

VDR Antibody (monoclonal) (M02)

Mouse monoclonal antibody raised against a full length recombinant VDR. Catalog # AT4509a

Product Information

Application	IHC, E
Primary Accession	<u>P11473</u>
Other Accession	<u>BC060832</u>
Reactivity	Human
Host	mouse
Clonality	monoclonal
Isotype	IgG2a Kappa
Clone Names	2F4
Calculated MW	48289

Additional Information

Gene ID	7421
Other Names	Vitamin D3 receptor, VDR, 25-dihydroxyvitamin D3 receptor, Nuclear receptor subfamily 1 group I member 1, VDR, NR1I1
Target/Specificity	VDR (AAH60832, 1 a.a. ~ 427 a.a) full-length recombinant protein with GST tag. MW of the GST tag alone is 26 KDa.
Dilution	IHC~~1:100~500 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	VDR Antibody (monoclonal) (M02) is for research use only and not for use in diagnostic or therapeutic procedures.

Background

This gene encodes the nuclear hormone receptor for vitamin D3. This receptor also functions as a receptor for the secondary bile acid lithocholic acid. The receptor belongs to the family of trans-acting transcriptional regulatory factors and shows sequence similarity to the steroid and thyroid hormone receptors. Downstream targets of this nuclear hormone receptor are principally involved in mineral metabolism though the receptor regulates a variety of other metabolic pathways, such as those involved in the immune response and cancer. Mutations in this gene are associated with type II vitamin D-resistant rickets. A single nucleotide polymorphism in the initiation codon results in an alternate translation start site three codons downstream. Alternative splicing results in multiple transcript variants encoding the same protein.

References

[Effect of TT genotype of the vitamin D receptor gene on bone mineral density in dialysis patients] . Ter Arkh, 2010. PMID 20731109.Genomic and metabolomic patterns segregate with responses to calcium and vitamin D supplementation. Elnenaei MO, et al. Br J Nutr, 2010 Aug 23. PMID 20727239.Polymorphisms within exon 9 but not intron 8 of the vitamin D receptor are associated with the nephropathic complication of type-2 diabetes. Nosratabadi R, et al. Int J Immunogenet, 2010 Aug 19. PMID 20727043.Vitamin D receptor genetic variants among patients with end-stage renal disease. Tripathi G, et al. Ren Fail, 2010. PMID 20722565.Clinical and Genetic Predictors of Response to Narrowband UVB for the Treatment of Chronic Plaque Psoriasis. Ryan C, et al. Br J Dermatol, 2010 Aug 13. PMID 20716226.

Images



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



Detection limit for recombinant GST tagged VDR is approximately 1ng/ml as a capture antibody.

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