**BIODESIGN® SURGISIS® VAGINAL EROSION REPAIR GRAFT**

**INTENDED USE**
The Biodesign® Surgisis® Vaginal Erosion Repair Graft is intended to be implanted to reinforce soft tissues where weakness exists in the gynecological anatomy, including the repair of erosions of the vaginal wall. The graft is supplied sterile and is intended for one-time use.

**CONTRAINDICATIONS**
This product is intended for use by trained medical professionals.

**PRECAUTIONS**
- Do not resterilize. Discard all open and unused portions of the graft.
- The graft is sterile if the package is dry, unopened and undamaged. Do not use if the package seal is broken.
- Discard the graft if mishandling has caused possible damage or contamination, or if the graft is past its expiration date.
- Ensure that the graft is rehydrated prior to cutting or suturing.
- Ensure that all layers of the graft are secured when suturing.
- Place the graft in maximum possible contact with healthy, well-vascularized tissue to encourage cell ingrowth and tissue remodeling.
- Suturing more than one graft together may decrease graft performance.
- No studies have been conducted to evaluate the reproductive impact of the clinical use of the graft.
- Extended rehydration or excessive handling could lead to partial delamination of the superficial layers of the graft.
- The graft performance has not been evaluated with suture spacing greater than 2 mm.
- Users should exercise good surgical practice for the management of contaminated or infected wounds.
- The potential for infection of the graft material following implantation may be reduced by the use of prophylactic antibiotics.
- Users should exercise caution to avoid vessel, bowel, and bladder perforation.
- IMPORTANT: Users should counsel patients on abstaining from heavy lifting, strenuous exercise, vaginal insertions (e.g., tampons) and sexual intercourse for a period of four (4) to six (6) weeks after surgery.

**POSSIBLE COMPLICATIONS**
- Bleeding
- Infection
- Adhesions
- Erosion
- Chronic inflammation
- Allergic reaction

If conditions of infection, inflammation, or allergic reaction cannot be resolved, consider removal of the graft.

**STORAGE**
This graft should be stored in a clean, dry location at room temperature.

**STERILIZATION**
This graft has been sterilized with ethylene oxide.

**USE OF ANTIMICROBIALS**
Because the graft is used in surgical fields where sterility cannot be assured, the use of antimicrobials is common practice and may prevent infectious complications. In these cases both antibiotic prophylaxis of the patient and antimicrobial soaking of the graft have been used. Typical flora can be expected to include a variety of aerobic and facultative anaerobic organisms, including, but not limited to, Staphylococcus aureus, Staphylococcus epidermidis, Pseudomonas aeruginosa, and Escherichia coli. Typical vaginal and genitourinary flora can be expected to include a variety of aerobic and facultative anaerobic organisms such as bacteria spp. and Entero bacteriae spp. Therefore, the following points should be considered:
- Antimicrobials, if used topically or systemically, should provide coverage against a wide spectrum of aerobic and anaerobic organisms. 1
- Antibacterial prophylaxis, if chosen, should be started prior to surgery and continued post-operatively. 1

The presence of certain antimicrobials may inhibit revascularization and/or infiltration of cells into the graft. 1 For example, gentamicin is known to hinder neovascularization, epithelialization, and keratinocyte growth2 while povidone iodine3,4 bacitracin5,6, polymyxin B,7 and vancomycin8 have all been reported to slow or inhibit wound healing. However, no studies have been conducted to evaluate the combination of antimicrobials with the graft.

**INSTRUCTIONS FOR USE**
These recommendations are designed to serve only as a general guideline. They are not intended to supersede institutional protocols or professional clinical judgment concerning patient care.

**NOTE:** Always handle the graft using aseptic technique, minimizing contact with latex gloves.

**REQUIRED MATERIALS**
- Sterile dish (kidney dish or other bowl)
- Sterile forceps
- Rehydration fluid: room temperature, sterile saline or sterile lactated Ringer’s solution

**PREPARATORY**
1. Remove the packaging containing the graft from the envelope.
2. Remove the inner pouch containing the graft from the outer package using aseptic technique. Place the inner pouch in the sterile field.
3. Using sterile gloved hands, open the inner pouch carefully, and aseptically remove the graft with a sterile instrument. Place the graft into the sterile dish in the sterile field.
4. Add enough rehydration fluid to the dish to fully submerge the graft. Allow the graft to rehydrate, fully submerged, for 2-5 minutes. (See Use of Antimicrobials)
5. Prepare the patient and surgical site using standard surgical techniques appropriate for vaginal erosion repair.

**PROCEDURAL**
1. Size the graft approximately 20-30% larger than the defect. **NOTE:** If the graft is too small for the defect, excess tension may result in recurrence of the original tissue defect or development of a defect in the adjacent tissues.
2. Using aseptic technique, transfer the graft to the surgical site. Tuck the edges of the graft under the margins of the defect and suture into place, avoiding excess tension.
3. Close the edges of the vaginal epithelium over the graft. **NOTE:** If the vaginal epithelium does not cover the graft, leaving the graft exposed, consider placing the patient on estrogen cream. Additionally, a vaginal dilator or mold can be utilized post-operatively to keep the vaginal canal open.
4. Complete the standard surgical procedure.
5. Discard any unused portions of the graft according to institutional guidelines for disposal of medical waste.

**REFERENCES**