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

(19) World Intellectual Property Organization
International Bureau

(43) International Publication Date
13 September 2012 (13.09.2012)

WIPO | PCT

(10) International Publication Number
WO 2012/122242 A3

(51) International Patent Classification:
G01N 33/53 (2006.01)

(21) International Application Number:
PCT/US2012/028023

(22) International Filing Date:
7 March 2012 (07.03.2012)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
61/451,487 10 March 2011 (10.03.2011) US

(71) Applicant *(for all designated States except US)*: **THE REGENTS OF THE UNIVERSITY OF CALIFORNIA** [US/US]; 1111 Franklin Street, 12th Floor, Oakland, California 94607-5200 (US).

(72) Inventors; and

(75) Inventors/Applicants *(for US only)*: **KANE, John P.** [US/US]; 1490 Malborough Road, Hillsborough, California 94010 (US). **ISHIDA, Brian** [US/US]; 80 Kings Oak Place, Walnut Creek, California 94597 (US).

(74) Agent: **BORDEN, Paula A.**; BOZICEVIC, FIELD & FRANCIS LLP, 1900 University Avenue, Suite 200, East Palo Alto, California 94303 (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, 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, NO, NZ, OM, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW, 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, 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, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

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

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

(88) Date of publication of the international search report:
17 April 2014

WO 2012/122242 A3

(54) Title: COMPOSITIONS AND METHODS FOR DETERMINING RISK OF A CARDIOVASCULAR OCCLUSIVE EVENT

(57) Abstract: The present disclosure provides methods for assessing risk of a cardiovascular occlusive event in an individual. The methods find use in diagnostic and prognostic applications. The present disclosure provides a method for measuring the level of pre?-1 high density lipoprotein in a biological sample; and also provides kits for use in carrying out the method.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 12/28023

A. CLASSIFICATION OF SUBJECT MATTER
IPC(8) - G01N 33/53 (2012.01)
USPC - 435/7.1; 204/456
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) - G01N 33/53 (2012.01)
USPC - 435/7.1; 204/456

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
PubWest (PGPB,USPT,USOC,EPAB,JPAB); PubMed (MEDLINE)
method, assess, measure, determine, esimatate, identify, risk, cardiac, cardiovascular, myocardial, kit, HDL, ApoAI, pre-beta

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X ----- Y	MIIDA et al., Pre beta 1-high-density lipoprotein increases in coronary artery disease. Clin Chem., December 1996; vol 42, no 12, pp 1992-5; pg 1991, col 2, para 4; pg 1992, col 2, para 1, 3; pg 1993, col 1, para 2, 4; pg 1993, col 4, para 4; pg 1994, col 1, para 2; pg 1994, col 2, para 1; Fig 1-3	1-13, 15-19 ---------- 14, 20-27
Y	FIELDING et al., Unique epitope of apolipoprotein A-I expressed in pre-beta-1 high-density lipoprotein and its role in the catalyzed efflux of cellular cholesterol. Biochemistry, 07 June 1994; vol 33, no 22, pp 6981-5; pg 6982, col 2, para 1; Fig 1	14, 23
Y	US 7,749,729 B2 (HEINECKE et al.) 06 July 2010 (06.07.2010) col 15, ln 44- col 17, ln 14; col 20, ln 58; col 25, ln 6	20-27

☐ Further documents are listed in the continuation of Box C. ☐

* Special categories of cited documents:
"A" document defining the general state of the art which is not considered to be of particular relevance
"E" earlier application or patent but published on or after the international filing date
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
"O" document referring to an oral disclosure, use, exhibition or other means
"P" document published prior to the international filing date but later than the priority date claimed
"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
"&" document member of the same patent family

Date of the actual completion of the international search	Date of mailing of the international search report
25 May 2012 (25.05.2012)	08 JUN 2012

Name and mailing address of the ISA/US	Authorized officer:
Mail Stop PCT, Attn: ISA/US, Commissioner for Patents P.O. Box 1450, Alexandria, Virginia 22313-1450 Facsimile No. 571-273-3201	Lee W. Young PCT Helpdesk: 571-272-4300 PCT OSP: 571-272-7774