

**UNITED STATES INTERNATIONAL TRADE COMMISSION**  
**Washington, D.C.**

**In The Matter of**

**CERTAIN MOBILE ELECTRONIC  
DEVICES AND RADIO FREQUENCY AND  
PROCESSING COMPONENTS THEREOF**

**Investigation No. 337-TA-1065**

**NOTICE OF A COMMISSION DETERMINATION TO REVIEW IN PART A FINAL  
INITIAL DETERMINATION FINDING A VIOLATION OF SECTION 337; SCHEDULE  
FOR FILING WRITTEN SUBMISSIONS ON THE ISSUES UNDER REVIEW AND ON  
REMEDY, PUBLIC INTEREST, AND BONDING; AND EXTENSION OF THE  
TARGET DATE**

**AGENCY:** U.S. International Trade Commission.

**ACTION:** Notice.

**SUMMARY:** Notice is hereby given that the U.S. International Trade Commission (the “Commission”) has determined to review in part the final initial determination (“ID”) of the administrative law judge (“ALJ”), which was issued on September 28, 2018. The Commission has determined to extend the target date for completion of the investigation to February 19, 2019.

**FOR FURTHER INFORMATION CONTACT:** Carl P. Bretscher, Office of the General Counsel, U.S. International Trade Commission, 500 E Street, SW, Washington, DC 20436, telephone (202) 205-2382. Copies of non-confidential documents filed in connection with this investigation are or will be available for inspection during official business hours (8:45 a.m. to 5:15 p.m.) in the Office of the Secretary, U.S. International Trade Commission, 500 E Street, SW, Washington, DC 20436, telephone (202) 205-2000. General information concerning the Commission may also be obtained by accessing its Internet server (<https://www.usitc.gov>). The public record for this investigation may be viewed on the Commission’s Electronic Docket Information System (“EDIS”) (<https://edis.usitc.gov>). Hearing-impaired persons are advised that information on this matter can be obtained by contacting the Commission’s TDD terminal, telephone (202) 205-1810.

**SUPPLEMENTARY INFORMATION:** On August 14, 2017, the Commission instituted this investigation based on a Complaint and amendment thereto filed by Qualcomm Incorporated of San Diego, California (“Qualcomm”). 82 FR 37899 (Aug. 14, 2017). The notice of investigation named Apple Inc. of Cupertino, California (“Apple”) as Respondent. The Complaint alleged violations of Section 337 of the Tariff Act of 1930, as amended (19 U.S.C. 1337), by reason of the importation into the United States, sale for importation, or sale within the United States after importation of certain mobile electronic devices and radio frequency and processing components thereof that infringe one or more claims of U.S. Patent No. 9,535,490

(“the ’490 patent”), U.S. Patent No. 8,698,558 (“the ’558 patent”), U.S. Patent No. 8,633,936 (“the ’936 patent”), U.S. Patent No. 8,838,949 (“the ’949 patent”), U.S. Patent No. 9,608,675 (“the ’675 patent”), and U.S. Patent No. 8,487,658 (“the ’658 patent”). The Office of Unfair Import Investigations (“OUII”) is also a party to this investigation.

The following claims were voluntarily terminated during the course of this investigation: all asserted claims of the ’658 patent, ’949 patent, and ’675 patent; claims 1, 20-24, 26, 38, 67, and 68 of the ’936 patent; claims 1, 6, and 8-20 of the ’558 patent; and claims 1-6, 8, 10, and 16-17 of the ’490 patent. Comm’n Notice (July 17, 2018) (*aff’g* Order No. 43); Comm’n Notice (May 23, 2018) (*aff’g* Order No. 37); Comm’n Notice (Apr. 6, 2018) (*aff’g* Order No. 34); Comm’n Notice (Mar. 22, 2018) (*aff’g* Order No. 24); Comm’n Notice (Sept. 20, 2017) (*aff’g* Order No. 6). The only claims still at issue are claim 31 of the ’490 patent, claim 7 of the ’558 patent, and claims 19, 25, and 27 of the ’936 patent.

