ELEVATE TISSUE DISSOCIATION

Automate and Standardize with STEMprep™

STEMCELL™ TECHNOLOGIES

Scientists Helping Scientists™ | WWW.STEMCELL.COM

TABLE OF CONTENTS

Transform Your Tissue Processing Workflow

Achieve faster, more consistent results from your tissue samples with the STEMprep™ Tissue Dissociator. This automated system streamlines tissue dissociation to produce high-viability single-cell suspensions ready for downstream analysis. Designed by scientists for scientists, STEMprep™ is built to address the everyday challenges of sample preparation in research labs.

Video
Elevate Tissue Dissociation with STEMprep™
www.stemcell.com/STEMprep-video

Resource
Streamline Tissue Proccessing Workflow Using STEMprep™
www.stemcell.com/STEMprep

Innovative and Modular Design

Scale Your Throughput with Confidence

STEMprep™ is a benchtop system flexible enough to fit your lab's various tissue processing needs. Its innovative design features independent temperature-controlled sample slots that enable tailored dissociation conditions for each sample while an intuitive touchscreen interface simplifies operation. Figure 1 illustrates the full system layout and key functional elements.

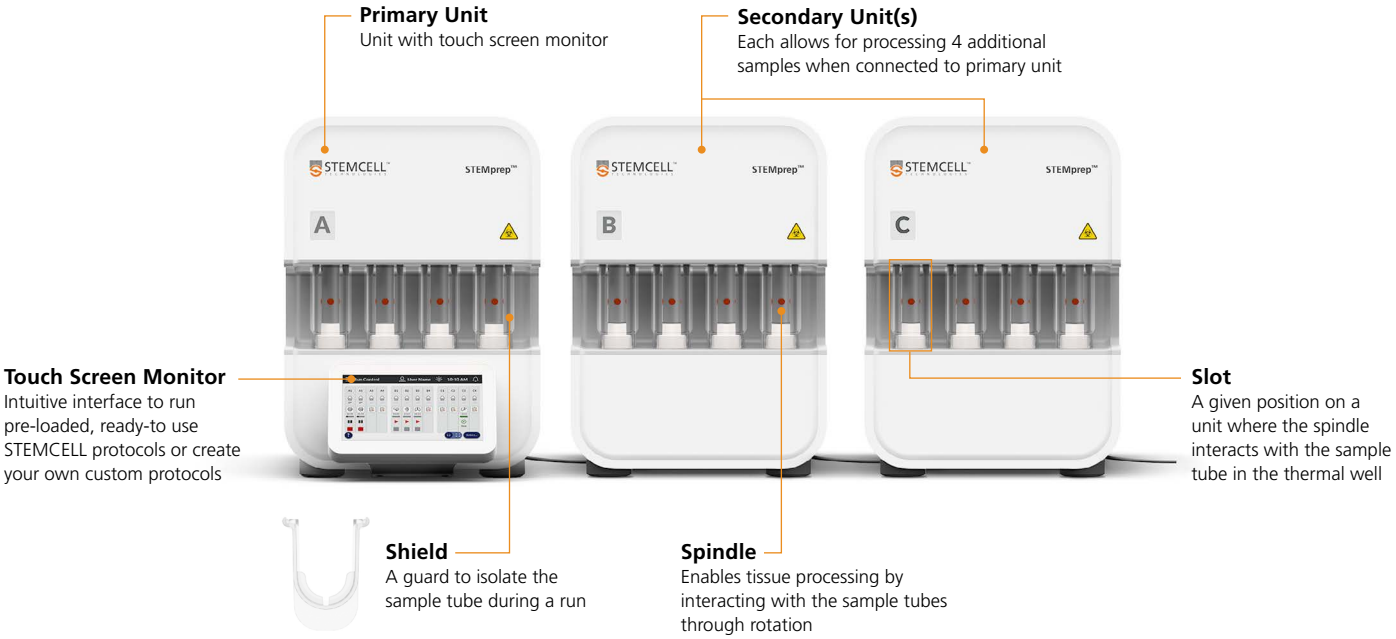


Figure 1. Overview of the STEMprep™ Tissue Dissociator System, Featuring the Primary and Secondary Units

Figure 2. Compact Design of the STEMprep™ Primary Unit

Flexible by design, STEMprep™ meets diverse research needs with modular solutions. The Primary Unit can process up to four samples simultaneously or in parallel. As your throughput requirements increase, the system can be expanded to accommodate 8, 12, or even more samples at a time. This modular approach (see Table 1) means you only invest in the capacity you need, and you can upgrade later by adding additional units.

Table 1. STEMprep™ System Configurations and Sample Capacity

System Configuration	Catalog #	Components	Notes
STEMprep™ Tissue Dissociator 4-Sample System	100-2112	1 x STEMprep™ Tissue Dissociator Primary Unit (Catalog #100-1248) 1 x Plastic Rack for Centrifuge Tubes, 50 mL (Catalog #200-0651)	The Primary Unit includes a touch screen monitor. Can process up to 4 samples.
STEMprep™ Tissue Dissociator 4-Sample Expansion Unit	100-2113	1 x STEMprep™ Tissue Dissociator Secondary Unit (Catalog #100-2110) 1 x Plastic Rack for Centrifuge Tubes, 50 mL (Catalog #200-0651)	The Secondary Unit enables the processing of 4 additional samples when connected to the Primary Unit. It cannot function independently.
STEMprep™ Tissue Dissociator 8-Sample System	100-2114	1 x STEMprep™ Tissue Dissociator Primary Unit (Catalog #100-1248) 1 x STEMprep™ Tissue Dissociator Secondary Unit (Catalog #100-2110) 1 x Plastic Rack for Centrifuge Tubes, 50 mL (Catalog #200-0651)	
STEMprep™ Tissue Dissociator 12-Sample System	100-2115	1 x STEMprep™ Tissue Dissociator Primary Unit (Catalog #100-1248) 2 x STEMprep™ Tissue Dissociator Secondary Unit (Catalog #100-2110) 1 x Plastic Rack for Centrifuge Tubes, 50 mL (Catalog #200-0651)	

Note: If you need to go beyond the 12-sample system, you can purchase an additional Expansion Unit to increase sample capacity by 4.

