

### KLF1 Antibody (C-Term)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP22456b

## **Specification**

## KLF1 Antibody (C-Term) - Product Information

Application WB,E
Primary Accession Q13351
Reactivity Human
Host Rabbit
Clonality polyclonal
Isotype Rabbit Ig
Calculated MW 38221

## KLF1 Antibody (C-Term) - Additional Information

### **Gene ID** 10661

#### **Other Names**

Krueppel-like factor 1, Erythroid krueppel-like transcription factor, EKLF, KLF1, EKLF

### Target/Specificity

This KLF1 antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between amino acids from the human region of human KLF1.

### **Dilution**

WB~~1:1000

#### **Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

### **Storage**

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

## **Precautions**

KLF1 Antibody (C-Term) is for research use only and not for use in diagnostic or therapeutic procedures.

## KLF1 Antibody (C-Term) - Protein Information

### Name KLF1

### Synonyms EKLF

**Function** Transcription regulator of erythrocyte development that probably serves as a general switch factor during erythropoiesis. Is a dual regulator of fetal-to-adult globin switching. Binds to



the CACCC box in the beta-globin gene promoter and acts as a preferential activator of this gene. Furthermore, it binds to the BCL11A promoter and activates expression of BCL11A, which in turn represses the HBG1 and HBG2 genes. This dual activity ensures that, in most adults, fetal hemoglobin levels are low. Able to activate CD44 and AQP1 promoters (PubMed:21055716). When sumoylated, acts as a transcriptional repressor by promoting interaction with CDH2/MI2beta and also represses megakaryocytic differentiation.

### **Cellular Location**

Nucleus. Note=Colocalizes with SUMO1 in nuclear speckles.

### **Tissue Location**

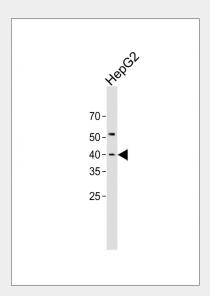
Expression restricted to adult bone marrow and fetal liver. Not expressed in myeloid nor lymphoid cell lines

## KLF1 Antibody (C-Term) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

## KLF1 Antibody (C-Term) - Images



All lanes: Anti-KLF1 Antibody (C-Term) at 1:1000 dilution + HepG2 whole cell lysate Lysates/proteins at 20  $\mu$ g per lane. Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size: 38 KDa Blocking/Dilution buffer: 5% NFDM/TBST.

## KLF1 Antibody (C-Term) - Background

Transcription regulator of erythrocyte development that probably serves as a general switch factor





during erythropoiesis. Is a dual regulator of fetal-to-adult globin switching. Binds to the CACCC box in the beta-globin gene promoter and acts as a preferential activator of this gene. Furthermore, it binds to the BCL11A promoter and activates expression of BCL11A, which in turn represses the HBG1 and HBG2 genes. This dual activity ensures that, in most adults, fetal hemoglobin levels are low. Able to activate CD44 and AQP1 promoters. When sumoylated, acts as a transcriptional repressor by promoting interaction with CDH2/MI2beta and also represses megakaryocytic differentiation.

# KLF1 Antibody (C-Term) - References

Bieker J.J., et al. DNA Cell Biol. 15:347-352(1996). van Ree J.H., et al. Genomics 39:393-395(1997). Grimwood J., et al. Nature 428:529-535(2004). Zhang W., et al. Proc. Natl. Acad. Sci. U.S.A. 95:9855-9860(1998). Arnaud L., et al. Am. J. Hum. Genet. 87:721-727(2010).