The presiding administrative law judge (“ALJ”) originally set a target date for completion of this investigation within 17 months, *i.e.*, by January 14, 2019. Comm’n Notice (Sept. 11, 2017) (*aff’g* Order No. 3). The Commission subsequently agreed to extend the target date to January 28, 2019. Comm’n Notice (Sept. 26, 2018) (*aff’g* Order No. 44). The Commission also extended the date for determining whether to review the subject ID to December 12, 2018. Comm’n Notice (Nov. 9, 2018).

The ALJ held an evidentiary hearing from June 19-27, 2018. On September 28, 2018, the ALJ issued his final initial determination in this investigation. The ALJ found a violation of Section 337 due to infringement of the ’490 patent. ID at 197. The ALJ found no infringement and hence no violation of Section 337 with respect to the ’558 patent or ’936 patent. *Id.* The ALJ found that Qualcomm satisfied the technical and economic prongs of the domestic industry requirement with respect to the ’490 patent, but did not satisfy the technical prong with respect to the ’558 patent or ’936 patent. *Id.* The ALJ also found that it was not shown by clear and convincing evidence that any asserted claim was invalid. *Id.* The ALJ further recommended that no limited exclusion order or cease-and-desist order be issued in this investigation due to their prospective effects on competitive conditions in the United States, national security, and other public interest concerns. *Id.* at 199-200. The ALJ recommended that bond be set at zero-percent of entered value during the Presidential review period, if any. *Id.* at 201.

Apple and Qualcomm filed their respective petitions for review on October 15, 2018. The parties, including OUII, filed their respective responses to the petitions on October 23, 2018. The Commission has also received a number of public interest statements from third parties, including Intel Corporation; ACT/The App Association; the American Antitrust Institute; the American Conservative Union; Americans for Limited Government; the Computer and Communications Industry Association; Conservatives for Property Rights; Frances Brevets (a patent sovereign fund); Frontiers of Freedom; Innovation Alliance; Inventors Digest; IP Europe; Public Knowledge and Open Markets (a joint submission); RED Technologies; R Street Institute, the Electronic Frontier Foundation, Engine Advocacy, and Lincoln Network (a joint submission), *et al.*

Having reviewed the record in this investigation, including the ALJ's orders and final ID, as well as the parties' petitions and responses thereto, the Commission has determined to review the final ID in part, as follows.

As to the '490 patent, the Commission has determined to review the ALJ's construction of the term "hold" and his findings on infringement and the technical prong of domestic industry to the extent they may be affected by that claim construction. The Commission has further determined to review the ALJ's findings as to whether claim 31 of the '490 patent is obvious.

The Commission has determined not to review any of the ALJ's findings with respect to the '558 patent or the '936 patent.

The Commission has also determined not to review the ALJ's findings with respect to the economic prong of the domestic industry requirement.

The parties are asked to provide additional briefing on the following issues regarding the '490 patent, with appropriate reference to the applicable law and the existing evidentiary record. For each argument presented, the parties' submissions should set forth whether and/or how that argument was presented and preserved in the proceedings before the ALJ, in conformity with the ALJ's Ground Rules (Order No. 2), with citations to the record:

- A. With regard to the '490 patent, please explain the plain and ordinary meaning of the term "hold" in the context of claim 31 of this patent. In particular, explain whether the ordinary meaning of "hold" can mean both "to store, buffer, or accumulate" data and "to prevent data from traveling across the bus," or whether "hold" must be limited to one construction or the other.
- B. Assuming "hold" could be interpreted to mean "to store, buffer, or accumulate" data and "to prevent data from traveling across the bus," as set forth in Question (A), explain whether that construction would affect the ALJ's findings on infringement or the technical prong of domestic industry, and if so, how.
- C. Assuming "hold" could be interpreted to mean "to store, buffer, or accumulate" data and "to prevent data from traveling across the bus," as set forth in Question (A), explain whether that construction would affect the ALJ's analysis of either the Heinrich patent (U.S. Patent No. 9,329,671) or the Balasubramanian patent (U.S. Patent No. 8,160,000) or his findings on obviousness, and if so, how.
- D. The Heinrich patent, *supra*, explains that a scheduler may be implemented either through software or hardware to control interprocessor communications in both directions across a bus. *See* Heinrich at 4:44-50, 7:8-21, 8:1-5. Heinrich further teaches that the scheduler can monitor the active state of the receiving processor by monitoring the active state of the IPC bus. *See id.* at 9:50-62. Explain whether the active state of the bus connecting the two processors in Heinrich coincides with or is otherwise related to the active state(s) of the processor(s) receiving the transmission across the bus. If so, explain whether monitoring the active state of the receiving processor (by monitoring the bus) and timing data transmissions to

coincide with the active state of the receiving processor(s) will directly, indirectly, or inherently cause the transmissions to coincide with the active state of the bus.