Product

STEMprep™ Tissue Dissociator

www.stemcell.com/STEMprep-tissue-dissociator

Why Use STEMprep™?

AUTOMATED & RELIABLE. Standardize tissue dissociation with automation for consistent, reproducible results.

HIGH YIELD & VIABILITY. Obtain high numbers of viable single cells with preserved functionality for downstream applications.

BUILT-IN HEATING & COOLING. Ensure optimal sample processing for various sample types and applications with built-in temperature control from 4 to 37°C.

MODULAR & SCALABLE. Choose from a 4-sample, 8-sample, or 12-sample system—scaling seamlessly to meet increasing throughput needs while maintaining efficiency.

FLEXIBLE & CUSTOMIZABLE. Use validated STEMCELL protocols or create your own to adapt STEMprep™ to different tissue types and experimental needs.

Demo

Request a Free STEMprep™ Demo
www.stemcell.com/STEMprep-demo

How to Use STEMprep™

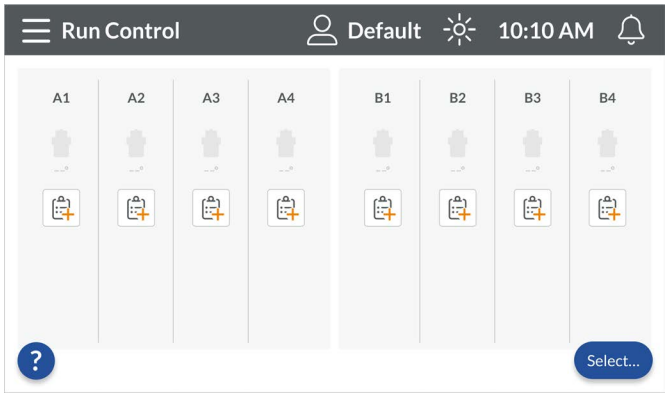
Standardized, Seamless, Scalable

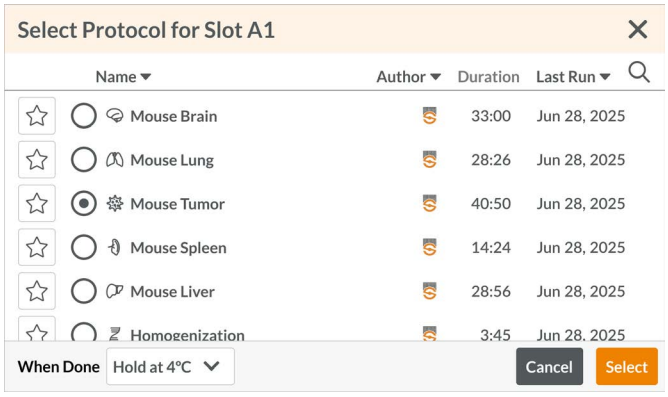
STEMprep™ streamlines your workflow with an intuitive touchscreen interface for fast protocol selection and set up. Integrated temperature control (4 - 37°C) eliminates the need for external heating or cooling devices, supporting a wide range of tissue types and dissociation conditions. Whether you're using validated protocols from STEMCELL Technologies or creating your own, STEMprep™ offers the flexibility and consistency your research demands.

Use STEMprep™ Tissue Dissociator with STEMprep™ Sample Tubes and tissue-specific dissociation kits to simplify and standardize performance across applications. With a modular design, STEMprep™ scales with your lab—start with a 4-sample Primary Unit and expand to process 8, 12, or more samples with Secondary Units.

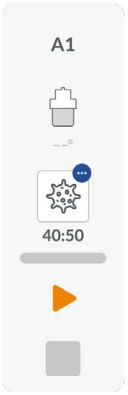
1. Operating the STEMprep™ Tissue Dissociator is simple and intuitive. After powering on the instrument using the rear switch, the touch screen on the Primary Unit will start up and the unit label will appear on each connected unit.

2. From the **Run Control Screen**, which displays all available slots, select a slot, and choose a protocol from the list available.





3. Prepare your sample by adding the tissue and the applicable STEMprep™ Tissue Dissociation Kit reagents into a STEMprep™ Sample Tube. Insert the tube into the selected slot; the system will indicate once the tube is properly positioned and ready to start. In the screenshot below, Slot A1 shows a correctly inserted sample tube, ready to begin the selected protocol.



4. When the protocol is complete, simply remove the tube. Your sample is now a single-cell suspension, ready for downstream applications. The instrument can then be powered down using the switch at the back.

For detailed operating instructions, refer to the Technical Manual (Document #10000030598). For a step-by-step overview of the setup process, see the Quick Start Guide (Document #27273). Both documents are available at www.stemcell.com

System Performance

High Yields, Preserved Viability, Reliable Results

Achieve consistent dissociation of diverse tissue types by minimizing user variability. By adding STEMprep™ to your workflow, you can reduce manual error, automate complex steps, and improve reproducibility. The integrated cold-hold functionality maintains low temperatures after protocol completion, offering added flexibility for sample retrieval and supporting downstream workflows such as RNA-based analyses where temperature control is critical.

The following data highlight STEMprep™ performance across various mouse tissue types including tumor, brain, liver, lung, and spleen. Notably, the system's cold-hold functionality preserves cell viability above 85%, showing no decline compared to fresh samples even after 24 hours of storage at 4°C.

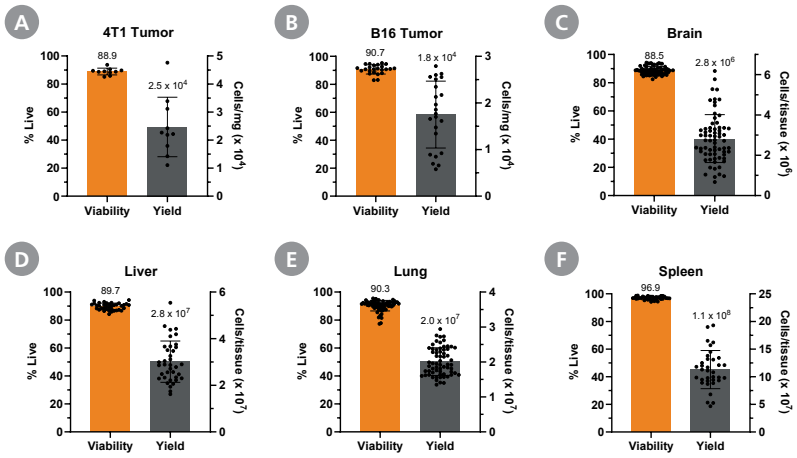


Figure 3. The STEMprep™ Tissue Dissociator System Enables Reliable Automated Mouse Tissue Dissociation

