

## Recombinant Human IDH1 Protein (His Tag)

**Catalog No.** PKSH032659

**Note:** Centrifuge before opening to ensure complete recovery of vial contents.

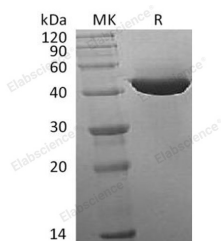
### Description

<b>Synonyms</b>	Isocitrate Dehydrogenase [NADP] Cytoplasmic;IDH;Cytosolic NADP-Isocitrate Dehydrogenase;IDP;NADP(+)-Specific ICDH;Oxalosuccinate Decarboxylase;IDH1;PICD
<b>Species</b>	Human
<b>Expression Host</b>	E.coli
<b>Sequence</b>	Met 1-Leu414
<b>Accession</b>	O75874
<b>Calculated Molecular Weight</b>	48.1 kDa
<b>Observed molecular weight</b>	39-54 kDa
<b>Tag</b>	C-His
<b>Bioactivity</b>	Not validated for activity

### Properties

<b>Purity</b>	> 95 % as determined by reducing SDS-PAGE.
<b>Endotoxin</b>	< 1.0 EU per µg of the protein as determined by the LAL method.
<b>Storage</b>	Store at < -20°C, stable for 6 months. Please minimize freeze-thaw cycles.
<b>Shipping</b>	This product is provided as liquid. It is shipped at frozen temperature with blue ice/gel packs. Upon receipt, store it immediately at < -20°C.
<b>Formulation</b>	Supplied as a 0.2 µm filtered solution of 50mM Tris, 200mM NaCl, 10% glycerol, pH8.0.
<b>Reconstitution</b>	Not Applicable

### Data



> 95 % as determined by reducing SDS-PAGE.

### Background

Isocitrate Dehydrogenase [NADP] Cytoplasmic (IDH1) belongs to the isocitrate and isopropylmalate dehydrogenases family. IDH1 exists as a homodimer; binding one magnesium or manganese ion per subunit. Mutations of IDH1 have been shown to cause metaphyseal chondromatosis with aciduria and are involved in the development of glioma IDH plays a role

### For Research Use Only

in the regeneration of NADPH for intraperoxisomal reductions; such as the conversion of 2; 4-dienoyl-CoAs to 3-enoyl-CoAs; as well as in peroxisomal reactions that consume 2-oxoglutarate; namely the  $\alpha$ -hydroxylation of phytanic acid.