- E. Based on your answer to Question (D), explain whether Heinrich's technique of grouping and scheduling transmissions to minimize the number of times a receiving processor switches between its active and sleep states will also minimize the number of times the bus switches between its active and sleep states.
- F. Taking into consideration the ALJ's construction of "after transmission," explain whether a scheduler that monitors the active states of both processors (*i.e.*, the application and baseband processors) and controls transmissions in both directions across the bus to coincide with the active state of each receiving processor will, in the course of its operation, directly, indirectly, or inherently "pull" uplink data from the application processor after the scheduler has initiated transmission of downlink data from the modem processor, as in claim 31.
- G. Explain whether the scheduler and/or lazy timers in Heinrich may comprise a "modem timer" and perform the functions of a modem processor in claim 31.
- H. Explain whether the Balasubramanian patent includes any disclosures or teachings relevant to Questions D-G for purposes of analyzing obviousness.
- F. Explain whether there is a long-felt but unmet need for the invention of the '990 patent, focusing particularly on evidence of a nexus between the invention and this secondary consideration of non-obviousness.

The parties are requested to brief only the discrete issues identified above, with reference to the applicable law and evidentiary record. The parties are not to brief any other issues on review, which have already been adequately presented in the parties' previous filings.

In connection with the final disposition of this investigation, the Commission may issue: (1) an exclusion order that could result in the exclusion of the subject articles from entry into the United States, and/or (2) a cease-and-desist order that could result in the respondent being required to cease and desist from engaging in unfair acts in the importation and sale of such articles. Accordingly, the Commission is interested in receiving written submissions that address the form of remedy, if any, that should be ordered. If a party seeks exclusion of an article from entry into the United States for purposes other than entry for consumption, the party should so indicate and provide information establishing that activities involving other types of entry either are adversely affecting it or likely to do so. For background, see *Certain Devices for Connecting Computers via Telephone Lines*, Inv. No. 337-TA-360, USITC Pub. No. 2843 (December 1994) (Commission Opinion).

If the Commission contemplates some form of remedy, it must consider the effects of that remedy upon the public interest. The factors the Commission will consider include the effect that an exclusion order and/or cease-and-desist order would have on: (1) the public health and welfare; (2) competitive conditions in the U.S. economy; (3) U.S. production of articles that are like or directly competitive with those that are subject to investigation; and (4) U.S. consumers.

The Commission is therefore interested in receiving written submissions that address the aforementioned public interest factors in the context of this investigation.

Accordingly, the Commission is interested in receiving responses to the following questions. For the purpose of preparing their responses, the parties should assume that a violation of Section 337 has been found with respect to claim 31 of the '490 patent only. No other patent or patent claim has been found to be infringed.

- A. Assuming the Commission were to affirm the ALJ's finding that only claim 31 of '490 patent is infringed and not invalid, explain the likelihood that Apple or Intel could design around the claimed invention to avoid infringement and, if so, approximately how long it would take to implement such a design-around in Apple's accused products (if known).
- B. Explain whether and to what extent Intel supplies the same chipsets used in the accused Apple iPhones to any other U.S. merchant for use in any other products that are made, used, or sold in the United States or imported into the United States.
- C. Explain whether the "carve-outs" proposed by the Office of Unfair Import Investigations would be practicable, feasible, and would effectively balance enforcement of Qualcomm's '490 patent rights against the interest of avoiding Intel's exit from the relevant market for premium baseband chipsets.
- D. Explain whether delaying implementation of a limited exclusion order or cease-and-desist order for a fixed period of time (*e.g.*, six months or one year) would effectively balance enforcement of Qualcomm's patent rights against the adverse consequences alleged by the parties with respect to industry competition, monopolization, the alleged exit of Apple's chipset supplier from the market for 5G technology, and other concerns. If not, explain whether any other "carve-out" or limitation in a remedial order can accomplish this objective.
- E. Explain whether national security concerns may be taken into consideration for the purpose of evaluating the public interest and, if so, whether and how such national security concerns would be implicated if a limited exclusion order were to issue covering products that infringe claim 31 of the '490 patent.