Mouse tissues were dissociated into single-cell suspensions using the STEMprep™ Tissue Dissociator System and the STEMprep™ Tissue Dissociation Kits. Viability and yield of single-cell suspensions generated from (A) 4T1 mammary tumors (n = 10), (B) B16 melanoma tumors (n = 28), (C) brain (n = 68), (D) liver (n = 37), (E) lung (n = 64), and (F) spleen (n = 35) were measured. Primary solid tumors were generated by subcutaneous injection of tumor cells into the flanks of mice. Tumor, liver, and lung samples were treated with ammonium chloride solution to lyse red blood cells. Brain samples were processed with 18% v/v OptiPrep™ to remove myelin and cell debris prior to analysis. Cell viability and yield following STEMprep™ processing were assessed by flow cytometry. Data are presented as mean ± SD.

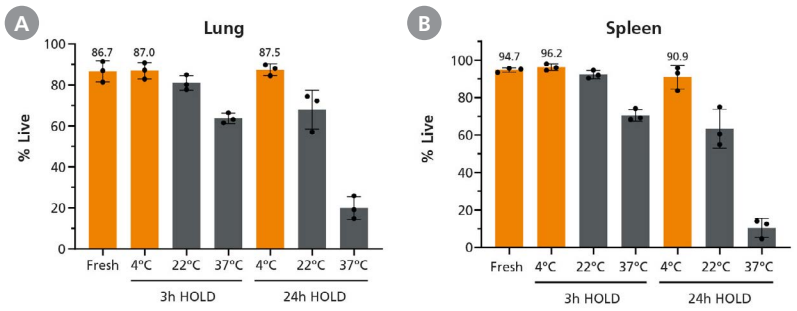


Figure 4. STEMprep™ Cold Temperature Hold Feature Preserves Mouse Lung and Spleen Cell Viability

Mouse lung and spleen tissues were dissociated using the STEMprep™ Mouse Lung and Spleen Dissociation Kits, respectively. After the protocol run was completed, the samples were held on the STEMprep™ Tissue Dissociator for up to 24 hours at 4°C, 22°C, and 37°C. Viability of total nucleated (A) lung and (B) spleen cells. Data are presented as mean ± SD (n = 3).

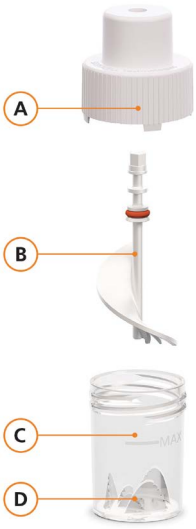
STEMprep™ Sample Tubes

Purposeful and Standardized by Design

Designed specifically for use with the STEMprep™ Tissue Dissociator and associated tissue dissociation kits, STEMprep™ Sample Tubes help users reduce variability and save time, enabling standardized dissociation of a wide range of tissue types.

Each tube features an integrated rotor and blade system that is activated by the instrument to dissociate tissue samples. The design ensures consistent, high-quality results across experiments—making it ideal for downstream applications like single-cell analysis or cell-based assays.

STEMprep™ Sample Tubes are ready to use right out of the package. Simply add your sample and reagents, secure the lid, and load the tube into the instrument to begin your dissociation protocol. The single-use design minimizes contamination risk, while the robust construction ensures functionality at the instrument's maximum operating speed and revolutions.



A. Lid
B. Rotor
C. Reservoir
D. Blades

Product

STEMprep™ Sample Tubes
www.stemcell.com/STEMprep-sample-tubes

STEMprep™ Tissue Dissociation Kits

Tissue-Specific Enzyme Cocktails Optimized for Consistency and Viability

Enjoy the ease of preparing single-cell suspensions from mouse tissues with STEMprep™ Tissue Dissociation Kits. Each kit is precisely formulated for a specific tissue type—brain, liver, lung, spleen, or tumor—and optimized for use with STEMprep™ Sample Tubes and the STEMprep™ Tissue Dissociator. The gentle and efficient dissociation maintains high cell viability while preserving surface marker expression, reducing user variability, and minimizing hands-on-time. Cell suspensions are ready for downstream workflows such as cell separation, cell culture, flow cytometry, and genetic or proteomic studies.

The following data highlight consistent high yields, cell viability, and subset retention across various mouse tissues dissociated using the STEMprep™ Tissue Dissociation Kits and the STEMprep™ Tissue Dissociator.

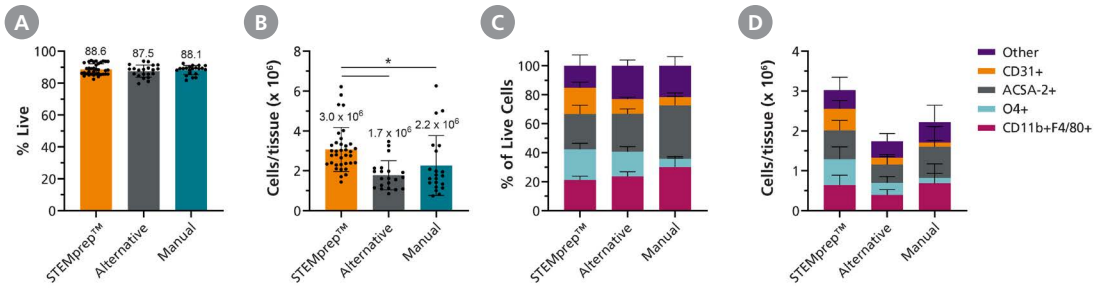


Figure 5. STEMprep™ Mouse Brain Dissociation Kit Achieves High Cell Viability and Yield

Mouse brains were processed into single-cell suspensions using the STEMprep™ Mouse Brain Dissociation Kit and the STEMprep™ Tissue Dissociator, an alternative automated system, or a manual dissociation method. (A) Viability of nucleated cells. (B) Yield of viable cells per whole brain tissue (325 - 395 mg). (C and D) Proportion and yield of CD45+ immune and CD45- non-immune cells, including CD11b+F4/80+ microglia, O4+ oligodendrocytes, ACSA-2+ astrocytes, and CD31+ endothelial cells. Viability, yield, and subset composition were assessed by flow cytometry. Brain samples were processed with protocol-specific density gradient media to remove myelin and cell debris. Red blood cells were lysed with ammonium chloride solution prior to subset analysis. Data are presented as mean ± SD (n = 21 - 36), * $p < 0.05$, one-way ANOVA with Tukey's multiple comparisons test.

