Fabric for medical devices

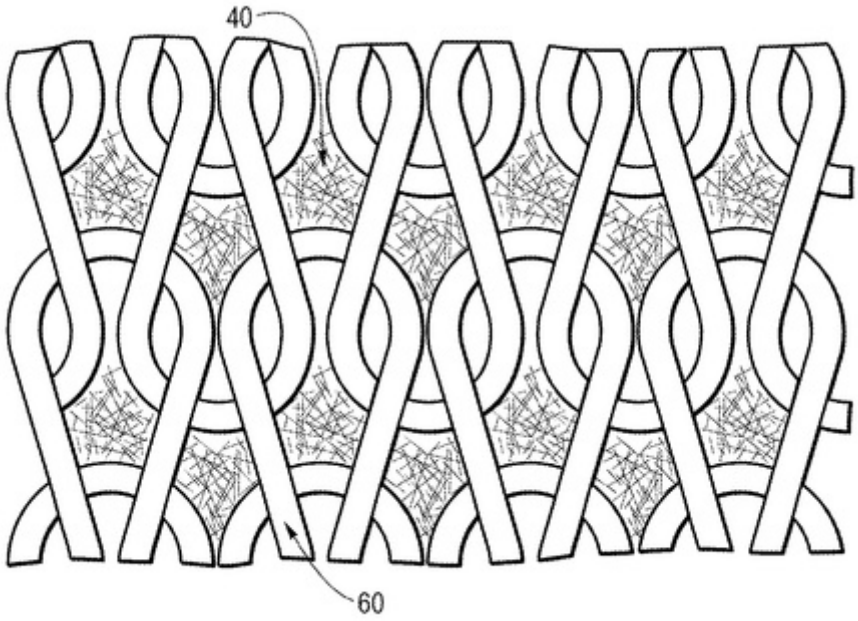
Patent number: US20190060528

Publication date: 2019-02-28

Applicant(s): Cook

Abstract

Woven or knitted fabrics for stent grafts include boron nitride nanotubes (20) in the matrix between strands of the **textile** material. The **textile** material comprises twisted filaments and the boron nitride nanotubes may be continuously or discontinuously integrated along the filaments or wrapped around the filaments. Alternatively they may be wrapped around the outside of a strand. The **textile** material may be polyethylene terephthalate.



Occlusive medical device with fabric retention barb

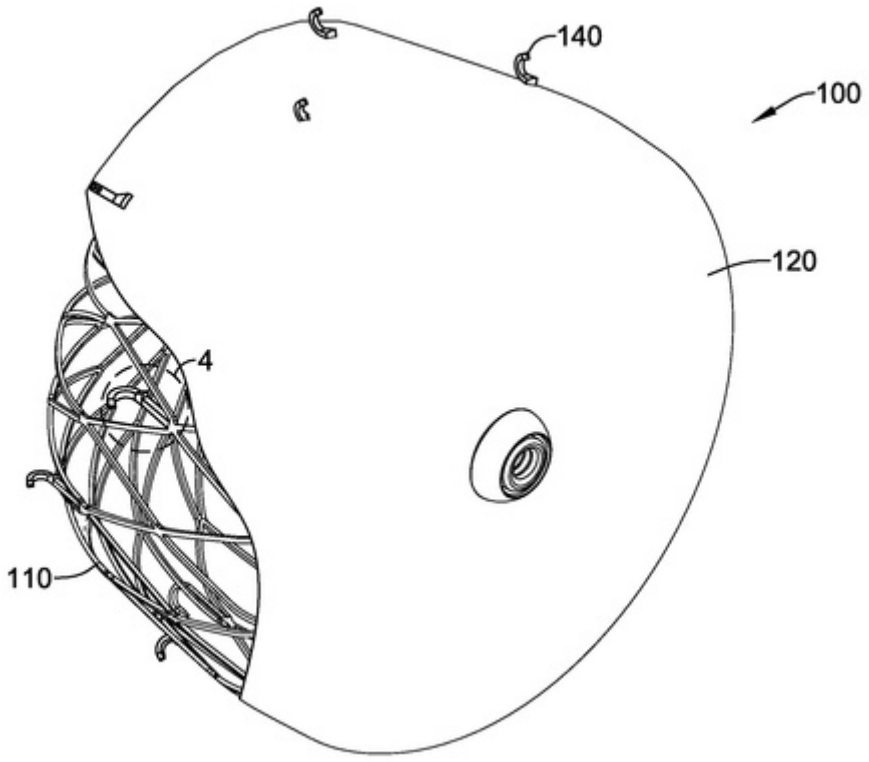
Patent number: US20180310925

Publication date: 2018-11-01

Applicant(s): Boston Scientific

Abstract

An occlusive implant system may include a catheter having a lumen extending from a proximal opening to a distal opening, a core wire slidably disposed within the lumen, and an occlusive implant having an expandable framework configured to shift between a collapsed configuration and an expanded configuration, and an occlusive element disposed on the expandable framework. The expandable framework may include a plurality of anchor members extending radially outward from the expandable framework, at least some of the plurality of anchor members each have a barb projecting circumferentially therefrom. The occlusive implant may be releasably connected to a distal portion of the core wire.



