weight: 180 kDa). Block in 1.5% BSA in 1x TBST. Other Band(s): Lower bands are DNMT1 degradation.

靶标

功能	Methylates CpG residues. Preferentially methylates hemimethylated DNA. Associates with DNA replication sites in S phase maintaining the methylation pattern in the newly synthesized strand, that is essential for epigenetic inheritance. Associates with chromatin during G2 and M phases to maintain DNA methylation independently of replication. It is responsible for maintaining methylation patterns established in development. DNA methylation is coordinated with methylation of histones. Mediates transcriptional repression by direct binding to HDAC2. In association with DNMT3B and via the recruitment of CTCFL/BORIS, involved in activation of BAG1 gene expression by modulating dimethylation of promoter histone H3 at H3K4 and H3K9.
组织特异性	Ubiquitous; highly expressed in fetal tissues, heart, kidney, placenta, peripheral blood mononuclear cells, and expressed at lower levels in spleen, lung, brain, small intestine, colon, liver, and skeletal muscle. Isoform 2 is less expressed than isoform 1.
序列相似性	Belongs to the C5-methyltransferase family. Contains 2 BAH domains. Contains 1 CXXC-type zinc finger.
结构域	The N-terminal part is required for homodimerization and acts as a regulatory domain.
翻译后修饰	Sumoylated; sumoylation increases activity.
细胞定位	Nucleus.

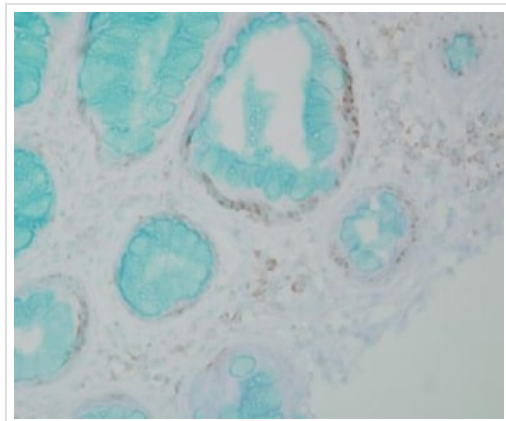
图片



Western blot - Anti-Dnmt1 antibody [60B1220.1] (ab13537)

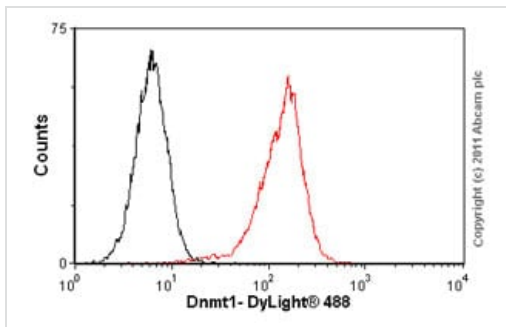
Anti-Dnmt1 antibody [60B1220.1] (ab13537) at 1/1000 dilution + H1299 (Human non-small cell lung carcinoma cell line) lysate

Predicted band size: 180 kDa



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Dnmt1 antibody [60B1220.1] (ab13537)

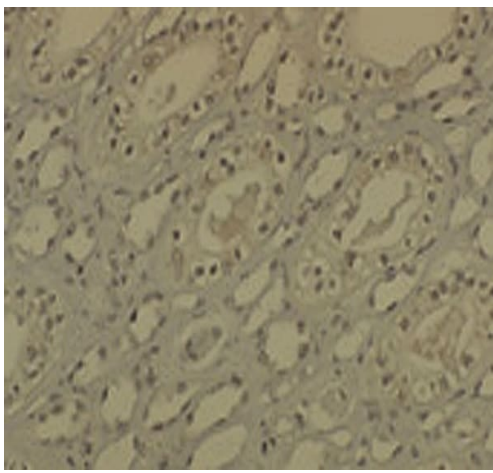
Immunohistochemistry analysis of formalin-fixed human colon carcinoma tissue labelling Dnmt1 with ab13537 at 1/10000 dilution (12 hours at 4°C), followed by biotin Goat Anti-Mouse antibody at 1/2000 for 1 hour at RT. Counterstain: Hematoxylin (purple/blue) nuclear stain at 200µl for 2 mins at RT.



Flow Cytometry - Anti-Dnmt1 antibody [60B1220.1] (ab13537)

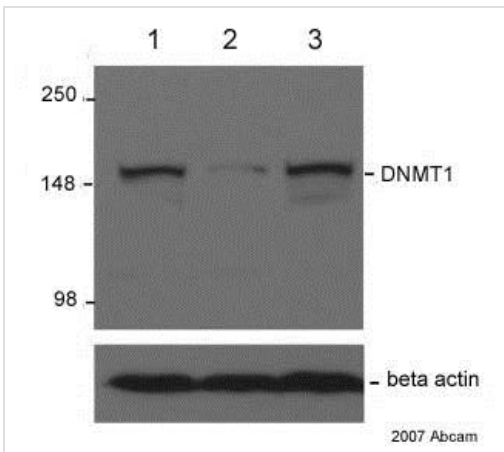
Overlay histogram showing HeLa cells stained with ab13537 (red line). The cells were fixed with methanol (5 min) and then permeabilized with 0.1% PBS-Tween for 20 min. The cells were then incubated in 1x PBS / 10% normal goat serum / 0.3M glycine to block non-specific protein-protein interactions followed by the antibody (ab13537, 1/100 dilution) for 30 min at 22°C. The secondary antibody used was DyLight® 488 goat anti-mouse IgG (H+L) ([ab96879](#)) at 1/500 dilution for 30 min at 22°C. Isotype control antibody (black line) was mouse IgG1 [CIGG1] ([ab91353](#), 2µg/1x10⁶ cells) used under the same conditions. Acquisition of >5,000 events was performed. This antibody gave a slightly

decreased signal in HeLa cells fixed with 4% paraformaldehyde (10 min)/permeabilized in 0.1% PBS-Tween used under the same conditions.



Immunohistochemistry analysis of mouse medullar kidney tissue labelling Dnmt1 with ab13537 at 1/10000 dilution, followed by biotin Goat Anti-Mouse antibody (brown). Counterstain: Hematoxylin (purple/blue) nuclear stain.

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Dnmt1 antibody [60B1220.1] (ab13537)



All lanes : Anti-Dnmt1 antibody [60B1220.1] (ab13537) at 1 µg/ml

Lane 1 : HCT116 whole cell lysate

Lane 2 : HCT116 DNMT1 KO whole cell lysate

Lane 3 : HCT116 DNMT3b KO whole cell lysate

Secondary

All lanes : HRP conjugated Sheep anti-mouse IgG

Developed using the ECL technique.

Performed under reducing conditions.

Predicted band size: 180 kDa

Exposure time: 1 minute

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

Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet

- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours

- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <https://www.abcam.cn/abpromise> or contact our technical team.

Terms and conditions

- Guarantee only valid for products bought direct from Abcam or one of our authorized distributors