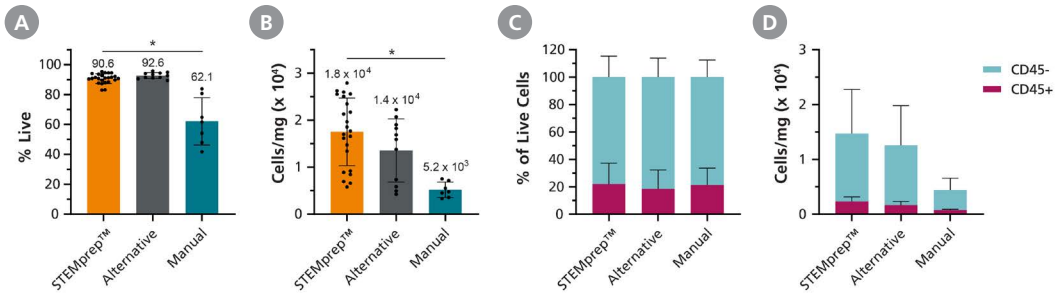


Figure 6. STEMprep™ Mouse Tumor Dissociation Kit Achieves High Cell Viability and Yield

Mouse B16 tumors were processed into single-cell suspensions using the STEMprep™ Mouse Tumor Dissociation Kit and the STEMprep™ Tissue Dissociator, an alternative automated system, or a manual dissociation method. (A) Viability of nucleated cells. (B) Yield of viable cells per mg of tumor tissue. (C and D) Proportion and yield of CD45+ immune and CD45- non-immune cells. Viability, yield, and subset composition were assessed by flow cytometry. Red blood cells were lysed with ammonium chloride solution before analysis. Data are presented as mean ± SD (n = 7 - 24); * $p < 0.05$, one-way ANOVA with Tukey's multiple comparisons test.

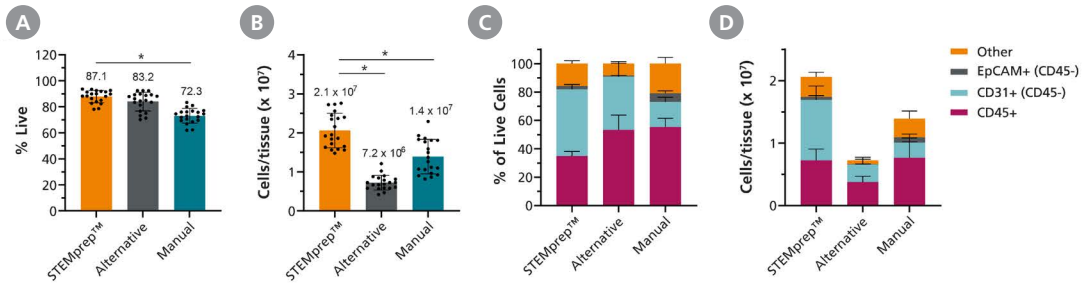


Figure 7. STEMprep™ Mouse Lung Dissociation Kit Achieves High Cell Viability and Yield

Mouse lungs were processed into single-cell suspensions using the STEMprep™ Mouse Lung Dissociation Kit and the STEMprep™ Tissue Dissociator, an alternative automated system, or a manual dissociation method. (A) Viability of total nucleated cells. (B) Yield of viable cells per whole lung tissue (251 - 495 mg). (C and D) Proportion and yield of CD45+ immune, CD31+ endothelial cells, and EpCAM+ epithelial cells. Viability, yield, and subset composition were assessed by flow cytometry. Red blood cells were lysed with ammonium chloride solution before analysis. Data are presented as mean ± SD (n = 20), * $p < 0.05$, one-way ANOVA with Tukey's multiple comparisons test.

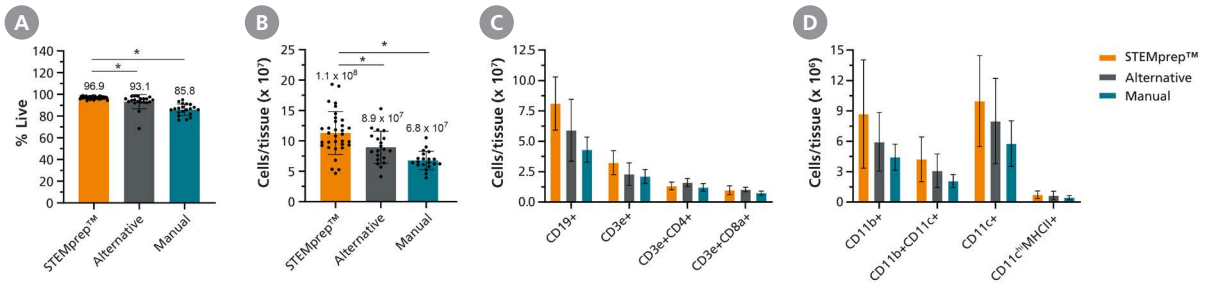


Figure 8. STEMprep™ Mouse Spleen Dissociation Kit Achieves High Cell Viability and Yield

Mouse spleens were processed into single-cell suspensions using the STEMprep™ Mouse Spleen Dissociation Kit and the STEMprep™ Tissue Dissociator, an alternative automated system, or manually using Spleen Dissociation Medium (#07915). (A) Viability of total nucleated cells. (B) Yield of viable cells per whole spleen tissue (63 - 152 mg). (C and D) Yield of spleen myeloid and lymphoid subsets. Viability, yield, and subset composition were assessed by flow cytometry. Red blood cells were lysed with ammonium chloride solution before analysis. Data are presented as mean ± SD (n = 17 - 26). * $p < 0.05$, one-way ANOVA with Tukey's multiple comparisons test.

