


CTS™ Immune Cell SR

Catalog Numbers A25961-01, A25961-02

Pub. No. MAN0010992 Rev. 3.0

 **WARNING!** Read the Safety Data Sheets (SDSs) and follow the handling instructions. Wear appropriate protective eyewear, clothing, and gloves. Safety Data Sheets (SDSs) are available from thermofisher.com/support.

Product description

CTS™ Immune Cell SR (Serum Replacement) is intended to be used as a media supplement for the expansion of the *in vitro* immune cells to support increased yield. CTS™ Immune Cell SR is a defined xeno-free formulation and does not contain bovine or other non-human, animal-derived components.

Contents and storage

Contents	Cat. No.	Amount	Storage	Shelf life ^[1]
CTS™ Immune Cell SR	A25961-01	50 mL	-20°C to -5°C. Protect from light.	18 months
	A25961-02	500 mL		

^[1] Shelf-Life duration is determined from Date of Manufacture.

Safety information

Human origin materials are non-reactive (donor level) for anti-HIV 1 & 2, anti-HCV, and HBsAg. Handle in accordance with established bio-safety practices.

Culture conditions

Media: Complete medium is comprised of a basal T cell media or T cell media kit (CTS™ AIM V™ SFM, or other supportive media) containing CTS™ Immune Cell SR

Culture type: Suspension

Culture vessels: Cell culture plates, T-flasks, G-Rex flasks or cell culture bags

Temperature range: 36°C to 38°C

Incubator atmosphere: Humidified atmosphere of 4–6% CO₂ in air. Ensure that proper gas exchange is achieved in culture vessels.

Important information

For best results, pre-equilibrate complete medium to temperature (36°C to 38°C) and gases (4–6% CO₂ in humidified air) before use. Avoid overexposure of cultures to light.

Procedural guidelines

- T cells may be grown in a complete medium such as CTS™ OpTmizer™ T-Cell Expansion SFM, CTS™ AIM V™ Medium, or other supportive media supplemented with CTS™ Immune Cell SR. As all T cell culture methods and cell sources may vary, we recommend that you determine what concentration of CTS™ Immune Cell SR is optimal for your culture system. We recommend a range of 2–5%.
- Some media (such as CTS™ OpTmizer™ T-Cell Expansion SFM) require the addition of glutamine and growth factors (e.g., IL-2) to support growth. IL-2 can be exchanged in complete media with alternative cytokines such as IL-7 or IL-15 to better preserve a memory stem/central memory T cell subset *ex vivo*. Adding a radical scavenger, such as N-acetylcysteine (NAC, 10 mM final concentration), may increase expansion.
- Follow standard media protocols provided by the media vendor, or your own internal protocols developed for your specific process.
- CTS™ Immune Cell SR in complete medium is stable for 2–4 weeks when stored in the dark at 2°C to 8°C. Avoid repeated warming and chilling of the complete medium. Warm only the volume required for that day's use.
- CTS™ Immune Cell SR has been shown to work well in CTS™ Dynabeads™ CD3/CD28 bead-based expansion as well as rapid expansion protocols using anti-CD3 mAb and feeder cells. CTS™ Immune Cell SR has also been shown to support *in vitro* expansion of gene-modified T cells using lentiviral vectors. CTS™ Immune Cell SR media supplement may also work in other immune cell culture protocols, although it has not been tested for such applications (e.g., NK T cells, regulatory T cells, DC).

Thaw CTS™ Immune Cell SR






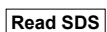



1. Place CTS™ Immune Cell SR at 2°C to 8°C overnight, to thaw.
2. The next day, place the bottle in a 37°C water bath and continue thawing until the ice is gone and the supplement is clear. Gently swirl the bottle occasionally while in the water bath.
3. Store thawed CTS™ Immune Cell SR at 2°C to 8°C in the dark for up to 4 weeks.

It is normal to see some flocculent material in the CTS™ Immune Cell SR while thawing, but this material will go into solution with gentle swirling at 37°C. Minimize dwell time in water bath.

Related products

Item	Source
CTS™ AIM V™ Medium	0870112
CTS™ OpTmizer™ T-Cell Expansion SFM	A10485
CTS™ IL-2 Recombinant Human (100 µg)	CTP0021
CTS™ IL-2 Recombinant Human (1 mg)	CTP0023
CTS™ Dynabeads™ CD3/CD28	40203D
L-Glutamine (200 mM)	25030
CTS™ GlutaMAX™-I Supplement	A12860
CTS™ DynaMag™ Magnet	12102
CTS™ DPBS without calcium chloride, without magnesium chloride	A12856

Explanation of symbols

Symbol	Description	Symbol	Description	Symbol	Description
	Manufacturer		Catalog number		Batch code
	Use by		Temperature limitation		Read Safety Data Sheet
	Consult instructions for use		Keep away from light		Sterile using aseptic processing techniques

Limited product warranty

Life Technologies Corporation and/or its affiliate(s) warrant their products as set forth in the Life Technologies' General Terms and Conditions of Sale found on Life Technologies' website at www.thermofisher.com/us/en/home/global/terms-and-conditions.html. If you have any questions, please contact Life Technologies at www.thermofisher.com/support.



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