CD133 (Prominin-1) Monoclonal Antibody (13A4), PE, eBioscience™

Product Details	
Size	100 µg
Species Reactivity	Dog, Mouse
Published Species	Dog, Rat, Mouse, Human
Host/Isotype	Rat / IgG1, kappa
Recommended Isotype Control	Rat IgG1 kappa Isotype Control (eBRG1), PE, eBioscience™
Class	Monoclonal
Type	Antibody
Clone	13A4
Conjugate	PE
Form	Liquid
Concentration	0.2 mg/mL
Purification	Affinity chromatography
Storage buffer	PBS, pH 7.2, with 0.1% gelatin
Contains	0.09% sodium azide
Storage conditions	4° C, store in dark, DO NOT FREEZE!
RRID	AB_465849

Applications	Tested Dilution	Publications
Immunohistochemistry (IHC)	-	1 Publication
Immunocytochemistry (ICC/IF)	-	2 Publications
Flow Cytometry (Flow)	1 µg/test	38 Publications

Product Specific Information

Description: The 13A4 monoclonal antibody recognizes mouse Prominin-1 (sometimes also referred to as CD133 and, in the case of the human orthologue, as AC133), a 115-120 kDa pentaspan transmembrane (5-TM) domain glycoprotein. Prominin-1 is expressed on primitive cells such as hematopoietic stem and progenitor cells, neural and endothelial stem cells, retina and retinoblastoma, as well as developing epithelium. To date, the function and ligand of Prominin-1 are unknown. The 13A4 antibody does not cross react with rat, human, chicken, or Drosophila antigen but has been reported to work in canine/dog.

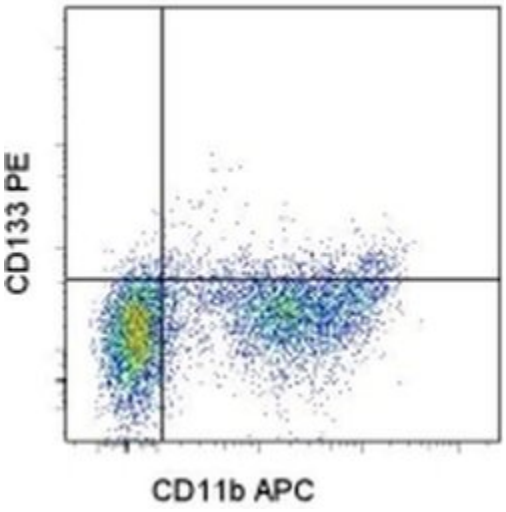
Applications Reported: The 13A4 antibody has been reported for use in flow cytometric analysis.

Applications Tested: This 13A4 antibody has been tested by flow cytometric analysis of mouse bone marrow cells. This can be used at less than or equal to 1 µg per test. A test is defined as the amount (µg) of antibody that will stain a cell sample in a final volume of 100 µL. Cell number should be determined empirically but can range from 10^5 to 10^8 cells/test. It is recommended that the antibody be carefully titrated for optimal performance in the assay of interest.

Excitation: 488-561 nm; Emission: 578 nm; Laser: Blue Laser, Green Laser, Yellow-Green Laser.

Filtration: 0.2 µm post-manufacturing filtered.

Product Images For CD133 (Prominin-1) Monoclonal Antibody (13A4), PE, eBioscience™



CD133 (Prominin-1) Antibody (12-1331-82) in Flow
Staining of C57Bl/6 bone marrow cells with Anti-Mouse CD11b APC (Product # 17-0112-82) and 1 µg of Anti-Mouse CD133 (Prominin-1) PE. Total viable cells were used for analysis.

View more figures on thermofisher.com

41 References

Immunohistochemistry (1)

Cancer research

PTEN Signaling in the Postnatal Perivascular Progenitor Niche Drives Medulloblastoma Formation.

"12-1331 was used in Immunohistochemistry to investigate the impact of conditionally inactivating PTEN in neonatal neural stem and progenitor cells."

Authors: Zhu G,Rankin SL,Larson JD,Zhu X,Chow LM,Qu C,Zhang J,Ellison DW,Baker SJ

Species
Mouse

Dilution
1:100

Year
2017

Immunocytochemistry (2)

Cell reports

Spatiotemporally Dependent Vascularization Is Differently Utilized among Neural Progenitor Subtypes during Neocortical Development.

Authors: Komabayashi-Suzuki M,Yamanishi E,Watanabe C,Okamura M,Tabata H,Iwai R,Ajioka I,Matsushita J,Kidoya H, Takakura N,Okamoto T,Kinoshita K,Ichihashi M,Nagata KI,Ema M,Mizutani KI

Species
Mouse

Dilution
Not Cited

Year
2019

Cancer research

CD133 is not present on neurogenic astrocytes in the adult subventricular zone, but on embryonic neural stem cells, ependymal cells, and glioblastoma cells.

Authors: Pfenninger CV,Roschupkina T,Hertwig F,Kottwitz D,Englund E,Bengzon J,Jacobsen SE,Nuber UA

Species
Not Applicable

Dilution
Not Cited

Year
2007

Flow Cytometry (38)

F1000Research

A double blinded, placebo-controlled pilot study to examine reduction of CD34 $^{+}$/CD117 $^{+}$/CD133 $^{+}$ lymphoma progenitor cells and duration of remission induced by neoadjuvant valspodar in dogs with large B-cell lymphoma.

"12-1331 was used in Flow cytometry/Cell sorting to examine whether ABCB1 would reduce lymphoma progenitor cells, and extend the length of remission in dogs with therapy naive large B-cell lymphoma."

Authors: Ito D,Childress M,Mason N,Winter A,O'Brien T,Henson M,Borgatti A,Lewellen M,Krick E,Stewart J,Lahrman S, Rajwa B,Scott MC,Seelig D,Koopmeiners J,Ruetz S,Modiano J

Species
Dog

Dilution
Not Cited

Year
2021

View more Flow references on thermofisher.com

More applications with references on thermofisher.com