

# **GLI1** Antibody

Purified Mouse Monoclonal Antibody Catalog # AO2089a

# **Product Information**

**Application** WB, IHC, FC, ICC, E

Primary Accession
Reactivity
Human
Host
Clonality
Monoclonal
Clone Names
Isotype
IgG1
Calculated MW
P08151
Human
House
Human
House
IgG1
117904

**Description** This gene encodes a member of the Kruppel family of zinc finger proteins. The

encoded transcription factor is activated by the sonic hedgehog signal transduction cascade and regulates stem cell proliferation. The activity and nuclear localization of this protein is negatively regulated by p53 in an inhibitory loop. Multiple transcript variants encoding different isoforms have

been found for this gene.

**Immunogen** Purified recombinant fragment of human GLI1 (AA: 284-449) expressed in E.

Coli.

**Formulation** Purified antibody in PBS with 0.05% sodium azide

## **Additional Information**

**Gene ID** 2735

Other Names Zinc finger protein GLI1, Glioma-associated oncogene, Oncogene GLI, GLI1,

GLI

**Dilution** WB~~1/500 - 1/2000 IHC~~1/200 - 1/1000 FC~~1/200 - 1/400 ICC~~N/A

E~~1/10000

**Storage** Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store

at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions** GLI1 Antibody is for research use only and not for use in diagnostic or

therapeutic procedures.

## **Protein Information**

Name GLI1

### **Synonyms**

#### GLI

#### **Function**

Acts as a transcriptional activator (PubMed: 10806483, PubMed:19706761, PubMed:19878745, PubMed:24076122, PubMed:24217340, PubMed:24311597). Binds to the DNA consensus sequence 5'-GACCACCCA-3' (PubMed:2105456, PubMed:24217340, PubMed:8378770). Regulates the transcription of specific genes during normal development (PubMed:19706761). Plays a role in craniofacial development and digital development, as well as development of the central nervous system and gastrointestinal tract. Mediates SHH signaling (PubMed:19706761, PubMed:28973407). Plays a role in cell proliferation and differentiation via its role in SHH signaling (PubMed:11238441, PubMed:28973407).

#### **Cellular Location**

Cytoplasm. Nucleus. Note=Tethered in the cytoplasm by binding to SUFU (PubMed:10806483). Activation and translocation to the nucleus is promoted by interaction with STK36 (PubMed:10806483). Phosphorylation by ULK3 may promote nuclear localization (PubMed:19878745). Translocation to the nucleus is promoted by interaction with ZIC1 (PubMed:11238441)

#### **Tissue Location**

Detected in testis (at protein level) (PubMed:2105456). Testis, myometrium and fallopian tube. Also expressed in the brain with highest expression in the cerebellum, optic nerve and olfactory tract (PubMed:19878745). Isoform 1 is detected in brain, spleen, pancreas, liver, kidney and placenta; isoform 2 is not detectable in these tissues (PubMed:19706761)

## References

1.Mol Cancer. 2014 Jun 3;13:137.2.J Hematol Oncol. 2014 Mar 30;7:28.

# **Images**

