

PRODUCT INFORMATION

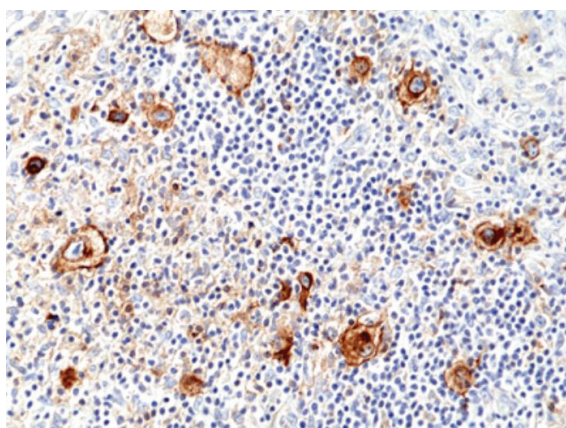
CD25/Interleukin-2R α (N-Term) Rabbit Monoclonal Antibody (RM418)

Item No. 32339

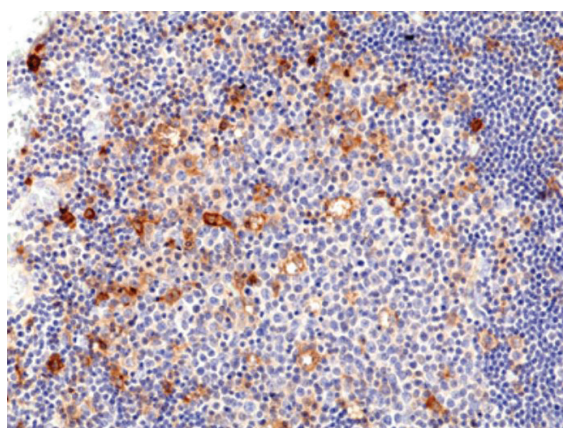
Overview and Properties

Contents:	This vial contains 100 μ l of protein A-affinity purified monoclonal antibody.
Synonyms:	CD25/IL-2R α , Cluster of Differentiation 25/Interleukin-2 Receptor Subunit α , ILR2A
Immunogen:	Peptide from the N-terminal region of human CD25
Cross Reactivity:	(+) CD25
Species Reactivity:	(+) Human
Form:	Liquid
Storage:	-20°C (as supplied)
Stability:	\geq 1 year
Storage Buffer:	PBS with 50% glycerol, 1% BSA, and 0.09% sodium azide
Clone:	RM418
Host:	Rabbit
Isotype:	IgG
Application:	Immunohistochemistry; the recommended starting dilution is 1:100 -1:200. Other applications were not tested, therefore optimal working concentration/dilution should be determined empirically.

Images



Immunohistochemical staining of formalin-fixed and paraffin-embedded human Hodgkin lymphoma tissue using CD25/Interleukin-2R α (N-Term) Rabbit Monoclonal Antibody (RM418) at a dilution of 1:200.



Immunohistochemical staining of formalin-fixed and paraffin-embedded human tonsil tissue using CD25/Interleukin-2R α (N-Term) Rabbit Monoclonal Antibody (RM418) at a dilution of 1:200.

WARNING
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA
This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY
Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

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Description

CD25, also known as interleukin-2 receptor α (IL-2R α), is a transmembrane glycoprotein.¹ It is composed of two domains, D1 and D2, and associates with the CD122/IL-2 β and CD132/IL-2 γ c subunits to form the heterotrimeric IL-2 receptor. CD25 is expressed in activated T and B cells, regulatory T cells, and lymphokine-activated killer (LAK) cells.²⁻⁴ Activation of IL-2R on T cells increases the expression of CD25 and leads to T cell proliferation and differentiation, as well as activation-induced T cell death.^{3,4} IL2A expression and CD25 protein levels in bone marrow are increased in patients with acute myeloid leukemia (AML) and associated with poor prognosis.³ SNPs in IL2A and elevated serum levels of a soluble form of CD25 are associated with an increased risk of Graves' disease.⁵ Cayman's CD25 (N-Term) Rabbit Monoclonal Antibody (RM418) can be used for immunohistochemistry (IHC).

References

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2. Volkó, J., Kenesei, Á., Zhang, M., *et al.* IL-2 receptors preassemble and signal in the ER/Golgi causing resistance to antiproliferative anti-IL-2R α therapies. *Proc. Natl. Acad. Sci. USA* **116**(42), 21120-21130 (2019).
3. Li, J., Ran, Q., Xu, B., *et al.* Role of CD25 expression on prognosis of acute myeloid leukemia: A literature review and meta-analysis. *PLoS One* **15**(7), e0236124 (2020).
4. Waldmann, T.A. The IL-2/IL-2 receptor system: A target for rational immune intervention. *Immunol. Today* **14**(6), 264-270 (1993).
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