## Mouse Anti-Vitamin D Receptor/VDR [D6]: MC0304, MC0304RTU7

Intended Use: For Research Use Only

**Description:** Steroid receptors are ligand-dependent intracellular proteins that stimulate transcription of specific genes by binding to specific DNA sequences following activation by the appropriate hormone. The 1,25-dihydroxy-vitamin D3 receptor (VDR) belongs to the superfamily of steroid hormone receptors which includes estrogen, progesterone, glucocorticoid, androgen, and thyroid hormone receptors. Vitamin D modulates calcium and phosphorus homeostasis, bone remodeling, cell growth regulation, and differentiation. Studies have found VDR in the intestine, bone, kidney, epidermis, and cells of the endocrine immune system. Repression of T-cell proliferation and interleukin-2 (IL-2) gene expression, for example, occurs when VDR binds within the IL-2 enhancer. Formation of VDR/retinoic X receptor (RXR) heterodimers in the presence of intracellular 1,25(OH)2D3 has been shown to interfere with assembly of nuclear factor of activated T-cells (NFATp)/Fos/Jun/DNA complex and subsequent IL-2 gene transcription.

## **Specifications**

D6
Mouse
IgG2a/k
Human, mouse, rat
Nucleus, cytoplasm, membrane
Antibody in PBS pH7.4, containing BSA and $\leq 0.09\%$ sodium azide (NaN3)
Store at 2°- 8°C
IHC, IF, IP, WB

Description	Catalog No.	Size	
Vitamin D Receptor/VDR Concentrated	MC0304	1 ml	
Vitamin D Receptor/VDR Prediluted	MC0304RTU7	7 ml	

## **IHC Procedure**

menoceaure		
Positive Control Tissue:	Skin tissue; HeLa cells, MCF7 cell extracts	
Concentrated Dilution:	50-200	
Pretreatment:	Citrate pH6.0 or EDTA pH8.0, 15 minutes using Pressure Cooker, or 30-60 minutes	
	using water bath at 95°-99°C	
Incubation Time and Temp:	30-60 minutes @ RT	
Detection:	Refer to the detection system manual	
* Result should be confirmed by an established diagnostic procedure.		



FFPE human parathyroid gland tissue stained with anti-VDR using DAB

## **References:**

- Examination of VDR/RXR/DRIP205 Interaction, Intranuclear Localization, and DNA Binding in Ras-Transformed Keratinocytes and Its Implication for Designing Optimal Vitamin D Therapy in Cancer. Jusu S. et al. Endocrinology. Mar 1;159(3):1303-1327, 2018.
- 2. Decreased Expression of Vitamin D Receptor Affects an Immune Response in Primary Biliary Cholangitis via the VDRmiRNA155-SOCS1 Pathway. Kempinska-Podhorodecka A, et al. Int J Mol Sci. Jan 29;18(2), 2017.

Doc. 100-MC0304 Rev. A