

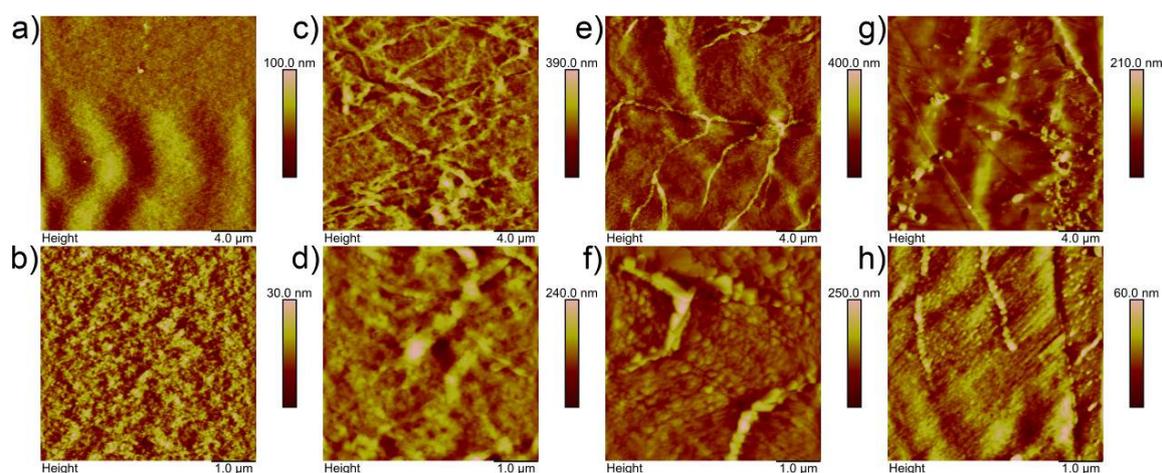
# Supplementary Materials: Anti-Microbial Biopolymer Hydrogel Scaffolds for Stem Cell Encapsulation

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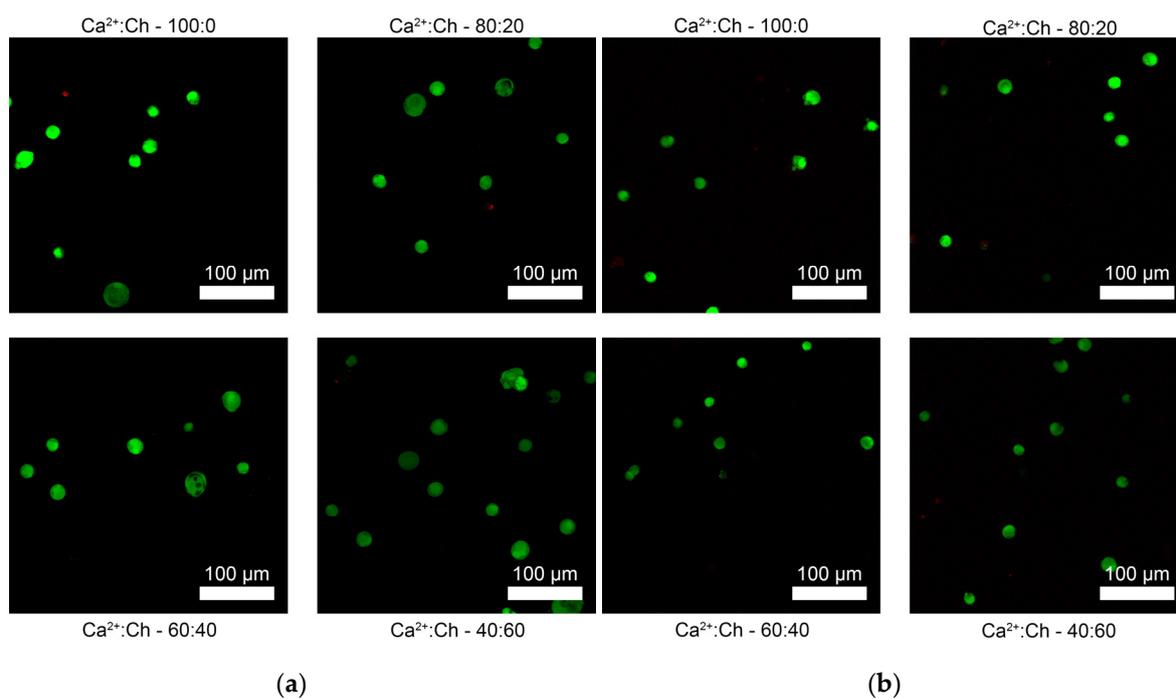
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### S1 Atomic Force Microscopy analysis of hydrogels

