

**To prepare Soybean Trypsin Inhibitor (STI) for cell culture**

**250 mg/L dissolved in DPBS (filter-steriled and stored at 4°C)**

**Reagents/equipment:**

1. Soybean Trypsin Inhibitor (STI)(Sigma)  
Lab has both T9128 and T6522 as of 1/4/2008.
  - a. T9128: **This is much cheaper and works fine.**  
Sigma Trypsin inhibitor from Glycine max (soybean)  
Type II-S, soluble powder, T9128-5G (\$397.50)
  - b. T6522: Sigma Trypsin inhibitor from Glycine max (soybean)  
Type I-S, powder, cell culture tested, T6522-5G (\$1,455.00)
2. Dulbecco's Phosphate-Buffered Saline (D-PBS) (1X) liquid containing no calcium or magnesium (Invitrogen-Gibco catalog# 14190-136)(1L)
3. Stericup 1000mL (Millipore Corporation, Billerica, MA01821)(catalog# SCGPU11RE)(polyethersulfone, 1000/1000 mL, radio-sterilized Application: Sterilize tissue culture media and additives, protein solutions, virus suspensions, DNA, and other aqueous solutions)
4. 15-ml/50-ml sterile blue-cap polypropylene conical centrifuge tubes

**Procedure: **Work in tissue culture hood except step #1.****

1. Weigh 250 mg of STI and dispense into a sterile 15-ml tube.
  - a. Make 10 tubes or more at once for a lab common stock.
  - b. Store in the bottom drawer (left side) of the lab tissue culture refrigerator.
2. Open a new bottle of 1L D-PBS in the tissue culture hood.
3. Transfer 250 mg of STI into 1L of D-PBS by dissolving the powder with about 5-10 ml of D-PBS.
4. Filter-sterile the STI solution with a 1000mL Stericup.
5. Dispense into 50-ml tubes (~50 ml each x 20 tubes). Label "STI" with a fine-tip marking pen (EtOH resistant ink) on the side of the tube.
6. Store at 4°C on the bottom shelf of the lab tissue culture refrigerator.