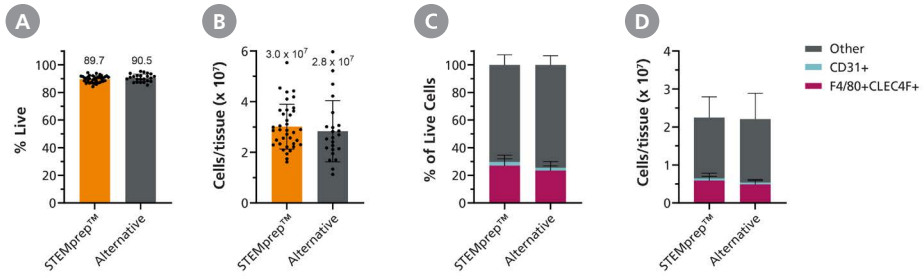


Figure 9. STEMprep™ Mouse Liver Dissociation Kit Achieves High Cell Viability and Consistent Yield

Mouse livers were processed into single-cell suspensions using the STEMprep™ Mouse Liver Dissociation Kit and the STEMprep™ Tissue Dissociator or an alternative automated system. (A) Viability of total nucleated cells. (B) Yield of viable cells per whole liver tissue (900 - 2000 mg). (C and D) Proportion and yield of F4/80+CLEC4F+ Kupffer cells, and CD31+ liver sinusoidal endothelial cells. Viability, yield, and subset composition were assessed by flow cytometry. Red blood cells were lysed with ammonium chloride solution before subset analysis. Data are presented as mean ± SD (n = 15 - 37).

Product

STEMprep™ Tissue Dissociation Kits

www.stemcell.com/STEMprep-tissue-dissociation-kits

Downstream Applications

Seamless Integration with EasySep™ and ImmunoCult™

The STEMprep™ Tissue Dissociator system works seamlessly with downstream tools that researchers rely on, such as for immune profiling, functional assays, and cell culture. After dissociation, cells are ready for immediate use with EasySep™, STEMCELL's fast and column-free immunomagnetic cell separation system, and ImmunoCult™, a suite of reagents for efficient cell activation, expansion, and differentiation.

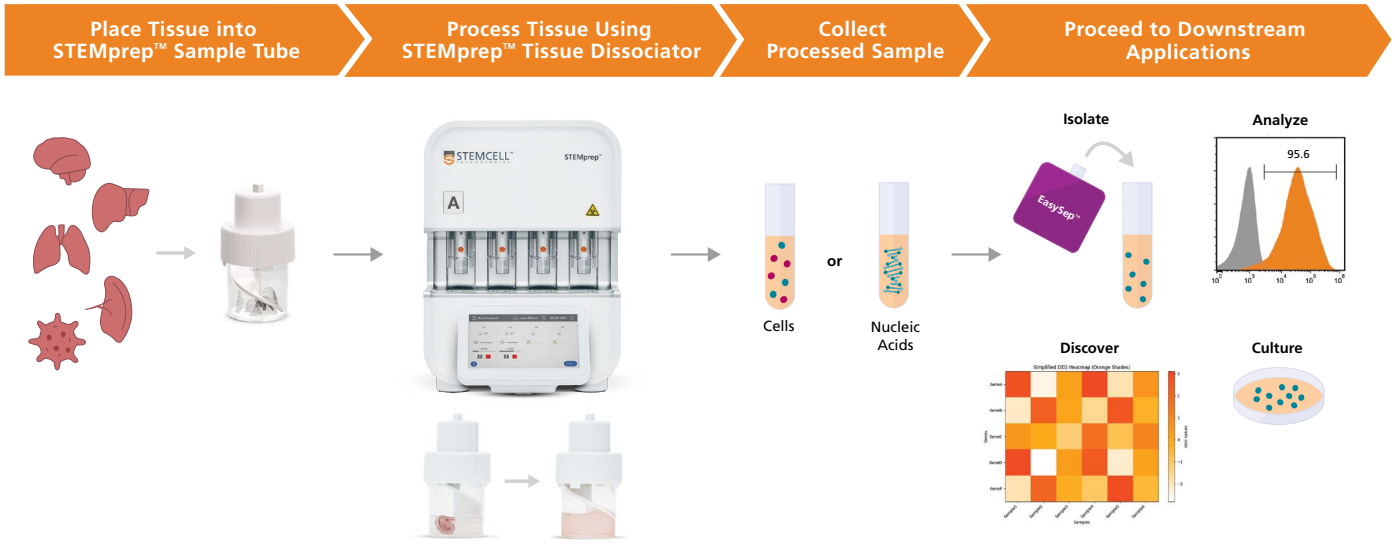


Figure 10. STEMprep™ Tissue Dissociation Workflow

The STEMprep™ Tissue Dissociator enables efficient processing of various tissue types, including mouse brain, liver, lung, spleen, and tumors. In this workflow, a tissue is placed into the STEMprep™ sample tube and processed using the STEMprep™ Tissue Dissociator. Depending on the selected protocol—dissociation or homogenization—the resulting output is either a single-cell suspension or a sample suitable for nucleic acid isolation. The processed sample can then be used for various downstream applications, such as cell isolation, activation, culture, and analysis.

Why Use EasySep™ to Isolate Cells?

EASY & EFFICIENT. Isolate cells in as little as 8 minutes with a simple pour.

HIGH PURITY & RECOVERY. Achieve up to 99% cell purities with high recoveries.

COLUMN-FREE. Obtain viable, functional cells without the need for columns and washes.

VERSATILE. Isolate cells from virtually any sample source, including whole blood and leukopaks.

PROVEN. Widely used in published research for over 20 years, supporting diverse downstream applications.

Why Use ImmunoCult™?

OPTIMIZED. Activate, expand, or differentiate immune cells in culture conditions optimized to promote high yield and frequency.

CONSISTENT. Minimize variation by using serum-free and animal component-free culture conditions.

RELIABLE. Consistently achieve high yields of immune cells with the desired phenotype and function.

FLEXIBLE. Mix and match media, activators, and supplements to suit your specific research needs.

