

## I-FABP Monoclonal Antibody

<b>Catalog No :</b>	YM0352
<b>Reactivity :</b>	Human
<b>Applications :</b>	WB;IHC;IF;FCM;ELISA
<b>Target :</b>	I-FABP
<b>Fields :</b>	>>PPAR signaling pathway;>>Fat digestion and absorption
<b>Gene Name :</b>	FABP2
<b>Protein Name :</b>	Fatty acid-binding protein, intestinal
<b>Human Gene Id :</b>	2169
<b>Human Swiss Prot No :</b>	P12104
<b>Mouse Swiss Prot No :</b>	P55050
<b>Immunogen :</b>	Purified recombinant fragment of human I-FABP expressed in E. Coli.
<b>Specificity :</b>	I-FABP Monoclonal Antibody detects endogenous levels of I-FABP protein.
<b>Formulation :</b>	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
<b>Source :</b>	Monoclonal, Mouse
<b>Dilution :</b>	WB 1:500 - 1:2000. IHC 1:200 - 1:1000. IF 1:200 - 1:1000. Flow cytometry: 1:200 - 1:400. ELISA: 1:10000. Not yet tested in other applications.
<b>Purification :</b>	Affinity purification
<b>Storage Stability :</b>	-15°C to -25°C/1 year(Do not lower than -25°C)
<b>Molecularweight :</b>	15kD

**Cell Pathway :** PPAR;**P References :**

1. Yamada, K. et al. (1997) Diabetologia. 40(6):706-10
2. Georgopoulos, A. et al. (2000)85(9):3155-60
3. Kim, CH. et al. (2001) Metabolism. 50(4):473-6
4. Fisher, E. et al. (2006) Horm Met

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**Background :** The intracellular fatty acid-binding proteins (FABPs) belong to a multigene family with nearly twenty identified members. FABPs are divided into at least three distinct types, namely the hepatic-, intestinal- and cardiac-type. They form 14-15 kDa proteins and are thought to participate in the uptake, intracellular metabolism and/or transport of long-chain fatty acids. They may also be responsible in the modulation of cell growth and proliferation. Intestinal fatty acid-binding protein 2 gene contains four exons and is an abundant cytosolic protein in small intestine epithelial cells. This gene has a polymorphism at codon 54 that identified an alanine-encoding allele and a threonine-encoding allele. Thr-54 protein is associated with increased fat oxidation and insulin resistance. [provided by RefSeq, Jul 2008],

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**Function :** domain:Forms a beta-barrel structure that accommodates the hydrophobic ligand in its interior.,function:FABP are thought to play a role in the intracellular transport of long-chain fatty acids and their acyl-CoA esters. FABP2 is probably involved in triglyceride-rich lipoprotein synthesis. Binds saturated long-chain fatty acids with a high affinity, but binds with a lower affinity to unsaturated long-chain fatty acids. FABP2 may also help maintain energy homeostasis by functioning as a lipid sensor.,induction:By EGF.,similarity:Belongs to the calycin superfamily. Fatty-acid binding protein (FABP) family.,tissue specificity:Expressed in the small intestine and at much lower levels in the large intestine. Highest expression levels in the jejunum.,

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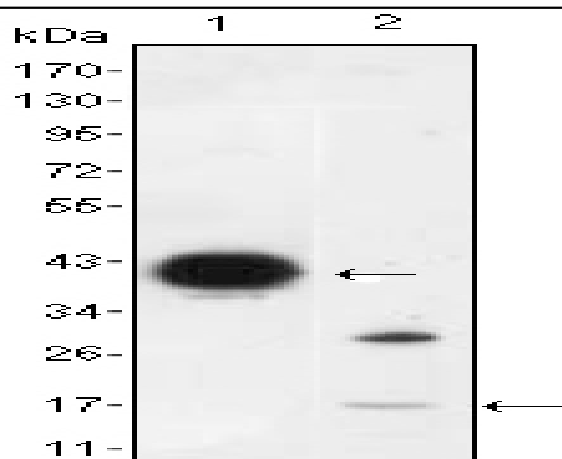
**Subcellular Location :** Cytoplasm.

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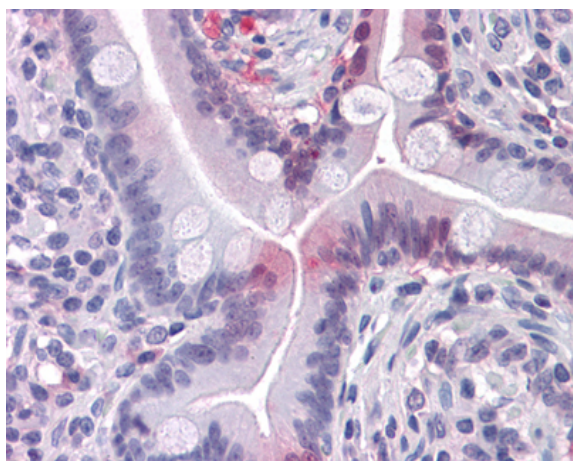
**Expression :** Expressed in the small intestine and at much lower levels in the large intestine. Highest expression levels in the jejunum.

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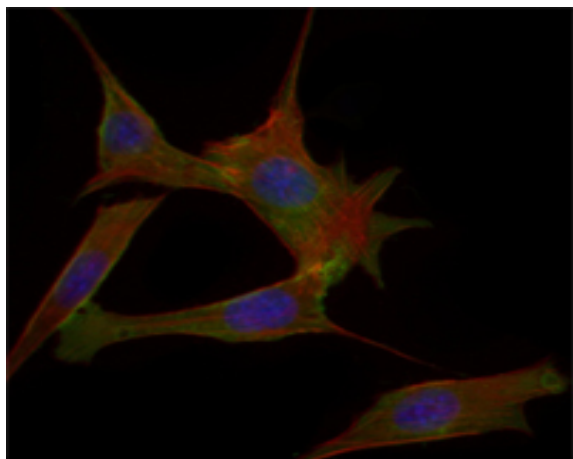
## Products Images



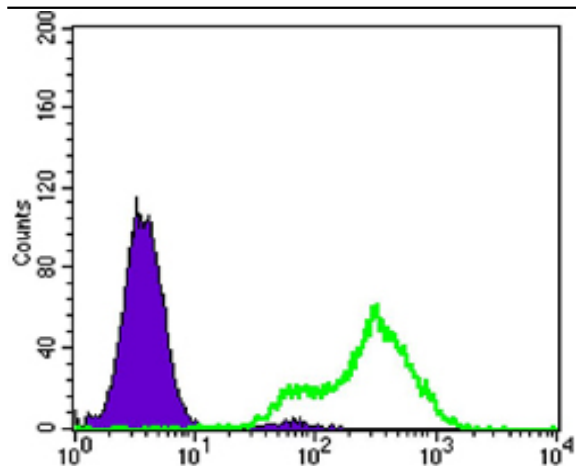
Western Blot analysis using I-FABP Monoclonal Antibody against FABP2-hlgGfc transfected HEK293 (1) cell lysate and LOVO (2) cell lysate.



Immunohistochemistry analysis of paraffin-embedded human Small Intestine tissues with AEC staining using I-FABP Monoclonal Antibody.



Immunofluorescence analysis of 3T3-L1 cells using I-FABP Monoclonal Antibody (green). Blue: DRAQ5 fluorescent DNA dye. Red: Actin filaments have been labeled with Alexa Fluor-555 phalloidin.



Flow cytometric analysis of LOVO cells using I-FABP Monoclonal Antibody (green) and negative control (purple).