



Preservation of Small Tissue Samples
and Biopsies

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1 Components

1.1 Kit contents

Product Code	Components	Units	Unit Volume	Medium to Add
TR-MNS-001	GelBase Beads	1 tube	0.4 mL	-
	Gel A (5x)	1 tube	0.12 mL	0.48 mL
	Dissolution Buffer	1 tube	1.1 mL	-
TR-MNS-003	GelBase Beads	3 tubes	0.4 mL	-
	Gel A (5x)	3 tubes	0.12 mL	0.48 mL
	Dissolution Buffer	3 tubes	1.1 mL	-
TR-MNS-006	GelBase Beads	6 tubes	0.4 mL	-
	Gel A (5x)	6 tubes	0.12 mL	0.48 mL
	Dissolution Buffer	6 tubes	1.1 mL	-
TR-MNS-012	GelBase Beads	12 tubes	0.4 mL	-
	Gel A (5x)	12 tubes	0.12 mL	0.48 mL
	Dissolution Buffer	12 tubes	1.1 mL	-
TR-MNS-024	GelBase Beads	24 tubes	0.4 mL	-
	Gel A (5x)	24 tubes	0.12 mL	0.48 mL
	Dissolution Buffer	24 tubes	1.1 mL	-

NOTE: Remove components from 2-8°C storage for at least 20 minutes before use

1.2 Components to be supplied by the user

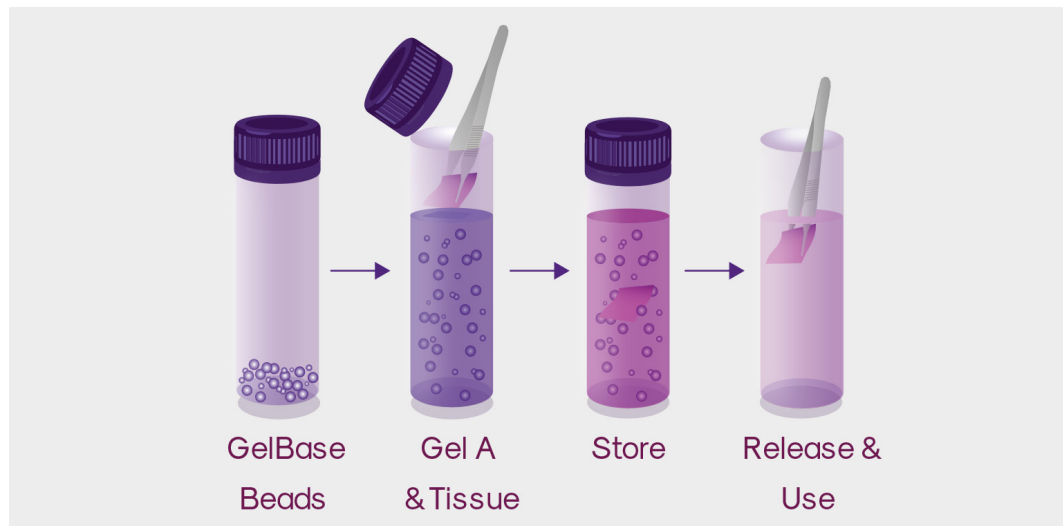
1000 µL micropipettes and tips or syringes and needles

Cell culture medium

Sterile forceps

2 Step-by-Step guide

2.1 Overview



2.2 Gelation

1. Ensure that all components are allowed to equilibrate to room temperature before use and conduct all steps at room temperature.
2. Dilute **Gel A** 1 in 5 with cell culture medium by adding directly to tubes containing gel concentrate (See kit contents on Page 3 for a dilution guide). Either mix by vortexing for 10 seconds or gently mix with a pipette until homogenous.
3. Add 0.6 mL of **Gel A** to tubes containing **GelBase Beads**.
4. Invert tube to distribute **GelBase Beads** throughout **Gel A**.
5. Slide the tissue into the gel/bead mixture using sterile forceps, ensuring that the tissue is completely covered by the gel. This must be done within **20 minutes** of the addition of **Gel A**.^{1,2}
6. Replace the lid, ensuring a tight seal (**Gel A** will cure *in situ* within approximately 30 minutes, sample is ready to ship after 1 hour).

7. Store away from light at an appropriate temperature (between 15 and 25°C in Controlled Room Temperature (CRT) packaging or a temperature-controlled environment).

¹Recommended tissue size is between 0.1 cm x 0.1 cm x 0.1 cm and 0.5 cm x 0.5 cm x 0.5 cm per sample.

²Use the collection tube provided containing GelBase Beads for encapsulation, storage and release.

³Atelerix can recommend an appropriate storage temperature for your particular tissue. Please contact technical@atelerix.co.uk

2.3 Release

1. Remove lids from tubes and use a syringe with needle or pipette tip to infuse 1 mL **Dissolution Buffer** into the gel, ensuring that you do not disturb the tissue.
2. Allow **Gel A** to dissolve for **10 minutes** with occasional agitation of the tube before recovering the tissue sample with sterile forceps.
3. Wash tissue with culture medium or buffer solution before continuing with downstream processes.

2.4 Conditioning Chronos Advance CRT container

1. Remove the **six orange** 'Cool Phase' PCM panels from the CRT container and place them un-stacked at a temperature of approximately 20°C for **at least 24 hours**.
2. Reassemble the container placing the bottom and side PCM panels in place, ensuring that the side with the writing is facing towards outwards (as shown in the diagram below).
3. Place samples in the silver central payload box and carefully place in the centre of the CRT container.
4. Load the final PCM panel on top of the payload box ensuring that the side with the writing is facing outwards.
5. Place the polystyrene lid onto the system ensuring it is tightly sealed.
6. Close the outer carton.

Please consult [Chronos Advance Pack-Out Instructions](https://www.youtube.com/watch?v=dI0pRMz4CAQ) for a video detailing the assembly instructions: (<https://www.youtube.com/watch?v=dI0pRMz4CAQ>)



3 Statements

3.1 Kit storage and stability

This kit is stable at 4°C for 6 months. Bring components up to room temperature before use.

Atelerix does not recommend using the kit after the expiry date stated on the packaging.

3.2 Cellular material

Cellular spheroids/organoids and tissue biopsies can be used. Please ensure that biological material is free of fungal and bacteriological contamination before proceeding.

3.3 Trademarks

TissueReady™ is a trademark of Atelerix Ltd.