

# Assisted Reproductive Technologies Product Catalog



IrvineScientific®

# Irvine Scientific

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# Irvine Scientific Profile

## Introduction

### INTRODUCTION TO IRVINE SCIENTIFIC

Irvine Scientific was established in May 1970 to produce serum products for the cell culture market. From those beginnings, Irvine Scientific emerged and grew to become a respected innovator of cell culture products. Over the years, Irvine Scientific has evolved its products, services, and operations to become multi-disciplined, international in scope and subject matter experts in the area of cell culture media.

In 1987, Japan Energy (JE, a member of Nippon Mining Holdings), acquired Irvine Scientific. With the steady backing of JE (now a member of JX Holdings) Irvine Scientific became a leader in the expanding IVF and biopharmaceutical fields. JE has provided the strength to acquire products like Hana Biologicals, expand operations in California, Europe, and most recently build additional manufacturing capabilities in Japan. The second manufacturing site provides complete redundancy of commercial phase products, which reduces risks of product supply interruption and expertly positions us to serve the emerging markets in Asia.

Today, our diversified products and services benefit both life science and medical customers. Irvine Scientific is proud of its past as an innovator of products that positively touch so many lives. Whether it is developing the highest quality embryo culture media to assist IVF procedures, to supplying high quality media for diagnostics and research, to customizing media for biopharmaceutical production, providing the highest customer satisfaction is our primary goal. We plan to build on this proud history and continue innovating to meet our customer needs

### QUALITY POLICY

Irvine Scientific strives to be the top performer for our clients across all business units and build relationships of trust with our customers.

We establish, review and communicate our Quality Objectives throughout our organization, to assure understanding, continuing suitability and to maintain the effectiveness of the Quality Management Systems.

Our quality management system is committed to comply with the requirements applicable to the markets we serve.

### MISSION

Irvine Scientific's mission is to set the standard for EXCELLENCE through:

- Quality Products for the Cell Culture, Diagnostics, and Biopharmaceutical Markets
- Quality Service with respect, courtesy and loyalty to our customers
- Quality People dedicated to complete customer satisfaction
- Customer satisfaction is not our goal...it is our policy!



### IRVINE SCIENTIFIC CORPORATE CULTURE MISSION

In keeping with our commitment to quality, we expect every team member to demonstrate integrity and accountability to one's self, our colleagues and the business of Irvine Scientific

We are committed to mutual respect, honesty and leadership by example. Irvine Scientific requires a strong work ethic and open communication at every level.

**Integrity:** Doing the right thing, in the right way for the right reasons without compromise.

**Accountability:** Owning your responsibilities, actions, and the results of your actions, whether good or bad, as individuals and collectively as team members.

**Mutual Respect:** Showing consideration for one another and appreciation of each other's contributions to the company.

**Honesty:** Being truthful.

**Leadership by Example:** Ensuring that the expectations you have of others is reflected in your own actions.

**Work Ethic:** Being self-motivated to commit one's full effort each workday. Work as though you own part of the company!

**Open Communication:** Speaking candidly, expressing true opinions and listening effectively throughout all levels of the organization.

## QUALITY SYSTEMS

We take pride in the fact that our quality systems are second to none by offering:

- Outstanding validations programs
- Strong technical support for customers
- Documentation and traceability for all manufactured lots
- Unsurpassed regulatory strength
- Consistently expedient response to customers
- Excellent track record for audits and inspections
- Corporate culture focus on values and customers

## ISO 13485 CERTIFICATION

Irvine Scientific has received Certification to the ISO 13485 International Quality Standard. The Certification was achieved after completing an assessment of the quality management system against the comprehensive requirements of the world-class standard to the manufacture of medical devices. This certification illustrates the commitment of Irvine Scientific to providing quality products to the industrial, research, and laboratory biomedical communities worldwide.

## FDA CLEARANCE

Where required, our products have been cleared by the FDA in compliance to 510Ks. Drug Master Files (DMF) for our key products have been filed with the FDA to further assist the regulatory needs of our customers.

## CE MARKING

Where required our products meet European requirements for CE Marking.



## MANUFACTURING

**Liquid Media.** Approved filtration and filling protocols include testing for both filter integrity and product quality. Media is filtered through 0.1 micron filters to achieve a Sterility Assurance Level (SAL) of  $10^{-3}$ . Aseptic filling and capping are performed within a Class 100 environment. Product is labeled and immediately sent to storage. Finished product testing is performed on media in accordance with written Standard Operating Procedures and Finished Product Specifications as a requirement for final release.

**Powdered Cell Culture Media and Balanced Salts** are prepared in accordance with the original formula for liquid when feasible. Anhydrous salts are substituted on an equimolar basis. Powder is packed in screw capped containers and should be stored dry according to product labeling. Small aliquots may be removed for use if appropriate concern for moisture is exercised. Powdered media is checked for particle size uniformity and complete solubility. Irvine Scientific uses procedures to achieve thorough distribution of trace compounds in powdered media.

**Chemicals** used in Irvine Scientific media products conform to at least ACS, USP, NF and other International Pharmacopeia standards where available. Certificates are obtained from vendors. Samples of components are tested at a minimal for endotoxin, identity (by Fourier Transform Infrared Spectroscopy), efficacy and toxicity as appropriate.

**Human Source Raw Materials** used in the manufacturing of Irvine Scientific reproductive media are therapeutic grade. All human source material has been tested at the donor level with FDA licensed kits, and found to be nonreactive for the antibodies to Hepatitis B Surface Antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus (HIV 1&2). Source material is also screened by questionnaire at the donor level for risk factors associated with Creutzfeldt-Jakob Disease (CJD).

**Water.** The water system is routinely monitored for microbial levels, endotoxin, conductivity, and TOC (total organic carbon). Finished product water meets USP test requirements for "Water for Injection".

## QUALITY CONTROL

**Sterility Testing** of all media is performed in accordance with the Code of Federal Regulations (CFR) Title 21, Part 610.12 or current USP <71>. Statistical samples are filtered through 0.45 micron membranes. The membranes are incubated at 30°-35°C in Fluid Thioglycollate and at 20°-25°C in Soybean-Casein Digest media and observed regularly for 14 days.

**Mouse Embryo Testing** is performed on media when determined as an appropriate biological test. The test utilizes fresh, one cell mouse embryos. Test results indicate the percentage of mouse embryos developing to fully expanded blastocysts after 96 hours in culture. Other biocompatibility testing (such as sperm survival, sperm motility recovery, or blastocyst recovery assay) is routinely performed on products where appropriate.

# Quality Systems

**Endotoxin** is measured using the LAL gel clot or kinetic chromogenic methodology on all Media and is performed in accordance with current USP <85>. Products containing protein are heat treated in boiling water for 2 minutes to denature the enzymes that interfere with the enzyme cascade reaction for endotoxin detection.

**pH** is measured at a 1X concentration in accordance with finished product specifications. The user is reminded that a medium in free exchange with CO<sub>2</sub> in an incubator may establish a final equilibrated pH that is different from the initial manufactured pH. The user should always check equilibrated aliquots of the final media with a pre-calibrated pH meter rather than relying on visual estimation alone, which can be deceptive.

**Osmolality** testing is performed either by the freezing point or vapor pressure methodology. Testing is performed on precalibrated instrumentation using specific Standard Operating Procedures to ensure accuracy and consistency.

**Certificates of Analysis (CofA)** are provided with each shipment, and test results are reported on a lot-specific basis.

