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For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: HUMAN MEMBRANE-ASSOCIATED PROTEINS

(57) Abstract: The invention provides human membrane-associated proteins (HUMAP) and polynucleotides which identify and encode HUMAP. The invention also provides expression vectors, host cells, antibodies, agonists, and antagonists. The invention also provides methods for diagnosing, treating, or preventing disorders associated with expression of HUMAP.

INTERNATIONAL SEARCH REPORT

International Application No
PCT/US 00/10884

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 C12N15/12 C07K14/705 C07K16/28 C12Q1/68 A61K38/17
G01N33/53

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 C12N C07K C12Q A61K G01N

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, STRAND

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DATABASE EMBL - EMBEST_HUM13 [Online] Entry HS1271395, Acc.no. AA480075, 23 June 1997 (1997-06-23) HILLIER, L. ET AL.: "zv42b06.r1 Soares ovary tumor NbHOT Homo sapiens cDNA clone IMAGE:756275 5', mRNA sequence." XP002146174 the whole document ---	10-14
X	DATABASE EMBL - EMBEST_HUM13 [Online] Entry HS1227891, Acc.no. AA427548, 25 May 1997 (1997-05-25) HILLIER, L. ET AL.: "zw22d08.s1 Soares ovary tumor NbHOT Homo sapiens cDNA clone IMAGE:770031 3', mRNA sequence." XP002146175 the whole document -----	10-14

☐ 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)

"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

"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

"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.

"&" document member of the same patent family

Date of the actual completion of the international search

30 August 2000

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04.12.2000

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INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 00/10884

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:

Although claims 16, 19 and 22 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.
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:

see additional 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 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.:

1-23 (all partially)

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

This International Searching Authority found multiple (groups of) inventions in this international application, as follows:

1. Claims: Invention 1: 1-23, all partially

Polypeptide according to seq.ID.1 or having 90% homology thereto, biologically active and immunogenic fragments thereof, polynucleotide encoding it (e.g. seq.ID.18) or fragments thereof comprising at least 60 contiguous nucleotides, vector comprising said polynucleotide, host transformed with said vector and its use for producing said polypeptide, antibody against said polypeptide, method for detecting said polynucleotide through hybridization, method for identifying an (ant)agonist or a compound that alters the expression of said polypeptide, and a pharmaceutical composition of said polypeptide or said (ant)agonist.

2. Claims: Inventions 2-17: claims 1-23, all partially

Subject matter analogous to that defined above under invention 1, but limited to the respective protein sequences 2-17 and the nucleic acids encoding them, represented by sequences 19-34, whereby invention 2 is limited to seq.ID's 2 and 19, invention 3 is limited to seq.ID's 3 and 20,...., and invention 17 is limited to seq.ID's 17 and 34.

For the sake of conciseness, the first subject matter is explicitly defined, the other subject matters are defined by analogy thereto.