



Mouse Anti-Human IDH1 R132H monoclonal antibody, clone JID243 (CABT-L2915)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Product Overview	This antibody is intended for qualified laboratories to qualitatively identify by light microscopy the presence of associated antigens in sections of formalin-fixed, paraffin-embedded tissue sections using IHC test methods.
Specificity	Human IDH1 R132H
Isotype	IgG
Source/Host	Mouse
Species Reactivity	Human
Clone	JID243
Conjugate	Unconjugated
Applications	IHC
Reconstitution	<p>The prediluted antibody does not require any mixing, dilution, reconstitution, or titration; the antibody is ready-to-use and optimized for staining.</p> <p>The concentrated antibody requires dilution in the optimized buffer, to the recommended working dilution range.</p>
Positive Control	Astrocytoma
Format	Liquid
Size	Predilute: 7 ml, Concentrate: 100 µl, Concentrate: 1 ml
Buffer	<p>Predilute: Antibody Diluent Buffer</p> <p>Concentrate: Tris Buffer, pH 7.3 - 7.7, with 1% BSA</p>

Preservative	< 0.1% Sodium Azide
Storage	Store at 2-8°C. Do not freeze.
Ship	Wet ice

BACKGROUND

Introduction	Isocitrate Dehydrogenase 1 (IDH1) is a soluble, cytosolic enzyme involved in the TCA metabolic cycle. The most notable mutation in this enzyme, R132H, is clinically indicated in the majority of astrocytomas and oligodendroglial tumours, with the mutation being associated with more favourable prognosis and increased survival in those patients. IDH1 R132H is also useful in the differential diagnosis between anaplastic glioma and glioblastoma.
Keywords	IDH1;isocitrate dehydrogenase 1 (NADP+), soluble;IDH;IDP;IDCD;IDPC;PICD;HEL-216;HEL-S-26;isocitrate dehydrogenase [NADP] cytoplasmic

GENE INFORMATION

Gene Name	IDH1 isocitrate dehydrogenase 1 (NADP+), soluble [Homo sapiens (human)]
Official Symbol	IDH1
Synonyms	IDH1; isocitrate dehydrogenase 1 (NADP+), soluble; IDH; IDP; IDCD; IDPC; PICD; HEL-216; HEL-S-26; isocitrate dehydrogenase [NADP] cytoplasmic; NADP(+)-specific ICDH; oxalosuccinate decarboxylase; epididymis luminal protein 216; epididymis secretory protein Li 26; NADP-dependent isocitrate dehydrogenase, cytosolic; NADP-dependent isocitrate dehydrogenase, peroxisomal;
Entrez Gene ID	3417
Protein Refseq	NP_001269315
UniProt ID	O75874
Chromosome Location	2q33.3
Pathway	2-Oxocarboxylic acid metabolism; Abnormal conversion of 2-oxoglutarate to 2-hydroxyglutarate; Biosynthesis of amino acids; Carbon metabolism; Central carbon metabolism in cancer; Citrate cycle (TCA cycle); Citrate cycle (TCA cycle, Krebs cycle); Citrate cycle, first carbon oxidation, oxaloacetate => 2-oxoglutarate;
Function	NAD binding; NADP binding; isocitrate dehydrogenase (NADP+) activity; magnesium ion binding; protein homodimerization activity; receptor binding;