

DESCRIPTION

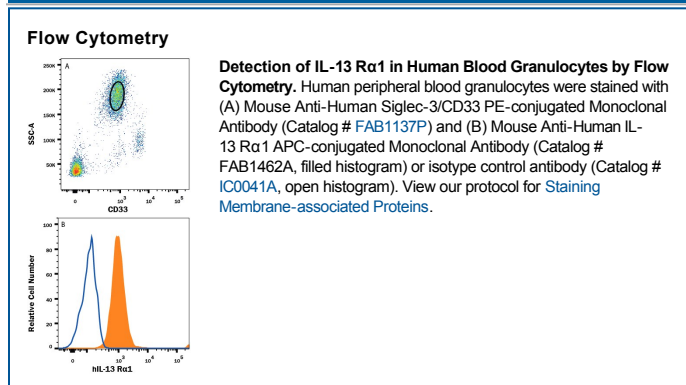
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|---------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Species Reactivity | Human |
| Specificity | Detects human IL-13 R α 1 in direct ELISAs and Western blots. In direct ELISAs and Western blots, no cross-reactivity with recombinant mouse IL-13 R α 1, recombinant human (rh) IL-13 R α 2, rhIL-4 R, rhIL-5 R β , or rhIL-9 R is observed. |
| Source | Monoclonal Mouse IgG _{2B} Clone # 419718 |
| Purification | Protein A or G purified from hybridoma culture supernatant |
| Immunogen | Mouse myeloma cell line NS0-derived recombinant human IL-13 R α 1 Ala27-Thr343 Accession # P78552 |
| Conjugate | Allophycocyanin Excitation Wavelength: 620-650 nm Emission Wavelength: 660-670 nm |
| Formulation | Supplied in a saline solution containing BSA and Sodium Azide. See Certificate of Analysis for details. *Contains <0.1% Sodium Azide, which is not hazardous at this concentration according to GHS classifications. Refer to the Safety Data Sheet (SDS) for additional information and handling instructions. |

APPLICATIONS

Please Note: Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

| | Recommended Concentration | Sample |
|-----------------------|----------------------------------|-----------|
| Flow Cytometry | 10 μ L/10 ⁶ cells | See Below |

DATA



PREPARATION AND STORAGE

| | |
|--------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------|
| Shipping | The product is shipped with polar packs. Upon receipt, store it immediately at the temperature recommended below. |
| Stability & Storage | Protect from light. Do not freeze. <ul style="list-style-type: none"> ● 12 months from date of receipt, 2 to 8 °C as supplied. |

BACKGROUND

Two type 1 membrane proteins belonging to the hematopoietin receptor family have been cloned and shown to bind IL-13 with differing affinities. The lower affinity IL-13 binding protein, previously designated IL-13 R α , or NR4, is now referred to as IL-13 R α 1. The high-affinity IL-13 binding protein, previously also designated IL-13 R or IL-13 R α ', is now referred to as IL-13 R α 2.

The human IL-13 R α 1 was originally cloned based on sequence homology to the mouse IL-13 R α 1. The IL-13 R α 1 cDNA encodes a 427 amino acid (aa) precursor protein with a putative 21 aa signal peptide, a 324 aa extracellular domain, a 23 aa transmembrane region and a 59 aa cytoplasmic tail. Human and mouse IL-13 R α 1 share 76% aa sequence identity. The extracellular domain of IL-13 R α 1 is also closely related to that of IL-13 R α 2. IL-13 R α 1 has been shown to combine with the IL-4 R α to form a high-affinity receptor complex capable of transducing an IL-13-dependent proliferative signal. The role of IL-13 R α 2 in IL-13 signaling remains to be elucidated.