APPARATUS AND METHOD FOR TRANSMITTING PILOT SIGNAL IN WIRELESS COMMUNICATION SYSTEM

Abstract: An apparatus and method for reducing pilot overhead in a multi-antenna system are provided. The method generates postcodes and pre-codes for streams used to transmit signals to at least two receivers. The method allocates a pilot signal to at least one of the streams, and allocates an additional pilot signal shared by at least one of the streams. The method precedes the pilot signal allocated to at least one of the streams, the additional pilot signal, and data to be transmitted to each of the receivers, based on the pre-code for each of the streams, prior to transmission.
— before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments (Rule 48.2(h))
INTERNATIONAL SEARCH REPORT

A. CLASSIFICATION OF SUBJECT MATTER

H04B 1/76(2006.01)i

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 8 H04B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched
Korean Utility models and applications for Utility Models since 1975
Japanese Utility models and applications for Utility Models since 1975

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
eKOMPASS(KIPO internal) "reduce, pilot, antenna, postcode, code, transmit"

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>
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<tbody>
<tr>
<td>A</td>
<td>KR 10-2007-0103717 A (SAMSUNG ELECTRONICS INC.) 24 October 2007&lt;br&gt;See the abstract, and figure 1.</td>
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<td>KR 10-2007-0101743 A (SAMSUNG ELECTRONICS INC.) 17 October 2007&lt;br&gt;See the abstract, and figure 7.</td>
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<td>A</td>
<td>US 2008-0075196 A1 (KIM et al.) 27 March 2008&lt;br&gt;See the abstract, and figure 1.</td>
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□ Further documents are listed in the continuation of Box C.  
× See patent family annex.

* Special categories of cited documents:
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Date of the actual completion of the international search
03 DECEMBER 2009 (03.12.2009)

Date of mailing of the international search report
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