# General Information

## Domestic and International Ordering

### United States Headquarters

Phone 1 (800) 437-5706  
1 (949) 261-7800  
Fax 1 (949) 261-6522  
E-mail [tmrequest@irvinesci.com](mailto:tmrequest@irvinesci.com)  
Website [www.irvinesci.com](http://www.irvinesci.com)

### European Headquarters

Phone 353 1 281-99-20  
Fax 353 1 281-99-28  
E-mail [IrelandOffice@irvinesci.com](mailto:IrelandOffice@irvinesci.com)

### PRICING AND TERMS

Irvine Scientific reserves the right to change prices without notice. Any price reduction will automatically apply to your invoice. Invoices are due in net 30 days in U.S. dollars. A finance charge of 1.5 percent per month (annual percentage rate of 18 percent) will be charged to past due accounts.

### LOT RESERVATION POLICY

Samples will be provided at no charge for the purpose of testing a particular lot. Reserved lots will be held for three weeks from the date the sample is shipped. Upon completion of your testing, a purchase order for the amount reserved is required to secure product. The reserve will be automatically cancelled at the end of the three weeks unless otherwise notified.

### CREDIT CARD ORDERS

For your convenience Irvine Scientific accepts VISA®, MasterCard® and American Express® as payment for your order. Please provide your credit card account number and expiration date when you place your order.

### PERISHABLE PRODUCT PACKAGING

Perishable products will be packed as appropriate in insulated cartons for safe arrival. A packaging charge will be added as a separate item on our invoice when products require dry ice or cold packaging. We will not accept responsibility for shipments packaged contrary to our procedures at the customer's request.



# General Information

## Shipping

### SHIPPING

Items ordered are shipped within 48 hours of receipt of the order. Partial shipments may be made when complete orders cannot be shipped. If partial shipments are not acceptable, indication should be made at the time the order is placed.

Orders are shipped via best way unless otherwise specified. Irvine Scientific routinely ships via FedEx.

Shipments are FOB origin, freight prepaid. Title to the items sold passes to the purchaser upon delivery of the items to the carrier.

### SHORTAGES AND DAMAGES

If a shortage occurs in any shipment received from Irvine Scientific, please notify our Customer Service Department within three business days for a credit or replacement product. Otherwise, the order will be considered complete.

Irvine Scientific provides assistance with filing claims for loss or damaged product. Please keep all packing materials and containers for inspection by the carrier.

### CANCELLATIONS

Cancellation of custom prepared products will not be accepted after manufacturing has begun.

### RETURNS

A Return Goods Authorization number and shipping instructions must be obtained from our Customer Service Department prior to returning any product. All product must be returned in good condition and is subject to a handling and restocking charge of 20 percent plus freight. No product may be returned after 30 days.

Where spoilage occurs in transit, please advise Customer Service and request instructions immediately upon receipt of the shipment. Credit will not be issued on any items that are returned without prior authorization.

### CONDITIONS

Unless otherwise indicated, the products listed herein are for purposes described only. They are not to be used for administration to humans or for drug purposes. Nothing disclosed herein is to be construed as a recommendation to use products in violation of any patents. The information presented is believed to be accurate. However, said information and products are offered without warranty or guarantee since the ultimate conditions of use and the variability of the materials treated are beyond our control. We cannot be responsible for patent infringements or other violations that may occur with the use of these products.

The information presented in this catalog concerning product specifications, descriptions, price, returns, and conditions is effective January 2008 and supersedes all previous publications.

### INTENDED USE

Unless otherwise indicated, the products listed herein are for assisted reproductive technology or research use only. Not for drug use. Consult labeling.

# General Information

## Shipping

### REDUCE • RE-USE • RECYCLE

Irvine Scientific is concerned with the environmental impact of our packaging materials and we encourage our customers to dispose of these materials responsibly. Effective re-use and recycling of these components depends on you. Please use the following guidelines to help us protect our environment for future generations:

| Packaging Material                 | Re-use   | Recycle  |
|------------------------------------|--|--|
| Glass-Type 1 Borosilicate          | Not recommended for re-use   | Not currently recyclable   |
| Plastic-PETG<br>Plastic-PET        | Not recommended for re-use   | Disinfected bottles can be recycled with consumer PET (soda bottles)<br>Incineration (results in CO <sub>2</sub> + H <sub>2</sub> O) |
| Plastic-HDPE                       | Not recommended for re-use   | Disinfected bottles can be recycled with consumer HDPE   |
| Bubble wrap-PE                     | Re-use as packaging material   | Contact Recycle Hot Line 800/944-8448 for the nearest collection site  |
| Polystyrene Foam (EPS)<br>CFC Free | Deliver to commercial packaging outlets (i.e. Mail Boxes, Etc.) for re-use | Contact Recycle Hot Line 800/944-8448 for the nearest collection site  |



# General Information

## Shipping

### Irvine Scientific's Global Presence

ARGENTINA AUSTRALIA AUSTRIA BAHRAIN BANGLADESH BELGIUM BOLIVIA BRAZIL  
CANADA CHILE CHINA COLOMBIA COSTA RICA CYPRUS CZECH REPUBLIC DENMARK  
DOMINICAN REPUBLIC ECUADOR EGYPT ESTONIA FINLAND FRANCE GERMANY  
GREECE GUAM GUATEMALA GUYANA HONDURAS HONG KONG HUNGARY ICELAND  
INDIA INDONESIA IRELAND ISRAEL ITALY JAMAICA JAPAN JORDAN KOREA KUWAIT  
LATVIA LEBANON LIBYA LITHUANIA LUXEMBOURG MALAYSIA MEXICO NETHERLANDS  
NEW ZEALAND NIGERIA NORWAY PANAMA PARAGUAY PERU PHILIPPINES POLAND  
PORTUGAL PUERTO RICO RUSSIA SAUDI ARABIA SINGAPORE SOUTH AFRICA SPAIN  
SWEDEN SWITZERLAND TAIWAN THAILAND TURKEY U.A.E. UKRAINE UNITED KINGDOM  
UNITED STATES URUGUAY VENEZUELA

**For the local distributor of Irvine Scientific products in your country,**  
please contact our USA Customer Service Department or visit our website: [www.irvinesci.com](http://www.irvinesci.com)  
Phone: 001-949-261-7800  
Fax: 001-949-261-6522



# Gamete, Fertilization and Embryo Culture Media

## GAMETE, FERTILIZATION EMBRYO CULTURE MEDIA

Culture media for use in human assisted reproductive procedures which include sperm processing, oocyte retrieval, fertilization, embryo culture to Day 3 or Day 5-6 and embryo transfer.

