



CELLECTA

Lentiviral expression vectors are one of the most effective vehicles to introduce and stably express CRISPR sgRNA, shRNA, cDNA, or reporter genes in almost any mammalian cell, including non-dividing cells and whole model organisms. Lentiviral expression constructs packaged into pseudoviral particles can be transduced into cells with very high efficiency--approaching 100% in some cell types--even in those cells most difficult to transfect, such as primary, stem, and differentiated cells.

- Different antibiotic (puro, bleo, neo, blast) and fluorophore markers (GFP, RFP) are available.
- Constructs are provided as plasmid and/or packaged lentiviral particles at a range of titers.

Wide Range of Options for Custom sgRNA Constructs

The CRISPR/Cas9 system can be used for gene knockout (KO), knockdown, activation or to initiate knock-ins in vivo or in vitro by using a combination of an sgRNA (single-guide RNA) together with a Cas9 nuclease.

Some examples of custom constructs include

- Constitutive or tet-inducible sgRNA constructs designed for CRISPR KO, CRISPRa, or CRISPRi.
- All-in-one constructs with sgRNA and Cas9 or single-vector sgRNA-only formats
- Complete panels of Cas9 and dCas9-hybrid (e.g., dCas9-KRAB, dCas9-VPH, dCas9-VPR, etc.) expression constructs

Just provide the gene information and we will select the optimal guide designs.

Get the CRISPR KO, CRISPRi, or CRISPRa sgRNA constructs you want, simply and easily.

Construction of shRNA Custom Constructs

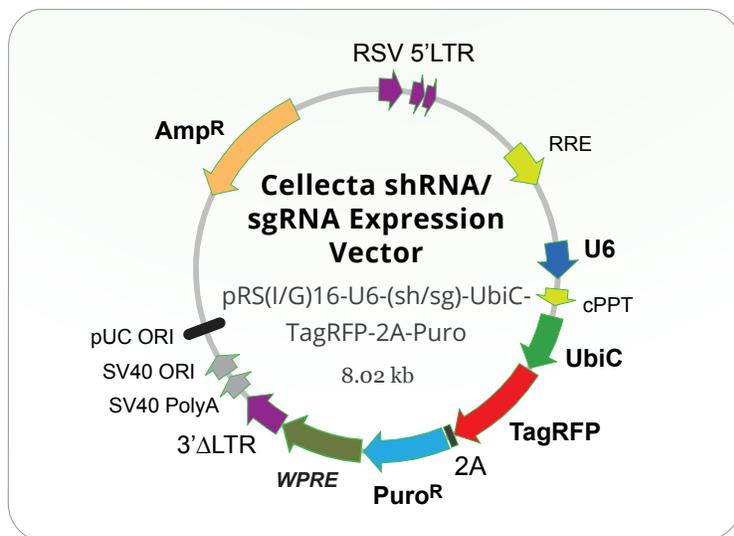
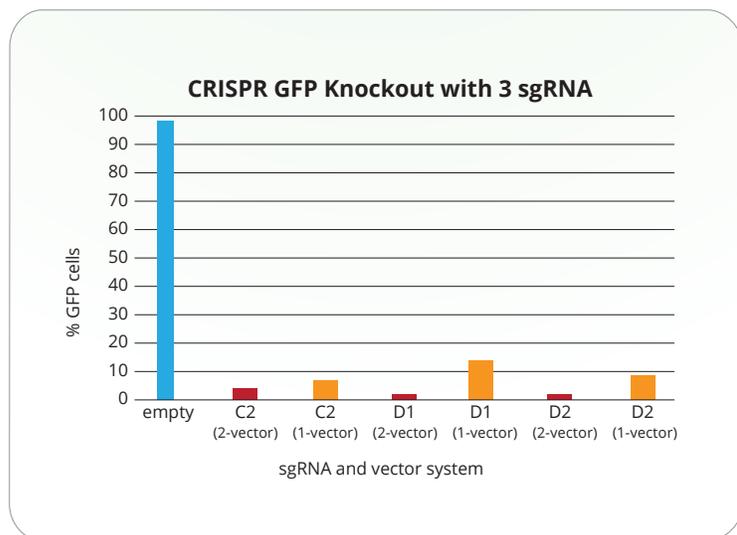
For custom shRNA constructs, we only need to know the RefSeq identification for the gene transcript and we will design any number of shRNA constructs that target it. Choose from a range of vectors with various selections and constitutive or inducible H1 or U6 shRNA promoters.

Stable Expression of Your Gene of Interest

Get a lentiviral construct expressing your gene of interest. Lentiviral vectors stably integrate at high efficiency and are passed onto daughter cells, so it is easy to make clonal expression lines. Even cell pools without clonal selection can typically be treated, grown for several passages, freeze/thawed, without disrupting the construct.

We Also Provide Cell Engineering Services

Want to knock out a gene, knock in a tag to an endogenous gene, get a cell line expressing Cas9, or expressing a different gene of interest? You can just have us make them for you. We offer a complete range of cell engineering services to make Cas9 expression cells, knockout/knockdown genes of interest, or make cells expressing a desired protein. Let us know what you want and we will go through the options with you.



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