

## Product datasheet for KN318506LP

# OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

### Txn1 Mouse 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: Txn1 Locus ID: 22166

**Components:** KN318506G1, Txn1 gRNA vector 1 in pCas-Guide CRISPR vector (GE100002)

KN318506G2, Txn1 gRNA vector 2 in pCas-Guide CRISPR vector (GE100002)

KN318506LPD, donor DNA containing left and right homologous arms and Luciferase-Puro

functional cassette.

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 011660

 UniProt ID:
 P10639

Synonyms: ADF; AW550880; Trx1; Txn

**Summary:** Participates in various redox reactions through the reversible oxidation of its active center

dithiol to a disulfide and catalyzes dithiol-disulfide exchange reactions (By similarity). Plays a role in the reversible S-nitrosylation of cysteine residues in target proteins, and thereby contributes to the response to intracellular nitric oxide. Nitrosylates the active site Cys of CASP3 in response to nitric oxide (NO), and thereby inhibits caspase-3 activity. Induces the

FOS/JUN AP-1 DNA binding activity in ionizing radiation (IR) cells through its

oxidation/reduction status and stimulates AP-1 transcriptional activity (By similarity).

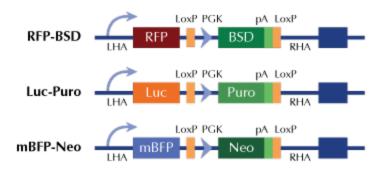
[UniProtKB/Swiss-Prot Function]





## **Product images:**

#### Donor Vector Edited Chromosome



RFP, Luc, and mBFP will be under native gene promoter