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17/468,396 07 September 2021 (07.09.2021) US(71) Applicant: **QUALCOMM INCORPORATED** [US/US];
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5775 Morehouse Drive, San Diego, California 92121-1714 (US).(74) Agent: **SWICKHAMER, Christopher M.**; Holland &
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(US).(81) Designated States (unless otherwise indicated, for every
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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,
SA, SC, SD, SE, SG, SK, SL, ST, SV, SY, TH, TJ, TM, TN,
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EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV,
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TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW,
KM, ML, MR, NE, SN, TD, TG).

(54) Title: RESOURCE SET CONFIGURATION REPORTING WITH MULTIPLE CHANNEL AND INTERFERENCE MEASUREMENTS

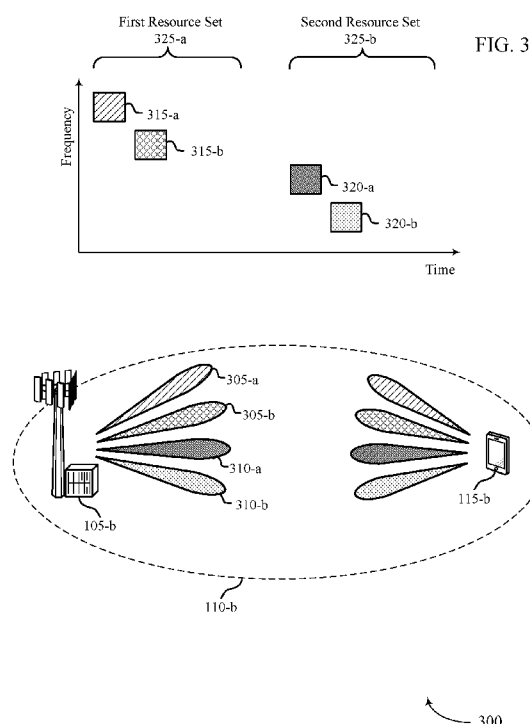


FIG. 3

(57) Abstract: Methods, systems, and devices for wireless communica-
tions are described. A user equipment (UE) may receive a reporting con-
figuration that may include a number of channel measurement or inter-
ference measurement resource sets that the UE may measure in accord-
ance with one or more reporting quantities. Based on receiving multi-
ple resource sets in a reporting configuration from the base station, the
UE may generate and transmit a measurement report including resource
sets contained in the reporting configuration. This may allow the UE to
report different report quantities between different resource sets indicat-
ed by a base station. In addition, the UE may be configured to rank mea-
surements using different reporting quantities. The report configuration
may configure the UE to perform measurements of different resources in
accordance with one or more reporting quantities, and the UE may apply
a rule to rank different measurements based on the indicated reporting
quantities.

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- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments (Rule 48.2(h))*

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INTERNATIONAL SEARCH REPORT

International application No

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A. CLASSIFICATION OF SUBJECT MATTER

INV. H04L5/00 H04B7/00

ADD.

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)

H04L H04B

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)

EPO-Internal, WPI Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	HUAWEI ET AL: "Summary of remaining issues for CSI reporting", 3GPP DRAFT; R1-1800095 , vol. RAN WG1, no. Vancouver, Canada; 20180122 - 20180126 13 January 2018 (2018-01-13), XP051384591, Retrieved from the Internet: URL: http://www.3gpp.org/ftp/tsg%5Fran/WG1%5FRL1/TSGR1%5FAH/NR%5FAH%5F1801/Docs/ [retrieved on 2018-01-13] Sections 1-4 ----- -/--	1-10, 17-26



Further documents are listed in the continuation of Box C.



See patent family annex.

* 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

28 February 2022

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09/03/2022

Name and mailing address of the ISA/

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C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	HUAWEI ET AL: "Remaining issues for CSI framework", 3GPP DRAFT; R1-1800529 , vol. RAN WG1, no. Vancouver, Canada; 20180122 - 20180126 13 January 2018 (2018-01-13), XP051384907, Retrieved from the Internet: URL: http://www.3gpp.org/ftp/tsg%5Fran/WG1%5FRL1/TSGR1%5FAH/NR%5FAH%5F1801/Docs/ [retrieved on 2018-01-13] Sections 1-3 -----	1-10, 17-26
X	CATT: "General CSI framework for CSI acquisition and beam management", 3GPP DRAFT; R1-1717814 , vol. RAN WG1, no. Prague, CZ; 20171009 - 20171013 8 October 2017 (2017-10-08), XP051340999, Retrieved from the Internet: URL: http://www.3gpp.org/ftp/Meetings_3GPP_SYNC/RAN1/Docs/ [retrieved on 2017-10-08] Sections 1-3 -----	1-10, 17-26
X	EP 3 618 491 A1 (HUAWEI TECH CO LTD [CN]) 4 March 2020 (2020-03-04) paragraph [0007] - paragraph [0036] paragraph [0070] - paragraph [0187] -----	1, 11-17, 27-30
X	WO 2020/034312 A1 (ZTE CORP [CN]) 20 February 2020 (2020-02-20) paragraph [0022] - paragraph [0025] paragraph [0043] - paragraph [0078] paragraph [0147] - paragraph [0171] -----	11-16, 27-30

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US2021/049369

Box No. II Observations where certain claims were found unsearchable (Continuation of item 2 of first sheet)

This international search report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☐ Claims Nos.:
because they relate to subject matter not required to be searched by this Authority, namely:
2. ☐ Claims Nos.:
because they relate to parts of the international application that do not comply with the prescribed requirements to such an extent that no meaningful international search can be carried out, specifically:
3. ☐ Claims Nos.:
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

Box No. III Observations where unity of invention is lacking (Continuation of item 3 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

see additional sheet

1. ☒ As all required additional search fees were timely paid by the applicant, this international search report covers all searchable claims.
2. ☐ As all searchable claims could be searched without effort justifying an additional fees, this Authority did not invite payment of additional fees.
3. ☐ As only some of the required additional search fees were timely paid by the applicant, this international search report covers only those claims for which fees were paid, specifically claims Nos.:
4. ☐ No required additional search fees were timely paid by the applicant. Consequently, this international search report is restricted to the invention first mentioned in the claims;; it is covered by claims Nos.:

Remark on Protest

- ☐ The additional search fees were accompanied by the applicant's protest and, where applicable, the payment of a protest fee.
- ☐ The additional search fees were accompanied by the applicant's protest but the applicable protest fee was not paid within the time limit specified in the invitation.
- ☒ No protest accompanied the payment of additional search fees.

FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

This International Searching Authority found multiple (groups of) inventions in this international application, as follows:

1. claims: 1-10, 17-26

Generation of measurement reports for different resources

2. claims: 11-16, 27-30

Resource measurement using different reporting quantity types

INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No

PCT/US2021/049369

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
EP 3618491	A1	04-03-2020	BR 112019023213 A2	26-05-2020
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