A crosslinkable propylene polymer composition

Patent number: EP3409701

Publication date: 2018-12-05

Applicant(s): Borealis

Abstract

The invention relates to a process for the preparation of a crosslinkable propylene polymer composition comprising melt mixing and reacting, preferably in an extruder, a heterophasic propylene copolymer composition A, at least one crosslinkable grafting component B represented by the formula R 1 SiR 2 q Y 3-q and a radical initiator C. The invention also relates to the moisture crosslinkable polypropylene polymer composition obtainable by the process, to a crosslinked propylene polymer composition, to the use of the crosslinkable composition for the manufacture of adhesives, sealant, films, foams, coatings or shaped articles and the use of the crosslinked propylene polymer composition in food packaging, medical devices, textile packaging, technical films and protection films.

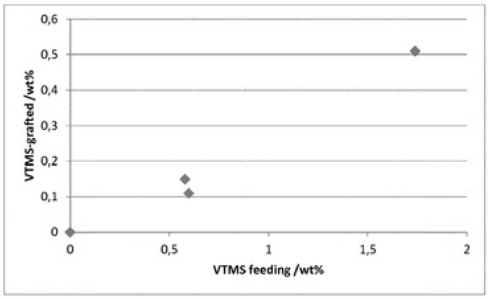


Figure 1

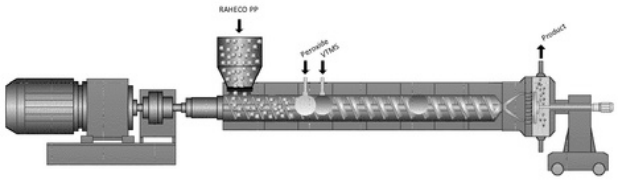


Figure 2

Warp-knitted elastic knitted perforated web

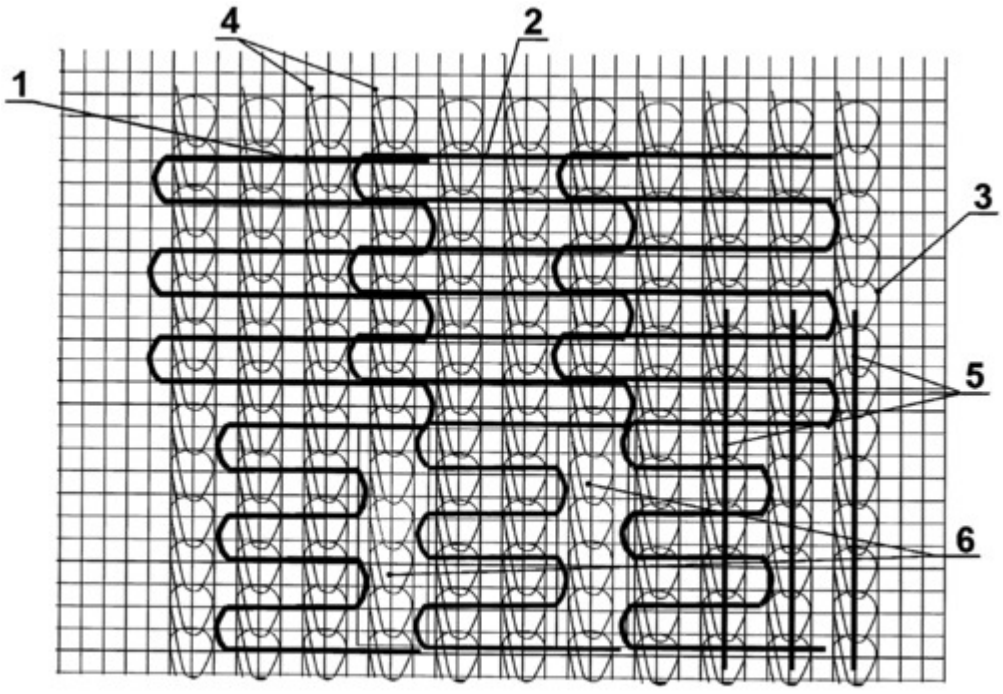
Patent number: RU2657996

Publication date: 2018-06-18

Applicant(s): Reznov

Abstract

invention relates to the knitwear manufacture, in particular to the having elastic properties double-sided warp-knitted flat knitted fabrics with through holes (cells). By the warp **fabric** contains intersecting needle wales, closed chain of synthetic threads, and by the weft is the wool yarn or wool-containing yarn threads systems. One of these systems forms the **fabric** front side, and the other is the back side. **Fabric** composition also includes located inside the needle wales elastomeric threads. **Fabric** has areas with missing in the needle wales weft threads, in which place the holes are formed.EFFECT: technical result of invention consists in provision of opportunity to obtain the air-permeable web, in particular suitable for the manufacturing of **medical devices** such as swathes, belts, etc.



