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Product datasheet for KN206340

SPG7 Human Gene Knockout Kit (CRISPR)

Product data:

Product Type: Knockout Kits (CRISPR)

Format: 2 gRNA vectors, 1 GFP-puro donor, 1 scramble control

Donor DNA: GFP-puro

Symbol: SPG7

Locus ID: 6687

Components: **KN206340G1**, SPG7 gRNA vector 1 in pCas-Guide CRISPR vector (GE100002), Target Sequence: CCGGGTCCTCGGCCGCTGTG
KN206340G2, SPG7 gRNA vector 2 in pCas-Guide CRISPR vector (GE100002), Target Sequence: CGGGCCTGGACCCCGGCGGA
KN206340D, donor DNA containing left and right homologous arms and GFP-puro functional cassette.
Homologous arm and GFP-puro sequences:
pUC vector backbone in gray; Left arm sequence in blue; GFP-puro in green; Right arm in violet

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GATCATGTAA CTCGCCTT

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.

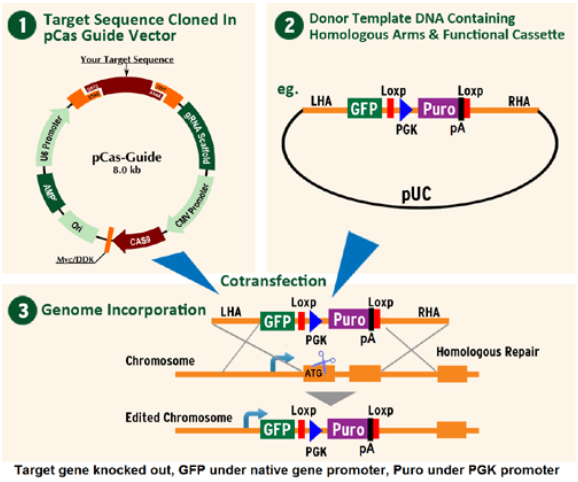
RefSeq: NM_003119, NM_199367, NM_001363850

UniProt ID: Q9UQ90

Synonyms: CAR; CMAR; PGN; SPG5C

Summary: This gene encodes a mitochondrial metalloprotease protein that is a member of the AAA family. Members of this protein family share an ATPase domain and have roles in diverse cellular processes including membrane trafficking, intracellular motility, organelle biogenesis, protein folding, and proteolysis. Mutations in this gene cause autosomal recessive spastic paraplegia 7. Two transcript variants encoding distinct isoforms have been identified. [provided by RefSeq, Mar 2014]

Product images:



Target gene knocked out, GFP under native gene promoter, Puro under PGK promoter