## HUMAN TUBAL FLUID MEDIA (HTF)

A synthetic, defined solution for use as a culture medium through Day 3 of human embryo development as well as the processing of gametes.

| Catalog Number | Description   | Size             |
|----------------|---|------------------|
| 90125          | HTF MEDIUM WITH GENTAMICIN<br>liquid medium<br>requires CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with sodium bicarbonate<br>without protein<br>manufactured every two weeks<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 64 Days from Date of Manufacture | 100 mL<br>500 mL |

## MODIFIED HUMAN TUBAL FLUID MEDIA (mHTF) AND PBS 1X - DULBECCO'S PHOSPHATE BUFFERED SALINE SOLUTION

Synthetic, defined solutions for procedures which include the retrieval, handling and transfer of human gametes and embryos.

| Catalog Number | Description  | Size             |
|----------------|--|------------------|
| 90163          | MULTIPURPOSE HANDLING MEDIUM™ (MHM™)<br>Liquid Medium<br>for use without CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with 4 mM sodium bicarbonate<br>with 10.5 mM HEPES<br>with 4.5 mM Mops<br>without protein<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 6 Months from Date of Manufacture | 100 mL<br>500 mL |
| 90126          | MODIFIED HTF MEDIUM WITH GENTAMICIN - HEPES<br>liquid medium<br>for use without CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with 21 mM HEPES buffer<br>with 4 mM sodium bicarbonate<br>without protein<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 6 Months from Date of Manufacture         | 100 mL<br>500 mL |
| 9235           | PBS 1X - DULBECCO'S PHOSPHATE BUFFERED SALINE SOLUTION<br>liquid, ready-to-use<br>without sodium bicarbonate<br>without phenol red<br>mouse embryo tested<br>Store at 15-30°C<br>Shelf Life: 6 Months from Date of Manufacture   | 500 mL           |

# Gamete, Fertilization and Embryo Culture Media

## MODIFIED HAM'S F-10 BASAL MEDIA

A synthetic, defined solution for use as a culture medium through Day 3 of human embryo development as well as processing of gametes.

| Catalog Number | Description  | Size   |
|----------------|--|--------|
| 99175          | MODIFIED HAM'S F-10 BASAL MEDIUM<br>liquid, basal medium<br>with 25 mM bicarbonate<br>with phenol red<br>without hypoxanthine<br>without protein<br>without antibiotics<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 18 Months from Date of Manufacture | 100 mL |

## MODIFIED HAM'S F-10 BASAL MEDIA-HEPES

A synthetic, defined solution for use in procedures which include retrieval, handling and transfer of human gametes and embryos.

| Catalog Number | Description   | Size   |
|----------------|---|--------|
| 99168          | MODIFIED HAM'S F-10 BASAL MEDIUM - HEPES<br>liquid, basal medium<br>with 25 mM bicarbonate<br>with 20 mM HEPES buffer<br>with phenol red<br>without hypoxanthine<br>without protein<br>without antibiotics<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 18 Months from Date of Manufacture | 100 mL |

## NON-SEQUENTIAL CULTURE MEDIUM

Culture media to be used in a single step culture system for fertilization and embryo culture to the blastocyst stage of development.

### Continuous Single Culture™

A single step culture medium for human gametes and embryos used for fertilization and growth of embryos through day 5/6 of development.

| Catalog Number | Description   | Size  |
|----------------|---|-------|
| 90164          | Continuous Single Culture™<br>liquid medium for fertilization and embryo culture used in a<br>uninterrupted culture system without dish renewal<br>requires protein supplementation<br>requires CO <sub>2</sub> incubation<br>with gentamicin<br>with EDTA<br>with alanyl-glutamine<br>with glucose<br>Store at 2-8°C<br>Shelf Life: 90 Days from Date of Manufacture | 60 mL |

# Gamete, Fertilization and Embryo Culture Media

## SINGLE STEP MEDIUM™

Single Step Medium™ is intended for use as a culture medium for human gametes and embryos for fertilization and growth of embryos to day 5/6 of development.

| Catalog Number | Description  | Size  |
|----------------|--|-------|
| 90161          | SINGLE STEP MEDIUM™<br>liquid medium for culturing embryos from fertilization through day 5/6<br>requires CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with sodium bicarbonate<br>with EDTA<br>with glucose<br>with alanyl-glutamine<br>without protein<br>Store at 2-8°C<br>Shelf Life: 90 Days from Date of Manufacture | 60 mL |

## SEQUENTIAL EMBRYO CULTURE MEDIA

Media formulations designed to be used sequentially in the development of human embryos to the blastocyst stage.

### P-1® MEDIUM (PREIMPLANTATION STAGE ONE)

P-1® Medium is the industry “Gold Standard” for culture medium for human gametes during fertilization and growth of embryos through Day 3 of development. P-1® Medium is formulated from the original HTF base with the addition of the amino acid taurine, but without glucose and phosphate. P-1® Medium is intended for embryo growth from Day 0 to Day 3. Embryo transfer can be performed on Day 2 or 3, or the embryos may be cultured further to blastocyst stage utilizing the second stage of the sequential media system (MultiBlast Medium®). The formulation of P-1® Medium was developed by Dr. Thomas B. Pool (Fertility Center of San Antonio).

| Catalog Number | Description  | Size   |
|----------------|--|--------|
| 99242          | P-1® MEDIUM WITH GENTAMICIN<br>liquid medium for culturing of human embryos to Day 3<br>requires CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with sodium bicarbonate<br>with taurine<br>without protein<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 64 Days from Date of Manufacture | 100 mL |

# Gamete, Fertilization and Embryo Culture Media

## EARLY CLEAVAGE MEDIUM® (ECM®)

Early Cleavage Medium (ECM) is intended for use as a culture medium for human gametes during fertilization and growth of embryos through Day 3 of development. ECM is a modification of P-1<sup>®</sup> Medium that contains glucose, alanyl-glutamine and EDTA, components shown to benefit human embryo development. This medium is an alternative to P-1<sup>®</sup> Medium for those clinicians who prefer the presence of glucose during fertilization and early cleavage stages of embryo development.

| Catalog Number | Description   | Size  |
|----------------|---|-------|
| 90138          | EARLY CLEAVAGE MEDIUM® (ECM®)<br>liquid medium for culturing human embryos to Day 3<br>requires CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with sodium bicarbonate<br>with glucose<br>with EDTA<br>with alanyl-glutamine<br>without protein<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 90 Days from Date of Manufacture | 60 mL |

## MULTIBLAST MEDIUM®

Regardless of your starting path (P-1<sup>®</sup> or ECM®), MultiBlast Medium® is used to culture embryos from Day 3 to blastocyst stage (up to Day 6). MultiBlast Medium® is a chemically defined complex medium containing salts, energy substrates, glucose, alanyl-glutamine (as a stable source of glutamine), optimized concentrations of essential and non-essential amino acids and citric acid as an antioxidant.

| Catalog Number | Description   | Size  |
|----------------|---|-------|
| 90139          | MULTIBLAST MEDIUM®<br>liquid medium for use from Day 3 to blastocyst stage<br>requires CO <sub>2</sub> incubation<br>with 10 µg/mL gentamicin<br>with sodium bicarbonate<br>with glucose<br>with alanyl-glutamine<br>with amino acids<br>without protein<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 90 Days from Date of Manufacture | 60 mL |

# Gamete, Fertilization and Embryo Culture Media

## COMPLETE MEDIA FOR GAMETE, FERTILIZATION AND EMBRYO CULTURE

Synthetic medium formulation supplemented with Human Serum Albumin\*† (HSA™) to provide the convenience of complete, ready-to-use medium. Intended for use in human assisted reproductive procedures.

| Catalog Number | Description   | Size      |
|----------------|---|-----------|
| 90165          | CONTINUOUS SINGLE CULTURE™ COMPLETE<br>liquid medium for fertilization and embryo culture used in a uninterrupted culture system without dish renewal, ready to use, pre-supplemented with Human Serum Albumin (5% v/v) requires CO <sub>2</sub> incubation<br>with gentamicin<br>with EDTA<br>with alanyl-glutamine<br>with glucose<br>Store at 2-8°C<br>Shelf Life: 120 Days from Date of Manufacture | 2 x 20 mL |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

† Note: Not for use as an injectable product.

|      |   |               |
|------|---|---------------|
| 9922 | COMPLETE HTF MEDIUM WITH SSS™<br>HTF Medium with 10% Serum Substitute Supplement*†<br>for fertilization and culturing human gametes and embryos to Day 3 of development<br>liquid, ready-to-use<br>requires CO <sub>2</sub> incubation<br>with gentamicin<br>with sodium bicarbonate<br>with 10% SSS (v/v)<br>with phenol red<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 120 Days from Date of Manufacture | 2 x 20 mL Kit |
|------|---|---------------|

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

† Note: Not for use as an injectable product.

