SRB Cell Proliferation and Cytotoxicity Assay Kit

Cat : M1000

Size: 100T/500T

Storage: Low-temperature transport, valid for 1 year.

Product content:

Components	100T	500T	Storage
Fixing fluid	10mL	50mL	2-8℃ avoid light
Washing solution 1	60mL	300mL	2-8℃
Dye solution	10mL	50mL	2-8℃ avoid light
Washing solution 2	100mL	500mL	2-8℃
Dissolving solution	20mL	100mL	2-8℃

Introduction:

Sulforhodamine B(SRB) colorimetry is mainly used to detect cell proliferation. SRB is a pink anionic dye, easily soluble in water, and can specifically bind to the basic amino acids that make up proteins in cells under acidic conditions. The absorption peak is generated at 515nm wavelength, and the absorption value is linearly positive correlated with the number of cells, so it can be used for quantitative detection of cell number.

SRB staining is not as easy to discolor as MTT method, and cells can be placed in the 96-well plate for a longer time after fixed staining, so it is less affected by the determination time. SRB dissolved in Tris solution can also be stable for a longer time. Therefore, 96-well cell culture plates fixed at different time points can be measured at the same time, and the measured light absorption value results will not be significantly affected. When the absorption value is plotted with the SRB concentration, it is linear below the OD 1.5-2.0. When it exceeds the linear range, it is best to re-read after dilution. Although the SRB method is more complicated than other detection methods, it is suitable for high-throughput screening because the time can be mastered by oneself and is not limited.

Protocols:

1. Cells of logarithmic phase were collected and the concentration of cell suspension was adjusted and divided into 96-well plates with 100μL per well.
2. The cells were cultured in a 37℃, 5% CO2 temperature box to stick to the wall and cultured for 6-24 hours.
3. Remove the cells, discard the medium, and wash with PBS for 1-2 times.
4. Add 100μL pre-cooled fixing solution, rest at room temperature for 5 min, and then rest at 4℃ for 1h.
5. Discard the supernatant, clean three times with washing liquid 1, and dry at room temperature.
6. Add 100μL dyeing solution, incubate for 20min away from light (can be wrapped in aluminum foil and slowly shaken on a horizontal shaking table or a side shaking table), discard the dyeing solution.
7. With washing liquid 2 cleaning five times (quickly completed, so as not to leak out of the cell), as

far as possible to clean the residual dyeing liquid, room temperature dry.
8. Add 200μL solution and incubate for 30min away from light (wrap in aluminum foil and slowly shake on a horizontal shaker or a side shaker).
9. Measure the absorption value at 515nm wavelength.

Notes:

1. Before the formal experiment, please select several samples for pre-experiment, in order to optimize the experimental conditions, determine the best cell dosage, and obtain the best experimental results.
2. Due to the use of 96-well plates for detection, if the cell culture time is longer, it is necessary to pay attention to the problem of evaporation. May adopt the method of abandoning the surrounding circle, and add PBS, water or culture solution; the 96-well plate can also be placed near the incubator water
3. During inoculation, the cell suspension must be mixed to avoid cell precipitation, resulting in an uneven number of cells in each well.You can mix it every few holes.
4. For your safety and health, please wear a lab coat and use disposable gloves and a mask to operate.

Figure: Figure 1

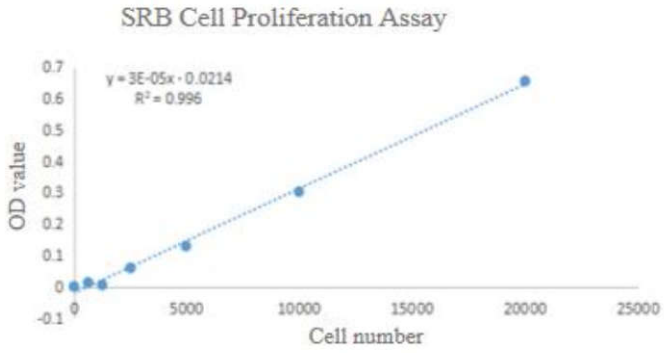
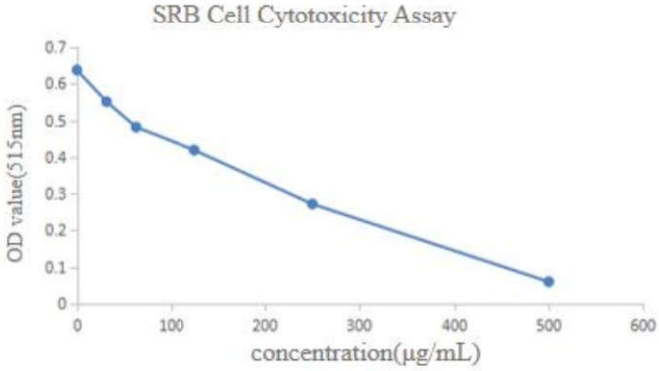


Figure 2



Related products:

M1020 MTT Cell Proliferation and Cytotoxicity Assay Kit
P1020 1×PBS，PH7.2-7.4，0.01M，cell culture
T1300 Trypsin-EDTA solution，0.25% (without phenol red)
12100 DMEM(H)
S9000 Extra Fetal Bovine Serum