

DESCRIPTION

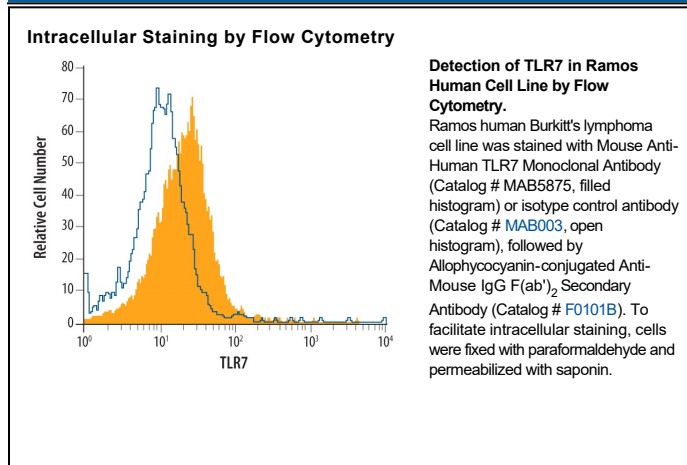
Species Reactivity	Human
Specificity	Detects human TLR7 in direct ELISAs.
Source	Monoclonal Mouse IgG _{2A} Clone # 533707
Purification	Protein A or G purified from hybridoma culture supernatant
Immunogen	<i>E. coli</i> -derived recombinant human TLR7 Met360-Leu516 Accession # Q9NYK1
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied either lyophilized or as a 0.2 µm filtered solution in PBS.

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
Intracellular Staining by Flow Cytometry	2.5 µg/10 ⁶ cells	See Below
CyTOF-ready	Ready to be labeled using established conjugation methods. No BSA or other carrier proteins that could interfere with conjugation.	

DATA



PREPARATION AND STORAGE

Reconstitution	Reconstitute at 0.5 mg/mL in sterile PBS.
Shipping	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below. *Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C
Stability & Storage	Use a manual defrost freezer and avoid repeated freeze-thaw cycles. <ul style="list-style-type: none"> • 12 months from date of receipt, -20 to -70 °C as supplied. • 1 month, 2 to 8 °C under sterile conditions after reconstitution. • 6 months, -20 to -70 °C under sterile conditions after reconstitution.

BACKGROUND

Toll-like receptor 7 (TLR7) is a 120 kDa (predicted, unglycosylated) type I transmembrane glycoprotein and member of the Toll-like receptor family. Human TLR7 is synthesized as a 1049 amino acid (aa) precursor that contains a 26 aa signal sequence, an 803 aa extracellular domain (ECD), a 21 aa transmembrane sequence, and a 189 aa cytoplasmic domain. Mature human TLR7 is 81% aa identical to mature mouse TLR7. TLR7 is detected in brain, placenta, spleen, stomach, small intestine, lung, and in plasmacytoid pre-dendritic cells. Functionally, TLR7 participates in the innate immune response to microbial agents.