METHOD FOR PREVENTING OR TREATING PAIN IN A MAMMAL

Abstract: Methods are provided for preventing or treating pain in a mammal comprising administering an inhibitor of p38β MAP kinase in a therapeutically effective amount to the mammal in need thereof.
# INTERNATIONAL SEARCH REPORT

## A. CLASSIFICATION OF SUBJECT MATTER

**IPC:**

C07H 21/04 (2006.01); A01N 43/04 (2006.01); C12Q 1/68 (2006.01); C12P 19/34 (2006.01); C12N 5/06 (2006.01)

**USPC:**

514/44, 2, 435/6, 91.1, 1325, 375, 536/23.1, 24.3, 24.5

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.: 514/44, 2; 435/6, 91.1, 325, 375; 536/23.1, 24.3, 24.5

Documented 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)

Please See Continuation Sheet

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

<table>
<thead>
<tr>
<th>Category</th>
<th>Citation of document, with indication, where appropriate, of the relevant passages</th>
<th>Relevant to claim No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>X</td>
<td>UNDERWOOD et al. SB239063, a potent p38 MAP kinase inhibitor, reduces inflammatory cytokine production, airways eosinophil infiltration, and persistence. Journal of Pharmacology and Experimental Therapeutics, 2000 Vol. 293, pages 281-293, see Abstract, Figure 1, and Table 2.</td>
<td>1, 3, 5-14, 16-25, 31</td>
</tr>
<tr>
<td>X</td>
<td>LEE et al. MAP kinase p38 inhibitors: Clinical results and an intimate look at their interactions with p38 alpha protein. Current Medicinal Chemistry, 2005, Vol. 12, pages 2979-2994, see Abstract, Figure 1, Figure 3 and Table 1.</td>
<td>1, 3, 5-14, 16-29, 31</td>
</tr>
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<td>X</td>
<td>MYERS et al. Inhibition of p38 MAP kinase activity enhances axonal regeneration. Experimental Neurology, 2003 Vol. 184, pages 606-614, see Abstract and Figure 3.</td>
<td>1, 3, 5-14, 16-29, 31</td>
</tr>
<tr>
<td>X</td>
<td>KULIOPOULOS et al. Effect of selective inhibition of the p38 MAP kinase pathway on platelet aggregation. Thromb Haemost, 2004, Vol. 92, pages 1387-1393, see Abstract and Figure 1.</td>
<td>1, 3, 5-14, 16-29, 31</td>
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</tbody>
</table>

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 application or patent 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
- "R" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principles or theory underlying the invention
- "S" 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
- "V" 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

Date of the actual completion of the international search:

07 August 2006 (07.08.2006)

Date of mailing of the international search report:

31 August 2006 (07.08.2006)

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Mail Stop PCT, Attn: ISA/US
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
Facsimile No. (571) 273-3201

Authorized officer

Terra C. Gibbs

Telephone No. 571-272-0564

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<tr>
<td>X</td>
<td>SVENSSON et al. Spinal p38beta isoform mediates tissue injury-induced hyperalgesia and spinal sensitization. <em>Journal of Neurochemistry</em>, 2005 Vol. 92, pages 1508-1520, see Abstract, page 1509, second column, Figure 1, Table 1, and Figures 6 and 7.</td>
<td>1, 2, 4-15, 17-30, and 32</td>
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</tbody>
</table>
Continuation of B. FIELDS SEARCHED Item 3:
WEST and STN databases searched
NPL and Medline databases searched
search terms: p38 beta MAP kinase, p38 beta mitogen activated protein kinase, antisense, siRNA, short hairpin RNA, ribozyme inhibit