

Product datasheet for **KN304521BN**

Dgat2 Mouse Gene Knockout Kit (CRISPR)

Product data:

Product Type: Knockout Kits (CRISPR)
Format: 2 gRNA vectors, 1 mBFP-Neo donor, 1 scramble control
Donor DNA: mBFP-Neo
Symbol: Dgat2
Locus ID: 67800
Components: **KN304521G1**, Dgat2 gRNA vector 1 in pCas-Guide CRISPR vector (GE100002)
KN304521G2, Dgat2 gRNA vector 2 in pCas-Guide CRISPR vector (GE100002)
KN304521BND, donor DNA containing left and right homologous arms and mBFP-Neo functional cassette.

Homologous arm and mBFP-Neo sequences:

pUC vector backbone in gray; **Left arm sequence in blue**; **mBFP-Neo in green**; **Right arm in violet**

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 GGTATGGCTT CATTAGCTC CGGTTCCCAA CGATC

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_026384](#)

UniProt ID:

[Q9DCV3](#)

Synonyms:

0610010B06Rik; ARAT; DGAT-2

Summary:

Essential acyltransferase that catalyzes the terminal and only committed step in triacylglycerol synthesis by using diacylglycerol and fatty acyl CoA as substrates. Required for synthesis and storage of intracellular triglycerides. Probably plays a central role in cytosolic lipid accumulation. In liver, is primarily responsible for incorporating endogenously synthesized fatty acids into triglycerides. Functions also as an acyl-CoA retinol acyltransferase (ARAT) (By similarity).[UniProtKB/Swiss-Prot Function]

Product images:

