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Barrows

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(54) **BIOABSORBABLE FIBERS AND REINFORCED COMPOSITES PRODUCED THEREFROM**

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(51) **Int. Cl.⁷** **D02G 3/00**

(52) **U.S. Cl.** **428/373; 428/292.1; 428/375; 428/361; 428/374**

(58) **Field of Search** **428/364, 292.1, 428/373, 374, 375, 361**

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(57) **ABSTRACT**

This invention relates to bioabsorbable fibers, comprising a semicrystalline fiber-forming core polymer and an amorphous sheath polymer, wherein the core polymer and sheath polymer are separately melt extruded and connected to one another through an adhesive bond. The present invention also relates to reinforced composites of the bioabsorbable fibers, and to devices comprising the reinforced composites. The devices are suitable for in vivo implantation. Some embodiments of the present devices can also support high loads, making them useful for fracture fixation and spinal fusion. The invention also relates to methods of making the various materials of the invention.

7 Claims, No Drawings