WHEN THERE’S A NEED FOR EPIDERMIS
PRESS START
The automated CELLUTOME™ Epidermal Harvesting System

The CELLUTOME™ System is an innovative epidermal harvesting device which can be easily integrated into your everyday practice:

• Automated, precise and reproducible process
• Fast harvesting procedure, takes on average 45 minutes
• Can be performed by any suitably trained physician on your team
Harvesting epidermal tissue with the CELLUTOME™ System

AUTOMATED, UNIFORM PROCESS
The harvesting procedure is precise and reproducible, raising uniform microdomes.
4.9X magnification of a microdome array section

EFFECTIVE HARVESTING PROCEDURE
The CELLUTOME™ System effectively harvests the donor-site epidermis down to the basal layer, including basal keratinocytes.
Histological microdome cross-section; 100X magnification. BK = basal layer keratinocyte; SC = stratum corneum.

A simple process, a single procedure

EPIDERMAL HARVESTING
The Harvester is positioned onto the donor site, and a combination of gentle warmth and negative pressure is used to raise epidermal microdomes.

GRAFT ACQUISITION
The microdomes are harvested and then secured on a non-adherent dressing (e.g., ADAPTIC TOUCH™ or Tegaderm™).
The CELLUTOME™ System produces an array of epidermal microdomes ready for immediate transfer onto a recipient site.

Tissue for Grafting
The microdomes harvested contain undamaged tissue for grafting to a recipient site.
LIVE/DEAD® stained epidermal microdome with Calcein AM dye; green staining indicates live cells.

Cell Outgrowth from Microdomes
Cells grow outwards from the microdome edge demonstrating that grafts were not damaged during acquisition.
Keratinocyte outgrowth over time, cultured in EpiLife® medium (cytoskeleton, green; plasma membrane, red; nucleus, blue; 100X magnification)

Application to the Recipient Site
The microdomes are placed directly onto the recipient site.

Less Than 1 Hour
Discover the features of the CELLUTOME™ Epidermal Harvesting System

**PROVEN REPRODUCIBILITY**

All harvested microdomes exhibited:

- Uniform undamaged cells†
- Cell formation at dermal-epidermal junction†
- Cell outgrowth and secretion of growth factors†

Key growth factors secreted from the epidermal microdomes:

Microdome growth factors††

<table>
<thead>
<tr>
<th>VEGF</th>
<th>TGF-α</th>
<th>PDGF-AA</th>
<th>PDGF-AB BB</th>
<th>HGF</th>
<th>G-CSF</th>
</tr>
</thead>
<tbody>
<tr>
<td>✔</td>
<td>✔</td>
<td>✔</td>
<td>✔</td>
<td>✔</td>
<td>✔</td>
</tr>
</tbody>
</table>

†Growth factors were detected in 3 subjects using multiplex bead-based immunoassays. HEKs were grown in monolayer cultures.

VEGF = Vascular Endothelial Growth Factor; TGF-α = Transforming Growth Factor alpha; PDGF = Platelet Derived Growth Factor; HGF = Hepatocyte Growth Factor; G-CSF = Granulocyte Colony-Stimulating Factor.

Donor-site case studies‡

In a study of 15 patients, donor sites were completely healed within 2–3 weeks.

**STUDY 1:**

- At harvest
- 14 days after harvest
- 21 days after harvest

Donor-site case studies indicate complete healing within 2–3 weeks.
MINIMAL IMPACT ON PATIENT EXPERIENCE

The impact of the epidermal harvesting procedure on patients was measured in a study involving 15 patients.

FAST DONOR-SITE RECOVERY:

- Minimal pain and donor-site trauma, with no need for anesthesia
- Donor site heals within 2–3 weeks

Patients undergoing epidermal harvesting experienced minimal pain\(^1\)

<table>
<thead>
<tr>
<th>Patient pain rating</th>
<th>No hurt</th>
<th>Hurts a little bit</th>
<th>Hurts a little more</th>
<th>Hurts even more</th>
<th>Hurts a whole lot</th>
<th>Hurts worst</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Donor-site dermal response score\(^1\)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Day 7</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>Day 14</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>Day 21</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
</tbody>
</table>

STUDY 2:

\(^1\)The featured case studies are representative of the average progression of healing for the study. As with any case study, the results and outcomes should not be interpreted as a guarantee or warranty of similar results. Individual results may vary depending on the patient’s circumstances and condition.

Bring the benefits of the CELLUTOME™ Epidermal Harvesting System to your patients and practice

- Automated, precise and reproducible process
- Minimal pain and donor-site trauma
- Easy to integrate into existing clinical practice
- Comprehensive training from a KCI representative in less than one hour

WHEN THERE’S A NEED FOR EPIDERMIS
PRESS START

For more information, visit acelity.com or call 800-275-4524

NOTE: Specific indications, contraindications, warnings, precautions and safety information exist for KCI products and therapies. Please consult a physician and product instructions for use prior to application. Rx only.

©2013-2016 KCI Licensing, Inc. All rights reserved. Tegaderm is a trademark of 3M Company. EpiLife and Live/Dead are trademarks of Life Technologies Corporation. All other trademarks designated herein are proprietary to KCI Licensing, Inc., and Systagenix Wound Management IP Co B.V., their respective affiliates and/or licensors. DSL #16-0363.US • LIT 29-A-227 • (Rev. 4/16)