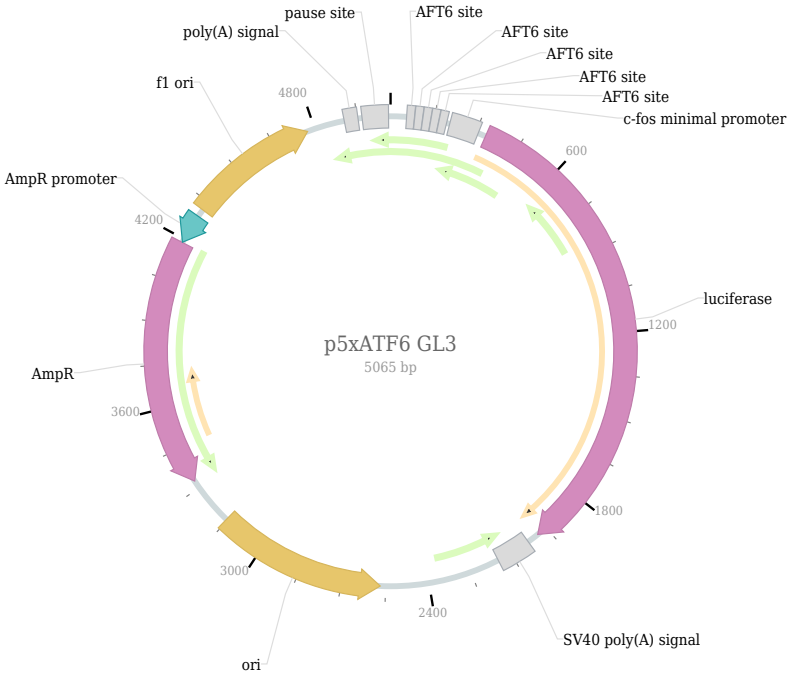
p5xATF6 GL3

Vector ID	V009709
Antibiotic Resistance	Ampicillin
Length	5065 bp
Vector Type	Reporter vector

Product Information

Replication Origin	ori
Source/Author	Wang Y, Shen J, Arenzana N, Tirasophon W, Kaufman RJ, Prywes R.
Growth Strain(s)	Top10
Comment	p5xATF6-GL3 is a luciferase reporter plasmid containing five tandem wild-type ATF6-specific binding sequences upstream of a minimal c-fos promoter. It quantitatively measures activated nuclear ATF6 levels induced by ER stress via dual-luciferase detection. Its native ATF6 consensus motif ensures exclusive response to ATF6 rather than related ATF1/CREB transcription factors. This vector is standard for investigating the IRE1-ATF6 signaling axis of the unfolded protein response.

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 ℃.