# Gamete, Fertilization and Embryo Culture Media

## COMPLETE MEDIA FOR GAMETE, FERTILIZATION AND EMBRYO CULTURE

Synthetic media formulations supplemented with Serum Substitute Supplement\*† (SSS™) to provide the convenience of complete, ready-to-use media. Intended for use in human assisted reproductive procedures.

| Catalog Number | Description   | Size          |
|----------------|---|---------------|
| 9926           | <p>COMPLETE P-1° MEDIUM WITH SSS™<br/>P-1° Medium with 10% Serum Substitute Supplement*†<br/>for fertilization and culturing human gametes and embryos to Day 3 of development<br/>liquid, ready-to-use<br/>requires CO<sub>2</sub> incubation<br/>with gentamicin<br/>with sodium bicarbonate<br/>with 10% SSS (v/v)<br/>with phenol red<br/>with taurine<br/>without glucose<br/>Store at 2-8°C<br/>Shelf Life: 120 Days from Date of Manufacture</p> | 2 x 20 mL Kit |
| 90140          | <p>COMPLETE EARLY CLEAVAGE MEDIUM (ECM®) WITH SSS™<br/>ECM® with 10% Serum Substitute Supplement*†<br/>for fertilization and culturing human gametes and embryos to Day 3 of development<br/>liquid, ready-to-use<br/>requires CO<sub>2</sub> incubation<br/>with gentamicin<br/>with sodium bicarbonate<br/>with 10% SSS (v/v)<br/>with phenol red<br/>mouse embryo tested<br/>Store at 2-8°C<br/>Shelf Life: 120 Days from Date of Manufacture</p>    | 2 x 20 mL Kit |
| 90141          | <p>COMPLETE MULTIBLAST MEDIUM WITH SSS™<br/>MultitBlast Medium® with 10% Serum Substitute Supplement*†<br/>for culturing embryos from Day 3 to the blastocyst stage (up to Day 6)<br/>liquid, ready-to-use<br/>requires CO<sub>2</sub> incubation<br/>with gentamicin<br/>with sodium bicarbonate<br/>with 10% SSS (v/v)<br/>with phenol red<br/>mouse embryo tested<br/>Store at 2-8°C<br/>Shelf Life: 120 Days from Date of Manufacture</p>           | 2 x 20 mL Kit |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

† Note: Not for use as an injectable product.

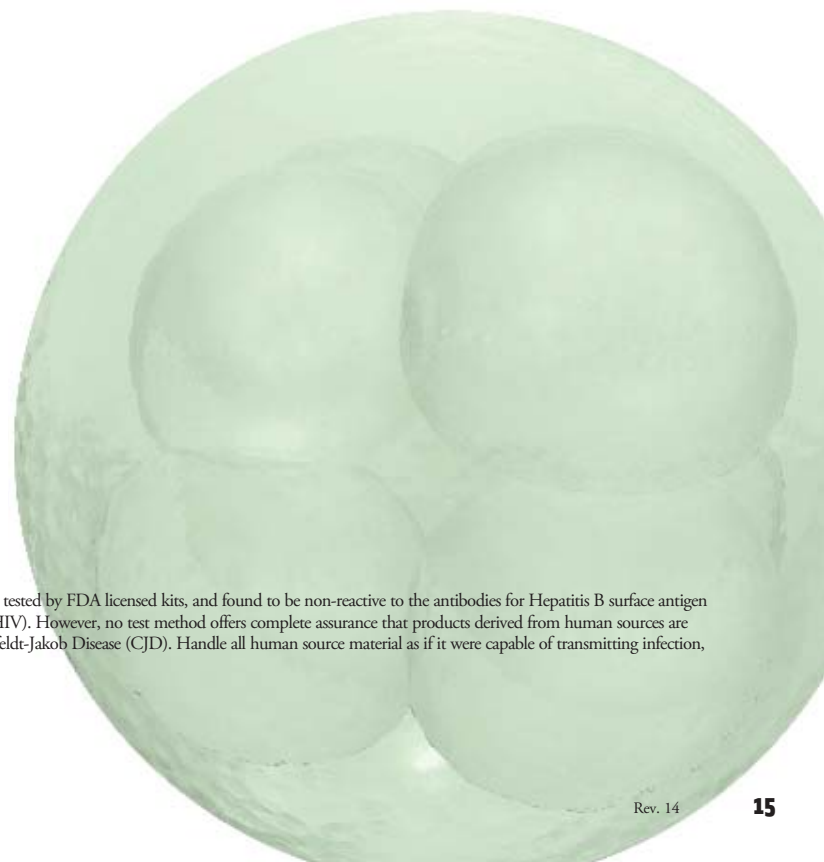
# Gamete, Fertilization and Embryo Culture Media

## COMPLETE MEDIA FOR GAMETE, FERTILIZATION AND EMBRYO CULTURE

Synthetic media formulations supplemented with Dextran Serum Supplement\* (DSS) to provide the conveniences of complete, ready-to-use media. Intended for use in human assisted reproductive procedures.

| Catalog Number | Description  | Size          |
|----------------|--|---------------|
| 90142          | COMPLETE EARLY CLEAVAGE MEDIUM (ECM®) WITH DSS<br>ECM® with 10% Dextran Serum Supplement*<br>for fertilization and culturing human gametes and embryos to Day 3 of development<br>liquid, ready-to-use<br>requires CO <sub>2</sub> incubation<br>with gentamicin<br>with sodium bicarbonate<br>with 10% DSS (v/v)<br>with phenol red<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 120 Days from Date of Manufacture | 2 x 20 mL Kit |
| 90143          | COMPLETE MULTIBLAST MEDIUM WITH DSS<br>Multiblast Medium® with 10% Dextran Serum Supplement*<br>for culturing embryos from Day 3 to the blastocyst stage (up to Day 6)<br>liquid, ready-to-use<br>requires CO <sub>2</sub> incubation<br>with gentamicin<br>with sodium bicarbonate<br>with 10% DSS (v/v)<br>with phenol red<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 120 Days from Date of Manufacture         | 2 x 20 mL Kit |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.





# Sperm Processing Media

## Sperm Washing Media

### SPERM WASHING MEDIA

Sperm washing media is intended for use in human assisted reproductive procedures which include gamete manipulation. These procedures include the use of this medium for sperm washing prior to IUI, IVF and other ART procedures.

