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

(19) World Intellectual Property Organization
International Bureau

(43) International Publication Date
7 April 2011 (07.04.2011)

PCT

(10) International Publication Number
WO 2011/039724 A1

(51) International Patent Classification:
C07K 16/28 (2006.01) *A61P 35/00* (2006.01)
A61K 47/48 (2006.01) *A61K 39/395* (2006.01)

(21) International Application Number:
PCT/IB2010/054422

(22) International Filing Date:
30 September 2010 (30.09.2010)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
09305938.4 2 October 2009 (02.10.2009) EP

(71) Applicant *(for all designated States except US)*: **SANOFI-AVENTIS** [FR/FR]; 174 avenue de France, F-75013 Paris (FR).

(72) Inventors; and

(75) Inventors/Applicants *(for US only)*: **BOUCHARD, Hervé** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **COMMERCON, Alain** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **FROMOND, Claudia** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **MIKOL, Vincent** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **PARKER, Fabienne** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **SASSOON, Ingrid** [FR/FR]; c/o Sanofi-Aventis Département Brevets, 174 Avenue de France, F-75013 Paris (FR). **TAVARES, Daniel** [US/US]; c/o ImmunoGen Inc. 830 Winter Street, Waltham, Massachusetts 02451 (US).

(74) Agent: **BOUVET, Philippe**; c/o sanofi-aventis, Patent Department, 174 avenue de France, F-75013 Paris (FR).

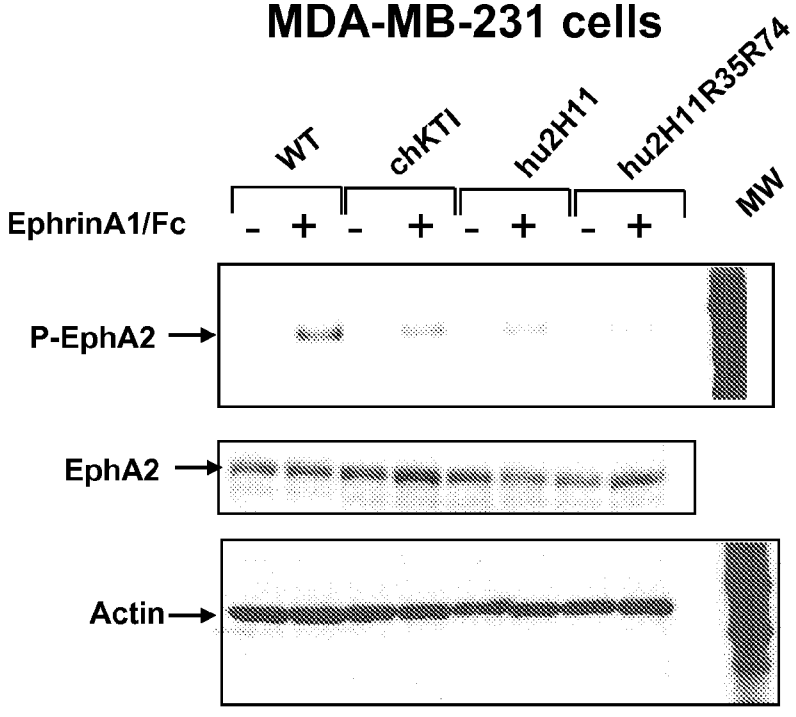
(81) Designated States *(unless otherwise indicated, for every kind of national protection available)*: AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, 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,

[Continued on next page]

(54) Title: ANTIBODIES THAT SPECIFICALLY BIND TO THE EPHA2 RECEPTOR

(57) Abstract: The present disclosure relates to an antibody or an epitope-binding fragment thereof that specifically binds to an EphA2 receptor. It further relates to a conjugate comprising a cytotoxic agent which is covalently bound to the antibody and a method for preparing such a conjugate.

Fig. 5B



WO 2011/039724 A1

NO, NZ, OM, PE, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, 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, LR, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV, MC, MK, MT, NL, NO, PL, PT, RO, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Declarations under Rule 4.17:

— *of inventorship (Rule 4.17(iv))*

Published:

— *with international search report (Art. 21(3))*

— *with sequence listing part of description (Rule 5.2(a))*