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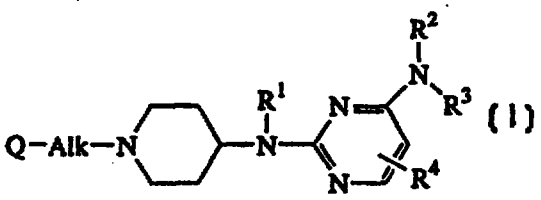
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(54) Title: 2,4-DIAMINOPYRIMIDINE DERIVATIVES AS DOPAMINE D4 RECEPTOR ANTAGONISTS

(57) Abstract

The present invention concerns the compounds of formula (I), the N-oxide forms, the pharmaceutically acceptable acid addition salts and stereochemically isomeric forms thereof, wherein Alk is C_{1-6}alkanediyl or C_{3-6}alkenediyl; R^1 is hydrogen or C_{1-4}alkyl; R^2 and R^3 each independently are hydrogen, C_{1-6}alkyl or C_{3-7}cycloalkyl; or R^2 and R^3 may also be taken together with the nitrogen atom to which they are attached, thus forming a pyrrolidine, a piperidine or a perhydro azepine ring; R^4 is hydrogen or halo; Q is aryl, aryloxy, di(aryl)methyl or heteroaryl; aryl is naphthyl or phenyl, said naphthyl and phenyl may optionally be substituted; and heteroaryl is quinolinyl, isoquinolinyl, pyridinyl, thienyl, indolyl, 2,3-dihydro-1,4-benzodioxinyl, 2,3-dihydro-benzofuranyl or benzodioxolanyl; said heteroaryls may optionally be substituted; it further relates to processes for their preparation, compositions comprising them as well as their use as a medicine; compounds of formula (I) containing a radioactive isotope; a process of marking dopamine D_4 receptor sites; and a process for imaging an organ are disclosed.



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