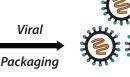


## **Stable Cell Line Generation in Primary Cells**

A comprehensive custom Lentiviral-based Stable Cell Line Generation Service for genetically engineering sensitive hard-to-transfect cells, primary cells, stem cells and terminally differentiated cells such as neurons.



Pack
Clone target
gene into



Recombinant Lentivirus



Infected Cells in Culture



Genotyping



# Key Features:

lentivirus vectors

- Broad tropism lentiviruses to target most mammalian cell types.
- Non-integrating lentiviruses for CRISPR-lenti gene knockout.
- Choice of selection markers: antibiotic resistance or GFP 3<sup>rd</sup> generation lentiviral systems for the highest biosafety standards.
- Gene editing confirmed by NGS or RT-PCR.

## **Gene Overexpression**

#### **Inducible Gene Expression**

**Gene Knockout** 

**Gene Knockdown** 

#### **Cell Line Modifications**

Knock-In Cell Line Generation:

We offer 3rd generation lentiviral system for stable gene knock-in into multiple cell types from most mammalian species.

CRISPR Knockout
Cell Line Generation:

We offer non-integrating lentiviruses (IDLVs) for CRISPR-lenti gene knockout or knock down modifications in hard-to-transfect cell lines.

## **Cost-effective**

**Efficient** 

Primary Cells & Many Other Cell Lines

#### **Service Specifications:**

#### Customer should provide:

- Frozen cells: 2 vials of 10^6 cells/ vial OR live cells: 2 x T25 flasks at 90% confluency
- Detailed information regarding target gene and gene modification

#### Deliverables:

- Two vials of 1-2 clone(s) or 2 vials of pooled clones
- Optional: negative control non-target gRNA-virus available
- Clonal expansion and preservation
- Milestone reports and detailed final report

### **Applications:**

Drug screening

**Functional** assays

Membrane protein screening

Long-term expression studies

Antibody immunization boosting

Gene therapy research

**Timeline: 3-6 months**