Product Data Sheet

Alexa Fluor[®] 488 anti-mouse IL-17A

Catalog # / Size:	3134550 / 100 μg 3134545 / 25 μg
Clone:	TC11-18H10.1
Isotype:	Rat IgG1, к
Immunogen:	<i>E. coli</i> expressed, recombinant mouse IL-17A
Reactivity:	Mouse
Preparation:	The antibody was purified by affinity chromatography, and conjugated with Alexa Fluor® 488 under optimal conditions.
Formulation:	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.
Concentration:	0.5



PMA (20 ng/ml) + ionomycin (1 microg/ml) -stimulated (6 hours + monensin, 2 μ M) mouse thymoma cell line EL-4 intracellularly stained with TC11-18H10.1 Alexa Fluor® 488

Applications:

Applications:	Flow Cytometry
Recommended Usage:	Each lot of this antibody is quality control tested by intracellular immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is ≤ 0.25 microg per million cells in 100 microL volume. It is recommended that the reagent be titrated for optimal performance for each application.
	st Alexa Fluor $^{ m B}$ 488 has a maximum emission of 519 nm when it is excited at 488 nm.
Application Notes:	 ELISA Capture^{3,4} and ELISPOT Capture⁵: The purified TC11-18H10.1 antibody is useful as the capture antibody in a sandwich ELISA, when used in conjunction with the biotinylated TC11-8H4 antibody (Cat. No. 507002) as the detecting antibody and recombinant mouse IL-17 (Cat. No. 576009) as the standard. Flow Cytometry^{2-4,7,8,11,12}: The TC11-18H10.1 antibody is useful for intracellular immunofluorescent staining and flow cytometric analysis to identify IL-17-producing cells within mixed cell populations. Neutralization^{6,9}: The LEAF™ purified antibody (Endotoxin <0.1 EU/µg, Azide-Free, 0.2 µm filtered) is recommended for neutralization of mouse IL-17 bioactivity <i>in vivo</i> and <i>in vitro</i> (Cat. No. 506906). Additional reported applications (for the relevant formats) include: Western blotting.
Application References:	 Kennedy J, <i>et al.</i> 1996. <i>J. Interferon Cytokine Res.</i> 16:611. Schubert D, <i>et al.</i> 2004. <i>J. Immunol.</i> 172:4503. (ICFC) Infante-Duarte C, <i>et al.</i> 2000. <i>J. Immunol.</i> 165:6107. (ICFC, ELISA Capture) Harrington LE, <i>et al.</i> 2005. <i>Nature Immunol.</i> doi:10.1038/ni1254. (ICFC, ELISA Capture) Nekrasova T, <i>et al.</i> 2005. <i>J. Immunol.</i> 175:2734. (ELISPOT Capture) Yen D, <i>et al.</i> 2006. <i>J. Clin. Invest.</i> 116:1310. (Neut) Ehirchiou D, <i>et al.</i> 2007. <i>J. Exp. Med.</i> 204:1519. (ICFC) Kang SG, et al. 2007. <i>J. Immunol.</i> 179:3724. (ICFC)

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10. Neufert C, et al. 2007. Eur. J. Immunol. 37:1809. PubMed
11. Wang C, et al. 2009. Mucosal Immunol 2:173. (ICFC) PubMed
12. Cui Y, et al. 2009. Invest. Ophth. Vis. Sci. 50:5811. (ICFC) PubMed
13. Kivisäkk P, et al. 2009. Ann. Neurol. 65:457. PubMed
14. Cooney LA, et al. 2011. J. Immunol. 187:4440. PubMed
15. Ma Y, et al. 2012. PLoS One. 7:e40763. PubMed
16. Murakami R, et al. 2013. PLoS One. 8:73270. PubMed

Description: IL-17, also known as CTLA-8, is a T cell-expressed pleiotropic cytokine that exhibits a high degree of homology to a protein encoded by the ORF13 gene of herpes virus Saimiri. IL-17 is produced by Th cells (Th17) that are distinct from the traditional Th1- and Th2-cell subsets. IL-23 plays an important role in triggering IL-17 production. Both recombinant and natural IL-17 have been shown to exist as disulfide linked homodimers. IL-17 exhibits multiple biological activities on a variety of cells including: the induction of IL-6 and IL-8 production in fibroblasts, activation of NF-κB, and costimulation of T cell proliferation. IL-17 is an essential inflammatory mediator in the development of autoimmune diseases. Neutralization of IL-17 with monoclonal antibody is able to ameliorate the disease course.

Antigen1. Fitzgerald K, et al. Eds. 2001. The Cytokine FactsBook. Academic Press SanReferences:Diego.

- 2. Numasaki M, et al. 2002. Blood 101:2620.
- 3. Fossiez F, et al. 1996. J. Exp. Med. 183:2593.
- 4. Yao Z,