Vertical Integration provides safe and secure handling of placental tissue from birth site to processing, and finally, the doctor’s office, with a complete chain of custody.

Standards of Excellence
Every mother must go through a thorough screening process to receive the required approval from our medical director in order to become a donor. Integra only accepts placental tissues from scheduled cesarean sections. Integrity's affiliate has been a registered tissue bank with the FDA since 2006 and is accredited by the American Association of Tissue Banks.

Time to Preservation
Vertical Integration provides safe and secure handling of placental tissue from birth site to processing, and finally, the doctor’s office, with a complete chain of custody.

Why BioD?
Complete Chain of Custody
- Vertically integrated company maintains full control of the tissue from recovery through distribution
- We use only live donors that are prescreened and selected
- We only process tissue that we recover from routine cesarean sections
- We minimize the time to preservation of the viable tissue
- The proximity of the recovery facilities to our processing facilities allows Integra to start processing the tissue within 4 hours of the baby being born in order to preserve the native tissue characteristics of the placenta.

References:
BioDRestore™ Elemental Tissue Matrix

• Human amniotic tissue has been used to treat a variety of wounds for more than 100 years.
• Growth factors and cytokines found in amniotic tissue are anti-inflammatory, stimulate cell proliferation, reduce cell migration and may reduce scarring.
• BioDRestore is composed of morselized amniotic tissue that contain the key cytokines and growth factors present in amniotic tissue.
• BioDRestore aids in creating the appropriate environment to repair soft tissue wounds.
• BioDRestore undergoes our proprietary CryoPrime® processing that preserves the growth factors, cytokines and extracellular matrix (ECM) found in native amniotic tissue.
• BioDRestore is sourced using a vertically integrated process that ensures safe and secure handling of tissue from birth site to the processing site and then the doctor’s office - complete chain of custody from collection through clinical use.

BioDRestore retains potent anti-inflammatory properties as shown in an in vitro inflammatory response assay. With BioDRestore, concentrations of pro-inflammatory mediators are reduced by more than 95% for TNF-alpha, IL-1beta, and IL-6, and by 80% for IL-8, see figure above.

Preclinical results are not necessarily predictive of clinical outcomes.

Advantages of Amniotic Tissue

Foundation for Regeneration
Extracellular matrix components such as Collagens I, II, IX, X, VII and other structural proteins provide a natural scaffold to facilitate cellular adhesion while assisting cellular migration and proliferation.15

Supports Soft Tissue Repair
Growth factors found in amniotic tissue such as PDGF, VEGF, EGF, FGF and TGF-B support cellular proliferation and new collagen formation.

Immune-Privileged
Placental tissues are “immune-privileged” and therefore rarely cause an immune response in the human body.16

Structure of the placental membranes

AMNIONCHORION
Epithelium
Compact layer
Fibroblast layer
Spongy layer
Cellular layer
Reticular layer
Trophoblast layer
Basement membrane

Anti-Inflammatory / Immunomodulatory Cytokines

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<th>Native Human Amnion</th>
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Anti-Catabolic Factors

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BioDRestore Retains Key Proteins of Unprocessed Human Amniotic Membranes