

Mouse/Rat CD71 Antibody

Purified *in vivo* GOLD™ Functional Grade

Monoclonal Antibody

Product Information

Product No.: C853

Clone: OX-26

Isotype: Mouse IgG2a

Storage: Sterile 2° to 8°C

Product Description

Specificity:

Clone OX-26 reacts with rat CD71 (TfR1)

Antigen Distribution:

CD71 is expressed on the surface of proliferating cells, reticulocytes, and erythroid precursors

Background:

CD71 is a transferrin receptor on the cell surface that mediates the uptake of transferrin-iron complexes, thereby mediating cellular proliferation¹. CD71 is a homodimeric glycoprotein containing 760 amino acids and it binds to diferric transferrin². Binding by diferric transferrin causes CD71 to be internalized, and diferric iron is subsequently released³. CD71 is highly expressed on malignant cells, as iron uptake is necessary for aberrant cell proliferation⁴.

Known Reactivity Species:

Mouse, Rat

Format:

Purified *in vivo* GOLD™ Functional Grade

Formulation

This monoclonal antibody is aseptically packaged and formulated in 0.01 M phosphate buffered saline (150 mM NaCl) PBS pH 7.0-7.5, 0.005% pS80 stabilizing buffer, with no carrier protein, potassium, calcium or preservatives added. Due to inherent biochemical properties of antibodies, certain products may be prone to precipitation over time. Precipitation may be removed by aseptic centrifugation and/or filtration.

Purity

≥95% monomer by analytical SEC, >95% by SDS Page

Endotoxin

<1.0 EU/μg as determined by the LAL method

Storage and Stability

Functional grade preclinical antibodies may be stored sterile as received at 2° to 8°C for up to one month. For longer term storage, aseptically aliquot in working volumes without diluting and store at ≤ -70°C.

Avoid Repeated Freeze Thaw Cycles

Product Preparation

Functional grade preclinical antibodies are manufactured in an animal free facility using in vitro cell culture techniques and are purified by a multi-step process including the use of protein A or G to assure extremely low levels of endotoxins, leachable protein A or aggregates.

Applications

Applications and Recommended Usage (Quality Tested by Leinco):

FC
IHC

Other Applications Reported in Literature:

IHC
FC

Country of Origin

USA

References

- 1) Aisen P. Int J Biochem Cell Biol. Nov;36(11):2137-43. 2004.
- 2) Lawrence CM, Ray S, Babyonyshev M, et. al. Science. Oct 22;286(5440):779-82. 1999.
- 3) Marsee DK, Pinkus GS, Yu H. Am J Clin Pathol. Sep;134(3):429-35. 2010.
- 4) Candelaria PV, Leoh LS, Penichet ML, Daniels-Wells TR. Front Immunol. Mar 17;12:607692. 2021
- 5) Jiménez E, Sacedón R, Vicente A, et. al. J Immunol. May 15;168(10):5005-13. 2002.
- 6) Fabriek BO, Polfliet MM, Vloet RP, et. al. Blood. Jun 15;109(12):5223-9. 2007.