(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau

(43) International Publication Date
26 February 2009 (26.02.2009)

PCT

(10) International Publication Number
WO 2009/024502 A1

(51) International Patent Classification:

C07D 207/08 (2006.01)	***A61K 31/4468*** (2006.01)
C07D 401/06 (2006.01)	***A61K 31/496*** (2006.01)
C07D 401/14 (2006.01)	***A61K 31/506*** (2006.01)
C07D 403/06 (2006.01)	***A61K 31/5377*** (2006.01)
C07D 403/14 (2006.01)	***A61P 23/00*** (2006.01)
C07D 487/04 (2006.01)	***A61P 25/00*** (2006.01)
C07D 491/04 (2006.01)	***A61P 25/16*** (2006.01)
C07D 491/10 (2006.01)	

(21) International Application Number:
PCT/EP2008/060566

(22) International Filing Date: 12 August 2008 (12.08.2008)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
07114790.4 22 August 2007 (22.08.2007) EP

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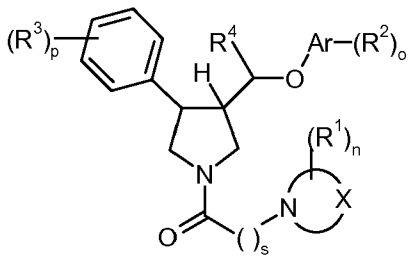
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(81) Designated States *(unless otherwise indicated, for every kind of national protection available)*: AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW.

(84) Designated States *(unless otherwise indicated, for every kind of regional protection available)*: ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV, MC, MT, NL, NO, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:
— *with international search report*

(54) Title: PYRROLIDINE ARYL-ETHER AS NK3 RECEPTOR ANTAGONISTS



(I)

(57) Abstract: The invention relates to a compound of general formula (I) wherein is aryl or a five or six membered heteroaryl; is a six to nine membered mono or bi-heterocyclic group, wherein X may be a carbon atom, SO_2 or a further hetero atom, selected from the group consisting of N or O; if X is a carbon atom, O, SO_2 or unsubstituted N, then R_1 is hydrogen, hydroxy, cyano, -(CH $_2$) $_q$ -OH, -(CH $_2$) $_q$ -NRR', -(CH $_2$)$_q$-CN, lower alkyl, -S(O)$_2$ -lower alkyl, -NR-S(O) $_2$ -lower alkyl, -C(O)-lower alkyl, -NR-C(O)-lower alkyl, phenyl, or is a heterocyclic group selected from piperidinyl-$_2$-one; if X is a N-atom, substituted by R $_1$, then R $_1$ is hydrogen, -(CH $_2$) $_q$ -OH, -(CH $_2$) $_q$ -NRR', -(CH $_2$)$_q$-CN, lower alkyl, -S(O) $_2$ - lower alkyl, aryl or a five or six membered heteroaryl or -C(O)-lower alkyl, provided that q is 2 or 3. R/R' are independently from each other hydrogen or lower alkyl; R $_2$ is hydrogen, halogen, lower alkyl, cyano, lower alkoxy substituted by halogen, lower alkyl substituted by halogen or is a five or six membered heteroaryl; R $_3$ is hydrogen or halogen; R $_4$ is hydrogen or lower alkyl; n is 1 or 2; in case n is 2, R $_1$ may be the same or different; o is 1 or 2; in case o is 2, R_2 may be the same or different; p is 1 or 2; in case p is 2, R $_3$ may be the same or different; $_q$ is 1, 2 or 3; s is 0, 1, 2, 3 or 4; or to a pharmaceutically active salt thereof, including all stereoisomeric forms, individual diastereoisomers and enantiomers of the compound of formula (I) as well as racemic and non-racemic mixtures thereof. It has been found that the present compounds are high potential NK-3 receptor antagonists for the treatment of depression, pain, psychosis, Parkinson's disease, schizophrenia, anxiety and attention deficit hyperactivity disorder (ADHD).

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