

Electronic Supplementary Information

Functionalization of natural polymers coated-gold nanoparticles with bFGF for regenerative purposes

Helena Ferreira,^{a,b†} Albino Martins,^{a,b} Marta L. Alves da Silva,^{a,b} Sara Amorim,^{a,b} Susana Faria,^c
Ricardo A. Pires,^{a,b} Rui L. Reis,^{a,b} Nuno M. Neves,^{a,b†}

^a3B's Research Group - Biomaterials, Biodegradables and Biomimetics, Department of Polymer Engineering, University of Minho; Headquarters of the European Institute of Excellence on Tissue Engineering and Regenerative Medicine; AvePark- Parque de Ciência e Tecnologia, Zona Industrial da Gandra, 4805-017 Barco GMR, Portugal.

^bICVS/3B's - PT Government Associate Laboratory, Braga/Guimarães, Portugal.

^cDepartment of Mathematics for Science and Technology, Research CMAT, University of Minho, Campus de Azurém, 4800-058 Guimarães, Portugal.

[†]Corresponding authors: nuno@dep.uminho.pt; helenaferreira@dep.uminho.pt

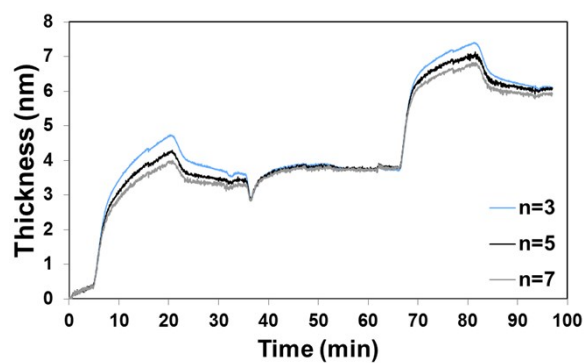


Fig. S1 Real time thickness estimation using the Sauerbrey model for the 3rd, 5th and 7th overtones.

Table S1 Amount of the anti-bFGF antibody linked to amino groups of chitosan from natural polymers-coated AuNPs, in the presence of increasing concentrations of them (measured in terms of Au atoms using ICP-OES).

[Au] ($\mu\text{g/mL}$)	Anti-bFGF bound (ng)
250	121.6 \pm 12.6
500	140.2 \pm 18.8
750	156.6 \pm 12.8
1000	190.0 \pm 31.4

Video S1 NPs moving (Brownian motion) acquired using the NanoSight NS500 instrument.