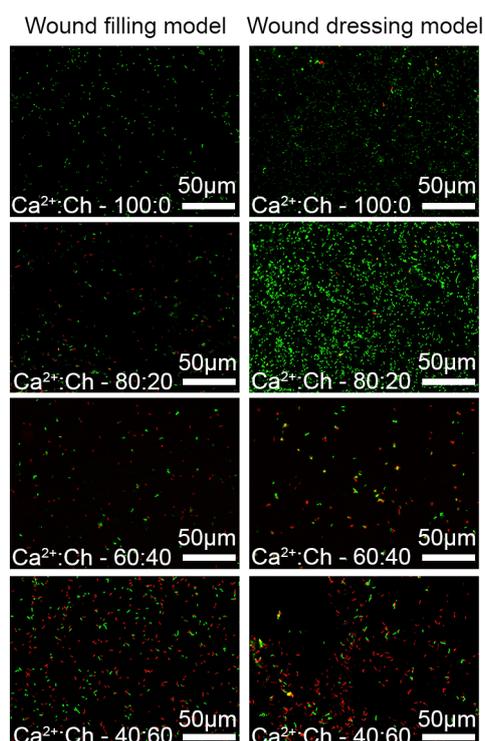


**Figure S1:** Atomic force microscopy images of the Alg-Ca<sup>2+</sup>/Ch-(100:0) (a and b), Alg-Ca<sup>2+</sup>/Ch-(80:20) (c and d), Alg-Ca<sup>2+</sup>/Ch-(60:40) (e and f) and Alg-Ca<sup>2+</sup>/Ch-(40:60) (g and h). For each gel composition, two pictures are shown in different sizes.

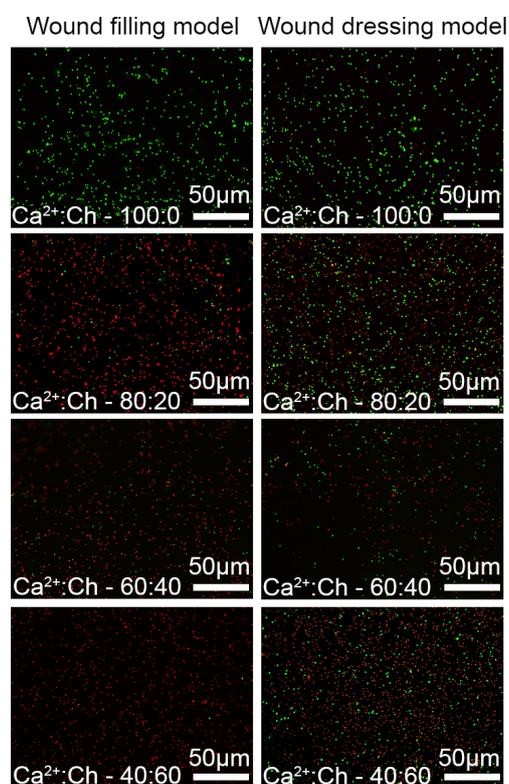
### S2 hBM-MSC live/dead imaging encapsulated in gels



**Figure S2:** Representative pictures of the live/dead staining of encapsulated hBM-MSCs in hydrogels of all compositions after 1 day (a) and 5 days (b) of culturing. Green cells are living, the nucleus of dead cells is stained red. Measuring depth was 50 μm for all pictures.

S3 *P. aeruginosa* live/dead imaging

**Figure S3:** Representative pictures of the live/dead staining of *P. aeruginosa* cells adhered to glass and treated with gels of displayed composition using the wound filling (left) and wound dressing (right) approach. Living cells are stained in green and dead cells are stained in red.

S4 *S. Aureus* live/dead imaging

**Figure S4:** Representative pictures of the live/dead staining of *S. aureus* cells adhered to glass and treated with gels of displayed composition using the wound filling (left) and wound dressing (right) approach. Living cells are stained in green and dead cells are stained in red.