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ADH5 Antibody - N-terminal region

Rabbit Polyclonal Antibody
Catalog # AI16054

Product Information

Application	WB
Primary Accession	P11766
Other Accession	NP_000662
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Calculated MW	39724

Additional Information

Gene ID	128
Alias Symbol	ADH5, ADHX, FDH,
Other Names	Alcohol dehydrogenase class-3, 1.1.1.1, Alcohol dehydrogenase 5, Alcohol dehydrogenase class chi chain, Alcohol dehydrogenase class-III, Glutathione-dependent formaldehyde dehydrogenase, FALDH, FDH, GSH-FDH, 1.1.1.-, S-(hydroxymethyl)glutathione dehydrogenase, 1.1.1.284, ADH5 (HGNC:253), ADHX, FDH
Format	Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.
Reconstitution & Storage	Add 50 &mu, l of distilled water. Final Anti-ADH5 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	ADH5 Antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	ADH5 (HGNC:253)
Synonyms	ADHX, FDH
Function	Catalyzes the oxidation of long-chain primary alcohols and the oxidation of S-(hydroxymethyl) glutathione (PubMed:8460164). Also oxidizes long chain omega-hydroxy fatty acids, such as 20-HETE, producing both the intermediate aldehyde, 20-oxoarachidonate and the end product, a dicarboxylic acid, (5Z,8Z,11Z,14Z)-eicosatetraenedioate (PubMed:16081420). Class-III ADH is remarkably ineffective in oxidizing ethanol (PubMed:8460164). Required for

clearance of cellular formaldehyde, a cytotoxic and carcinogenic metabolite that induces DNA damage (PubMed:33355142). Also acts as a S-nitroso-glutathione reductase by catalyzing the NADH-dependent reduction of S- nitrosoglutathione, thereby regulating protein S-nitrosylation (By similarity).

Cellular Location Cytoplasm.

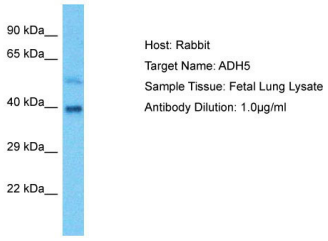
Background

Class-III ADH is remarkably ineffective in oxidizing ethanol, but it readily catalyzes the oxidation of long-chain primary alcohols and the oxidation of S-(hydroxymethyl) glutathione.

References

Sharma C.P.,et al.Biochem. Biophys. Res. Commun. 164:631-637(1989).
Giri P.R.,et al.Biochem. Biophys. Res. Commun. 164:453-460(1989).
Hur M.W.,et al.Gene 121:305-311(1992).
Halleck A.,et al.Submitted (JUN-2004) to the EMBL/GenBank/DDBJ databases.
Kalnine N.,et al.Submitted (OCT-2004) to the EMBL/GenBank/DDBJ databases.

Images



Host: Rabbit
Target Name: ADH5
Sample Tissue: Fetal Lung lysates
Antibody Dilution: 1.0µg/ml