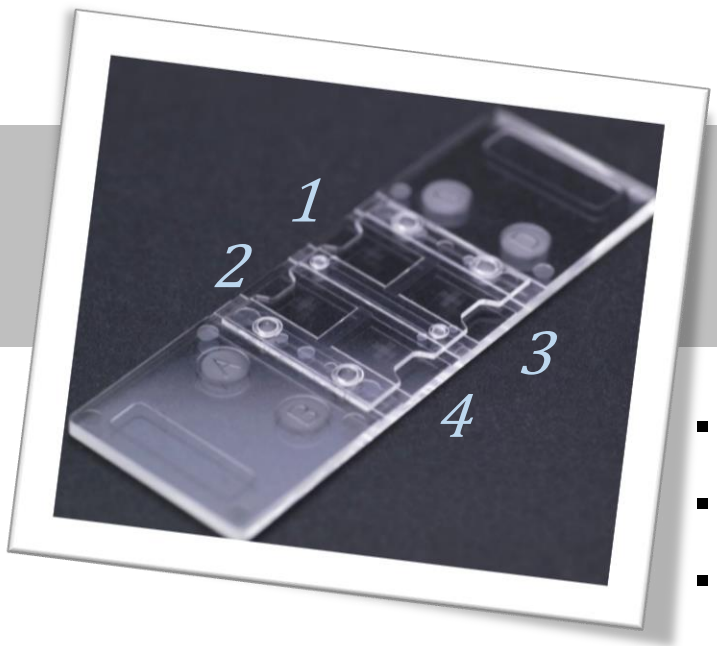
funakoshi
FRONTIERS IN LIFE SCIENCE

JAPAN MADE QUALITY

Disposable Hemocytometer (4-Chambers)

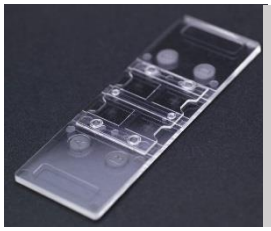


Improved Neubauer Cell Counter

- Designed for rapid loading
- No washing, no labor, save time
- Same grid as standard one
- High calculation accuracy
- Made of durable and high grade plastic

More detail
https://www.funakoshi.co.jp/exports_contents/80019

Code	Product name	Unit
521-10	Disposable Hemocytometer (4-chambers)	20 slides / 1 case
		50 slides / 1 case
		200 slides / 4 cases



Reference

Improved Neubauer Cell Counter Counting Method for Culture Cells

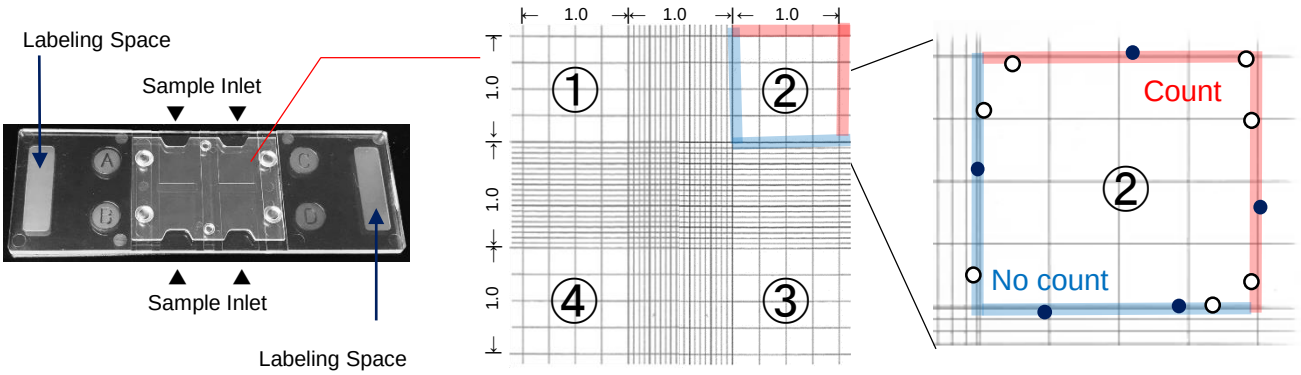


Fig.1 Counting Area

Fig.2 Enlarged image of area②

○ Live cell ● Dead cell

【 Sample Preparation 】

1) Prepare cell suspension. When counting adherent cells, disperse cells by cell detachment solution such as Accutase or Accumax (Innovative Cell Technologies, Inc.) for accurate counting.

2) Take 100 µL of cell suspension and transfer to another tube. Add 100 µL of prepared Trypan Blue (0.3 - 0.4%) solution to the tube. (This makes x 2 diluted solution).
Note : Dilution rate should be optimized if cell numbers are high.

3) Pipet the solution gently.

【 Counting 】

1) Take 10 µL of trypan blue stained cell suspension. Inject the solution from sample inlets slowly.
Note : High speed injection may cause leak to other chambers.

2) Count all cells on compartment ① - ④
- If the cells are on border lines, count those on 2 border lines only. (Red line, see Fig.2)
- Count Live cells (Unstained) and / or Dead cells (Stained)

3) Calculate cell numbers
< Cell numbers in 1 mL >
- Live cells = (All live cells / counted compartments) x dilution rate x 10^4
- Dead cells = (All dead cells / counted compartments) x dilution rate x 10^4
- Viability (%) = Live cells / All cells (=Live cells + Dead cells) x 100

【 Tips and Notes 】
- For accurate counting, adjust cell numbers to 100 – 500 cells / 1 mm^2.
- Empty chamber may have small objects, but this does not affect to count.
- This is reference only. Detail counting method or for more information, please see experiment protocol book.