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*For two-letter codes and other abbreviations, refer to the "Guid-
ance Notes on Codes and Abbreviations" appearing at the begin-
ning of each regular issue of the PCT Gazette.*

(54) Title: MEDICAMENT INHALER

(57) Abstract: A new and improved inhaler includes an accurate and consistent mechanical dose metering system that dispenses dry powdered medicament in discrete amounts or doses for patient inhalation, a pressure relief system that manages pressure within a medicament reservoir of the inhaler to ensure consistently dispensed doses, and a dose counting system indicating the number of doses remaining in the inhaler.



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INTERNATIONAL SEARCH REPORT

International Application No

PCT/US 01/20098

A. CLASSIFICATION OF SUBJECT MATTER
IPC 7 A61M15/00

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 A61M

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)

EP0-Internal, PAJ

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	WO 94 05360 A (NORTON HEALTHCARE LTD ;ANGEL CLIVE GRAHAM (GB); HARRIS MARK ALEXAN) 17 March 1994 (1994-03-17) page 6, paragraph 3 -page 7, paragraph 2 page 9, paragraph 2 -page 10, paragraph 1; figures 1,2	1,29-39
X	GB 2 320 489 A (NORTON HEALTHCARE LTD) 24 June 1998 (1998-06-24) page 1, paragraph 2 claims 1-7	18-28
X	US 5 657 748 A (BRAITHWAITE PHILIP WILSON) 19 August 1997 (1997-08-19) column 5, line 52 -column 6, line 3; figures 5,6	18,19, 21-26
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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)

"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

28 June 2002

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05. 07. 2002

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INTERNATIONAL SEARCH REPORT

International Application No
PCT/US 01/20098

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 5 840 279 A (GOTTENAUER WOLFGANG ET AL) 24 November 1998 (1998-11-24) claims -----	29

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 01/20098

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:

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.:

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: 1-17

Inhaler with pressurisation of the powder reservoir having a pressure relieving means

2. Claims: 18-28

powder inhaler having a dose counter.

3. Claims: 29-39

Inhaler having a ratchet mechanism for moving the dosing member

INTERNATIONAL SEARCH REPORT
Information on patent family members

International Application No
PCT/US 01/20098

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INTERNATIONAL SEARCH REPORT

Information on patent family members

II International Application No

PCT/US 01/20098

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