| Catalog Number | Description   | Size                         |
|----------------|---|------------------------------|
| 99109          | <p>MODIFIED HAM'S F-10 WITH ALBUMIN<br/>for in vitro sperm washing procedures which<br/>for use without CO<sub>2</sub> incubation<br/>with 21 mM HEPES buffer<br/>with 4 mM sodium bicarbonate<br/>with 1 mM calcium lactate<br/>with 0.5 mM magnesium sulfate<br/>with 5 mg/mL (0.5%) human serum albumin<sup>†</sup> (therapeutic grade source material*)<br/>without antibiotics<br/>mouse embryo tested<br/>Store at 2-8°C<br/>Shelf Life: 2 Years from Date of Manufacture</p> | <p>12 x 12 mL<br/>100 mL</p> |
| 9983           | <p>SPERM WASHING MEDIUM<br/>for in vitro sperm washing procedures which<br/>for use without CO<sub>2</sub> incubation<br/>based on Modified Human Tubal Fluid<br/>with 21 mM HEPES buffer<br/>with 4 mM sodium bicarbonate<br/>with 5 mg/mL (0.5%) human serum albumin<sup>†</sup> (therapeutic grade source material*)<br/>without antibiotics<br/>mouse embryo tested<br/>Store at 2-8°C<br/>Shelf Life: 2 Years from Date of Manufacture</p>                                     | <p>12 x 12 mL<br/>100 mL</p> |
| 9984           | <p>MODIFIED SPERM WASHING MEDIUM<br/>for in vitro sperm washing procedures which<br/>for use without CO<sub>2</sub> incubation<br/>based on Modified Human Tubal Fluid<br/>with 21 mM HEPES buffer<br/>with 4 mM sodium bicarbonate<br/>with 5 mg/mL (0.5%) bovine serum albumin<sup>‡</sup><br/>without antibiotics<br/>mouse embryo tested<br/>Store at 2-8°C<br/>Shelf Life: 2 Years from Date of Manufacture</p>  | <p>12 x 12 mL<br/>100 mL</p> |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

<sup>†</sup> Note: Not for use as an injectable product.

<sup>‡</sup> Irvine Scientific's Bovine Serum Albumin is produced from raw material obtained from U.S. source animals.

# Sperm Processing Media

## Sperm Washing Media

### SPERM SEPARATION MEDIA

ISolate® is a density gradient medium designed to separate the motile fraction of human sperm from seminal fluid for assisted reproductive procedures. As a two layer gradient system, it effectively separates motile sperm from non-viable sperm, white blood cells, cell debris and other contaminants. Formulated for use as a two layer gradient system, or as concentrated solutions allowing the laboratory to make their own dilutions.

| Catalog Number | Description  | Size  |
|----------------|--|---|
| 99264          | ISOLATE®†<br>in two concentrations<br>ready-to-use density gradient medium<br>50% upper layer and 90% lower layer<br>mouse embryo tested<br>rabbit pyrogen tested<br>sperm survival assay<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture  | 12 x 6 mL Kit - 18 Isolations<br>2 x 50 mL Kit - 25 Isolations<br>2 x 100 mL Kit - 50 Isolations          |
| 99275          | ISOLATE® STOCK SOLUTION†<br>90% density gradient medium<br>for use in one step procedure or for further dilution<br>mouse embryo tested<br>rabbit pyrogen tested<br>sperm survival assay<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture   | 100 mL<br>500 mL packaging available by standing order only   |
| 99306          | ISOLATE® CONCENTRATE†<br>colloidal silica concentrate<br>for further dilution into density gradients<br>formulated in an isotonic buffer and approximates the<br>density of undiluted Percoll®<br>mouse embryo tested<br>rabbit pyrogen tested<br>sperm survival assay<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture | 100 mL<br>500 mL packaging available by custom order only<br>1 L packaging available by custom order only |

† Pyrogen tested

# Sperm Processing Media

## Sperm Storage Medium

### SPERM PROCESSING MEDIA

Refrigeration Medium is intended for refrigeration of semen for use in assisted reproductive procedures.

| Catalog Number | Description   | Size      |
|----------------|---|-----------|
| 90129*         | REFRIGERATION MEDIUM - TEST YOLK BUFFER (TYB)<br>WITH GENTAMICIN<br>for short term storage of human sperm at 2° to 5°C<br>with 20% egg yolk‡ - from USDA certified SPF (Virus Free) laying flocks,<br>heat inactivated at 56°C for 30 minutes<br>with 10 µg/mL gentamicin<br>Store below -10°C<br>Shelf Life: 2 Years from Date of Manufacture/4 Days if stored in refrigerator | 20 x 5 mL |

‡ From USDA Certified SPF (Virus Free) laying flocks

\* Shipped with dry ice.

# Protein Supplements, Oil and Water

## PROTEIN SUPPLEMENTS

Concentrated media supplements for use with most culture media. The amount of supplementation can vary according to the specific procedure being performed. Not for use as an injectable product.

| Catalog Number | Description   | Size                 |
|----------------|---|----------------------|
| 99193          | SERUM SUBSTITUTE SUPPLEMENT (SSS™)<br>6% total protein: containing approximately<br>84% human serum albumin <sup>†</sup> (therapeutic grade source material*: 50mg/mL)<br>16% alpha and beta globulins* <sup>†</sup> : 10mg/mL<br><1% gamma globulins* <sup>†</sup><br>in normal saline<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture  | 12 x 12 mL<br>100 mL |
| 9988           | HUMAN SERUM ALBUMIN SOLUTION<br>(therapeutic grade source material*)<br>non-reactive for:<br>Hepatitis B Surface Antigen (HB <sub>s</sub> Ag)<br>Antibodies to Hepatitis C Virus (HCV) and<br>Human Immunodeficiency Virus (HIV)<br>By FDA approved methods<br>screened for the presence of CJD at the donor level<br>100 mg/mL, 10%<br>in normal saline<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 3 Years from Date of Manufacture | 12 x 5 mL<br>100 mL  |
| 9301           | DEXTRAN SERUM SUBSTITUTE (DSS)<br>5% total protein - containing approximately<br>5% human serum albumin <sup>†</sup> (therapeutic grade source material*: 50mg/mL)<br>2% dextran <sup>‡</sup> : 20mg/mL<br>in normal saline<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture   | 100 mL               |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HB<sub>s</sub>Ag), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

<sup>†</sup> Note: Not for use as an injectable product.

<sup>‡</sup> Non-protein pharmaceutical grade material.

# Protein Supplements, Oil and Water

## OIL FOR EMBRYO CULTURE

Oil for Embryo Culture, a sterile light mineral oil, is intended for use as an overlay when culturing in reduced volumes of media to prevent evaporation and to insulate the media from changes to osmolality and pH.

| Catalog Number | Description   | Size             |
|----------------|---|------------------|
| 9305           | OIL FOR EMBRYO CULTURE<br>for use as an overlay to cover small volumes of culture media during embryo and gamete manipulation.<br>sterile light mineral oil<br>Store at 15-30°C away from light<br>Shelf Life: 2 Years from Date of Manufacture | 100 mL<br>500 mL |

## WATER FOR ASSISTED REPRODUCTIVE TECHNOLOGIES (ART) USE

Water for Assisted Reproductive Technologies (ART) is intended for use in ART laboratory procedures requiring a non-pyrogenic, high purity grade of water.

| Catalog Number | Description  | Size    |
|----------------|--|---------|
| 9307           | WATER FOR ASSISTED REPRODUCTIVE TECHNOLOGIES (ART) USE<br>for use in ART laboratory procedures requiring a non-pyrogenic, high purity grade of water.<br>state-of-the-art Water for Injection (WFI) System<br>Store at 15-30°C<br>Shelf Life: 2 Years from Date of Manufacture | 1 Liter |

# Vitrification System

## VITRIFICATION EMBRYOS AND BLASTOCYSTS

Irvine Scientific's Vitrification System is specially designed for vitrifying, warming and storing of embryos of all stages.

