

Medical scaffold, methods of fabrication and uses thereof (Technion)

code: CTT-0739

The present invention is a method for manufacturing medical scaffolds and their uses in bone repair, and in dental and orthopedic surgeries. The scaffolds are composed of electrospun nanofibers that have a continuous or stepwise gradient of porosity, and an average pore size and weight per volume. The electrospun scaffold has a 3D structure of non-woven uniform, randomly oriented nanofibers with a diameter of 300-500 nm. The combination of the culture of osteogenic cells with an electrospun 3D scaffold provides an in-vitro system that simulates the natural 3D environment capable of supporting bone repair. Note: available for commercialization for applications from the neck down.

Contact for more information:

tzachy tal , +972-4-8294856

T - Technion Technology Transfer
Technion City, Senate Bldg., Haifa 32000, Israel
Tel. 972-4-829-4851; 972-8325-375
Fax. 972-4-832-0845