# Safety Data Sheet (SDS)

**Product name:** EmbryoNest™
**Manufacturer:** Oterus Biosystems Inc.
**Address:** 2040 Oliver Avenue, San Diego, CA 92109
**Email:** info@oterusbio.com
**Recommended use:** In vitro laboratory research use only
**Restrictions on use:** Not for diagnostic, clinical, or therapeutic use in humans or animals

## 1. IDENTIFICATION

**Product use:** In-vitro fertilization culture plate with a thin surface coating for in-vitro research.
**Emergency telephone number:** (+1) 858-999-4359, Available Mon-Fri, 9AM- 5PM PST. Language: English Only

## 2. HAZARD IDENTIFICATION

**Classification (GHS):**
This product is **not classified as hazardous** under GHS for normal use as an article.

**Label elements:**

- **Signal word:** None
- **Hazard statements:** Not classified as hazardous.
- **Precautionary statements:**
  - Use in accordance with good laboratory practices.
  - Avoid ingestion, injection, or direct contact with eyes.
  - Not for use in humans or animals.

**Other hazards:**

- If coating is removed, concentrated, or chemically altered, hazards may differ from those described here.
- NaOH in free solution is corrosive, but in this product, it is present in very small, neutralized quantities within the coating.

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

No components need to be disclosed according to the applicable regulations.

## 4. FIRST-AID MEASURES

**General:**
Under normal use, exposure is unlikely. In case of accidental contact with coating solution (e.g., during manufacturing or if coating is reconstituted):

- **Inhalation:**
  - Move person to fresh air.
  - Seek medical attention if symptoms persist.
- **Skin contact:**
  - Wash with soap and water.
  - Remove contaminated clothing.
  - Seek medical attention if irritation develops.
- **Eye contact:**
  - Rinse cautiously with water for several minutes.
  - Remove contact lenses if present and easy to do.
  - Seek medical attention if irritation persists.
- **Ingestion:**
  - Rinse mouth with water.
  - Do not induce vomiting.
  - Seek medical attention if feeling unwell.

**Most important symptoms/effects:**

- Expected to be minimal due to low quantities and immobilized coating.
- Possible mild irritation if free solution contacts eyes or skin.

## 5. FIRE-FIGHTING MEASURES

**Suitable extinguishing media:**
Use media appropriate for surrounding materials (water spray, foam, dry chemical, $CO_2$).
**Specific hazards:**

- Product is primarily plastic (e.g., polystyrene or similar).
- Combustion may produce carbon monoxide, carbon dioxide, and other decomposition products.

**Protective equipment:**
Wear self-contained breathing apparatus and protective clothing in case of fire.

## 6. ACCIDENTAL RELEASE MEASURES

Under normal use, the coating is immobilized on the plate surface.
**If coating solution or wash-off occurs (manufacturing or lab incident):**

- **Personal precautions:**
  - Use gloves, lab coat, and eye protection.
  - Avoid contact with skin and eyes.
- **Environmental precautions:**
  - Avoid release of concentrated solutions into drains or the environment.
- **Methods for cleanup:**
  - Absorb small spills with inert material (e.g., paper towels, absorbent pads).

- Dispose of waste according to local regulations and institutional policies.

## 7. HANDLING AND STORAGE

**Handling:**

- For laboratory research use only.
- Handle using standard good laboratory practices.
- Avoid generating aerosols from any liquid associated with the coating.
- Do not ingest or inject.
- Not for use in humans or animals.

**Storage:**

- Store at recommended temperature (e.g., 2–8 °C or room temperature, as applicable).
- Keep in original packaging until use.
- Protect from extreme temperatures and direct sunlight.
- Keep away from incompatible chemicals (strong acids or bases, oxidizers) if storing with other reagents.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

**Exposure limits:**
No occupational exposure limits are established for this product as an article.
**Engineering controls:**

- Use in a standard laboratory environment.
- If handling free coating solution, use appropriate ventilation (e.g., fume hood if aerosol or splashing is possible).

