Technical Data Sheet

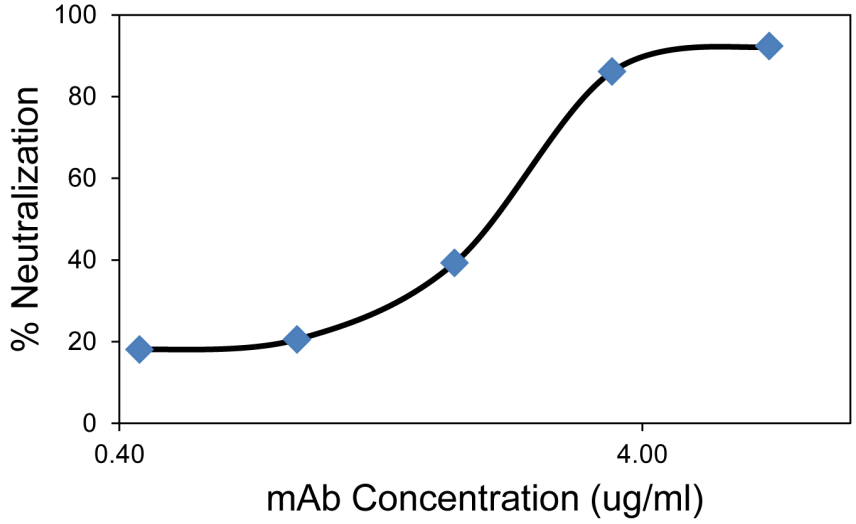
Purified NA/LE Mouse Anti-Mouse IL-17F

Product Information

Material Number:	**563592**
Alternate Name:	Il17f; interleukin 17F; Interleukin-17F
Size:	100 µg
Concentration:	1.0 mg/ml
Clone:	MM17F8F5
Immunogen:	Mouse IL-17F
Isotype:	Mouse IgG1, κ
Reactivity:	QC Testing: Mouse
Storage Buffer:	No azide/low endotoxin: Aqueous buffered solution containing no preservative, 0.2µm sterile filtered. Endotoxin level is ≤0.01 EU/µg (≤0.001 ng/µg) of protein as determined by the LAL assay.

Description

The MM17F8F5 monoclonal antibody specifically binds to Interleukin-17F (IL-17F) and can neutralize its biological activity. IL-17F is a member of the IL-17 family of cytokines. Among IL-17 family members, IL-17F has the highest amino acid sequence homology to IL-17A. IL-17F is produced by activated CD4+ T helper (Th17) cells, CD8+ T (Tc17) cells and γδ T cells. IL-17F can be secreted as homodimers or as heterodimers with IL-17A. IL-17F and IL-17A have overlapping functions such as inducing epithelial cells and fibroblasts to produce proinflammatory cytokines and chemokines including IL-6, GM-CSF, CXCL1, CCL2, and CCL7. These factors attract and activate neutrophils and other cell types that mediate protective responses against pathogenic microbes or pathologic allergic or autoimmune diseases. IL-17 gene knockout studies have shown that IL-17F and IL-17A have independent functions as well. IL-17F and IL-17A exert their biological function by binding to and signaling through IL-17 receptors comprised of the transmembrane receptor subunits, IL-17RA (CD217) and IL-17RC.



Neutralization of mouse IL-17F biological activity with MM17F8F5, a Mouse Anti-Mouse IL-17F monoclonal antibody. *In a 96-well microplate, biologically-active recombinant mouse IL-17F protein (0.2 µg/well) was preincubated (1 hr, 37°C) with serial dilutions of Purified NA/LE Mouse Anti-Mouse IL-17F antibody (Cat. No. 563592; µg/ml) or tissue culture medium (as a control). Following the incubation, cells from the NIH-3T3 mouse embryonic cell line were added at 5 x 10^4 cells per well and were cultured at 37°C. After 24 hours of culture, the supernatants from each well were harvested and their concentrations of IL-6 were quantified using a BD™ Cytometric Bead Array Mouse IL-6 Flex Set (Cat. No. 558301). As the MM17F8F5 antibody was serially diluted, a neutralizing Anti-Mouse IL-17F antibody dose-response relationship was observed as shown in the figure.*

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Preparation and Storage

Store undiluted at 4°C.

The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography.

This preparation contains no preservatives, thus it should be handled under aseptic conditions.

Application Notes

Application

Intracellular staining (flow cytometry)	Routinely Tested
Neutralization	Tested During Development

Suggested Companion Products

Catalog Number	Name	Size	Clone
558301	Mouse IL-6 Flex Set	100 tests	(none)
561631	Alexa Fluor® 488 Mouse anti-Mouse IL-17F	0.1 mg	O79-289
561630	Alexa Fluor® 647 Mouse anti-Mouse IL-17F	0.1 mg	O79-289
561657	Alexa Fluor® 647 Mouse anti-Mouse IL-17F	25 µg	O79-289
561656	PE Mouse anti-Mouse IL-17F	25 µg	O79-289
561627	PE Mouse anti-Mouse IL-17F	0.1 mg	O79-289
562418	PE-CF594 Mouse Anti-Mouse IL-17F	50 µg	O79-289
562194	PerCP-Cy™5.5 Mouse Anti-Mouse IL-17F	50 µg	O79-289
562174	Mouse IL-17F Flex Set	100 tests	(none)
553447	Purified NA/LE Mouse IgG1 κ Isotype Control	0.5 mg	107.3
554721	Purified NA/LE Mouse IgG1 κ Isotype Control	0.5 mg	107.3

Product Notices

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. An isotype control should be used at the same concentration as the antibody of interest.
3. Sodium azide is a reversible inhibitor of oxidative metabolism; therefore, antibody preparations containing this preservative agent must not be used in cell cultures nor injected into animals. Sodium azide may be removed by washing stained cells or plate-bound antibody or dialyzing soluble antibody in sodium azide-free buffer. Since endotoxin may also affect the results of functional studies, we recommend the NA/LE (No Azide/Low Endotoxin) antibody format, if available, for in vitro and in vivo use.
4. Alexa Fluor® is a registered trademark of Molecular Probes, Inc., Eugene, OR.
5. Cy is a trademark of Amersham Biosciences Limited.
6. CF™ is a trademark of Biotium, Inc.
7. Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols.

References

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