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ance Notes on Codes and Abbreviations" appearing at the begin-
ning of each regular issue of the PCT Gazette.*

(54) Title: METHODS FOR IMPROVED TREATMENT OF CANCER WITH IRINOTECAN BASED ON MRP1

(57) Abstract: The present invention relates to the use of irinotecan or derivative thereof for the preparation of a pharmaceutical composition for treating cancer, especially, colorectal cancer, cervical cancer, gastric cancer, lung cancer, malignant glioma, ovarian cancer, and pancreatic cancer in a patient having a genotype with a variant allele which comprises a polynucleotide in accordance with the present invention. Preferably, a nucleotide deletion, addition and/or substitution comprised by said polynucleotide results in an altered expression of a variant allele compared to the corresponding wild type allele or an altered activity of the polypeptide encoded by the variant allele compared to the polypeptide encoded by the corresponding wild type allele. Finally, the present invention relates to a method for selecting a suitable therapy for a subject suffering from colorectal cancer, cervical cancer, gastric cancer, lung cancer, malignant glioma, ovarian cancer, and pancreatic cancer.



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INTERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER
IPC 7 A61K31/4745 A61P35/00

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)

IPC 7 A61K

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 practical, search terms used)

EPO-Internal, WPI Data, BIOSIS, EMBASE, MEDLINE, CHEM ABS Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	WO 98 37892 A (UPJOHN CO ;ULRICH ROGER G (US)) 3 September 1998 (1998-09-03) page 1, line 5 - line 26 ---	19-21, 25-27
X	WO 00 37107 A (MASFERRER JAIME L ;GORDON GARY (US); SEARLE & CO (US); KOKI ALANE) 29 June 2000 (2000-06-29) claims 1,14,42 ---	1-18, 22-24, 28-37 19-21, 25-27
A	WO 01 49299 A (MICHAEL MICHAEL ;MOORE MALCOLM J (CA)) 12 July 2001 (2001-07-12) page 2, line 1 - line 22 page 3, line 5 - line 21 ---	1-18, 22-24, 28-37 14-16, 24,37
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☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

° Special categories of cited documents :

A document defining the general state of the art which is not considered to be of particular relevance

E earlier document but published on or after the international filing date

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)

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P document published prior to the international filing date but later than the priority date claimed

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

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

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G document member of the same patent family

Date of the actual completion of the international search

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International Application No

PCT/EP 02/08200

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
P,X	WO 01 54678 A (SCHERING CORP) 2 August 2001 (2001-08-02) page 1, line 16 - line 19 page 3, line 11 - line 19 ----	1-13,17, 18,22, 23,28-37
P,X	WO 02 28380 A (MARTIN CHRISTOPHE ;BAILEY SUSAN M (GB); TWELVES CHRISTOPHE J (GB);) 11 April 2002 (2002-04-11) page 1, line 16 - line 24 claims 1,8 ----	1-18, 22-24, 28-37
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X	FRIEDMAN HENRY S ET AL: "Irinotecan therapy in adults with recurrent or progressive malignant glioma." JOURNAL OF CLINICAL ONCOLOGY, vol. 17, no. 5, May 1999 (1999-05), pages 1516-1525, XP008018482 ISSN: 0732-183X the whole document ----	1-18, 22-24, 28-37
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INTERNATIONAL SEARCH REPORT

International Application No

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	ANDO Y ET AL: "POLYMORPHISMS OF UDP-GLUCURONOSYLTRANSFERASE GENE AND IRINOTECAN TOXICITY: A PHARMACOGENETIC ANALYSIS" CANCER RESEARCH, AMERICAN ASSOCIATION FOR CANCER RESEARCH, BALTIMORE, MD, US, vol. 60, 15 December 2000 (2000-12-15), pages 6921-6926, XP002909302 ISSN: 0008-5472	1-18, 22-24, 28-37
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INTERNATIONAL SEARCH REPORT

International application No.
PCT/EP 02/08200

Box I Observations where certain claims were found unsearchable (Continuation of item 1 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:
see FURTHER INFORMATION sheet PCT/ISA/210
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 II Observations where unity of invention is lacking (Continuation of item 2 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

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 an additional fee, this Authority did not invite payment of any additional fee.
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.
- ☐ No protest accompanied the payment of additional search fees.

FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

Continuation of Box I.1

Although claims 1-15,18-23,28-36 are directed to a method of treatment of the human/animal body, the search has been carried out and based on the alleged effects of the compound/composition.

Although claims 14-17,24-27,37, as formulated, are directed to a diagnostic method practised on the human/animal body, the search has been carried out and based on the alleged effects of the compound/composition.

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

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