

Product datasheet for **KN201831LP**

PDHA1 Human Gene Knockout Kit (CRISPR)

Product data:

Product Type:	Knockout Kits (CRISPR)
Format:	2 gRNA vectors, 1 Luciferase-Puro donor, 1 scramble control
Donor DNA:	Luciferase-Puro
Symbol:	PDHA1
Locus ID:	5160
Components:	<p>KN201831G1, PDHA1 gRNA vector 1 in pCas-Guide CRISPR vector (GE100002)</p> <p>KN201831G2, PDHA1 gRNA vector 2 in pCas-Guide CRISPR vector (GE100002)</p> <p>KN201831LPD, donor DNA containing left and right homologous arms and Luciferase-Puro functional cassette.</p> <p>GE100003, scramble sequence in pCas-Guide vector</p>
RefSeq:	NM_000284 , NM_001173454 , NM_001173455 , NM_001173456
UniProt ID:	P08559
Synonyms:	PDHA; PDHAD; PDHCE1A; PHE1A
Summary:	<p>The pyruvate dehydrogenase (PDH) complex is a nuclear-encoded mitochondrial multienzyme complex that catalyzes the overall conversion of pyruvate to acetyl-CoA and CO₂, and provides the primary link between glycolysis and the tricarboxylic acid (TCA) cycle. The PDH complex is composed of multiple copies of three enzymatic components: pyruvate dehydrogenase (E1), dihydrolipoamide acetyltransferase (E2) and lipoamide dehydrogenase (E3). The E1 enzyme is a heterotetramer of two alpha and two beta subunits. This gene encodes the E1 alpha 1 subunit containing the E1 active site, and plays a key role in the function of the PDH complex. Mutations in this gene are associated with pyruvate dehydrogenase E1-alpha deficiency and X-linked Leigh syndrome. Alternatively spliced transcript variants encoding different isoforms have been found for this gene.[provided by RefSeq, Mar 2010]</p>



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Product images:

