

For research use only

Anti Human Organic Anion Transporter 3 (OAT3) Polyclonal Antibody

To eliminate the drug, xenobiotics, a varirety of endogeneous substances, and their metabolites out of the body, specific membrane proteins named transporters are required. There are two major pathways for the elimination, one of which is hepatic one through bile, and another is renal one to urine. The transporter fall into various transport systems by the transportative substrate. In particular, oraganic ion transporter family is comprised of organic anion transport family (OAT), oraganic cation transport family (OCT), OCTN/carnitine transport family, and OAT are multispecific organic anion transpoters, the substrates of which include a lot of both endogeneous and exogeneous anions.

Human organic anion transporter 3 (OAT3) encodes a 543 amino acid residue protein, and which is predicted 12 putative membran-spanning protein. OAT3 is expressed in the kidney, brain, and skeletal muscle. OAT3 mediated the uptake of organic anions, such as PAH (ρ -aminohippurate), ochratoxin A and estrone sulfate, prostaglandin E₂ (PGE₂), and cimetidine.

This has been proved to be useful for immunohistochemistry.

Package Size	$25 \mu\mathrm{g}$ (250 $\mu\mathrm{L}/\mathrm{vial}$)
Format	Rabbit polyclonal antibody 0.1 mg/mL
Buffer	Block Ace as a stabilizer, containing 0.1%Proclin as bacteriostat
Storage	Store below -20°C
	Once thawed, store at 4°C. Repeated freeze-thaw cycles should be avoided.
Purification method	This antibody was purified from rabbit serum immunized with synthesized C-end
	peptide of human OAT3 by peptide affinity chromatography.
Working dilution for im	munohistochemistry $1-5 \mu \text{ g/mL}$

HGNC Name SLC22A8 (solute carrier family 22A8)

*HGNC: Human Gene Nomenclature Committee



Human Kidney (frozen section)



Anti Human Organic Anion Transporter 3 (OAT3) Polyclonal Antibody

[Reference]

- 1 Kusuhara H., Sekine T., Utsunomiya-Tate N., Tsuda M., Kojima R., Cha S.H., Sugiyama., Kanai Y.and Endou H.:Molecular cloning and characterization of new multispecific organic anion transporter from rat brain. J.Biol.Chem.274 (19) 13675-13680, 1999
- 2 Sekine T., Cha S.H., Kanai Y.and Endou H.:Molecular biology of multispecific organic anion transporter family (OAT family). *Clin.Exp.NephIrol*.3.237-243,1999
- 3 Sekine T., Cha S.H.and Endou H.: The multispecific organic anion transporter (OAT) family. *pflugers Arch-Eur.J.Physiol*.440.337-350,2000
- 4 Cha S.H., Sekine T., Fukushima J., Kanai Y., Kobayashi Y., Goya T.and Endou H. :Identification and Characterization of Human Organic Anion Transporter 3 Expressing Predominantly in the Kidney. *Mol Pharmacol.* 59.1277-1286,2001



