

CEPT Cocktail

1 Contents

Components	HY-K1043
Chroman 1	5 mg
Emricasan	10 mg
Trans-ISRIB	10 mg
Polyamine Solution (1,000×)	5 mL

2 Introduction

MCE CEPT Cocktail is composed of CET small molecules (Chroman 1, Emricasan and Trans-ISRIB) and Polyamine Solution. This product enhances cell survival and promotes clonal growth of genetically stable hPSCs. In addition, this product provides strong improvements for several key applications in stem cell research, including routine cell passaging, cryopreservation of pluripotent and differentiated cells, embryoid body (EB) and organoid formation, etc.

3 General Protocol

1. Prepare stock solutions for each compound
 - a. Prepare 0.5 mM of Chroman 1 stock solution (10,000×): reconstitute 5 mg of Chroman 1 in 22.91 mL of DMSO. Vortex solution until the Chroman 1 is completely dissolved.
The working concentration of Chroman 1 is 50 nM.
 - b. Prepare 50 mM of Emricasan stock solution (10,000×): reconstitute 10 mg of Emricasan in 0.3512 mL of DMSO. Vortex solution until the Emricasan is completely dissolved.
The working concentration of Emricasan is 5 μM.

- c. Prepare 7 mM of Trans-ISRIB stock solution (10,000×): reconstitute 10 mg of Trans-ISRIB in 3.165 mL of DMSO. Gently warm the solution between 45°C and 60°C, and vortex solution until the Trans-ISRIB is completely dissolved.

The working concentration of Trans-ISRIB is 0.7 μM.

2. Supplement an aliquot of complete hPSC culture medium with CET small molecules 1:10,000 just before use. For example, add 1 μL of 10,000× stock solution of each small molecule per 10 mL of medium.
3. Add 10 μL of 1,000× Polyamine Solution per 10 mL of medium.
4. Filter the prepared medium using a 0.22 μm filter prior to use.

4 Storage

-20°C, 2 years

5 Precautions

1. Store the compounds individually at concentrated stock concentrations for up to 6 months at -80°C, or up to 1 month at -20°C. Avoid repetitive freeze-thaw cycles.
2. This product is for R&D use only, not for drug, household, or other uses.
3. For your safety and health, please wear a lab coat and disposable gloves to operate.