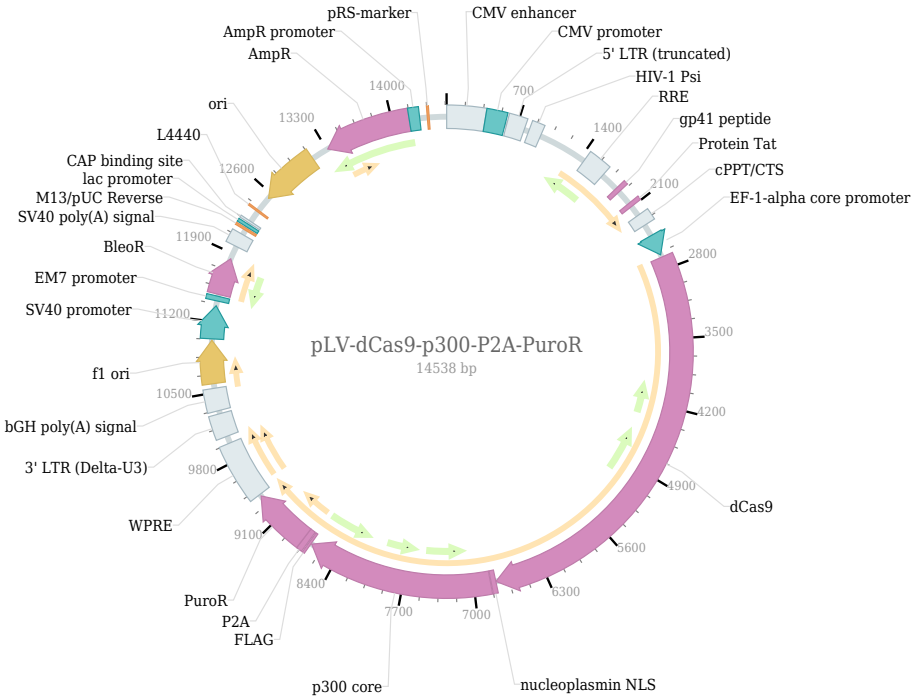
pLV-dCas9-p300-P2A-PuroR

Vector ID	V000455
Antibiotic Resistance	Ampicillin
Length	14538 bp
Vector Type	Mammalian Expression, Lentiviral, CRISPR

Product Information

Replication Origin	ori
Selection Marker	Puromycin
Promoter	EM7
Cloning Method	Gibson Cloning
5' Primer	ATCCGGTGCCTAGAGAAGGT
Comment	pLV-dCas9-p300-P2A-PuroR is a lentiviral CRISPRa epigenome editing plasmid. It expresses catalytically dead dCas9 fused to p300 histone acetyltransferase to deposit H3K27ac and activate target enhancers/promoters. The P2A-PuroR segment enables puromycin selection of cells stably producing this activator fusion protein. Its lentiviral backbone achieves stable integration into mammalian cells for pooled gain-of-function regulatory element screening.

Vector Map



Plasmid Resuspension Protocol

1. Centrifuge at 5,000×g for 5 min.
2. Carefully open the tube and add sterile water to dissolve the DNA: add 20 µl for 5 µg plasmid, and 100 µl for 100 µg plasmid.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin to concentrate the liquid at the bottom. Speed is less than 5000×g.
5. Store the plasmid at -20 ℃.