The gentle, tissue-specific enzymes and protocols of STEMprep™ preserve cell surface epitopes and cell functionality, ensuring compatibility with both positive and negative selection workflows, and enabling high-performance expansion, stimulation, and analysis in culture.

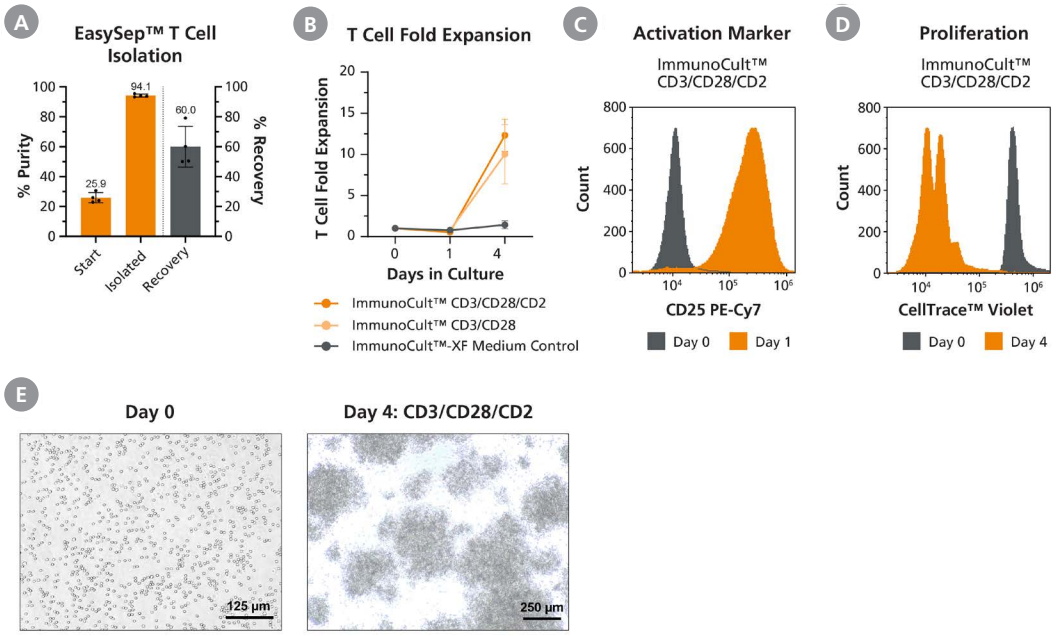


Figure 11. STEMprep™-Processed Mouse Splenic T Cells Proliferate upon Activation

Mouse spleens were processed into single-cell suspensions using the STEMprep™ Mouse Spleen Dissociation Kit and the STEMprep™ Tissue Dissociator. (A) Splenic T cells were then isolated using EasySep™ Mouse T Cell Isolation Kit. T cells were seeded at 2 x 10^5 cells in 200 µL of ImmunoCult™-XF T cell Expansion Medium and activated with ImmunoCult™ Mouse T Cell Activators in the presence of IL-2 (50 U/mL) for 4 days. (B) Fold expansion of T cells cultured in medium alone or in the presence of ImmunoCult™ activators CD3/CD28 or CD3/CD28/CD2. Flow cytometry analysis of T cells showing (C) the expression of T cell activation marker CD25 on Day 0 and Day 1 after activation and (D) the proliferation of CellTrace™ Violet-labeled T cells on Day 0 and Day 4 of activation. (E) Representative light microscopy images of T cell cultures on Days 0 and 4 after activation. Data are presented as mean ± SD (n = 4).

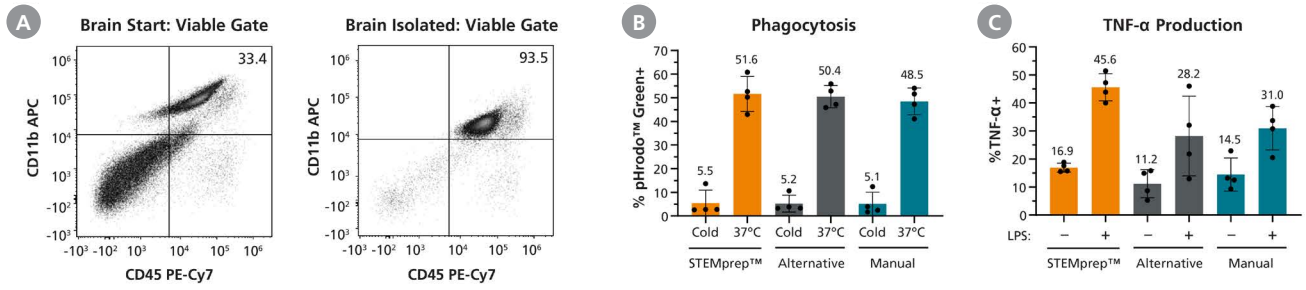


Figure 12. STEMprep™-Processed Mouse Brain Microglia Are Phagocytic and Produce Cytokines upon Activation

Mouse brains were processed into single-cell suspensions using STEMprep™ Mouse Brain Dissociation Kit and the STEMprep™ Tissue Dissociator, an alternative automated system, or a manual dissociation method. (A) Brain CD11b+ microglia were isolated from the single-cell suspensions using EasySep™ Mouse CD11b+ Positive Selection Kit II. (B) The isolated CD11b+ cells were incubated for 2 hours in the presence of pHrodo™ Green-conjugated E. coli BioParticles™ at 2 - 8°C (Cold) or 37°C. The fluorescence of phagocytosed BioParticles™ was measured by flow cytometry. (C) Intracellular flow cytometry staining of TNF-α production by brain CD11b+ microglia cultured overnight in the presence of 3 µg/mL Brefeldin A and treated with (+) or without (-) 100 ng/mL of lipopolysaccharides (LPS). Data are presented as mean ± SD (n = 4).