Фиг. 1

Support garment for a wearable medical device

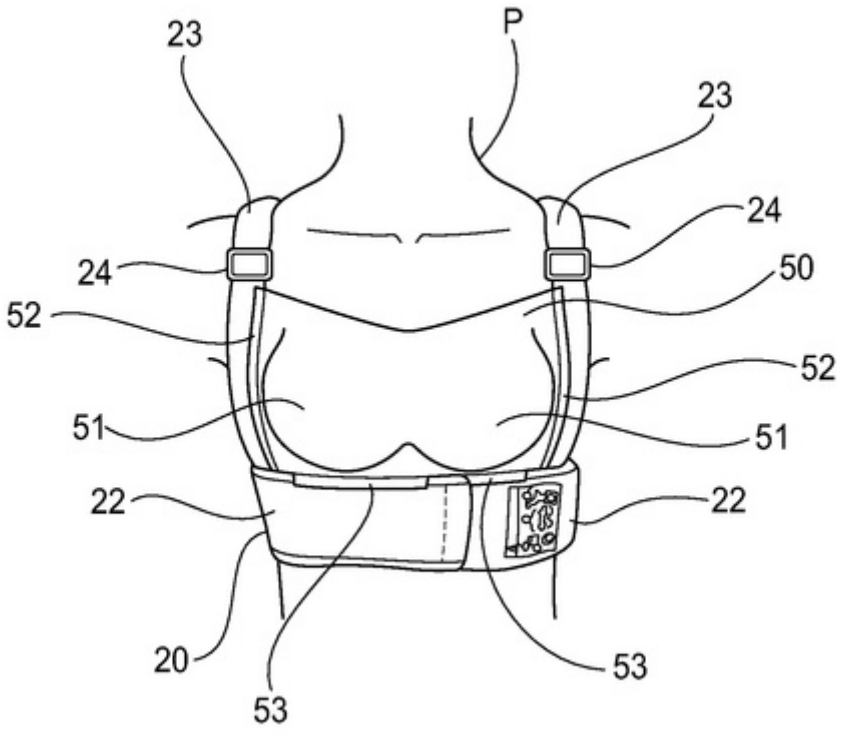
Patent number: US20180243549

Publication date: 2018-08-30

Applicant(s): Zoll medical

Abstract

A support garment for supporting a patient wearable defibrillator is made from a **fabric** having an outside surface and an inside surface and is configured to be worn about a chest of a patient. The support garment includes a back portion and a front portion connected to the back portion. The back portion and the front portion are configured to support a plurality of sensing electrodes and at least one therapeutic defibrillator electrode on the inside surface thereof. The front portion of the support garment further includes at least one bra portion. The at least one bra portion is configured to support front upper torsal female anatomy.



