Ionomeric Bone Cement and Granules
The Bioactive Material designed specifically for use in the middle ear

References
Freeman, C. and Brook, I. (2000). In vivo assessment of CorinCem (SerenoCem™) granules by comparison with porous hydroxyapatite—a qualitative study.
**Cement**

*SerenoCem™* cement was designed specifically for use in the middle ear. It was produced as a result of a Brite-EuRam European research project aimed at providing Otologists with a safe, effective hard tissue replacement material. *SerenoCem™* comprises a calcium fluoro-silicate base which is combined with polyacrylic acid to form a glass polyalkenoate cement. Development was carried out by the biomaterials departments of the Universities of Sheffield and Limerick and the Royal Free Hospital. The product is British-made.

Its applications include:
- Repair of ossicular discontinuity
- Reconstruction of the canal wall
- Repair of attic and scutum defects
- Primary and revision of stapedectomy
- Fixation of cochlear implant electrodes

Advantages of *SerenoCem™* cement are:
- Non-exothermic
- Bonds to both bone and metal
- Minimal shrinkage on setting
- Mouldable on placement
- Can be drilled like bone when set
- High compressive strength
- Excellent and predictable acoustic results

*SerenoCem™* cement is easy to prepare and apply, using the special mixer and applicator. Supplied sterile, it sets hard approximately 10 minutes after mixing, allowing around 4 minutes for placement and manipulation.

Note: the area into which the cement is placed must be kept dry, as the material will not harden in a wet field.

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**Granules**

*SerenoCem™* granules are a set, porous version of *SerenoCem™* cement, with a pore size of 200 microns. They are ideal material for obliteration of the mastoid cavity, or for use where liquid cement is contra-indicated.

Advantages of *SerenoCem™* granules:
- Hydrophilic - aiding placement and absorbing blood and proteins
- Osteoconductive and biocompatible
- Increased osteoid formation, leading to faster new bone growth
- No inflammation, fibrosis or resorption

*SerenoCem™* granules are easy to use, by simply mixing with autologous blood and a drop of antibiotic and packing into a well-vascularised site. Over-filling should be avoided.

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<tr>
<th>Order code</th>
<th>Description</th>
<th>Pack size</th>
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<tbody>
<tr>
<td>BC010</td>
<td><em>SerenoCem™</em> Cement</td>
<td>box of 2 capsules</td>
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<td>BC150</td>
<td><em>SerenoCem™</em> Applicator</td>
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<td>BC260</td>
<td><em>SerenoCem™</em> Mixer</td>
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<td>BCU500</td>
<td>Practice capsules</td>
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<td>BC050</td>
<td><em>SerenoCem™</em> granules, 0.5-1mm, 1g</td>
<td>box of 3 pouches</td>
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</table>

*SeroCem™* must not be used in the following situations:
- for load-bearing applications
- in soft tissue
- on cartilage without bone contact
- in acoustic neuroma or skull base surgery
- or any surgery where the material might come into contact with peripheral or cranial nerves, dura, CSF or other parts of the central nervous system.

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*...the resulting adhesion to bone is excellent.*

Babighian, Italy