

Fto (Fat mass and obesity-associated protein) Antibody Mouse monoclonal antibody Catalog # AN1187

Specification

Fto (Fat mass and obesity-associated protein) Antibody - Product Information

Application Primary Accession Reactivity Predicted Host Clonality Isotype Calculated MW WB <u>O9C0B1</u> Human, Mouse, Rat Bovine, Monkey Mouse monoclonal IgG 58 KDa

Fto (Fat mass and obesity-associated protein) Antibody - Additional Information

Gene ID79068Gene NameFTOOther NamesAlpha-ketoglutarate-dependent dioxygenase FTO, 11411-, Fat mass and obesity-associated
protein, FTO, KIAA1752

Target/Specificity

Synthetic peptide corresponding to amino acid residues from the N-terminal region conjugated to KLH.

Dilution WB~~ 1:1000

Format Protein G purified culture supernatant.

Antibody Specificity

Specific for the \sim 58 kDa Fto protein in Western blots of rat testes lysate. The antibody has also been used for immunocytochemistry with neuronal progenitor cells.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Fto (Fat mass and obesity-associated protein) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Shipping Blue Ice

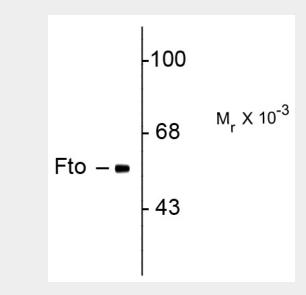


Fto (Fat mass and obesity-associated protein) Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- <u>Blocking Peptides</u>
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Fto (Fat mass and obesity-associated protein) Antibody - Images



Western blot of rat testes lysate showing specificimmunolabeling of the ~ 58k Fto protein.

Fto (Fat mass and obesity-associated protein) Antibody - Background

The FTO gene is the most robust gene for common obesity characterized to date. FTO gene expression has been found to be significantly upregulated in the hypothalamus of rats after food deprivation and strongly negatively correlated with the expression of orexin peptide which is involved in the stimulation of food intake (Fredricksson R et al., 2008). Deletion analysis of FTO gene in mice showed that Fto is functionally involved in the control of both energy intake and energy expenditure (Fischer J et al., 2009)

Fto (Fat mass and obesity-associated protein) Antibody - References

Fredriksson R, Hägglund M, Olszewski PK, Stephansson O, Jacobsson JA, Olszewska AM, Levine AS, Lindblom J, Schiöth HB (2008). The obesity gene, FTO, is of ancient origin, upregulated during food deprivation and expressed in neurons of feeding-related nuclei of the brain. Endocrinology 149: 2062. Fischer J, Koch L, Emmerling C, Vierkotten J, Peters T, Brüning JC, Rüther U. (2009).

Inactivation of the Fto gene protects from obesity. Nature 458: 894.