

ID2 antibody - middle region Rabbit Polyclonal Antibody Catalog # Al16264

Specification

ID2 antibody - middle region - Product Information

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Calculated MW WB <u>Q02363</u> <u>NM_002166</u>, <u>NP_002157</u> Human, Mouse, Rat, Pig, Bovine Human, Mouse, Rat, Pig, Chicken, Bovine Rabbit Polyclonal 15kDa KDa

ID2 antibody - middle region - Additional Information

Gene ID 3398

Alias Symbol

GIG8, ID2A, ID2H, MGC26389, bHLHb26

Other Names

DNA-binding protein inhibitor ID-2, Class B basic helix-loop-helix protein 26, bHLHb26, Inhibitor of DNA binding 2, Inhibitor of differentiation 2, ID2, BHLHB26

Format

Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

Reconstitution & Storage

Add 50 ul of distilled water. Final anti-ID2 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.

Precautions

ID2 antibody - middle region is for research use only and not for use in diagnostic or therapeutic procedures.

ID2 antibody - middle region - Protein Information

Name ID2

Synonyms BHLHB26

Function

Transcriptional regulator (lacking a basic DNA binding domain) which negatively regulates the basic helix-loop-helix (bHLH) transcription factors by forming heterodimers and inhibiting their DNA binding and transcriptional activity. Implicated in regulating a variety of cellular processes, including cellular growth, senescence, differentiation, apoptosis, angiogenesis, and neoplastic transformation. Inhibits skeletal muscle and cardiac myocyte differentiation. Regulates the circadian clock by repressing the transcriptional activator activity of the CLOCK-BMAL1



heterodimer. Restricts the CLOCK and BMAL1 localization to the cytoplasm. Plays a role in both the input and output pathways of the circadian clock: in the input component, is involved in modulating the magnitude of photic entrainment and in the output component, contributes to the regulation of a variety of liver clock-controlled genes involved in lipid metabolism.

Cellular Location

Cytoplasm {ECO:0000250|UniProtKB:P41136}. Nucleus {ECO:0000250|UniProtKB:P41136}

Tissue Location

Highly expressed in early fetal tissues, including those of the central nervous system

ID2 antibody - middle region - Protocols

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

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

ID2 antibody - middle region - Images

	60 kDa
	40 kDa
	31 kDa
	22 kDa
	10 kDa_
WB Suggested Anti-ID2 Antil	body Titration: 0.2-1 μg/ml
ELISA Titer: 1:1562500	
Positive Control: Human Thy	mus

ID2 antibody - middle region - Background

Transcriptional regulator (lacking a basic DNA binding domain) which negatively regulates the basic helix-loop-helix (bHLH) transcription factors by forming heterodimers and inhibiting their DNA binding and transcriptional activity. Implicated in regulating a variety of cellular processes, including cellular growth, senescence, differentiation, apoptosis, angiogenesis, and neoplastic transformation. Inhibits skeletal muscle and cardiac myocyte differentiation. Regulates the circadian clock by repressing the transcriptional activator activity of the CLOCK-ARNTL/BMAL1 heterodimer. Restricts the CLOCK and ARNTL/BMAL1 localization to the cytoplasm. Plays a role in both the input and output pathways of the circadian clock: in the input component, is involved in modulating the magnitude of photic entrainment and in the output component, contributes to the regulation of a variety of liver clock-controlled genes involved in lipid metabolism.



ID2 antibody - middle region - References

Hara E., et al.J. Biol. Chem. 269:2139-2145(1994). Biggs J., et al. Proc. Natl. Acad. Sci. U.S.A. 89:1512-1516(1992). Kim J.Y., et al.Mol. Endocrinol. 18:776-790(2004). Ward S.M., et al.J. Biol. Chem. 285:38987-39000(2010).