**Personal protective equipment (PPE):**

- **Eye/face protection:** Safety glasses or goggles.
- **Skin protection:** Lab coat and appropriate gloves (e.g., nitrile).
- **Respiratory protection:** Not required under normal use; use appropriate protection if aerosols or vapors are generated from free solution.
- **Hygiene measures:** Wash hands after handling. Do not eat, drink, or smoke in the lab.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

**Appearance:**

- Article: Clear plastic cell culture plate with invisible thin coating.
- Coating: Clear, aqueous solution (during manufacturing).

**Odor:** Odorless or mild.
**pH (coating solution):** Typically near physiological range (approx. pH 7–8).
**Melting/freezing point:** Not applicable to article.
**Boiling point:** Not applicable to article.
**Flash point:** Not applicable to article.

**Solubility:** Coating components are water-soluble; coating is immobilized on plate surface.
**Other data:** No explosive or oxidizing properties expected.

## 10. STABILITY AND REACTIVITY

**Reactivity:**
No special reactivity expected under normal laboratory conditions.
**Chemical stability:**
Stable under recommended storage conditions.
**Possibility of hazardous reactions:**
None expected under normal use.
**Conditions to avoid:**
Extreme heat, open flame, strong oxidizing or reducing agents if coating is in solution.
**Incompatible materials:**
Strong acids or bases, strong oxidizers (for free solution).
**Hazardous decomposition products:**
On combustion of plastic: CO, $CO_2$, and other organic decomposition products.

## 11. TOXICOLOGICAL INFORMATION

Given the very small quantity and immobilized nature of the coating, **significant exposure is unlikely**.
**Likely routes of exposure (if free solution):**

- Skin, eye contact, inhalation of aerosols, ingestion.

**Acute toxicity:**

- PEG, amino acids, and HEPES are generally of low toxicity at laboratory concentrations.
- NaOH is corrosive in concentrated form, but here is present in very small, neutralized amounts.

**Skin/eye irritation:**

- Free solution may cause mild irritation.
- Immobilized coating on the plate is not expected to cause irritation under normal use.

**Sensitization:**
No data indicating sensitization at these quantities.
**Carcinogenicity, mutagenicity, reproductive toxicity:**
No data indicating such effects at the quantities and use conditions described.

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity:**
Due to the very small quantities and typical lab disposal practices, environmental impact is expected to be minimal.

**Persistence and degradability:**
PEG and amino acids are generally biodegradable; HEPES is more persistent; NaOH neutralizes in aqueous environments.
**Bioaccumulation:**
Not expected to bioaccumulate significantly at these quantities.
**Mobility in soil:**
Limited relevance due to small quantities and controlled lab use.

## 13. DISPOSAL CONSIDERATIONS

**Product (used plates):**
- Dispose of in accordance with institutional biosafety and chemical waste procedures.
- If used with biological materials, treat as biohazardous waste as appropriate.

**Coating solution (if any remains):**
- Dispose of as laboratory chemical waste according to local regulations.
- Do not discharge large quantities into drains.

**Packaging:**
- Dispose or recycle according to local regulations.

## 14. TRANSPORT INFORMATION

This product is **not regulated as a dangerous good** under DOT, IATA, or IMDG when shipped as a cell culture plate with minimal coating.
- **UN number:** Not applicable
- **Proper shipping name:** Laboratory article, non-hazardous
- **Hazard class:** Not applicable
- **Packing group:** Not applicable
- **Marine pollutant:** No

## 15. REGULATORY INFORMATION

**OSHA:**
This product is considered an **article** and is not classified as hazardous under OSHA Hazard Communication Standard when used as intended.
**GHS:**
Not classified as hazardous.
**Other regulations:**
User must ensure compliance with local, state, and national regulations for laboratory chemicals and biological materials.

## 16. OTHER INFORMATION

**Prepared by:** Oterus Biosystems Inc.
**Revision date:** 8/29/2026
**Version:** 1.0
**Disclaimer:**
The information provided in this Safety Data Sheet is believed to be accurate as of the date of issue and is intended for guidance in safe handling, use, processing, storage, transportation, and disposal of the product. It is not a warranty or quality specification. The user is responsible for determining the suitability of this information for their purposes and for complying with all applicable laws and regulations.