

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

(19) World Intellectual Property
Organization
International Bureau

(43) International Publication Date
15 July 2021 (15.07.2021)



(10) International Publication Number
WO 2021/141757 A1

- (51) International Patent Classification:
G16B 40/20 (2019.01) *G16H 30/40* (2018.01)
- (21) International Application Number:
PCT/US2020/065995
- (22) International Filing Date:
18 December 2020 (18.12.2020)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data:
62/957,517 06 January 2020 (06.01.2020) US
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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, 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, IT, 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,

(54) Title: SYSTEMS AND METHODS FOR ANALYZING ELECTRONIC IMAGES FOR QUALITY CONTROL

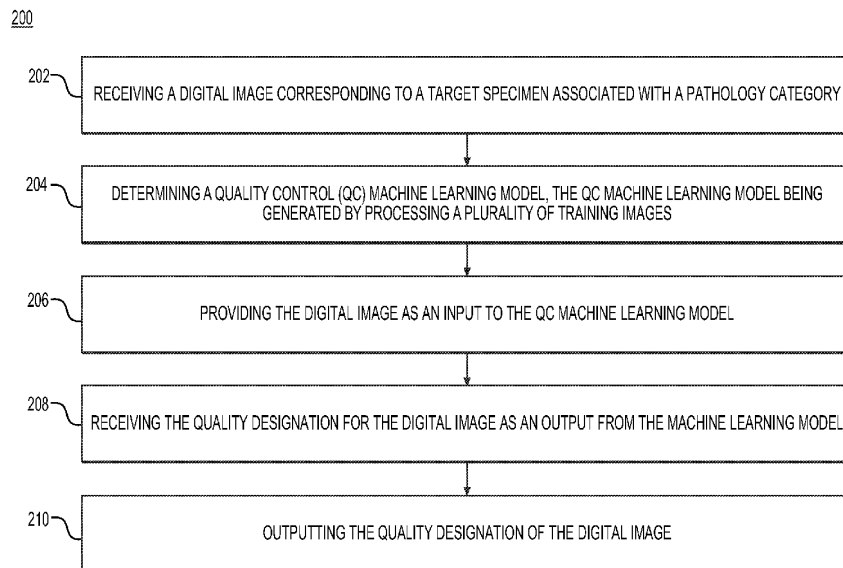


FIG. 2A

(57) Abstract: Systems and methods are disclosed for receiving a digital image corresponding to a target specimen associated with a pathology category, determining a quality control (QC) machine learning model to predict a quality designation based on one or more artifacts, providing the digital image as an input to the QC machine learning model, receiving the quality designation for the digital image as an output from the machine learning model, and outputting the quality designation of the digital image. A quality assurance (QA) machine learning model may predict a disease designation based on one or more biomarkers. The digital image may be provided to the QA model which may output a disease designation. An external designation may be compared to the disease designation and a comparison result may be output.

[Continued on next page]

WO 2021/141757 A1

SA, SC, SD, SE, SG, SK, SL, ST, SV, SY, TH, TJ, TM, TN,
TR, TT, TZ, UA, UG, US, UZ, VC, VN, WS, 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))