

**Mouse Anti-PIT1/POU1F1 [MD215]: MC0457, MC0457-0.5ML, MC0457RTU7**

**Intended Use:** For Research Use Only

**Description:** Belongs to the POU transcription factor family, Class-1 subfamily. Transcription factor involved in the specification of the lactotrope, somatotrope, and thyrotrope phenotypes in the developing anterior pituitary. Activates growth hormone and prolactin genes. Specifically binds to the consensus sequence 5'-TAAAT-3'. Defects in POU1F1 are the cause of pituitary hormone deficiency combined type 1 (CPHD1). CPHD is characterized by impaired production of growth hormone (GH) and one or more of the other five anterior pituitary hormones.

**Specifications:**

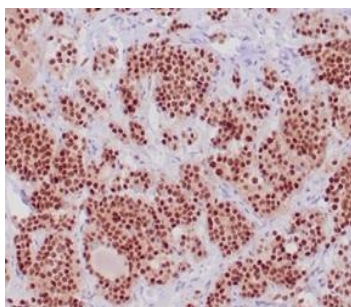
Clone: MD215  
 Source: Mouse  
 Isotype: IgG2b/k  
 Reactivity: Human  
 Immunogen: Recombinant human full-length PIT1 protein  
 Localization: Nucleus  
 Formulation: Purified antibody in PBS pH7.4, containing BSA, and ≤ 0.09% sodium azide (NaN3)  
 Storage: Store at 2°- 8°C  
 Applications: IHC  
 Package:

Description	Catalog No.	Size
PIT1/POU1F1 [MD215] Concentrated	MC0457	1 ml
PIT1/POU1F1 [MD215] Concentrated	MC0457-0.5ML	0.5 ml
PIT1/POU1F1 [MD215] Prediluted	MC0457RTU7	7 ml

**IHC Procedure\*:**

Positive Control Tissue: Liver, pituitary gland  
 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 pituitary gland stained with anti-PIT1 using DAB

**References:**

1. MicroRNAs Regulate Pituitary Development, and MicroRNA 26b Specifically Targets Lymphoid Enhancer Factor 1 (Lef-1), Which Modulates Pituitary Transcription Factor 1 (Pit-1) Expression. Zhang Z, et al. J Biol Chem 285:34718-28, 2010.
2. Inactivating Pit-1 mutations alter subnuclear dynamics suggesting a protein misfolding and nuclear stress response. Sharp ZD, et al. J Cell Biochem 92:664-78, 2004.
3. Mancini MG, et al. Subnuclear partitioning and functional regulation of the Pit-1 transcription factor. J Cell Biochem 72:322-38, 1999.