

Technical Data Sheet

InVivoMAb anti-mouse c-Kit (CD117)



Attention: Use of this product constitutes an agreement to Bio X Cell's Terms and Conditions which are included with this product in print and can also be found at <https://bioxcell.com/terms-and-conditions>.

Lot Specific Information

Lot Number: Lot Specific*
Volume: Lot Specific*
Concentration: Lot Specific* (generally 4 to 11 mg/ml) *
Total Protein: Lot Specific*

*This information will be noted on the certificate of analysis that ships with this product.

Product Information

Catalog Number: BE0280
Clone: 2B8
Isotype: Rat IgG2b, κ
Recommended Isotype Control(s): InVivoMAb rat IgG2b isotype control, anti-keyhole limpet hemocyanin
Recommended Dilution Buffer: InVivoPure pH 7.0 Dilution Buffer
Immunogen: Mouse bone marrow mast cells
Reported Applications: Flow cytometry
Immunofluorescence
Immunohistochemistry
Antibody Drug Conjugate
Formulation: PBS, pH 7.0
Contains no stabilizers or preservatives
Endotoxin: $\leq 1\text{EU/mg}$ ($\leq 0.001\text{EU}/\mu\text{g}$)
Determined by LAL gel clotting assay
Purity: $\geq 95\%$
Determined by SDS-PAGE
Sterility: 0.2 μm filtration
Production: Purified from cell culture supernatant in an animal-free facility
Purification: Protein G
RRID: [AB_2687803](https://rrid.info/AB_2687803)
Molecular Weight: 150 kDa

Description

The 2B8 monoclonal antibody reacts with mouse c-Kit also known as CD117, Steel factor receptor, stem cell factor receptor, and mast cell growth factor. c-Kit is a 145 kDa transmembrane tyrosine kinase and an immunoglobulin superfamily member. c-Kit is expressed on hematopoietic progenitor cells, mast cells, and acute myeloid leukemia (AML) cells and is a critical hematopoietic stem and progenitor cell receptor for the cytokine stem cell factor (SCF). The interaction of the c-Kit receptor and SCF promotes the proliferation and differentiation of hematopoietic progenitor cells. Studies have demonstrated that when 2B8 is conjugated to a cytotoxic compound, the antibody-drug conjugate (ADC) potently depleted greater than 99% of hematopoietic stem cells (HSCs) in-vivo and enabled the successful engraftment of donor hematopoietic cells without resulting in neutropenia or lymphopenia. The 2B8-ADC was more efficiently internalized by EML cells and more effective at depleting immunophenotypic and functional HSCs in vivo than murine anti-c-Kit clones 3C11 or ACK2.

Storage

Store at the stock concentration at 4°C . **Do not freeze.**

It is not uncommon for a floccule or precipitate to appear during storage. The floccule is typically buffer salts precipitating out of solution or a small bit of protein aggregation. For information on how to remove floccules or precipitates see our FAQ's at <https://bioxcell.com/faqs>.

Protocol Information

Since applications vary, each investigator should use the application references as a guide to help estimate the appropriate dose or concentration. The dose or concentration can be further optimized experimentally in a dose response or titration experiment.

Application References

For a complete list of references, visit https://bioxcell.com/be0280?bxcs=9k1b3a#tab_references or scan the QR code below.



Bio X Cell, LLC

<https://bioxcell.com>

+1-866-787-3444

customerservice@bioxcell.com

Conditions: For research use only. Not for use in diagnostic or therapeutic procedures.

Not for resale.

Bio X Cell, Bio X Cell logo, and all other trademarks are the property of Bio X Cell, LLC © 2025 Bio X Cell, LLC