

CERTIFICATE OF ANALYSIS – TECHNICAL DATA SHEET

Product name	Mincle, Rat, clone WEN43		
Catalog number	HM3041-20UG		
Lot number	-	Expiry date	-
Volume	200 µl	Amount	20 µg
Formulation	0.2 µm filtered in PBS+0.1%BSA	Concentration	100 µg/ml
Host Species	Mouse IgG1	Conjugate	None
Endotoxin	<24 EU/mg	Purification	Protein G
Storage	4°C		

Application notes

	IHC-F	IHC-P	IF	FC	FS	IA	IP	W
Reference #				1	1			
Yes				•	•			
No								
N.D.	•	•	•			•	•	•

N.D.= Not Determined; IHC = Immuno histochemistry; F = Frozen sections; P = Paraffin sections; IF = Immuno Fluorescence; FC = Flow Cytometry; FS = Functional Studies; IA = Immuno Assays; IP = Immuno Precipitation; W = Western blot

Dilutions to be used depend on detection system applied. It is recommended that users test the reagent and determine their own optimal dilutions. The typical starting working dilution is 1:50.

- FC: Antibody WEN43 stains the extracellular domain of Mincle transfected 293 cells. WEN43 does not bind to other receptors in the rat APLEC family (Ref.1).
- FS: Antibody WEN43 can act complementary in the inhibition of phagocytosis (Ref.1).
- Positive control: BW5417 or 293T cells.

General Information

Description	The monoclonal antibody WEN43 recognizes rat macrophage inducible C-type lectin (Mincle). This receptor is a member of the C-type lectin/C-type lectin-like domain (CTL/CTLD) superfamily. Members of this family share a common protein fold and have diverse functions, such as cell adhesion, cell-cell signaling, glycoprotein turnover, and roles in inflammation and immune response. For instance, Mincle is involved in mediating inflammatory responses to necrotic cells and is a pathogen sensor for Mycobacterium tuberculosis. It is a member of the Dendritic Cell Inhibitory Receptor (DCIR) group of C-type lectin receptors (CLRs), which are expressed mainly by antigen presenting cells and are encoded in a cluster in the natural killer gene complex. CLRs play crucial roles in defense against pathogens and recognize a variety of carbohydrate moieties. Ligand binding to CLRs leads to the activation of NF-κB via a Syk/CARD9 signaling module. Mincle was originally identified as a lipopolysaccharide-inducible protein in macrophages and has been shown to stimulate inflammatory responses to fungi, although the ligands and signaling pathways involved have not been defined. WEN43 does not bind to other receptors in the rat APLEC family.
Immunogen	Rat mincle-Fcγ2b fusion protein
Aliases	Marcophage inducible C-type lectin, CLR, CLECSF9, CLEC4E
References	1. Lobato-Pascual, A et al; Mincle, the receptor for mycobacterial cord factor, forms a functional receptor complex with MCL and FcεRI-γ. Eur J Immunol 2013, 43: 3167
Storage&stability	Product should be stored at 4°C. Under recommended storage conditions, product is stable for at least one year.

Precautions

For research use only. Not for use in or on humans or animals or for diagnostics. It is the responsibility of the user to comply with all local/state and federal rules in the use of this product. Hycult Biotech is not responsible for any patent infringements that might result from the use or derivation of this product.

We hereby certify that the above-stated information is correct and that this product has been successfully tested by the Quality Control Department. This product was released for sale according to the existing specifications. This document has been produced electronically and is valid without a signature.

Approved by Manager of QC
Brenda Teunissen

Date
11/01/2021

Do you have any questions or comments regarding this product? Please contact us via support@hycultbiotech.com.