

PDHA1 (phospho S293) polyclonal antibody (DyLight 650)

Catalog # PAB15339 Size 50 uL

Specification	
Product Description	Rabbit polyclonal antibody raised against synthetic phosphopeptide of PDHA1.
Immunogen	Synthetic phosphopeptide corresponding to residues surrounding S293 human PDHA1.
Host	Rabbit
Reactivity	Human
Specificity	This is specific for the phosphorylated Serine 293 form of the PDHE1 alpha protein. It is recommend ed that BSA rather than non-fat milk be used in membrane blocking and antibody dilution. This antibo dy is useful for Immunocytochemistry/immunofluorescence and Western blot, where a band is seen ~ 43 kDa. The observed molecular weight of the protein may vary from the listed predicted molecular weight due to post translational modifications, post translation cleavages, relative charges, and other experimental factors.
Form	Liquid
Conjugation	DyLight 650
Purification	Immunogen affinity purification
Recommend Usage	Immunocytochemistry/Immunofluorescence Western Blot The optimal working dilution should be determined by the end user.
Storage Buffer	In 50 mM sodium borate (0.05% sodium azide).
Storage Instruction	Store at 4°C in the dark.
Note	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which shoul d be handled by trained staff only.

Applications

Western Blot



- Immunocytochemistry
- Immunofluorescence

Gene Info — PDHA1	
Entrez GenelD	<u>5160</u>
Protein Accession#	P08559
Gene Name	PDHA1
Gene Alias	PDHA, PDHCE1A, PHE1A
Gene Description	pyruvate dehydrogenase (lipoamide) alpha 1
Omim ID	300502 308930 312170
Gene Ontology	<u>Hyperlink</u>
Gene Summary	The pyruvate dehydrogenase complex is a nuclear-encoded mitochondrial matrix multienzyme complex that provides the primary link between glycolysis and the tricarboxylic acid (TCA) cycle by catalyzing the irreversible conversion of pyruvate into acetyl-CoA. The PDH complex is composed of multiple copies of 3 enzymes: E1 (PDHA1); dihydrolipoyl transacetylase (DLAT; MIM 608770) (E2; EC 2.3.1.12); and dihydrolipoyl dehydrogenase (DLD; MIM 238331) (E3; EC 1.8.1.4). The E1 enzyme is a heterotetramer of 2 alpha and 2 beta subunits. The E1-alpha subunit contains the E1 active site and plays a key role in the function of the PDH complex (Brown et al., 1994 [PubMed 7 853374]).[supplied by OMIM
Other Designations	OTTHUMP00000023015 pyruvate dehydrogenase E1 alpha subunit

Pathway

- Biosynthesis of alkaloids derived from histidine and purine
- Biosynthesis of alkaloids derived from ornithine
- Biosynthesis of alkaloids derived from shikimate pathway
- Biosynthesis of alkaloids derived from terpenoid and polyketide
- Biosynthesis of phenylpropanoids
- Biosynthesis of plant hormones
- Biosynthesis of terpenoids and steroids



- Butanoate metabolism
- Citrate cycle (TCA cycle)
- Glycolysis / Gluconeogenesis
- Metabolic pathways
- Pyruvate metabolism
- Valine