vivamel
modern active wound healing dressing

WOUND TREATMENT WITH ACTIVE MEDICAL CHESTNUT HONEY

WHY MEDICAL HONEY:
• sterile,
• produced in accordance with the HACCP principles,
• controlled physicochemical properties,
• biocompatibility tests meet the requirements of ISO 10993,
• clinically tested.

WHY 100 % CHESTNUT HONEY:
• proven bacteriostatic effect on the most common strains of gram-positive and gram-negative bacteria in wounds, including MRSA and VRE;
• high levels of the glucose oxidase enzyme which promotes honey’s antimicrobial effect;
• a rich source of potassium, manganese, calcium, zinc, and, proline that stimulate production of collagen and epithelisation;
• contains kynurenic acid, which prevents biofilm formation;
• high content of phenolic compounds with antioxidant effect.

bacteriostatic effect of the chestnut honey

Since 1923

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FOUR PHASES OF WOUND HEALING WITH VIVAMEL

1. CLEANSING
   THE PHASE OF HAEMOSTASIS AND REMOVAL OF DECAYED AND DAMAGED TISSUE
   High level of sugar in honey (min 80%) induces osmotic pressure in cells:
   • increased tissue perfusion
   • antimicrobial effect
   • massive attraction of macrophages and lymphocytes
   • reduction of inflammation and oedema in the wound
   • accelerated wound cleansing

2. GRANULATION
   THE PHASE OF PROLIFERATION AND CELL MATURATION
   Continuous $\text{H}_2\text{O}_2$ release:
   • stimulates connective tissue growth
   • stimulates collagen production
   • stimulates granulation
   Presence of polyphenols:
   • antioxidative activity

3. EPITHELISATION
   THE PHASE OF EPIDERMIS GROWTH OR SCARRING:
   Presence of natural sugars:
   • energy for cell reconstruction
   High level of calcium, zinc, manganese, proline:
   • stimulation of collagen synthesis
   Presence of flavonoids:
   • stimulates cell proliferation
   • regulates metalloproteinases (MMP) formation

4. MATURATION
   THE PHASE OF TISSUE MATURATION AND TRANSFORMATION
   Aesthetic aspect:
   Clinical experience show that VIVAMEL products accelerate wound healing with less or no scarring.
   Presence of flavonoids:
   • anti-inflammatory activity
   • antioxidative activity
   Presence of kynurenic acid:
   • inhibits biofilm formation
   Presence of antimicrobial peptides (defenzin-1 and albumin):
   • wide antimicrobial effect
   Acidity pH-value:
   • suitable milieu for healing
   Mechanical barrier:
   • controlled viscosity of the honey provides mechanical protection
   Acidic pH-value:
   • suitable milieu for healing

DYNAMIC THERAPY

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TREATMENT PROTOCOL

Medical honey in a tube is recommended for treating minor wounds, both superficial and deep. It can be combined with other VIVAMEL wound dressings.

<table>
<thead>
<tr>
<th>WOUND DESCRIPTION</th>
<th>CHOOSING SUITABLE VIVAMEL PRODUCT</th>
</tr>
</thead>
<tbody>
<tr>
<td>high amount of secretion</td>
<td>ALGINAT</td>
</tr>
<tr>
<td>necrosis, fibrin</td>
<td>ALGINAT</td>
</tr>
<tr>
<td>granulation</td>
<td>CONTACT ALGINAT</td>
</tr>
<tr>
<td>epithelisation</td>
<td>CONTACT ALGINAT</td>
</tr>
<tr>
<td>infected wound</td>
<td>ALGINAT CONTACT TUBE</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>TREATMENT</th>
</tr>
</thead>
<tbody>
<tr>
<td>absorption</td>
</tr>
<tr>
<td>softening, debridement</td>
</tr>
<tr>
<td>maintenance, stimulation</td>
</tr>
<tr>
<td>protection, stimulation</td>
</tr>
<tr>
<td>reducing infection</td>
</tr>
</tbody>
</table>

DIABETES:

Clinical testing of wound treatment with VIVAMEL products in patients with diabetes was performed. Clinical studies showed that local application of VIVAMEL products to the wounds does not have any influence on blood sugar levels. Results and responses to the tests were very positive, therefore, VIVAMEL products are recommended for wound treatment in diabetic patients.

PRECAUTIONS and CONTRAINDICATIONS:

Although reactions to medical honey for wound treatment are not common, the use of products based on honey is not recommended for persons with honey allergy.

PRODUCTS WITH MEDICAL HONEY

<table>
<thead>
<tr>
<th>VIVAMEL</th>
<th>Art. No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>ALGINAT Alginate dressing with honey 5 x 5 cm</td>
<td>19701</td>
</tr>
<tr>
<td>ALGINAT Alginate dressing with honey 10 x 10 cm</td>
<td>19703</td>
</tr>
<tr>
<td>CONTACT Contact mesh with honey 5 x 5 cm</td>
<td>19707</td>
</tr>
<tr>
<td>CONTACT Contact mesh with honey 10 x 10 cm</td>
<td>19709</td>
</tr>
<tr>
<td>TUBE Medical honey 20 g</td>
<td>19705</td>
</tr>
</tbody>
</table>

Manufacturer: TOSAMA d.o.o., Šaranovičeva 35, 1230 Domžale, Slovenija © Alexandre Denis & Tosama