

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

(19) World Intellectual Property
Organization

International Bureau

(43) International Publication Date
27 June 2019 (27.06.2019)



(10) International Publication Number
WO 2019/122337 A1

(51) International Patent Classification:

C07K 16/28 (2006.01) *A61P 35/00* (2006.01)
A61K 45/06 (2006.01) *A61K 39/395* (2006.01)

Published:

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

(21) International Application Number:

PCT/EP2018/086606

(22) International Filing Date:

21 December 2018 (21.12.2018)

(25) Filing Language:

English

(26) Publication Language:

English

(30) Priority Data:

PCT/IB2017/001595

21 December 2017 (21.12.2017) IB

(71) Applicant: **DEBIOPHARM INTERNATIONAL S.A.**
[CH/CH]; Forum "après-demain", Chemin Messidor 5-7,
1002 Lausanne (CH).

(72) Inventors: **VUAGNIAUX, Grégoire**; Rue Orient-Ville
8, 1005 Lausanne (CH). **WIEDEMANN, Norbert**; Av-
enue Fantaisie 6, 1006 Lausanne (CH). **GAVILLET**
FRANCE, Bruno; 430 route de Pitegny, 01220 Grilly (FR).
SZYLDERGEMAJN ALTMAN, Sergio Adrian; Chemin
des Hirondelles 10, 1162 Saint Prex (CH).

(74) Agent: **HOFFMANN EITLE PATENT- UND**
RECHTSANWÄLTE PARTMBB; Arabellastraße 30,
81925 Munich (DE).

(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, DJ, DK, DM, DO,
DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN,
HR, HU, ID, IL, IN, IR, IS, JO, JP, KE, KG, KH, KN, KP,
KR, KW, 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).

(54) Title: COMBINATION ANTI CANCER THERAPY WITH AN IAP ANTAGONIST AND AN ANTI PD-1 MOLECULE

(57) Abstract: Disclosed is the use of an IAP antagonist for pretreating a human subject diagnosed with a cancer to enhance the likelihood that a subsequent treatment with an anti-PD-1 molecule results in an anti-cancer response or to enhance the responsiveness of the subject's cancer to the subsequent treatment with the anti-PD-1 molecule. Also encompassed are methods of treatment of a subject's cancer, the methods comprising pretreatment of the subject with an IAP antagonist and subsequent treatment of the subject with an anti-PD-1 molecule.