| Catalog Number             | Description  | Size |
|----------------------------|--|------|
| 90133-DSO<br>(U.S.A. Only) | <p>VIT KIT® – FREEZE SOLUTIONS ONLY**<br/>Vitrification Freeze Kit for embryos (PN through blastocyst stage)<br/>Each Kit Contains:<br/>liquid, ready-to-use solutions</p> <ul style="list-style-type: none"><li>- 2 Vial of ES (Equilibration Solution)<ul style="list-style-type: none"><li>· Contains 7.5% DMSO</li><li>· Contains 7.5% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 2 Vials of VS (Vitrification Solution)<ul style="list-style-type: none"><li>· Contains 15% DMSO</li><li>· Contains 15% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains 0.5 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li></ul> <p>does not require CO<sub>2</sub> incubation<br/>Store at 2-8°C<br/>Shelf Life: 1 Year from Date of Manufacture<br/>Instructional CD is available upon request</p>   | Kit  |
| 90137-DSO<br>(U.S.A. Only) | <p>VIT KIT® – THAW SOLUTIONS ONLY**<br/>Vitrification Thaw Kit for embryos (PN through blastocyst stage)<br/>Each Kit Contains:<br/>liquid, ready-to-use solutions</p> <ul style="list-style-type: none"><li>- 4 Vial of TS (Thawing Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains 1 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 1 Vial of DS (Dilution Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains 0.5 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 1 Vial of WS (Washing Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li></ul> <p>does not require CO<sub>2</sub> incubation<br/>Store at 2-8°C<br/>Shelf Life: 1 Year from Date of Manufacture<br/>Instructional CD is available upon request</p> | Kit  |



\*\* Only available in the U.S.A.

# Vitrification System

| Catalog Number | Description  | Size   |
|----------------|--|--------|
| 40709          | CRYOTIP®<br>A specially designed closed system device which is a finely pulled plastic straw for storing oocytes and embryos of all stages in liquid nitrogen for long term storage. | 5/pack |
| 40736          | CONNECTOR<br>For use with CryoTip®<br>Used to connect the CryoTip to an aspiration tool  | 2/pack |

\*\* Only available in the U.S.A.

# Vitrification System

## VITRIFICATION FOR OOCYTES AND EMBRYOS

Irvine Scientific's Vitrification System is specially designed for vitrifying, warming and storing of oocytes and embryos of all stages.

| Catalog Number | Description   | Size |
|----------------|---|------|
| 90133-SO       | <p>VIT KIT®- FREEZE SOLUTIONS ONLY*</p> <p>Vitrification Freeze Starter Kit for oocytes and embryos</p> <p>Each Kit Contains:</p> <p>liquid, ready-to-use solutions</p> <ul style="list-style-type: none"><li>- 2 Vial of ES (Equilibration Solution)<ul style="list-style-type: none"><li>· Contains 7.5% DMSO</li><li>· Contains 7.5% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 2 Vials of VS (Vitrification Solution)<ul style="list-style-type: none"><li>· Contains 15% DMSO</li><li>· Contains 15% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains 0.5 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li></ul> <p>does not require CO<sub>2</sub> incubation</p> <p>Store at 2-8°C</p> <p>Shelf Life: 1 Year from Date of Manufacture</p> <p>Instructional CD is available upon request</p>                | Kit  |
| 90133-HSV      | <p>VIT KIT®- FREEZE*</p> <p>Vitrification Freeze Starter Kit for oocytes and embryos</p> <p>Each Kit Contains:</p> <p>liquid, ready-to-use solutions</p> <ul style="list-style-type: none"><li>- 2 Vial of ES (Equilibration Solution)<ul style="list-style-type: none"><li>· Contains 7.5% DMSO</li><li>· Contains 7.5% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 2 Vials of VS (Vitrification Solution)<ul style="list-style-type: none"><li>· Contains 15% DMSO</li><li>· Contains 15% ethylene glycol</li><li>· Contains 20% DSS</li><li>· Contains 0.5 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 8 HSV Staws (green)</li></ul> <p>does not require CO<sub>2</sub> incubation</p> <p>Store at 2-8°C</p> <p>Shelf Life: 1 Year from Date of Manufacture</p> <p>Instructional CD is available upon request</p> | Kit  |

\* This configuration is only available for distribution outside of the USA and Australia. For US configurations, please refer to 90133-DES, 90133-DSO, and 90137-DSO.





# Vitrification System

| Catalog Number | Description   | Size   |
|----------------|---|--------|
| 90137-SO       | <p>VIT KIT® – THAW SOLUTIONS ONLY*</p> <p>Vitrification Thaw Kit Starter for oocytes and embryos</p> <p>Each Kit Contains:</p> <p>liquid, ready-to-use solutions</p> <ul style="list-style-type: none"><li>- 4 Vial of TS (Thawing Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains 1 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 1 Vial of DS (Dilution Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains 0.5 M sucrose</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li><li>- 1 Vial of WS (Washing Solution)<ul style="list-style-type: none"><li>· Contains 20% DSS</li><li>· Contains gentamicin</li><li>· In a M-199 HEPES buffered medium</li></ul></li></ul> <p>does not require CO<sub>2</sub> incubation</p> <p>Store at 2-8°C</p> <p>Shelf Life: 1 Year from Date of Manufacture</p> <p>Instructional CD is available upon request</p> | Kit    |
| 40709          | <p>CRYOTIP®</p> <p>A specially designed closed system device which is a finely pulled plastic straw for storing oocytes and embryos of all stages in liquid nitrogen for long term storage.</p>   | 5/pack |
| 40736          | <p>CONNECTOR</p> <p>For use with CryoTip®</p> <p>Used to connect the CryoTip to an aspiration tool</p>  | 2/pack |

\* This configuration is only available for distribution outside of the USA and Australia. For US configurations, please refer to 90133-DES, 90133-DSO, 90137-DES and 90137-DSO.

# Cryopreservation Media

## Cleavage-Stage Embryos

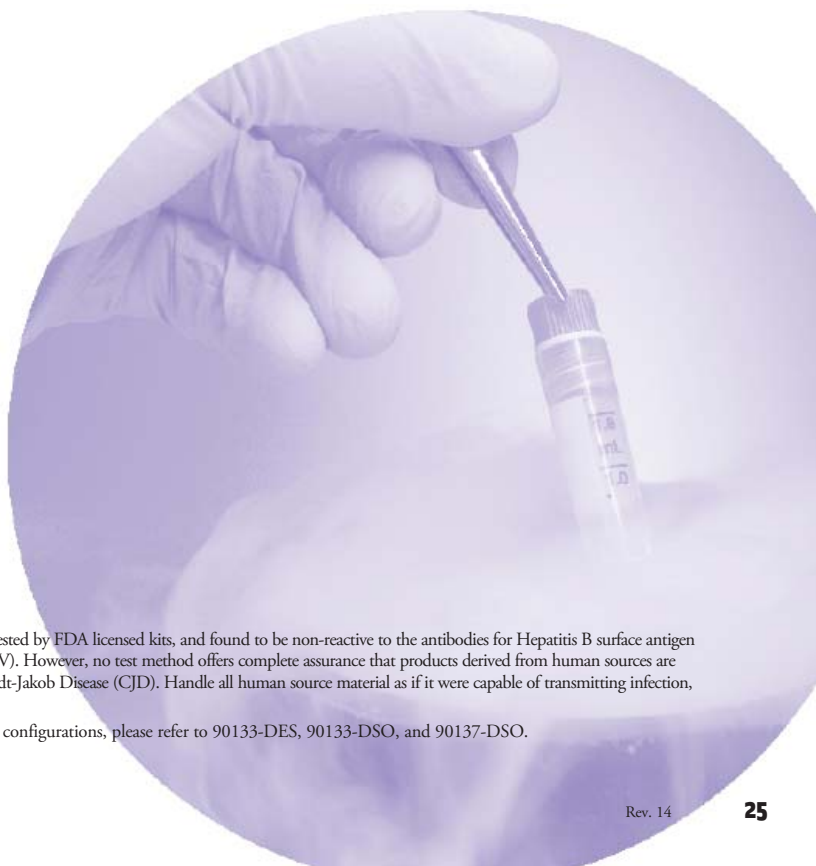
### CRYOPRESERVATION MEDIA FOR CLEAVAGE-STAGE EMBRYOS

Media specifically formulated for the cryopreservation and thawing of human cleavage-stage embryos. Formulation consists of Modified HTF (with HEPES) supplemented with 12 mg/mL Human Serum Albumin\*, propanediol and sucrose.

