

DATA SHEET

CELL LINE DESIGNATION
ORIGIN (PARENTAL CELL)
GENE INTRODUCED
RECEPTOR INTRODUCED:

Glutamate Receptor, Metabotropic 8 cell line (CB-80300-239)
HEK 293-CNG-Slcla3 cell (CB-80200-238)
Genbank Locus ID 2918
Human glutamate receptor, metabotropic 8 (NCBI protein database AAB51764.1)

USAGE

- cAMP assay for Gi-coupled human glutamate receptor, metabotropic 8 (GRM8).
- HEK293-CNG-Slcla3 cells (CB-80200-238) without transfected GRM8 are used as a negative control.

QUALITY CONTROL

1. This cell line has been tested negative for *Mycoplasma sp.*
2. This cell line has been tested positive for GRM8 specific response.
3. Surviving rate: More than 2.5 million/vial on the second day after thawing.
4. The receptor specific activity is stable for 10 weeks continuous passage.

CELL CULTURE CONDITION

1. Growth medium: 90% DMEM with Glutamax, 10% FBS, 250 µg/ml G418, 1 µg/ml puromycin and 5 µg/ml blasticidin
2. Freezing medium: 10% DMSO, 90% FBS

DATA EXAMPLE

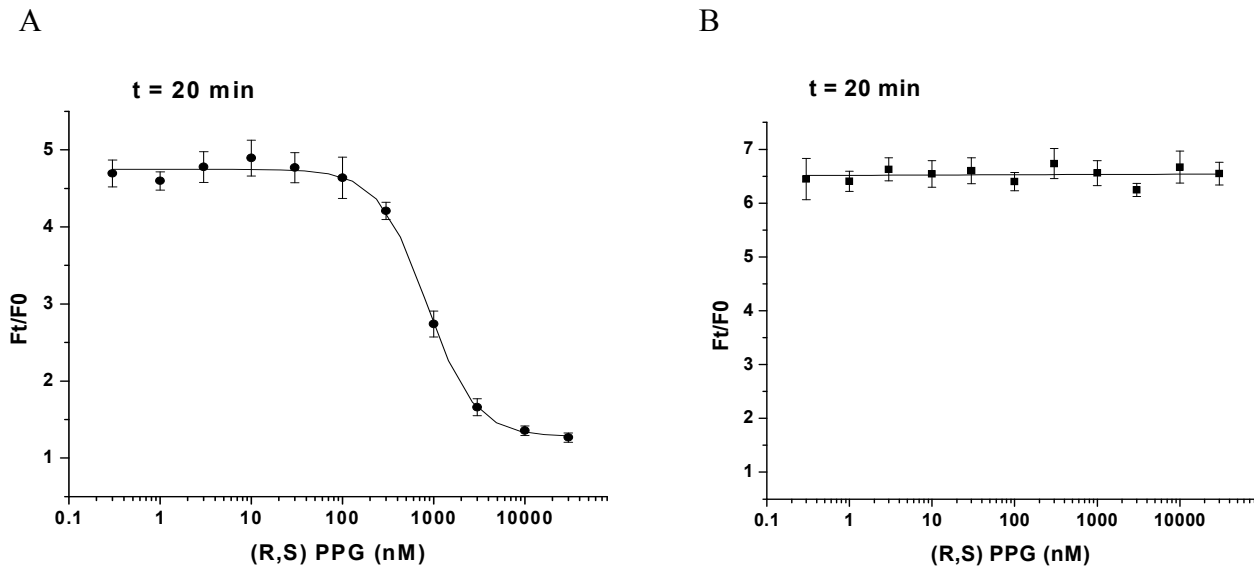


Figure 1. Response of ACTOne GRM8 cell line & parental cell line to (R,S)-phosphonophenylglycine.

ACTOne GRM8 cells and parental cells (CB-80200-200) were plated overnight in 20 µl culture medium on a BD Biocoat 384 well plate. The next day, cells were dye-loaded with 20 µl/well of 1X Dye-loading solution (ACTOne Membrane Potential Assay Kit). After 2 hours of incubation at room temperature, two readings were obtained prior to and 20 min after the addition of (R,S)-phosphonophenylglycine. Ratios of the two readings (F/F₀) are plotted in the figure.

- A. Dose response curve of (R,S)-phosphonophenylglycine in ACTOne GRM8 cell line. EC₅₀ = 828 nM in the presence of PDE inhibitor Ro20-1724 and β-adrenoceptor agonist isoproterenol.**
- B. Parental cells do not respond to (R,S)-phosphonophenylglycine.**