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(54) Title: TISSUE PROTECTING SPRAY-ON COPOLYMER FILM COMPOSITION

(57) Abstract: This invention deals with a tissue protecting, spray-on film composition comprising an amphiphilic film-forming, segmented/block copolymer derived from at least one water-soluble monomer and at least another water-insoluble monomer, wherein the film can be formed from a water soluble organic solvent such as 2-propanol, acetone, and ethyl acetate. The film can contain a bioactive agent including those to have antimicrobial, anesthetic, anti-inflammatory, and wound-healing activities.

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US05/24120

A. CLASSIFICATION OF SUBJECT MATTER
 IPC: **C08F 120/06(2006.01),220/68(2006.01)**

USPC: 526/317.1,230,320,312,74,89
 According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
 U.S. : 526/317.1,230,320,312,74,89

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2003/0100694 A1 (HOLGUIN) 29 May, 2003 (29.05.2003), abstract, page 3, [0038] through page 7, [0076]	1-19
X	US 2004/0266965 A1 (HOLGUIN et al.) 30 December, 2004 (30.12.2004), abstract, page 2, [0029] through page 16, [0203]	1-17
X	US 3,577,516 (GOULD et al.) 2 December, 1969 (02.12.1969), abstract, column 2, line 20 through column 4, line 33.	1-17

Further documents are listed in the continuation of Box C. See patent family annex.

* Special categories of cited documents:	"T"	later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
"A" document defining the general state of the art which is not considered to be of particular relevance	"X"	document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
"E" earlier application or patent published on or after the international filing date	"Y"	document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)	"&"	document member of the same patent family
"O" document referring to an oral disclosure, use, exhibition or other means		
"P" document published prior to the international filing date but later than the priority date claimed		

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Name and mailing address of the ISA/US Mail Stop PCT, Attn: ISA/US Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450 Facsimile No. (571) 273-3201	Authorized officer Randy Gulakowski Telephone No. 571-272-1302 DEBORAH A. THOMAS PARALEGAL SPECIALIST <i>DUT</i>

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US05/24120

Box No. II Observations where certain claims were found unsearchable (Continuation of item 2 of first sheet)

This international search report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. Claims Nos.:
because they relate to subject matter not required to be searched by this Authority, namely:

2. Claims Nos.:
because they relate to parts of the international application that do not comply with the prescribed requirements to such an extent that no meaningful international search can be carried out, specifically:

3. Claims Nos.:
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

Box No. III Observations where unity of invention is lacking (Continuation of item 3 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:
Please See Continuation Sheet

1. As all required additional search fees were timely paid by the applicant, this international search report covers all searchable claims.
 2. As all searchable claims could be searched without effort justifying additional fees, this Authority did not invite payment of any additional fees.
 3. As only some of the required additional search fees were timely paid by the applicant, this international search report covers only those claims for which fees were paid, specifically claims Nos.:

 4. No required additional search fees were timely paid by the applicant. Consequently, this international search report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:
- Remark on Protest**
- The additional search fees were accompanied by the applicant's protest and, where applicable, the payment of a protest fee.
 - The additional search fees were accompanied by the applicant's protest but the applicable protest fee was not paid within the time limit specified in the invitation.
 - No protest accompanied the payment of additional search fees.

BOX III. OBSERVATIONS WHERE UNITY OF INVENTION IS LACKING

Group I, claim(s) 1-17, drawn to a tissue protecting, spray on film composition.

Group II, claim(s) 18-31, drawn to a disinfectant spray bandage composition.

The inventions listed as Groups I and II do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons: the special technical feature of Group II is the claimed disinfectant spray bandage composition comprising an alcoholic solution of at least one amphiphilic, essentially water-insoluble, segmented/block copolymer, and this feature is not present in Group I. Therefore unity of invention is lacking.