| Catalog Number | Description   | Size          |
|----------------|---|---------------|
| 90116          | <p>EMBRYO FREEZE MEDIA</p> <p>embryo freeze medium-F1 with 1.5 M propanediol solution</p> <p>embryo freeze medium-F2 with 1.5 M propanediol solution and 0.1 M sucrose</p> <p>Each Kit Contains:</p> <ul style="list-style-type: none"><li>- 2 Vials of F1</li><li>- 4 Vials of F2</li></ul> <p>Store at 2-8°C</p> <p>Shelf Life: 6 Months from Date of Manufacture</p>   | 6 x 10 mL Kit |
| 90124          | <p>EMBRYO THAW MEDIA</p> <p>embryo thaw medium-T1 with 1.0 M propanediol solution and 0.2 M sucrose</p> <p>embryo thaw medium-T2 with 0.5 M propanediol solution and 0.2 M sucrose</p> <p>embryo thaw medium-T3 with 0.2 M sucrose</p> <p>Each Kit Contains:</p> <ul style="list-style-type: none"><li>- 2 Vials of T1</li><li>- 2 Vials of T2</li><li>- 2 Vials of T3</li></ul> <p>Store at 2-8°C</p> <p>Shelf Life: 6 Months from Date of Manufacture</p> | 6 x 10 mL Kit |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

\* This configuration is only available for distribution outside of the USA and Australia. For US configurations, please refer to 90133-DES, 90133-DSO, and 90137-DSO.



# Cryopreservation Media

## Blastocysts

### CRYOPRESERVATION MEDIA FOR BLASTOCYSTS

Media specifically formulated for the cryopreservation and thawing of human blastocysts. Formulation consists of Modified HTF (with HEPES) supplemented with 12 mg/mL Human Serum Albumin\*, glycerol and sucrose.

| Catalog Number | Description  | Size          |
|----------------|--|---------------|
| 90108          | <p>BLASTOCYST FREEZE MEDIA<br/>blastocyst freeze medium-F1 with 5% glycerol<br/>blastocyst freeze medium-F2 with 9% glycerol and 0.2 M sucrose<br/>Each Kit Contains:<br/>- 3 Vials of F1<br/>- 3 Vials of F2<br/>Store at 2-8°C<br/>Shelf Life: 6 Months from Date of Manufacture</p> | 6 x 10 mL Kit |
| 90110          | <p>BLASTOCYST THAW MEDIA<br/>blastocyst thaw medium-T1 with 0.5 M sucrose<br/>blastocyst thaw medium-T2 with 0.2 M sucrose<br/>Each Kit Contains:<br/>- 3 Vials of T1<br/>- 3 Vials of T2<br/>Store at 2-8°C<br/>Shelf Life: 6 Months from Date of Manufacture</p>                     | 6 x 10 mL Kit |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

# Cryopreservation Media

## Sperm

### CRYOPRESERVATION MEDIA FOR SPERM

Media containing TEST-yolk buffer (TYB) has been shown to be effective in preserving sperm when refrigerated for short intervals of time, and for long term frozen storage with the addition of glycerol. Sperm Maintenance Medium with glycerol, but without TEST-yolk buffer, is also designed for procedures involving the cryopreservation and storage of human sperm used for IUI, IVF and other assisted reproductive procedures.

| Catalog Number | Description  | Size                |
|----------------|--|---------------------|
| 90128*         | <p><b>FREEZING MEDIUM - TEST YOLK BUFFER (TYB)<br/>WITH GLYCEROL &amp; GENTAMICIN</b><br/>for cryoprotection when freezing human sperm<br/>with 12% v/v glycerol<br/>with 20% egg yolk<sup>‡</sup> - from USDA certified SPF (Virus Free) laying flocks,<br/>heat inactivated at 56°C for 30 minutes<br/>with 10 µg/mL gentamicin<br/>Store below -10°C<br/>Shelf Life: 2 Years from Date of Manufacture</p> | 20 x 5 mL<br>100 mL |
| 99176*         | <p><b>SPERM MAINTENANCE MEDIUM</b><br/>for cryoprotection when freezing human sperm<br/>with 28% v/v glycerol<br/>with 20 mg/mL (2%) human serum albumin<sup>†</sup> (therapeutic grade source material*)<br/>without egg yolk<br/>without antibiotics<br/>Store below -10°C<br/>Shelf Life: 2 Years from Date of Manufacture</p>  | 100 mL              |



# Micromanipulation Reagents/ICSI Products

## POLYVINYLPIRROLIDONE (PVP)

PVP medium is used for immobilizing human sperm for ICSI procedures.

| Catalog Number | Description  | Size       |
|----------------|--|------------|
| 90121          | POLYVINYLPIRROLIDONE (PVP) SOLUTION with HSA - 7%<br>7% Polyvinylpyrrolidone (PVP) reconstituted in an isotonic HEPES buffered HTF medium<br>Store at 2-8°C<br>Shelf Life: 6 Months from Date of Manufacture   | 5 x 0.5 mL |
| 90123          | POLYVINYLPIRROLIDONE (PVP) SOLUTION with HSA - 10%<br>10% Polyvinylpyrrolidone (PVP) reconstituted in an isotonic HEPES buffered HTF medium<br>Store at 2-8°C<br>Shelf Life: 6 Months from Date of Manufacture   | 5 x 0.5 mL |
| 99219          | POLYVINYLPIRROLIDONE (PVP) - LYOPHILIZED<br>Sterile 10% Lyophilized PVP to be reconstituted with Protein Supplemented Modified Human Tubal Fluid (Catalog #90126) or Sperm Washing Medium (Catalog # 9983)<br>Store at 2-8°C<br>Shelf Life: 2 Years from Date of Manufacture | 10 x 1 mL  |

## HYALURONIDASE SOLUTION

Hyaluronidase Solution is a convenient, ready-to-use solution designed for removing cumulus cells that surround freshly retrieved oocytes prior to ICSI or other ART procedures.

| Catalog Number | Description   | Size     |
|----------------|---|----------|
| 90101          | HYALURONIDASE SOLUTION<br>Contains 80 IU/mL of bovine derived <sup>‡</sup> Hyaluronidase Enzyme in a HEPES Buffered HTF Medium with human serum albumin <sup>†</sup> (therapeutic grade source material*) with gentamicin<br>Store at 2-8°C<br>Shelf Life: 12 Months from Date of Manufacture | 5 x 1 mL |

\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

<sup>†</sup> Note: Not for use as an injectable product.

