Product data sheet

MV4-11/GFP-luciferase stable cell line

Catalog Number: CL-1495

Storage: Liquid nitrogen

Components: 1 vial contains ~2 x10^6 cells in Cell freezing medium

Product description

MV4-11/GFP-luciferase cells are derived from the human MV4-11 macrophage cell line by stably integration of a constitutive turboGFP and Firefly luciferase expression construct. MV4-11 cell line was generated from biphenotypic B myelomonocytic leukemia, has been widely used in cancer research and drug development. MV4-11/GFP-luciferase cells stably express turboGFP and Firefly luciferase, can be used for *in vitro* assays and *in vivo* imaging.

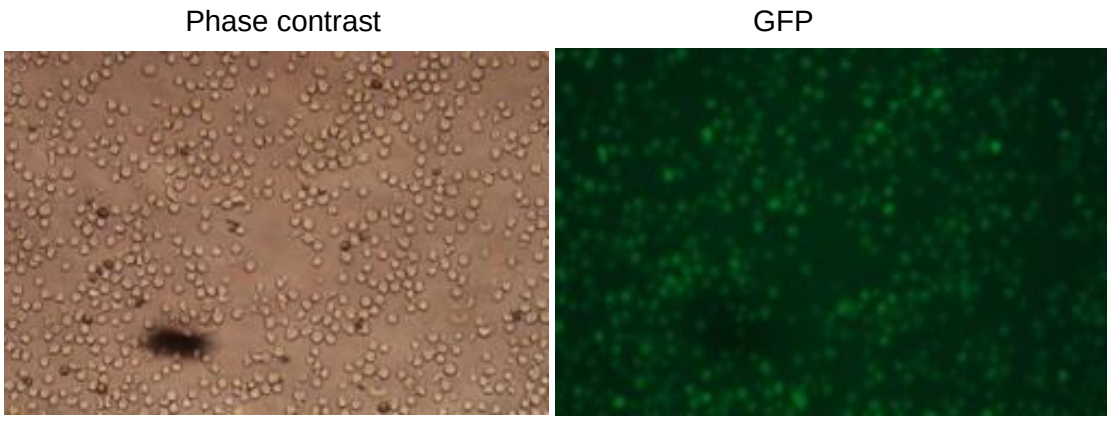

Figure 1. GFP expression in MV4-11/GFP-luciferase stable cell line

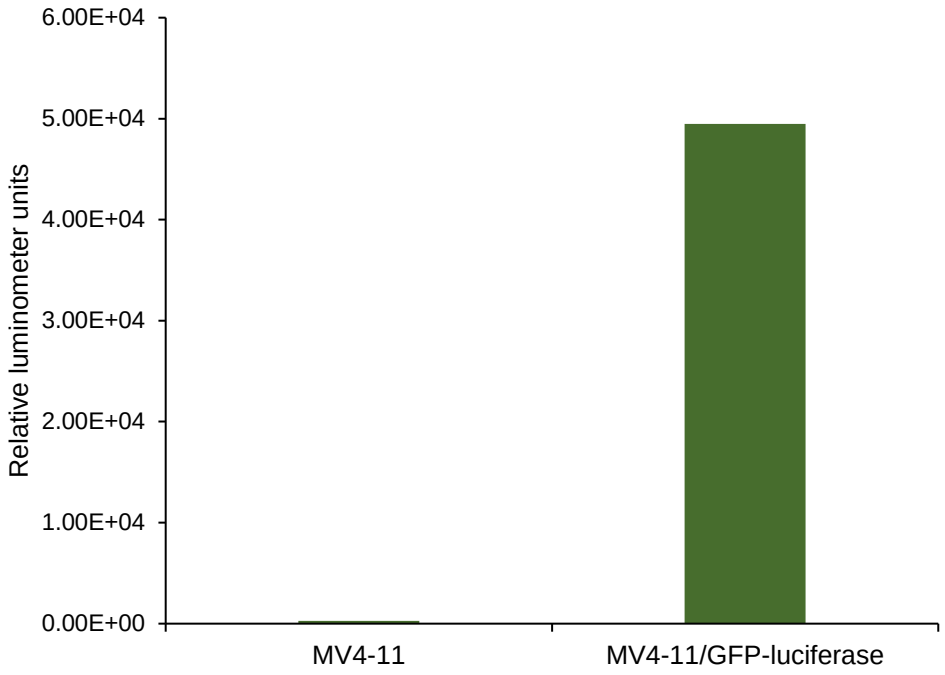

Figure 2. Firefly luciferase expression in MV4-11/GFP-luciferase stable cell line.

The luminescence intensity of ~5000 cells was detected by Bright-Glo™ luciferase Assay System (Promega, Cat E2610).

Cell line description

Organism: Homo sapiens (human)

Tissue: Peripheral blood

Cell Type: macrophage

Morphology: Lymphoblast

Culture Properties: Suspension

Disease: Biphenotypic B Myelomonocytic Leukemia

Biosafety Level: 2

Medium

1. Complete culture medium: RPMI-1640, 10-20% fetal bovine serum (FBS)
   1 µg/mL of puromycin may be added to the culture medium. Puromycin should not be added until a culture has been well established from the thawed cells.

2. Freeze medium: Fetal bovine serum (FBS), 6% DMSO

Culture procedure

Thawing of frozen cells

1. Thaw the frozen cryovial by gentle agitation in a 37 °C water bath in 1-2 minutes.
2. Remove the cryovial from the water bath as soon as the contents are thawed, and decontaminate by wiping with 70% ethanol.
3. Transfer the thawed cell suspension to a centrifuge tube containing 10 ml of Complete culture medium, centrifuge at 500 g for 5 minutes.
4. Remove the medium by aspiration, resuspend the cells with 2 ml of the Complete culture medium by gently pipetting up and down.
5. Transfer the cells to a T-25 suspension cell culture flask.
6. Place the cells in a 37°C incubator with 5% CO2.

Sub-culturing

Cultures can be maintained by the addition of fresh medium or replacement of medium. Alternatively, cultures can be established by centrifugation with subsequent resuspension at 2 x 10^5 viable cells/ml. Maintain cell density between 1x10^5 and 2x10^6 viable cells/ml.

Renew or add fresh medium every 2-3 days.