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Mouse Anti-CD133/Prominin-1 (PROM1) [MD299]: MC0604, MC0604RTU7

Intended Use: For Research Use Only

Description: CD133, also known as prominin or AC133, is a marker frequently found on multipotent progenitor cells, including immature hematopoietic stem and progenitor cells. The protein has been extensively used as a stem cell marker for normal and cancerous tissues. May play a role in cell differentiation, proliferation and apoptosis. Binds cholesterol in cholesterol-containing plasma membrane microdomains and may play a role in the organization of the apical plasma membrane in epithelial cells. During early retinal development acts as a key regulator of disk morphogenesis. Involved in regulation of MAPK and Akt signaling pathways. In neuroblastoma cells suppresses cell differentiation such as neurite outgrowth in a RET-dependent manner.

Specifications:

Clone: MD299
Source: Mouse
Isotype: IgG1
Reactivity: Human

Immunogen: Recombinant chimeric CD133 protein aa180-380 and aa612-765

Localization: Secreted

Formulation: Purified antibody in PBS pH7.4, containing BSA and ≤ 0.09% sodium azide (NaN3)

Storage: Store at 2°-8°C

Applications: IHC, Flow Cyt., IF, WB

Package:

Description	Catalog No.	Size	
CD133/Prominin-1 (PROM1) Concentrated	MC0604	1 ml	
CD133/Prominin-1 (PROM1) Prediluted	MC0604RTU7	7 ml	

IHC Procedure*:

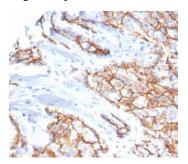
Positive Control Tissue: Colonic adenocarcinoma, kidney, muscle

Concentrated Dilution: 50-200

Pretreatment: Tris EDTA pH9.0, 15 minutes Pressure Cooker or 30-60 minutes water bath at 95°-99°C

Incubation Time and Temp: 30-60 minutes @ RT

Detection: Refer to the detection system manual * Result should be confirmed by an established diagnostic procedure.



FFPE human papillary renal cell carcinoma stained with anti-CD133 using DAB

References:

- 1. Functional links between gelatinase B/matrix metalloproteinase-9 and prominin-1/CD133 in diabetic retinal vasculopathy and neuropathy. Mohammad G, et al. Prog Retin Eye Res 43:76-91, 2014.
- 2. PDGFR-ß (+) perivascular cells from infantile hemangioma display the features of mesenchymal stem cells and show stronger adipogenic potential in vitro and in vivo. Yuan SM, et al. Int J Clin Exp Pathol 7:2861-70, 2014.
- 3. Implication of tumor stem-like cells in the tumorigenesis of sporadic paraganglioma. Yang Y. Med Oncol 30:659, 2013.
- 4. The prognostic significance of aldehyde dehydrogenase 1A1 (ALDH1A1) and CD133 expression in early stage non-small cell lung cancer. Alamgeer M, et al. Thorax N/A:N/A, 2013.

Doc. 100-MC0604