If the Commission orders some form of remedy, the U.S. Trade Representative, as delegated by the President, has 60 days to approve or disapprove the Commission's action. *See* Presidential Memorandum of July 21, 2005. 70 *Fed. Reg.* 43251 (July 26, 2005). During this period, the subject articles would be entitled to enter the United States under bond, in an amount determined by the Commission and prescribed by the Secretary of the Treasury. The Commission is therefore interested in receiving submissions concerning the amount of the bond that should be imposed if a remedy is ordered.

The Commission has determined to extend the target date for completion of this investigation to February 19, 2019.

**WRITTEN SUBMISSIONS:** The parties to this investigation are requested to file written submissions on the issues identified in this Notice. Parties to the investigation, interested government agencies, and any other interested parties are also encouraged to file written submissions on the issues of remedy, the public interest, and bonding. Such submissions should address the recommended determination by the ALJ on remedy and bonding. Complainant and OUII are requested to submit proposed remedial orders for the Commission’s consideration. Complainant is also requested to state the date that the patents expire and the HTSUS numbers under which the accused products are imported. Complainant is further requested to supply the names of known importers of the Respondent’s products at issue in this investigation. The written submissions and proposed remedial orders must be filed no later than the close of business on January 3, 2019. Reply submissions must be filed no later than the close of business on January 10, 2019. Opening submissions are limited to 60 pages. Reply submissions are limited to 40 pages. Such submissions should address the ALJ’s recommended determination on remedy and bonding. No further submissions on any of these issues will be permitted unless otherwise ordered by the Commission.

Persons filing written submissions must file the original document electronically on or before the deadlines stated above and submit eight (8) true paper copies to the Office of the Secretary by noon the next day, pursuant to section 201.4(f) of the Commission’s Rule of Practice and Procedure (19 CFR 210.4(f)). Submissions should refer to the investigation number (“Inv. No. 337-TA-1065”) in a prominent place on the cover page and/or first page. (*See Handbook for Electronic Filing Procedures, [https://www.usitc.gov/documents/handbook\\_on\\_filing\\_procedures.pdf](https://www.usitc.gov/documents/handbook_on_filing_procedures.pdf)*). Persons with questions regarding filing should contact the Secretary (202-205-2000).

Any person desiring to submit a document to the Commission in confidence must request confidential treatment. All such requests should be directed to the Secretary to the Commission and include a full statement of the reasons why the Commission should grant such treatment. *See* 19 CFR 201.6. Documents for which confidential treatment by the Commission is properly sought will be treated accordingly. All information, including confidential business information and documents for which confidential treatment is properly sought, submitted to the Commission for purposes of this Investigation may be disclosed to and used: (i) by the Commission, its employees and Offices, and contract personnel (a) for developing or maintaining the records of this or a related proceeding, or (b) in internal investigations, audits, reviews, and evaluations relating to the programs, personnel, and operations of the Commission including under 5 U.S.C. Appendix 3; or (ii) by U.S. government employees and contract personnel<sup>1</sup> solely for cybersecurity purposes. All non-confidential written submissions will be available for public inspection at the Office of the Secretary and on EDIS.

The authority for the Commission’s determination is contained in Section 337 of the Tariff Act of 1930, as amended (19 U.S.C. 1337), and in part 210 of the Commission’s Rules of Practice and Procedure (19 CFR part 210).

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<sup>1</sup> All contract personnel will sign appropriate nondisclosure agreements.

By order of the Commission.

A handwritten signature in black ink, appearing to read 'Lisa R. Barton', written in a cursive style.

Lisa R. Barton  
Secretary to the Commission

Issued: December 12, 2018