Plastic optical fiber for medical device

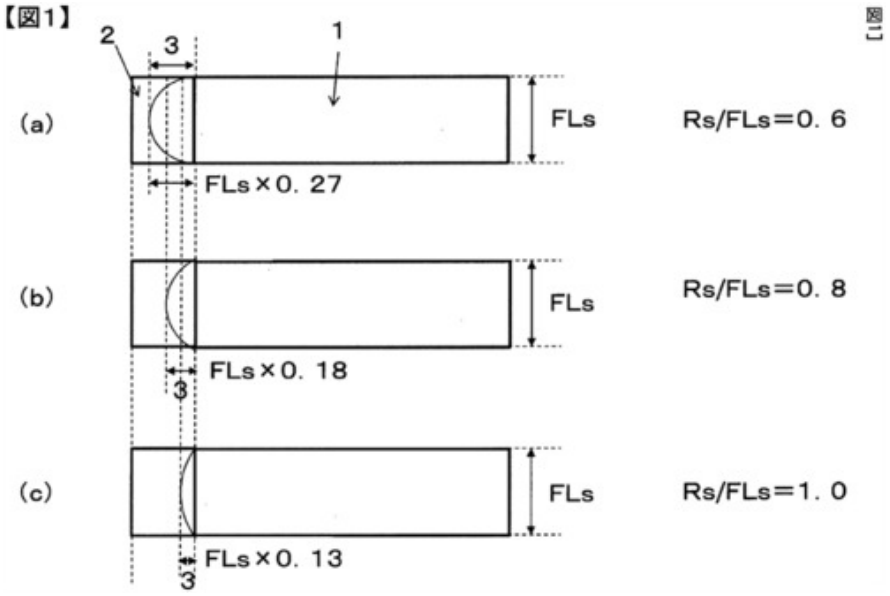
Patent number: WO2019059160

Publication date: 2019-03-28

Applicant(s): Toray

Abstract

The present invention provides a **plastic** optical fiber for **medical device** lighting, which has a core formed from a (co)**polymer** that is mainly composed of methyl methacrylate, and which is characterized in that: a cladding is composed of a copolymer that has a weight proportion of fluorine components of 60-74%; and the theoretical numerical aperture NA is from 0.48 to 0.65. Due to the above-described configuration, this **plastic** optical fiber for **medical device** lighting has high numerical aperture in addition to excellent light transmitting properties and excellent bending resistance. Additionally, this **plastic** optical fiber for **medical device** lighting enables reduction of lens cost and simplification of designing of a lighting device.



Liquid crystal polymer medical device and method

Patent number: WO2018195550

Publication date: 2018-10-25

Applicant(s): Impressio

Abstract

Liquid crystal polymers (LCPs) are described herein that include novel arrangements of bio-mimicking properties for use in surgery, therapy, and treatment of medical or comfort issues. Through the particular arrangements medical devices and portions of them may be adapted to have properties that dampen and dissipate vibrations such as shocks to body tissues during surgical recovery and/or during subsequent use. This dampening is attained by novel arrangements of LCP and processes for forming them that vary from prior attempts at synthesizing activated LCP elements. These novel arrangements include using LCP bodies that include thicknesses and properties that have not been demonstrated or achieved for medical or other purposes and that are achieved using distinct processes. These novel LCP arrangements and methods of creating them can produce medical devices that bio-mimic natural tissue or operation to provide better results for patients.

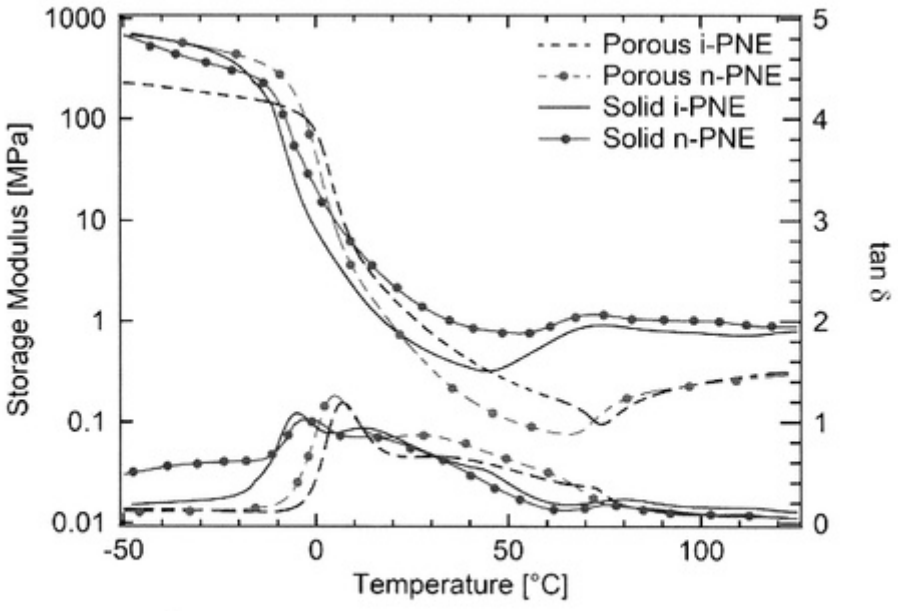


Fig. 12

Laminate material to be used in lubricative member for medical use

Patent number: WO2018131518

Publication date: 2018-07-19

Applicant(s): Fujifilm

Abstract

A laminate material to be used in a lubricative member for medical use, said laminate material comprising substrate a and layer b which contains a polymer having a polysiloxane structure and which is disposed on substrate a, wherein the polymer comprises, as constituting components, an acrylic acid component, an acrylic acid ester component, an acrylamide component and/or a styrene component, and the polymer has a hydroxy group, a carboxy group, an amino group, an isocyanate group, an oxazoline ring, an epoxy group, a vinyl group, an ethynyl group, a sulfanyl group, an azide group, a trialkoxysilyl group and/or an acid anhydride structure in a molecule thereof; a lubricative member for medical use in which the laminate material is used; and a medical device in which the lubricative member for medical use is used.