

Product datasheet for **KN218043LP**

TRPM7 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:	TRPM7
Locus ID:	54822
Components:	KN218043G1 , TRPM7 gRNA vector 1 in pCas-Guide CRISPR vector (GE100002) KN218043G2 , TRPM7 gRNA vector 2 in pCas-Guide CRISPR vector (GE100002) KN218043LPD , donor DNA containing left and right homologous arms and Luciferase-Puro functional cassette.

Homologous arm and Luciferase-Puro sequences:

pUC vector backbone in gray; **Left arm sequence in blue**; **Luciferase-Puro in green**; **Right arm in violet**

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GE100003, scramble sequence in pCas-Guide vector

Disclaimer:

These products are manufactured and supplied by OriGene under license from ERS. The kit is designed based on the best knowledge of CRISPR technology. The system has been functionally validated for knocking-in the cassette downstream the native promoter. The efficiency of the knock-out varies due to the nature of the biology and the complexity of the experimental process.

RefSeq:

[NM_001301212](#), [NM_017672](#), [NR_149152](#), [NR_149153](#), [NR_149154](#)

UniProt ID:

[Q96QT4](#)

Synonyms:

ALSPDC; CHAK; CHAK1; LTRpC-7; LTRPC7; TRP-PLIK

Summary:

This gene belongs to the melastatin subfamily of transient receptor potential family of ion channels. The protein encoded by this gene is both an ion channel and a serine/threonine protein kinase. The kinase activity is essential for the ion channel function, which serves to increase intracellular calcium levels and to help regulate magnesium ion homeostasis. The encoded protein is involved in cytoskeletal organization, cell adhesion, cell migration and organogenesis. Defects in this gene are a cause of amyotrophic lateral sclerosis-parkinsonism/dementia complex of Guam. The gene may also be associated with defects of cardiac function. [provided by RefSeq, Aug 2017]

Product images:
