

# WildSeq - Characterising cell pools to Create a Whitelist before in vivo studies

## Table of Contents

- [0.1. Materials](#)
- [0.2. Protocol](#)
  - [0.2.1. Day 1](#)
  - [0.2.2. Day 2](#)
- [1. Concentrating virus](#)
- [1.1. Results](#)

## 0.1. Materials

- Transit
- Plasmids (two packaging, one entry)
- Opti mem
- GlutaMax
- HEK cells
- Heat inactivated FBS

## 0.2. Protocol

Do not use antibiotics in media. And add g (unless it has L-alanyl-L-glutamine dipeptide)

### 0.2.1. Day 1

- Seed HEK cells @ 0.4m5d10h late afternoon

### 0.2.2. Day 2

- Check density reasonable (between 80 and 95% confluency)
- Replace media on feeders with fresh media
- Mix Opti-MEM + 43ul Transit + 1.3ul Opti-Mem per T75
- Add plasmids (in table below) to the cocktail and leave for 15 - 30 mins
- Add mixture dropwise and gently rock the plate in an incubator
- Harvest virus 36-48 hours after and move

Lentivirus 150cm dish	
Opi - mem	1 ml
Transit 293	33ul

Lentivirus 10cm dish	
Pax . 2	8.3ug
GaV MTR	2.8ug
Lentiviral WildSeq library	

## 1. Concentrating virus

Will concentrate Lenti-X Concentrator

- Spin briefly @ 500g, then filter virus supernatant into 15ml centrifuge tubes
- Mix 1 volume of Lenti-X concentrator to 3 volumes of supernatant (gentle inversion)
  - Measure viral supernatant / 3, then add to Lenti-X
- Incubate mixture at 30°C for 30 minutes to overnight
- Centrifuge sample @ 1,500 xg for 4 hours. The pellet will be visible.
- Carefully remove supernatant, taking care not to disturb pellet. Supernatant can be removed with either a pipette or a syringe.
- Gently resuspend the pellet in 1/10th volume of complete DMEM, PBS, or TNE. The pellet can be resuspended into suspension quickly.
- Immediately titrate sample using a plaque assay.

### 1.1. Results

This was successful. I replenished media on the cells with Lenti-X concentrator for 3 hours.

Date: 2022-08-15 Mon 00:00

Author: Chris Steel

Created: 2023-07-10 Mon 15:14