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

(19) World Intellectual Property Organization
International Bureau

(43) International Publication Date
24 March 2016 (24.03.2016)

WIPO | PCT

(10) International Publication Number
WO 2016/043788 A1

(51) International Patent Classification:
C07K 16/28 (2006.01)

(21) International Application Number:
PCT/US2014/065048

(22) International Filing Date:
11 November 2014 (11.11.2014)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
62/051,200 16 September 2014 (16.09.2014) US

(71) Applicant: **UNITED BIOMEDICAL, INC** [US/US]; 25 Davids Drive, Hauppauge, New York 11788 (US).

(72) Inventor: **WANG, Chang Yi**; 47 Snake Hill Road, Cold Spring Harbor, New York 11724 (US).

(74) Agent: **SCHURTER, Brandon T.**; Locke Lord LLP, 3 World Financial Center, New York, New York 10281 (US).

(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, BN, 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, IR, IS, JP, KE, KG, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PA, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW, SA, 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, RW, SD, SL, ST, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, 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, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, KM, ML, MR, NE, SN, TD, TG).

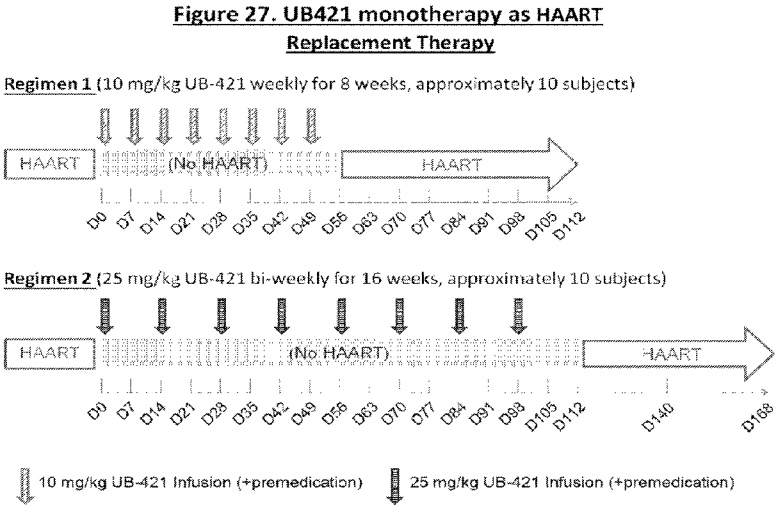
Published:

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

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

WO 2016/043788 A1

(54) Title: TREATMENT AND FUNCTIONAL CURE OF HIV INFECTION BY MONOCLONAL ANTIBODIES TO CD4 MEDIATING COMPETITIVE HIV ENTRY INHIBITION



(57) Abstract: The present disclosure is directed to compositions and methods for the prevention, treatment, and/or functional cure of HIV infection. One aspect of the present disclosure relates to monoclonal antibodies directed against CD4, compositions thereof, and methods employing such compositions for the prevention, treatment, and functional cure of HIV infection.