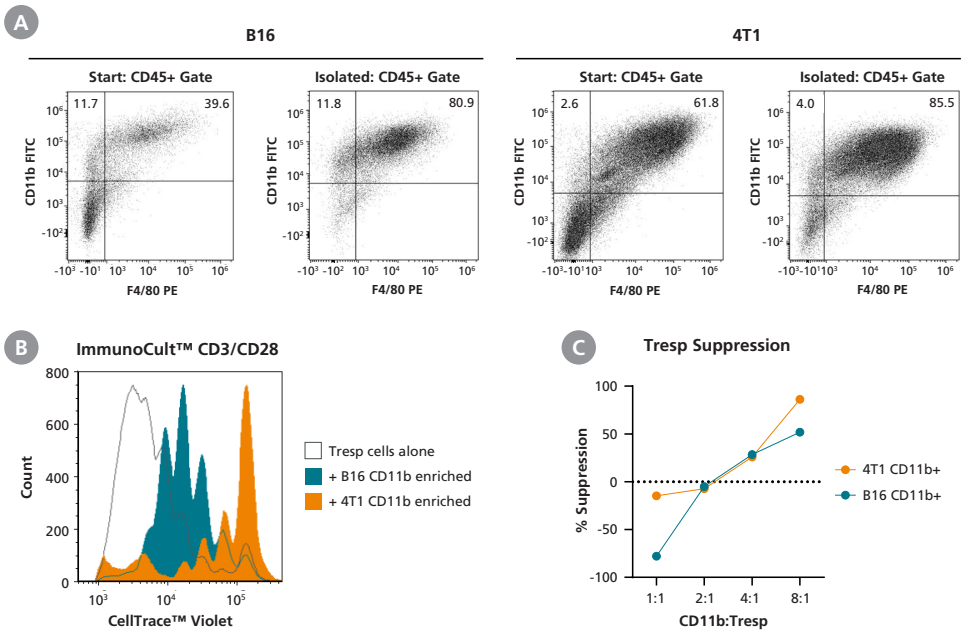


Figure 13. Intratumoral CD11b+ Cells Retain Immunosuppressive Function Downstream of STEMprep™ and EasySep™ Enrichment

Mouse 4T1 and B16 tumors were dissociated into single-cell suspensions using the STEMprep™ Mouse Tumor Dissociation Kit and the STEMprep™ Tissue Dissociator, followed by enrichment of CD11b+ cells. Splenic CD3+ T responder (Tresp) cells were labeled with CellTrace™ Violet, activated with the ImmunoCult™ Mouse CD3/CD28 T Cell Activator and cultured either alone or with CD11b-enriched cells at increasing CD11b:Tresp cell ratios at 37°C for 4 days. (A) Purity of CD11b+ cells before and after enrichment with the EasySep™ Mouse CD11b Positive Selection Kit II. (B) Representative histograms of Tresp proliferation in the presence or absence of CD11b enriched cells. (C) Summary of Tresp suppression by CD11b enriched cells from 4T1 and B16 tumors. Data are presented as the mean of 2 independent experiments.

Technical Bulletin

Achieve High Epitope Preservation Using STEMprep™

www.stemcell.com/STEMprep-epitope-preservation

Homogenization and Nucleic Acid Applications

Simplify RNA Preparation with Temperature-Controlled Homogenization

Prepare high-quality RNA from tissue samples using the STEMprep™ Tissue Dissociation System. It supports direct tissue homogenization, enabling efficient and standardized lysis for nucleic acid extraction. When paired with the EasySep™ Total Nucleic Acid Extraction Kit, you can process mouse brain, lung, and liver tissues in a consistent, hands-off workflow without relying on manual homogenization steps.

STEMprep™ also features a 4°C hold function, allowing samples to remain at cold temperatures throughout the homogenization process. This helps preserve RNA integrity, especially in temperature-sensitive samples, and makes it easier to integrate with staggered or high-throughput workflows.

The data below demonstrate that STEMprep™ enables efficient tissue homogenization while preserving RNA yield and quality, comparable to other automated methods but without additional equipment or manual steps.

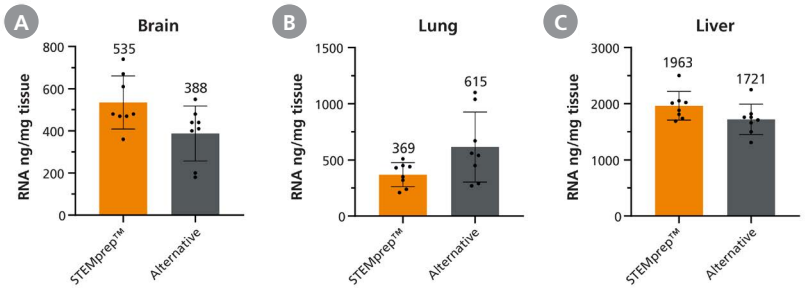


Figure 14. RNA Yields from Tissues Homogenized Using the STEMprep™ Tissue Dissociator Are Comparable to Other Automated Homogenization Methods.

Mouse (A) brain, (B) lung, or (C) liver tissues were homogenized using the STEMprep™ Tissue Dissociator or an alternative automated system. RNA was subsequently extracted using the EasySep™ Total Nucleic Acid Extraction Kit (with DNase I treatment). The yield of RNA per mg of tissue was assessed using the Qubit Flex Instrument and Qubit RNA Broad Range Assay kit. Data are presented as mean ± SD (n = 8).

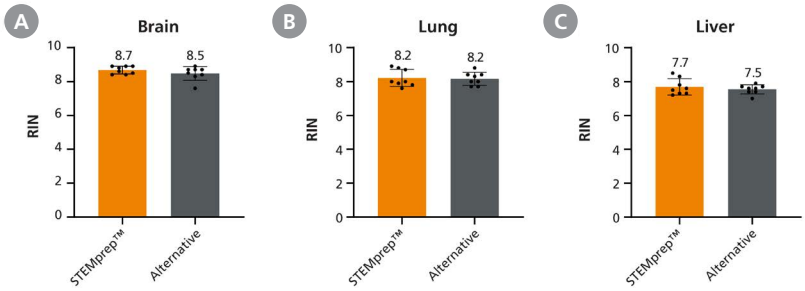


Figure 15. STEMprep™ Direct Tissue Homogenization Yields High-Quality RNA

RNA integrity number (RIN) of RNA extracted from mouse (A) brain, (B) lung, or (C) liver tissues. Tissues were homogenized using the STEMprep™ Tissue Dissociator or an alternative automated system. RNA was subsequently extracted from the resulting homogenates by EasySep™ Total Nucleic Acid Extraction Kit (with DNase I treatment). The quality of the extracted RNA was assessed using the 2100 Bioanalyzer Instrument and Agilent RNA 6000 Nano Kit. Data are presented as mean ± SD (n = 8).

