

Supplementary Materials

Table S1. Oligonucleotide primers used in this study

Primers	Sequences	Application
sgRNA-TK-F	caccggtctgcgcatcgtaaatac	TK sgRNA cloning
sgRNA-TK-R	aaacgtatttacgatgcgcagacc	
sgRNA-gE-F	caccgccgtgttctttgtggcggt	gE sgRNA cloning
sgRNA-gE-R	aaacaccgccataaagaacacggc	
TKhm1-F	ccgccttatcatccccgctccccgccg	TKhm1 amplification
TKhm1-R	ggcgccgtcgaggtagatccggagg	
LoxP-TKhm2-F	ataacttcgtatagcatacattatacgaagtatgt tgtgaccctcggccctcccaccgcg	TKhm2 amplification
TKhm2-R	ctccgcgtccgcgaggacggccac	
LoxP-CMV-F	ataacttcgtatagcatacattatacgaagtatgt gatgcgggttttggcagtac	CMV enhancer amplification
CMV-R	agctctgcttatatagacc	
Flt3L-F	atggtagtgcggcgcca	Flt3L amplification
Flt3L-R	tcatgtgaatgctggggacac	
mCherry-F	atggtgagcaaggcgaggagga	mCherry amplification
mCherry-R	gggcccgggatccaccgatctaga	
gEhm1-F	gaacgggaccacggacctct	gEhm1 amplification
gEhm1-R	atctgcgcggcgcgacagagaaagg	
loxN-eGFP-F	ataacttcgtatagtataccttatacgaagtatgtg agcaagggcgagg	eGFP amplification
eGFP- loxN-R	ataacttcgtataaggtatactatacgaagtatctt gtacagctcgtccat	
gEhm2-F	aaccgcctgttgatgtcc	gEhm2 amplification
gEhm2-R	acgcgtcgcgacaact	
gE300-F	cgggatctggacgttctg	gE gene verification
gE500-R	atggggcggctcgcgccggag	
TK114-F	cgcactctgttcgacacgga	TK gene verification
TK367-R	gctgatgtccccgacgatga	
Flt3L 51-F	ctgctgctgctgctgctgag	Flt3L gene verification
Flt3L 392-R	gagatgttggcctggacgaagc	
<u>eGFP-378-F</u>	<u>ggcatcgactcaaggagg</u>	<u>eGFP gene verification</u>
<u>eGFP-665-R</u>	<u>tgatccccggcgccggtcacgaac</u>	
<u>mCherry-32-F</u>	<u>catcatcaaggagttcatgc</u>	<u>mCherry gene verification</u>
<u>mCherry-593-R</u>	<u>ccaactgatgttgacgttg</u>	

Fig. S1 Sequence of PRV gE gene recombination donor template (gEhm1-loxN-eGFP-loxN-gEhm2) gE hm1 and gE hm2 colored in green, loxP sites colored in grey, eGFP colored in blue, the endogenous TSS of PRV gE shaded in violet.

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Fig. S2 Sequence of PRV TK gene recombination donor template (TKhm1-Flt3L-loxP-CMV promoter-mCherry-loxP-TKhm2) TKhm1 and TKhm2 colored in green, Flt3L colored in yellow, loxN sites colored in grey, CMV enhancer colored in blue, and mCherry colored in red.

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