10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

TCF7L2 Antibody (monoclonal) (M06)

Mouse monoclonal antibody raised against a partial recombinant TCF7L2.
Catalog # AT4192a

Product Information

Application	WB, IHC, IF, E
Primary Accession	Q9NQB0
Other Accession	NM_030756
Reactivity	Human
Host	Mouse
Clonality	monoclonal
Isotype	IgG1 Kappa
Clone Names	3A4
Calculated MW	67919

Additional Information

Gene ID	6934
Other Names	Transcription factor 7-like 2, HMG box transcription factor 4, T-cell-specific transcription factor 4, T-cell factor 4, TCF-4, hTCF-4, TCF7L2, TCF4
Target/Specificity	TCF7L2 (NP_110383, 490 a.a. ~ 596 a.a) partial recombinant protein with GST tag. MW of the GST tag alone is 26 KDa.
Dilution	WB~~1:500~1000 IHC~~1:100~500 IF~~1:50~200 E~~N/A
Format	Clear, colorless solution in phosphate buffered saline, pH 7.2 .
Storage	Store at -20°C or lower. Aliquot to avoid repeated freezing and thawing.
Precautions	TCF7L2 Antibody (monoclonal) (M06) is for research use only and not for use in diagnostic or therapeutic procedures.

Background

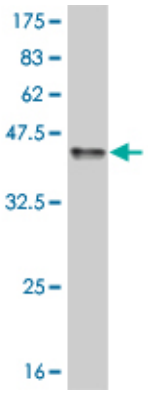
This gene encodes a high mobility group (HMG) box-containing transcription factor that plays a key role in the Wnt signaling pathway. The protein has been implicated in blood glucose homeostasis. Genetic variants of this gene are associated with increased risk of type 2 diabetes.

References

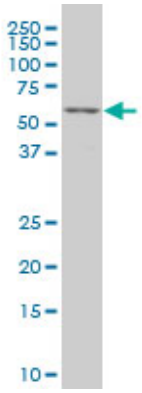
Glycemia determines the effect of type 2 diabetes risk genes on insulin secretion. Heni M, et al. Diabetes, 2010 Aug 29. PMID 20802253.Role of BMI in the Association of the TCF7L2 rs7903146 Variant with Coronary Heart Disease: The Atherosclerosis Risk in Communities (ARIC) Study. Kucharska-Newton AM, et al. J Obes,

2010. PMID 20798759.Hyperglycemia and Adverse Pregnancy Outcome (HAPO) Study: common genetic variants in GCK and TCF7L2 are associated with fasting and post-challenge glucose levels in pregnancy and with the new consensus definition of gestational diabetes from the International Association of Diabetes and Pregnancy Study Groups. Freathy RM, et al. Diabetes, 2010 Aug 3. PMID 20682688.The balance of TCF7L2 variants with differential activities in Wnt-signaling is regulated by lithium in a GSK3beta-independent manner. Struewing I, et al. Biochem Biophys Res Commun, 2010 Aug 20. PMID 20654575.Potential role of TCF7L2 gene variants on cardiac sympathetic/parasympathetic activity. Boccardi V, et al. Eur J Hum Genet, 2010 Jul 21. PMID 20648057.

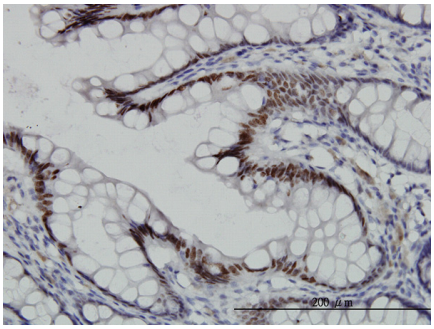
Images



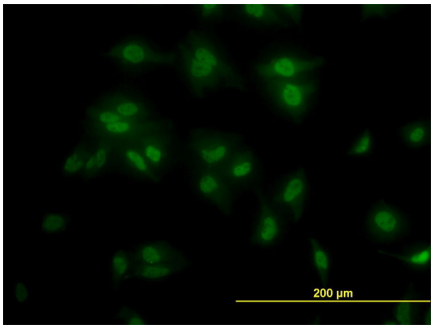
Antibody Reactive Against Recombinant Protein.Western Blot detection against Immunogen (37.51 KDa) .



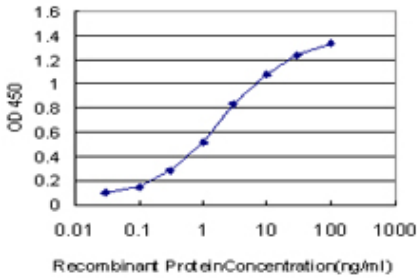
TCF7L2 monoclonal antibody (M06), clone 3A4 Western Blot analysis of TCF7L2 expression in K-562 ((Cat # AT4192a)



Immunoperoxidase of monoclonal antibody to TCF7L2 on formalin-fixed paraffin-embedded human colon. [antibody concentration 3 ug/ml]



Immunofluorescence of monoclonal antibody to TCF7L2 on HeLa cell. [antibody concentration 10 ug/ml]



Detection limit for recombinant GST tagged TCF7L2 is approximately 0.03ng/ml as a capture antibody.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.