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ENT2 Rabbit mAb

Catalog # AP75403

Product Information

Application	WB, IHC-P, FC
Primary Accession	Q14542
Reactivity	Rat, Human, Mouse
Host	Rabbit
Clonality	Monoclonal Antibody
Isotype	IgG
Conjugate	Unconjugated
Purification	Affinity Purified
Calculated MW	50113

Additional Information

Gene ID	3177
Other Names	SLC29A2
Dilution	WB~~1:500-1:1000 IHC-P~~N/A FC~~1:20
Format	Liquid in 50mM Tris-Glycine(pH 7.4), 0.15M NaCl, 40%Glycerol, 0.01% sodium azide and 0.05% BSA.
Storage	Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze/thaw cycles.

Protein Information

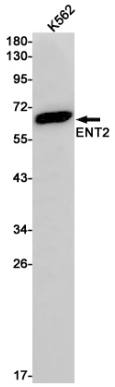
Name	SLC29A2 (HGNC:11004)
Synonyms	DER12, ENT2, HNP36
Function	Bidirectional uniporter involved in the facilitative transport of nucleosides and nucleobases, and contributes to maintaining their cellular homeostasis (PubMed:10722669, PubMed:12527552, PubMed:12590919, PubMed:16214850, PubMed:21795683, PubMed:9396714, PubMed:9478986). Functions as a Na(+)-independent, passive transporter (PubMed:9478986). Involved in the transport of nucleosides such as inosine, adenosine, uridine, thymidine, cytidine and guanosine (PubMed:10722669, PubMed:12527552, PubMed:12590919, PubMed:16214850, PubMed:21795683, PubMed:9396714, PubMed:9478986). Also able to transport purine nucleobases (hypoxanthine, adenine, guanine) and pyrimidine nucleobases (thymine, uracil) (PubMed:16214850, PubMed:21795683). Also mediates nicotinamide uptake supporting homeostasis and modulating its biological activities (PubMed:39885119). Can also transport urate (PubMed:40367900). Involved

	in nucleoside transport at basolateral membrane of kidney cells, allowing liver absorption of nucleoside metabolites (PubMed:12527552). Mediates apical nucleoside uptake into Sertoli cells, thereby regulating the transport of nucleosides in testis across the blood-testis-barrier (PubMed:23639800). Mediates both the influx and efflux of hypoxanthine in skeletal muscle microvascular endothelial cells to control the amount of intracellular hypoxanthine available for xanthine oxidase- mediated ROS production (By similarity).
Cellular Location	Apical cell membrane; Multi-pass membrane protein. Basolateral cell membrane; Multi-pass membrane protein. Cell membrane; Multi-pass membrane protein. Note=Localized to the apical membrane of Sertoli cells
Tissue Location	Highly expressed in skeletal muscle (PubMed:9478986). Expressed in liver, lung, placenta, brain, heart, kidney and ovarian tissues (PubMed:9478986). Expressed in testis at the blood-brain-barrier (PubMed:23639800).

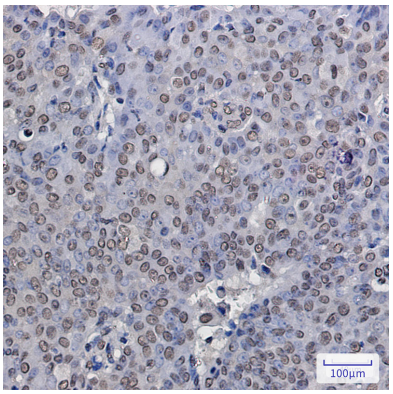
Background

The uptake of nucleosides by transporters, such as SLC29A2, is essential for nucleotide synthesis by salvage pathways in cells that lack de novo biosynthetic pathways. Nucleoside transport also plays a key role in the regulation of many physiologic processes through its effect on adenosine concentration at the cell surface (Griffiths et al., 1997 [PubMed 9396714]).

Images

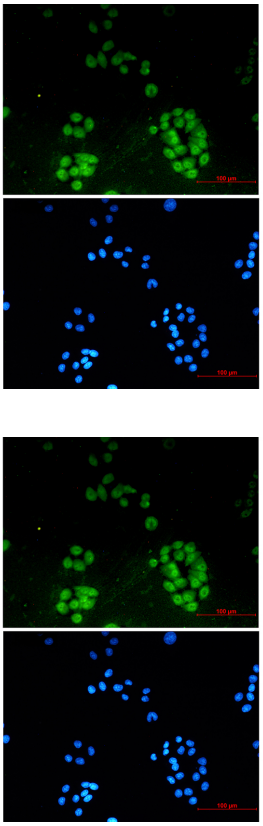


Western blot analysis of ENT2 in K562 lysates using ENT2 antibody.



Immunohistochemistry analysis of paraffin-embedded Human breast cancer using ENT2 antibody.High-pressure and temperature Sodium Citrate pH 6.0 was used for antigen retrieval.

Immunocytochemistry analysis of ENT2 (green) in Hela using ENT2 antibody,and DAPI(blue)



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