<sup>‡</sup> From USDA Certified SPF (Virus Free) laying flocks

# Micromanipulation Reagents/ICSI Products

## TYRODE'S SOLUTION - ACIDIFIED

Tyrode's Solution - Acidified is intended for use for zona drilling.

| Catalog Number | Description   | Size      |
|----------------|---|-----------|
| 99252          | TYRODE'S SOLUTION - ACIDIFIED<br>pH 2.3 ± 0.2<br>without sodium bicarbonate<br>without phenol red<br>Store at 15-30°C<br>Shelf Life: 2 Years from Date of Manufacture | 12 x 5 mL |

## EMBRYO BIOPSY MEDIUM

Embryo Biopsy Medium is a convenient ready-to-use solution specifically designed for culturing cleavage stage embryos during biopsy procedures to remove blastomeres for PGD.

| Catalog Number | Description  | Size      |
|----------------|--|-----------|
| 90103          | EMBRYO BIOPSY MEDIUM<br>liquid, ready-to-use<br>HEPES buffered HTF<br>without Ca <sup>2+</sup> /Mg <sup>2+</sup> ions<br>with 0.5 mM EDTA<br>with 5 mg/mL (0.5%) human serum albumin† (therapeutic grade source material*)<br>with 10 µg/mL gentamicin<br>mouse embryo tested<br>Store at 2-8°C<br>Shelf Life: 180 Days from Date of Manufacture | 2 x 20 mL |

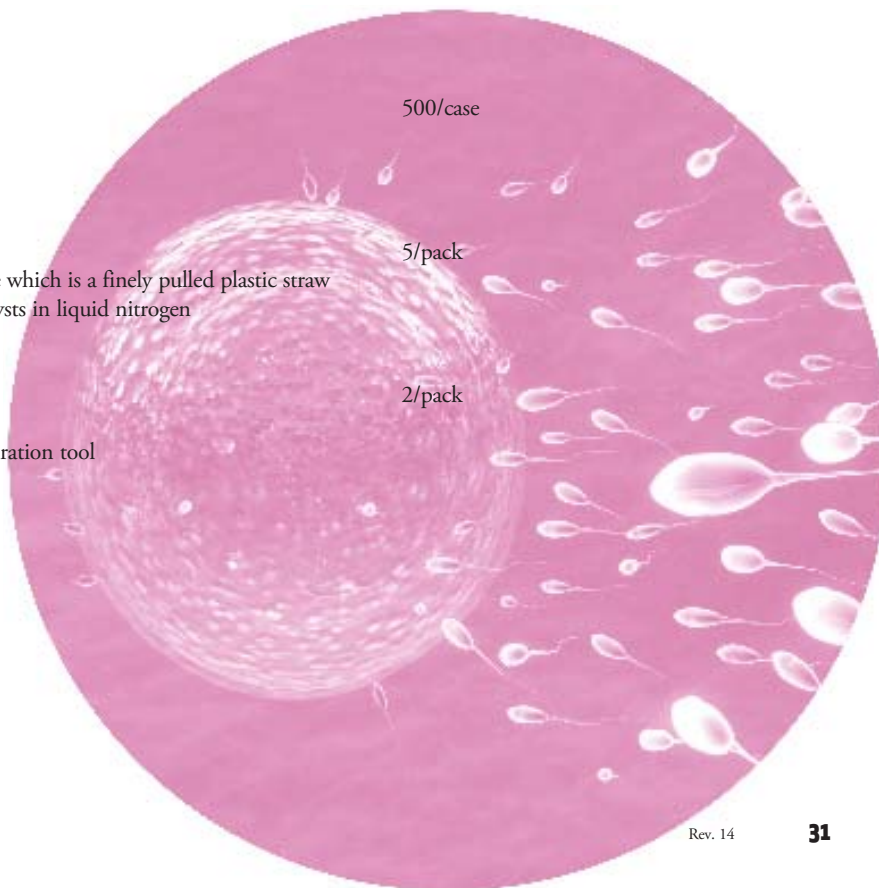
\* Human source material used in the manufacture of this product is therapeutic grade and has been tested by FDA licensed kits, and found to be non-reactive to the antibodies for Hepatitis B surface antigen (HBsAg), antibodies to Hepatitis C (HCV) and antibodies to Human Immunodeficiency Virus, (HIV). However, no test method offers complete assurance that products derived from human sources are noninfectious. Source materials are also screened at the donor level for potential exposure to Creutzfeldt-Jakob Disease (CJD). Handle all human source material as if it were capable of transmitting infection, using universal precautions.

† Note: Not for use as an injectable product.

# Laboratory Supplies

| Catalog Number | Description  | Quantity |
|----------------|--|----------|
| IS-300         | CENTRIFUGE<br>desk-top centrifuge designed for low speed processing of fluids.<br>Six tube capacity<br>Meets OSHA standards  | each     |
| IS-325A        | CENTRIFUGE TUBE<br>15 ml conical, with screw cap<br>Polybutadiene Styrene, sterile   | 49/Rack  |
| IS-363         | MAKLER COUNTING CHAMBER KIT<br>for rapid sperm count and motility evaluation on<br>undiluted semen using a standard microscope<br>20X objective or 20X eyepieces required<br>kit contains:<br>- counting chamber<br>- cover glass with grid<br>- 1 grip<br>- brush | Kit      |
| IS-364         | REPLACEMENT COVER GLASS WITH GRID<br>for Makler Counting Chamber (IS-363)  | each     |
| IS-363-CG      | REPLACEMENT CHAMBER GRIP<br>for Makler Counting Chamber  | each     |
| IS-373         | MAKLER COUNTING CHAMBER (CASA)<br>same as IS-363 but without grid  | each     |
| IS-374         | REPLACEMENT COVER GLASS (CASA)<br>without grid (can be used with IS-363 or IS-373)   | each     |
| IS-365         | MAKLER COUNTING CHAMBER (INVERTED)<br>for use with an inverted microscope  | each     |
| IS-366         | REPLACEMENT COVER GLASS (INVERTED)<br>for use with an inverted Makler Counting Chamber (IS-365)  | each     |

| Catalog Number | Description  | Quantity |
|----------------|--|----------|
| IS-360         | MAKLER INSEMINATION DEVICE<br>designed by Dr. Amnon Makler for IUI procedures<br>requires 1 cc tuberculin syringe, not supplied  | each     |
| IS-360RSB      | REPLACEMENT SLIDING BRACKET<br>for Makler Insemination Device  | each     |
| IS-360RSH      | REPLACEMENT SYRINGE HOLDER<br>for Makler Insemination Device   | each     |
| IS-361A        | SHORT INSEMINATION CANNULA (15 mm)<br>for intercervical inseminations<br>using the Makler Insemination Device (IS-360)   | 50/box   |
| IS-362A        | LONG INSEMINATION CANNULA (15 mm)<br>for IUI procedures using the<br>Makler Insemination Device (IS-360)   | 50/box   |
| N176740        | TC MULTIDISH<br>4 - wells<br>sterile<br>with lid   | 120/case |
| N366656-1      | CRYOTUBE<br>1.0 mL<br>sterile  | 500/case |
| 40709          | CRYOTIP®<br>A specially designed closed system device which is a finely pulled plastic straw<br>for storing oocytes, embryos and blastocysts in liquid nitrogen<br>for long term storage | 5/pack   |
| 40736          | CONNECTOR<br>For use with CryoTip®<br>Used to connect the CryoTip® to an aspiration tool   | 2/pack   |





## TRADEMARKS

|                                      |  |
|--------------------------------------|--|
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| Continuous Single Culture™           | is a trademark of Irvine Scientific                                |
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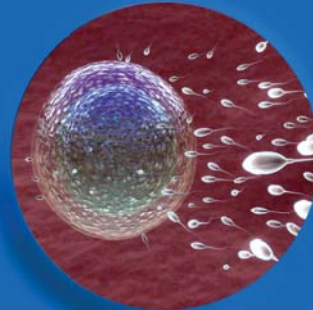
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