Product Ordering Information

STEMprep™ Tissue Dissociator System

Instrument

Product	Catalog #
STEMprep™ Tissue Dissociator 4-Sample System	100-2112
STEMprep™ Tissue Dissociator 8-Sample System	100-2114
STEMprep™ Tissue Dissociator 12-Sample System	100-2115
STEMprep™ Tissue Dissociator Expansion Unit	100-2113

Kits

Product	Catalog #
STEMprep™ Mouse Brain Dissociation Kit	100-2130
STEMprep™ Mouse Lung Dissociation Kit	100-2135
STEMprep™ Mouse Liver Dissociation Kit	100-2136
STEMprep™ Mouse Tumor Dissociation Kit	100-2137
STEMprep™ Mouse Spleen Dissociation Kit	100-2138

Consumables

Product	Catalog #
STEMprep™ Sample Tubes	200-0800

Service Packages

Product	Catalog #
1-Year Warranty	500-0622
Preventative Maintenance (PM) Visit (for an Instrument without a Warranty)	500-0623
Additional PM Visit (for an Instrument on an active Warranty)	500-0624
Installation Qualification, Operation Qualification, and Instrument Performance Verification (IQ/OQ/IPV)	500-0625
1-Year Warranty + PM Visit	500-0626

Specialized Cell Culture Media

ImmunoCult™ Products

Product	Catalog #	Size
ImmunoCult™-XF T Cell Expansion Medium	10981	500 mL
ImmunoCult™ Mouse T Cell Activator Kit	100-1572	1 kit
ImmunoCult™ Mouse Th1 Differentiation Supplement	10953	1 mL
ImmunoCult™ Mouse Th2 Differentiation Supplement	10955	1 mL
ImmunoCult™ Mouse Treg Differentiation Supplement	10957	1 mL
ImmunoCult™ Mouse B Cell Expansion Kit	100-1003	1 kit

Cell Isolation Magnets & Accessories

EasySep™ Products

Product	Catalog #
EasySep™ Magnet	18000
"The Big Easy" EasySep™ Magnet	18001
Easy 50 EasySep™ Magnet	18002
EasyEights™ EasySep™ Magnet	18103
EasyPlate™ EasySep™ Magnet	18102
EasySep™ Buffer	20144
EasySep™ Total Nucleic Acid Extraction Kit	100-1079

Cell Isolation Kits

Cell Type	Source	Product	Purity[1]	For Processing	Compatible Staining Antibodies	Catalog #
Macrophages	Lung	EasySep™ Mouse F4/80 Positive Selection Kit	94.3 ± 2.8%	7.5 x 10^8 cells	F4/80 (Catalog #60027)	100-0659
	Spleen		88.8 ± 3.4%	2 x 10^9 cells	CD11b (Catalog #100-0433)	
	Peritoneal Lavage		97.0 ± 0.4%	6 x 10^8 cells	CD45 (Catalog #60030)	
CD11b+ Cells	Spleen	EasySep™ Mouse CD11b Positive Selection Kit II	91.5 ± 4.3%	2 x 10^9 cells	CD11b (Catalog #60001)	18970 18970RF
	Bone Marrow		99.7 ± 0.3%			
	Lung		95.5 ± 1.3%			
	Brain		94.2 ± 4.0%	7 x 10^8 cells		
T Cells	Spleen	EasySep™ Mouse T Cell Isolation Kit	96.6 ± 2.0%	1 x 10^9 cells	CD3e (Catalog #60015)	19851 19851RF
CD4+ T Cells	Spleen	EasySep™ Mouse CD4+ T Cell Isolation Kit	95.4 ± 3%	1 x 10^9 cells	CD3e (Catalog #60015) CD4 (Catalog #60017)	19852 19852RF
Monocytes	Whole Blood, Bone Marrow	EasySep™ Mouse Monocyte Isolation Kit	89.5 ± 4.8%	1 x 10^9 cells	CD11b (Catalog #100-0433) Ly-6C (Catalog #100-1638)	19861 19861RF
CD45+ Cells	Lymphoid Organs or Non-Hematopoietic Tissue	EasySep™ Mouse CD45 Positive Selection Kit	97.1 ± 1.2%	2 x 10^9 cells	CD45.1 (Catalog #60117) CD45.2 (Catalog #60118)	18945
Tumor-Infiltrating Leukocytes	Single-Cell Suspensions of Solid Tumors	EasySep™ Mouse TIL (CD45) Positive Selection Kit	84.6 - 95.2%	1 x 10^9 cells	CD45 (Catalog #60030) CD45.1 (Catalog #60117) CD45.2 (Catalog #60118)	100-0350

[1]*Purities shown as either a range or mean ± SD*

Additional Tools

Plasticware

38010	Catalog #
Falcon® Conical Tubes (50 mL)	38010
Falcon® Conical Tubes (15 mL)	38009
Reversible Strainer (70 µm, large)	27260
Culture Dish, Non-Treated	38045
D-PBS (Without Ca++ and Mg++)	37350
Plastic Rack for Centrifuge Tubes	200-0651

Other Reagents

Product	Catalog #
OptiPrep™ (50 mL)	07820
Ammonium Chloride Solution	07850

Enzymes for Tissue Dissociation

Product	Catalog #	Unit Size
Collagenase Type I	07902	5 mL
Collagenase Type IV	07909	100 mL
Collagenase/Hyaluronidase (10X)	07912	10 mL
Dispase (1 mg/mL)	07923	100 mL
Dispase (5 U/mL)	07913	100 mL
DNase I (1 mg/mL)	07900	1 mL

ELEVATE TISSUE DISSOCIATION

Automate and Standardize with STEMprep™

STEMCELL™ TECHNOLOGIES

TOLL FREE PHONE 1 800 667 0322
PHONE +1 604 877 0713
INFO@STEMCELL.COM
TECHSUPPORT@STEMCELL.COM
FOR GLOBAL CONTACT DETAILS VISIT WWW.STEMCELL.COM

DOCUMENT #27276 VERSION 1.2.0 NOVEMBER 2025